



LTE Band 12 / 1.4MHz / 16QAM

Lowest Band Edge / 1 RB



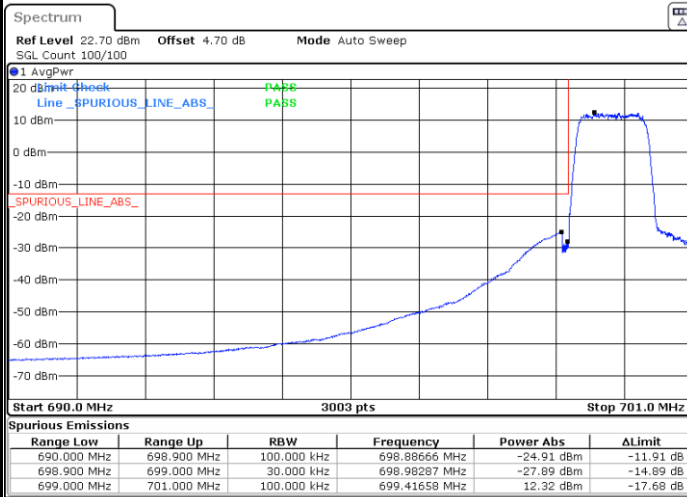
Date: 30 DEC 2020 14:05:42

Highest Band Edge / 1 RB



Date: 30 DEC 2020 14:13:35

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:09:05

Highest Band Edge / Full RB

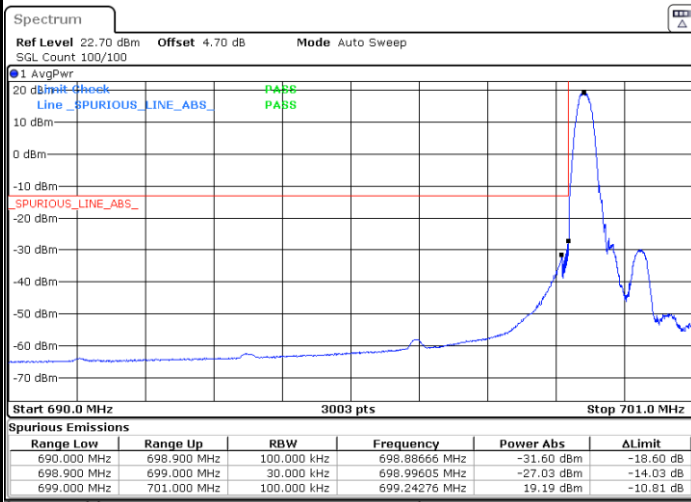


Date: 30 DEC 2020 14:10:12



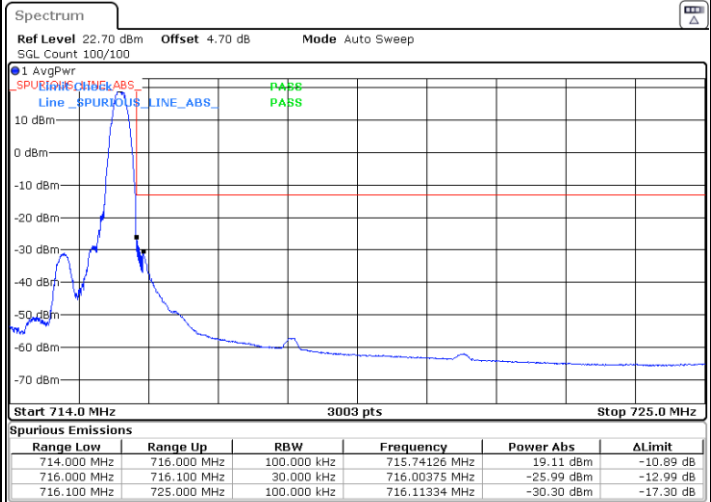
LTE Band 12 / 1.4MHz / 64QAM

Lowest Band Edge / 1 RB



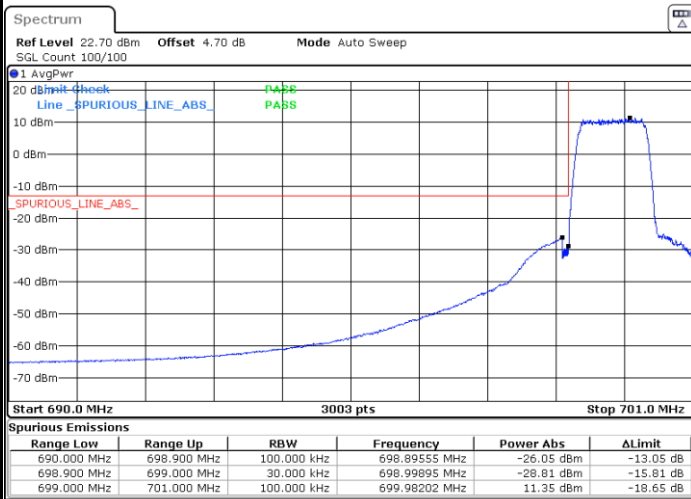
Date: 30 DEC 2020 14:43:59

Highest Band Edge / 1 RB



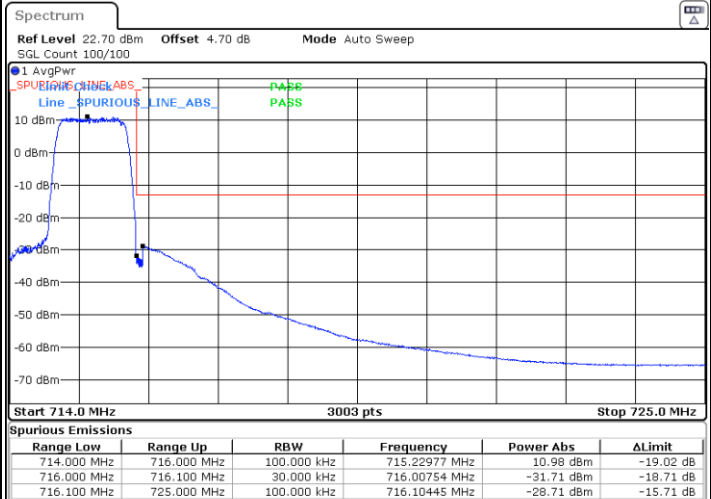
Date: 30 DEC 2020 14:41:44

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:45:06

Highest Band Edge / Full RB

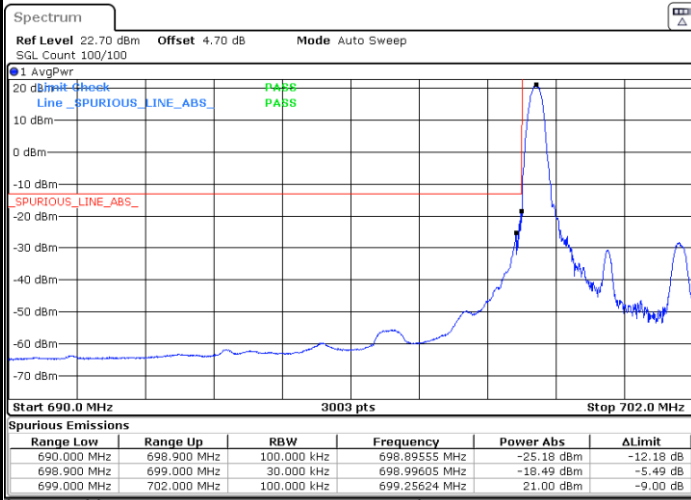


Date: 30 DEC 2020 14:42:51



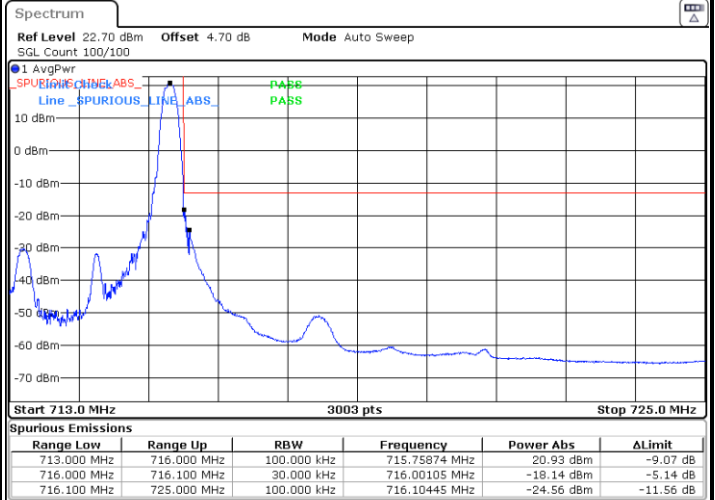
LTE Band 12 / 3MHz / QPSK

Lowest Band Edge / 1RB



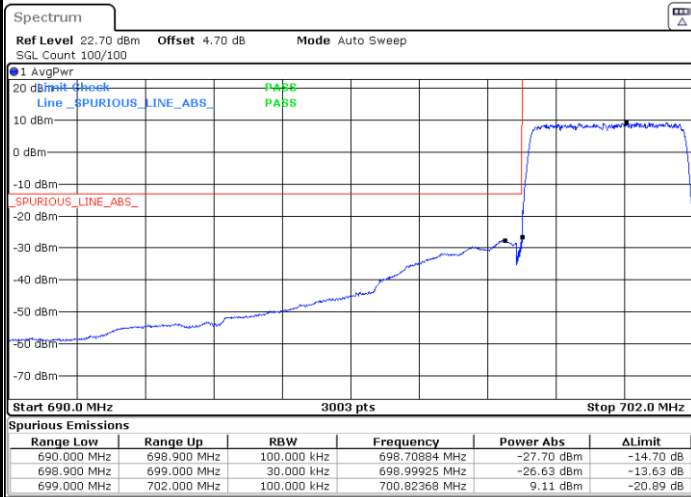
Date: 30 DEC 2020 14:15:50

Highest Band Edge / 1 RB



Date: 30 DEC 2020 14:21:28

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:16:58

Highest Band Edge / Full RB

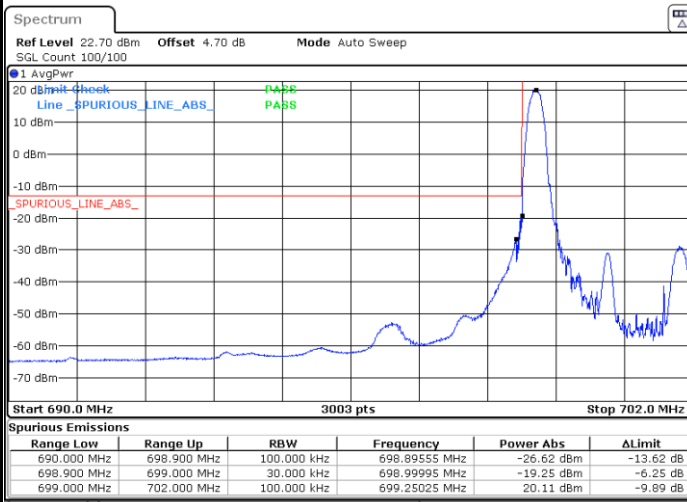


Date: 30 DEC 2020 14:20:20



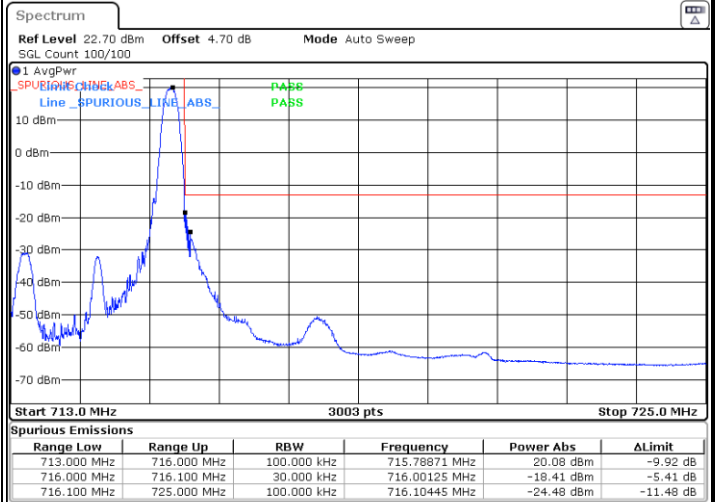
LTE Band 12 / 3MHz / 16QAM

Lowest Band Edge / 1 RB



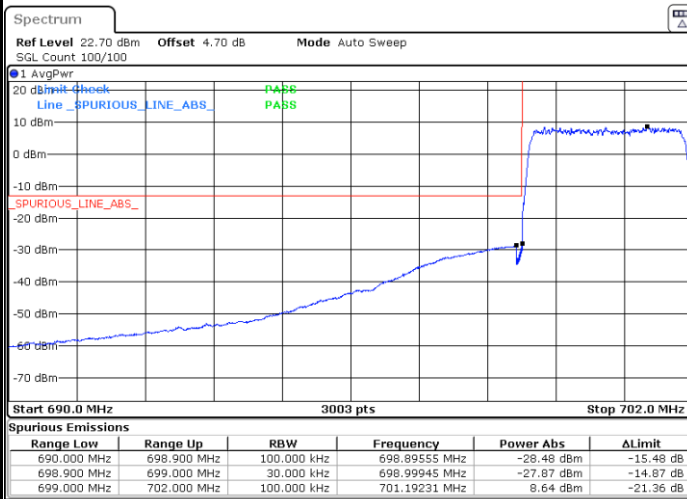
Date: 30 DEC 2020 14:14:43

Highest Band Edge / 1 RB



Date: 30 DEC 2020 14:22:35

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:18:05

Highest Band Edge / Full RB

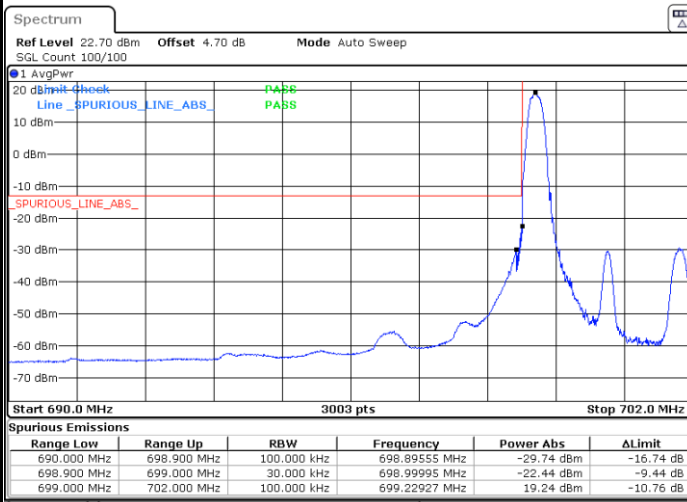


Date: 30 DEC 2020 14:19:13



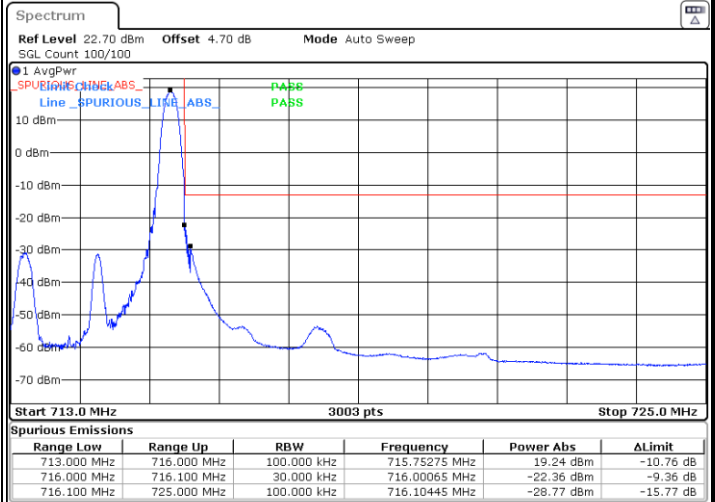
LTE Band 12 / 3MHz / 64QAM

Lowest Band Edge / 1 RB



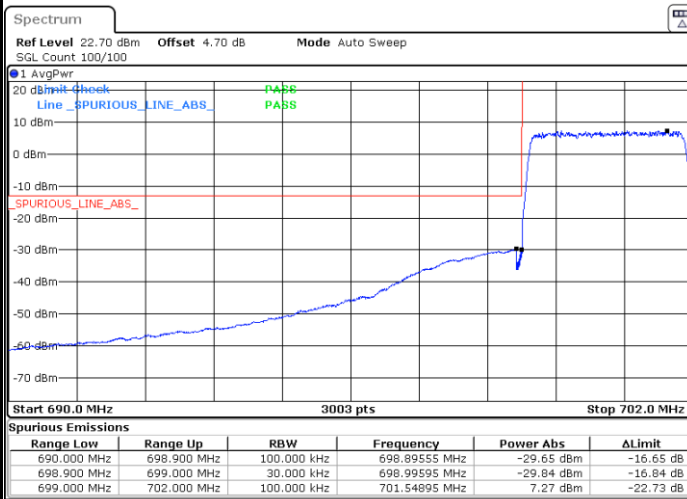
Date: 30 DEC 2020 14:46:14

Highest Band Edge / 1 RB



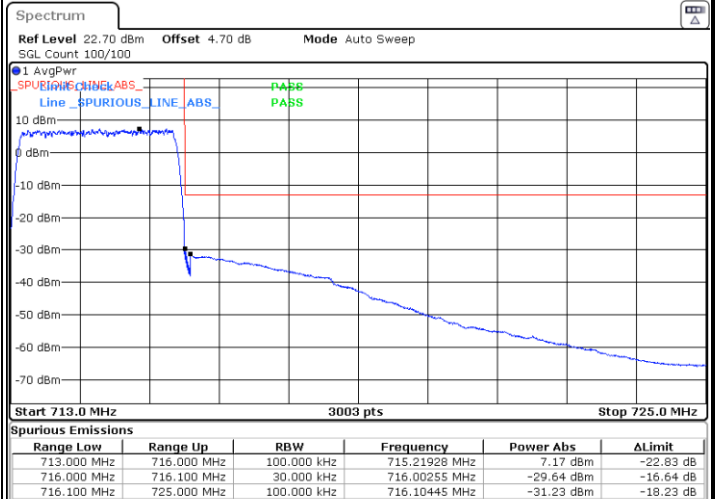
Date: 30 DEC 2020 14:49:37

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:47:21

Highest Band Edge / Full RB

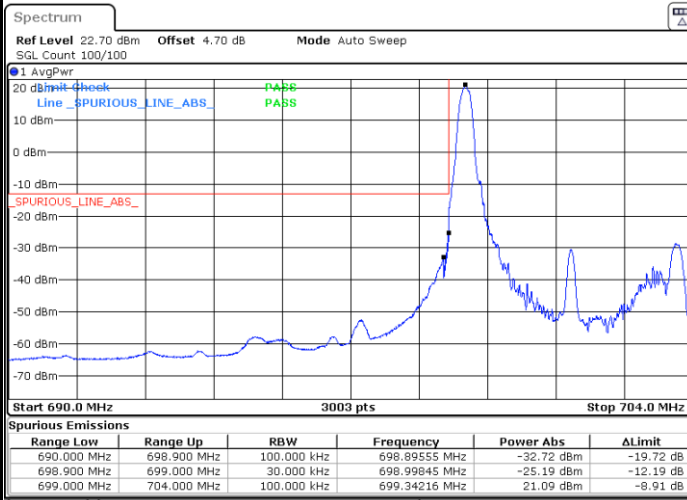


Date: 30 DEC 2020 14:48:29

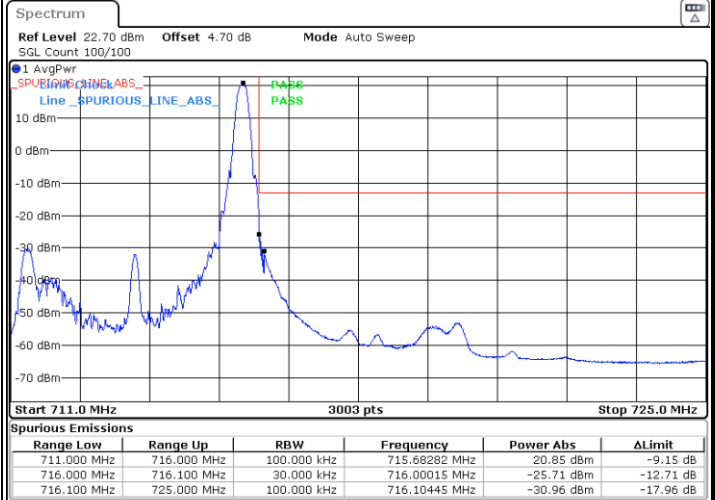


LTE Band 12 / 5MHz / QPSK

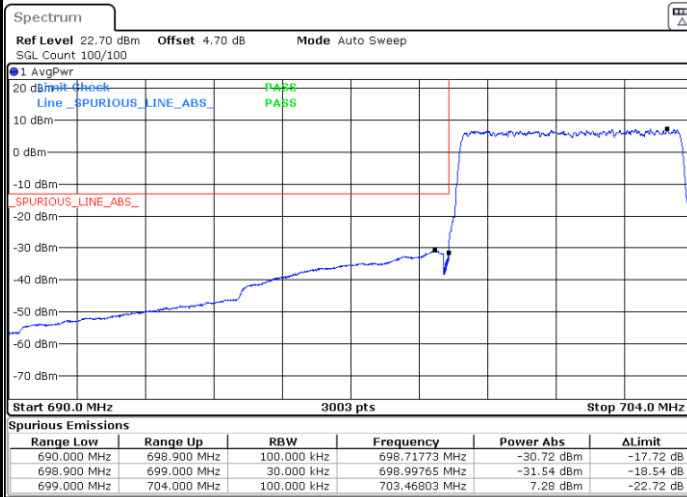
Lowest Band Edge / 1 RB



Highest Band Edge / 1 RB



Lowest Band Edge / Full RB



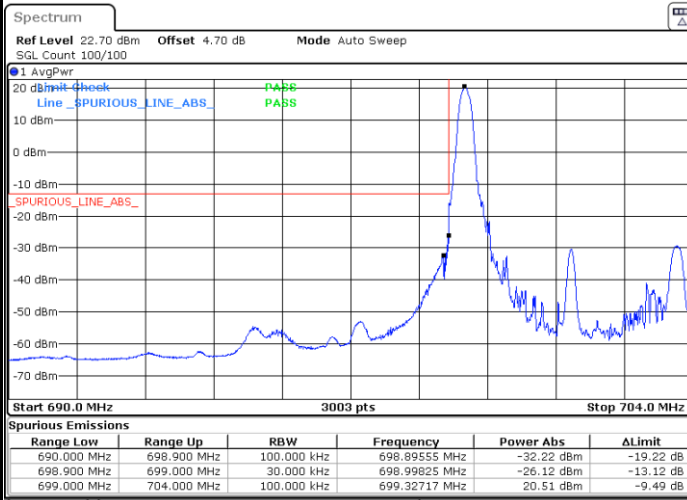
Highest Band Edge / Full RB





LTE Band 12 / 5MHz / 16QAM

Lowest Band Edge / 1RB



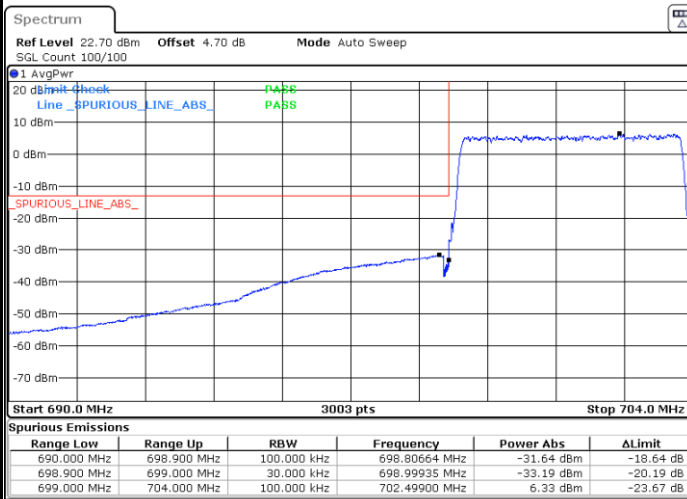
Date: 30 DEC 2020 14:23:43

Highest Band Edge / 1 RB



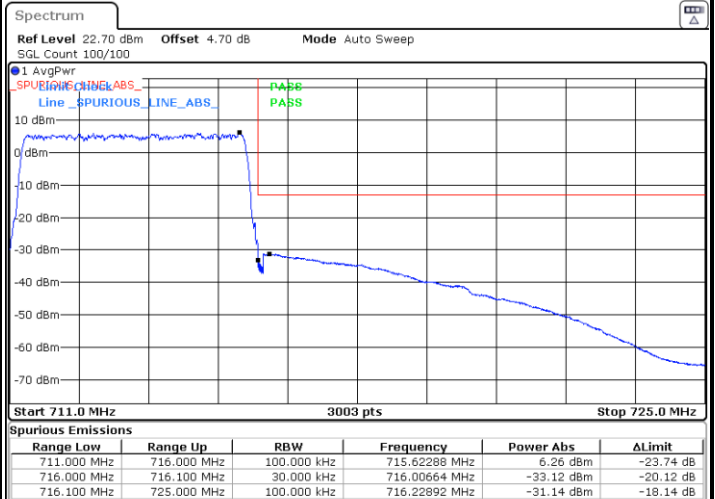
Date: 30 DEC 2020 14:31:36

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:27:06

Highest Band Edge / Full RB

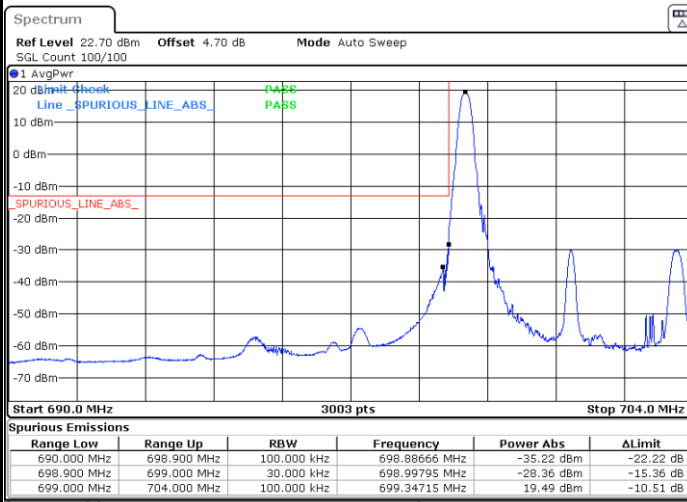


Date: 30 DEC 2020 14:28:13



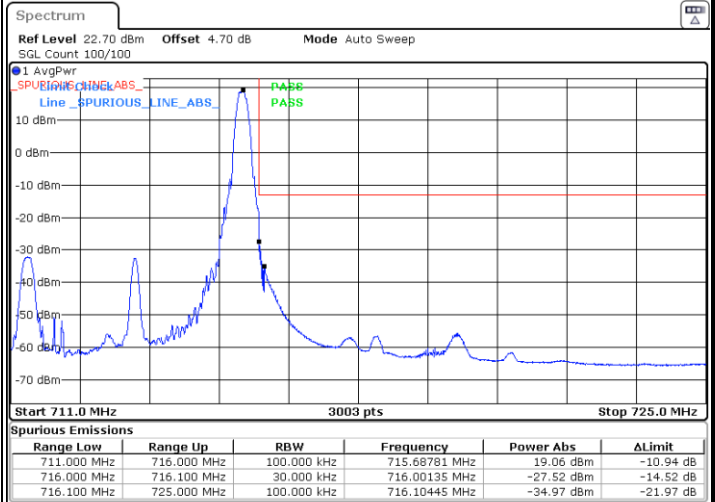
LTE Band 12 / 5MHz / 64QAM

Lowest Band Edge / 1RB



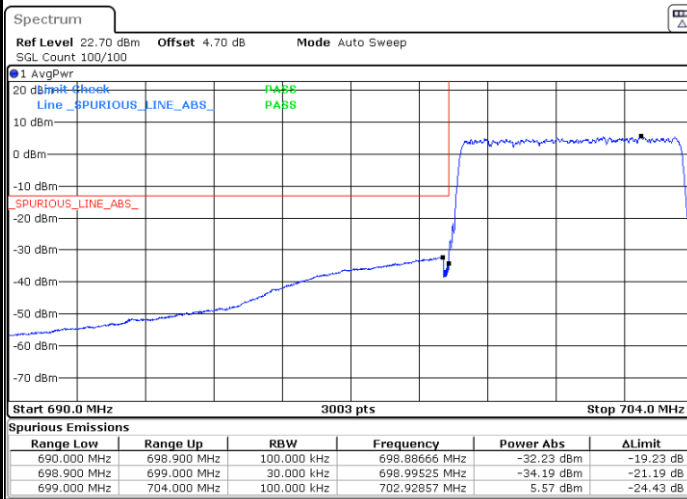
Date: 30 DEC 2020 14:52:59

Highest Band Edge / 1 RB



Date: 30 DEC 2020 14:51:52

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:54:07

Highest Band Edge / Full RB



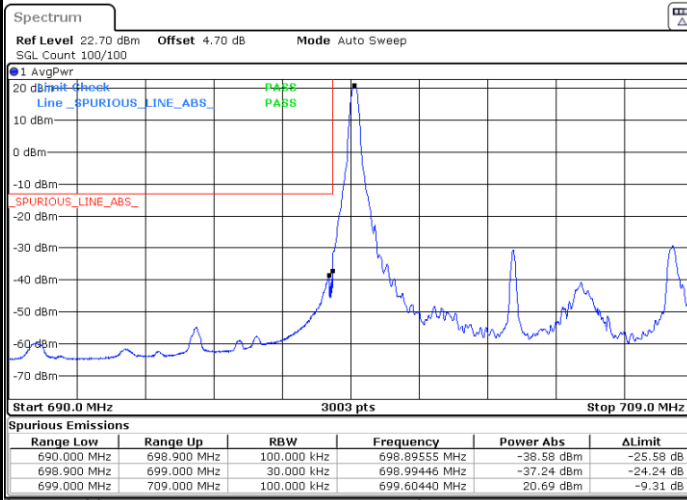
Date: 30 DEC 2020 14:50:44





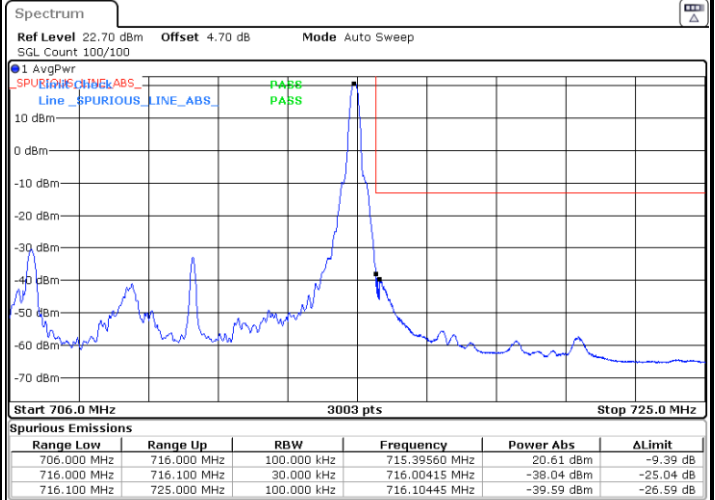
LTE Band 12 / 10MHz / QPSK

Lowest Band Edge / 1 RB



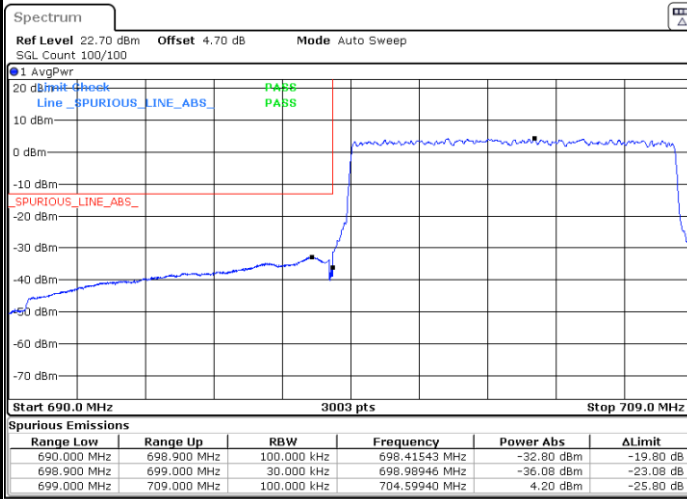
Date: 30 DEC 2020 14:33:51

Highest Band Edge / 1 RB



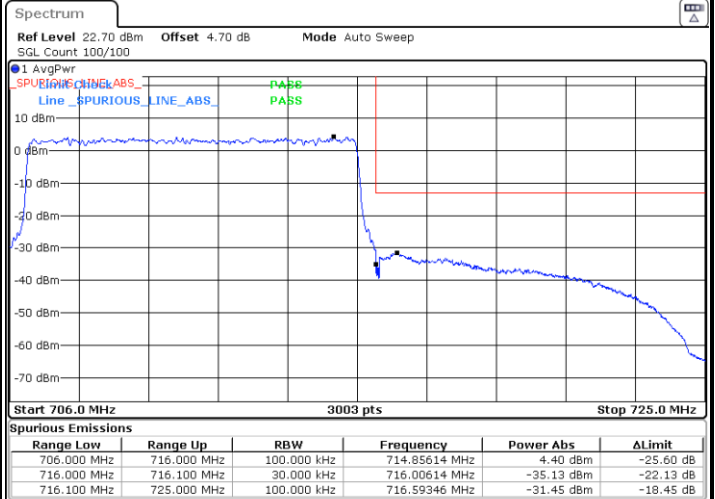
Date: 30 DEC 2020 14:39:29

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:34:58

Highest Band Edge / Full RB

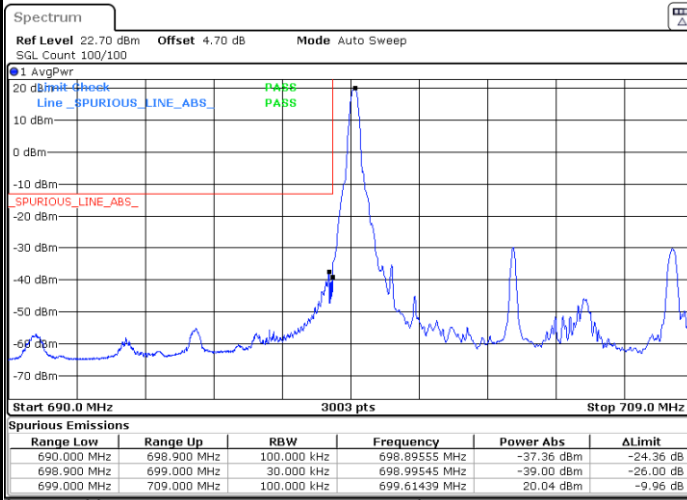


Date: 30 DEC 2020 14:38:21



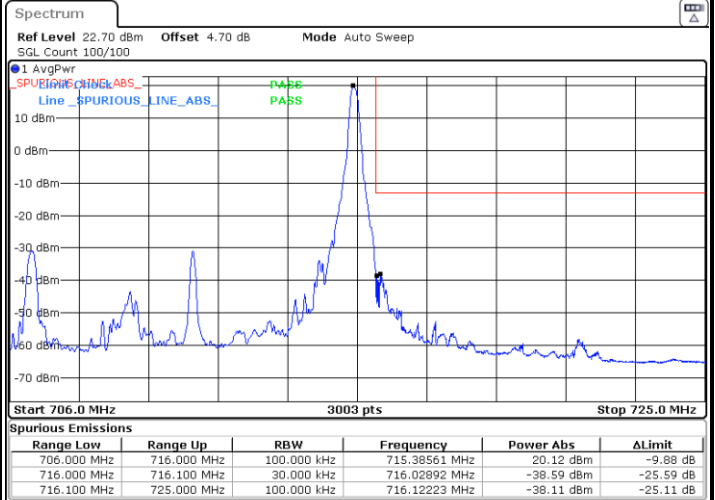
LTE Band 12 / 10MHz / 16QAM

Lowest Band Edge / 1 RB



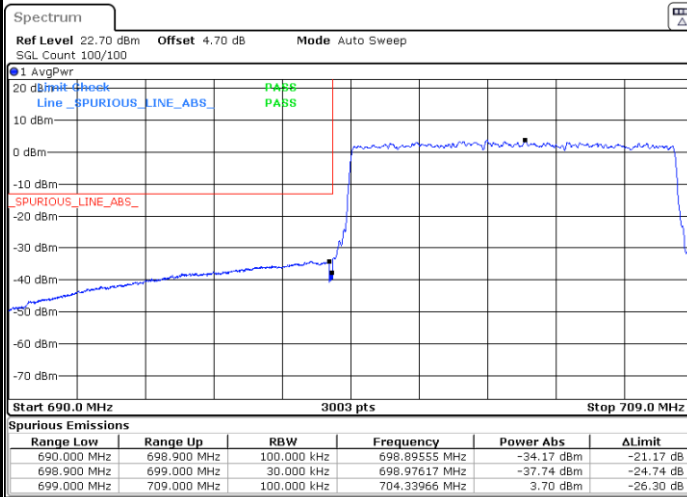
Date: 30 DEC 2020 14:32:43

Highest Band Edge / 1 RB



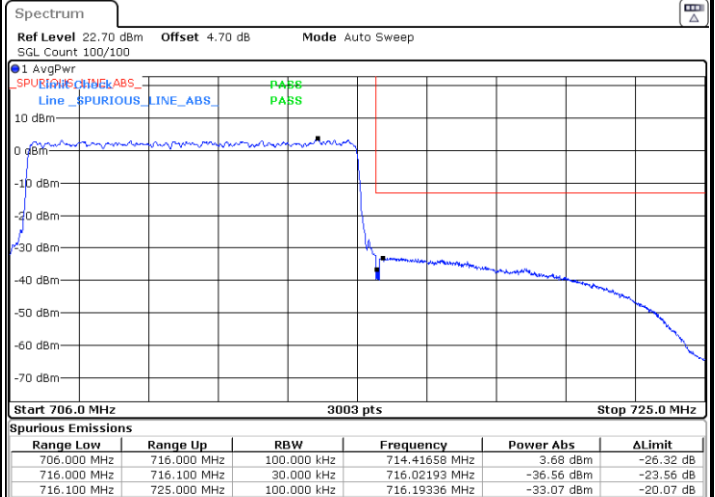
Date: 30 DEC 2020 14:40:36

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:36:06

Highest Band Edge / Full RB

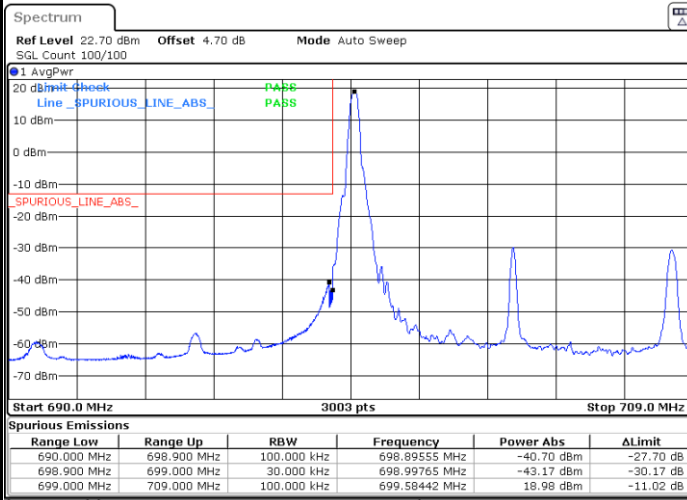


Date: 30 DEC 2020 14:37:14



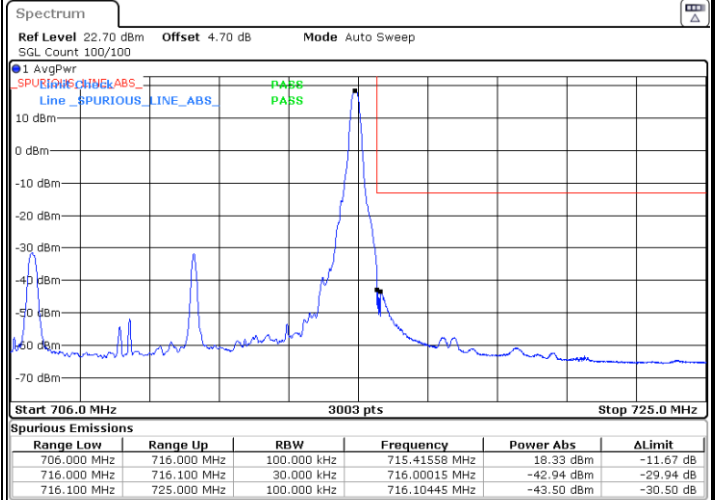
LTE Band 12 / 10MHz / 64QAM

Lowest Band Edge / 1 RB



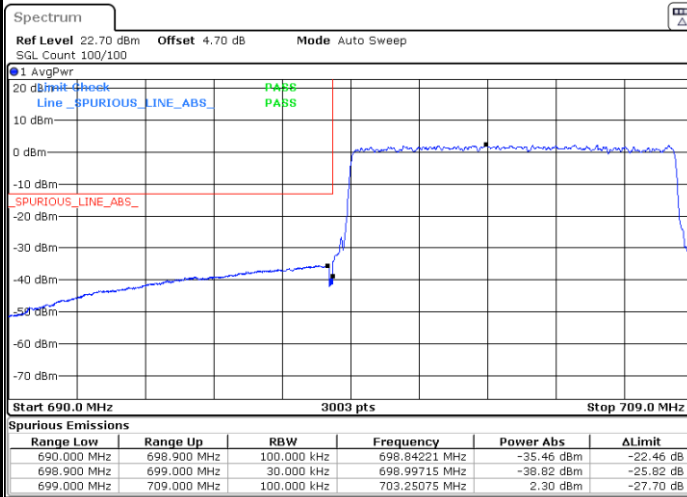
Date: 30 DEC 2020 14:57:29

Highest Band Edge / 1 RB



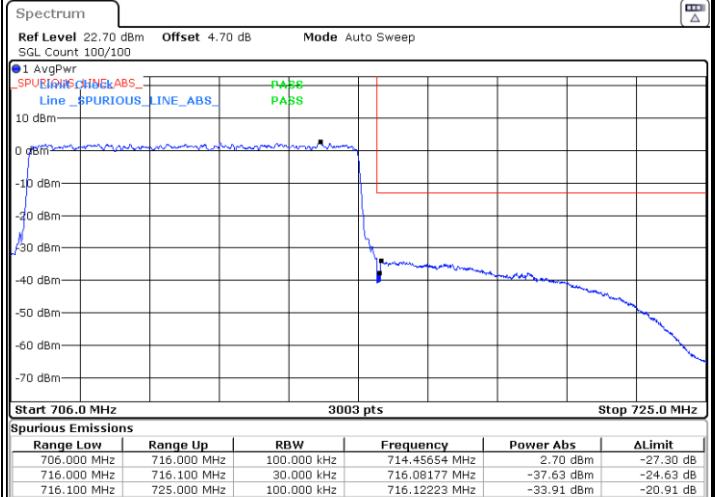
Date: 30 DEC 2020 14:56:22

Lowest Band Edge / Full RB



Date: 30 DEC 2020 14:58:37

Highest Band Edge / Full RB



Date: 30 DEC 2020 14:55:14



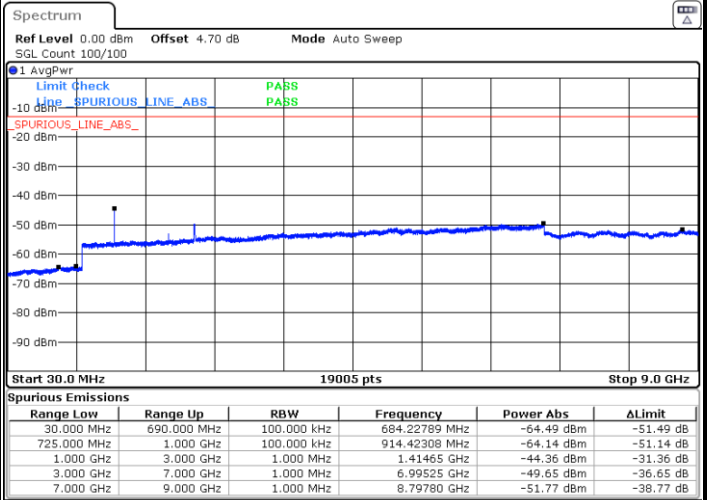
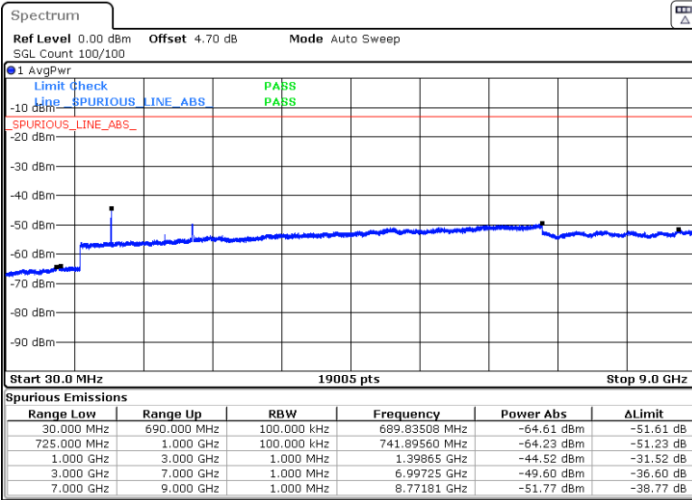
**Conducted Spurious Emission**



LTE Band 12 / 1.4MHz

Lowest Channel / QPSK

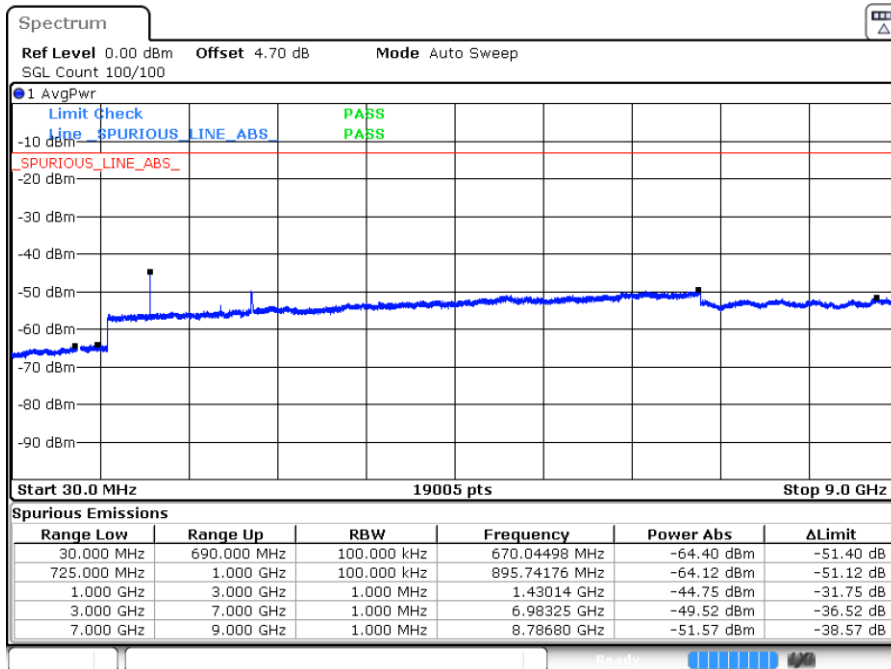
Middle Channel / QPSK



Date: 30 DEC 2020 15:05:00

Date: 30 DEC 2020 15:03:48

Highest Channel / QPSK

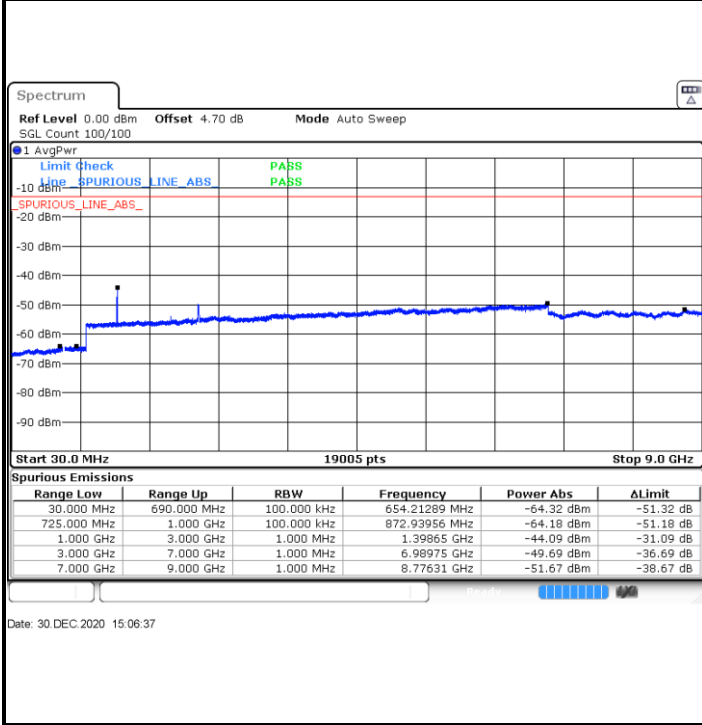


Date: 30 DEC 2020 15:05:32

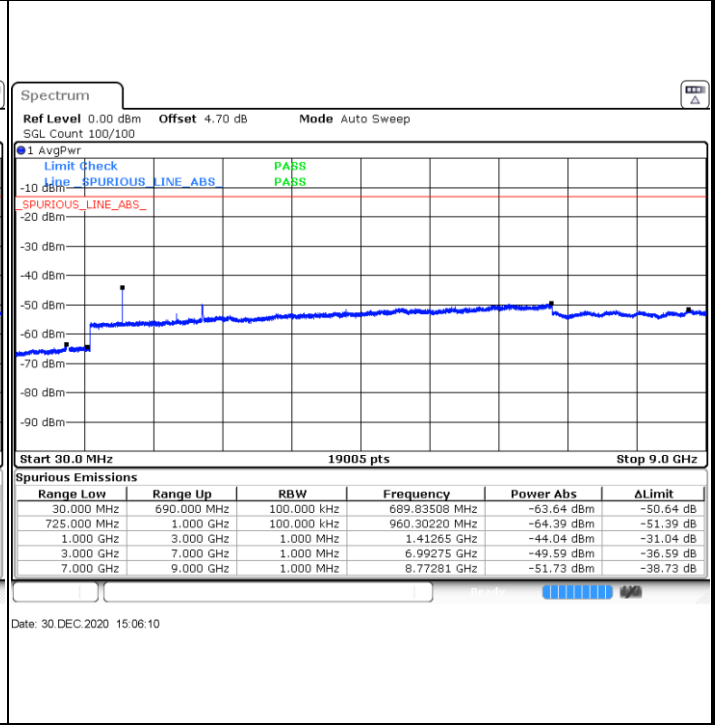


**LTE Band 12 / 3MHz**

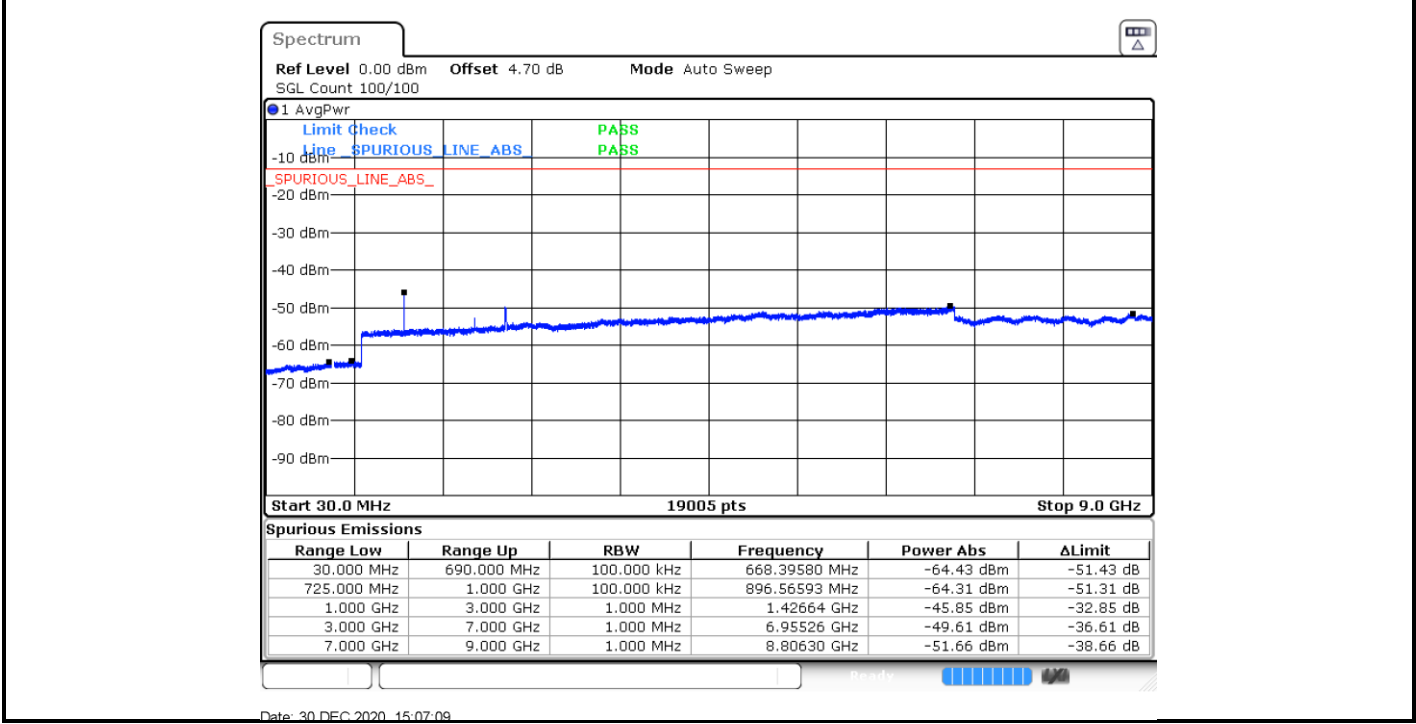
**Lowest Channel / QPSK**



**Middle Channel / QPSK**



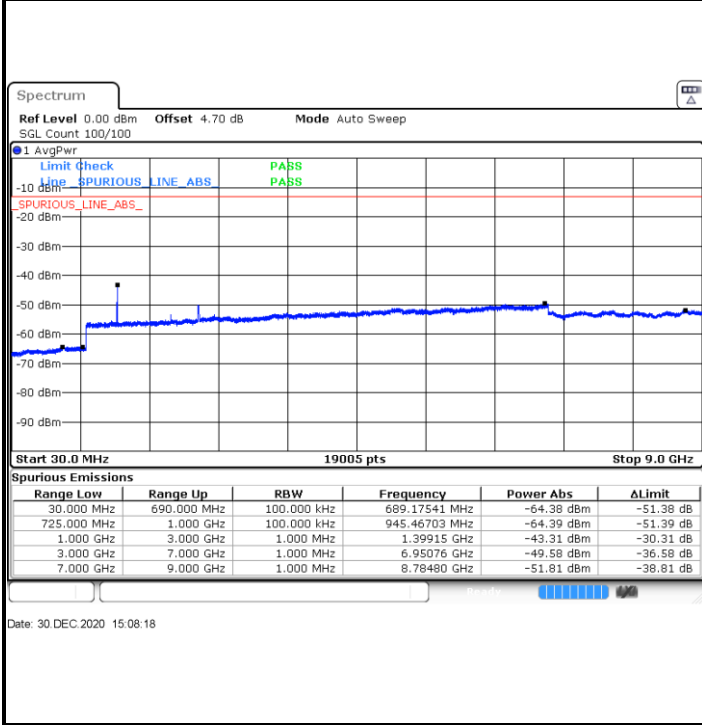
**Highest Channel / QPSK**



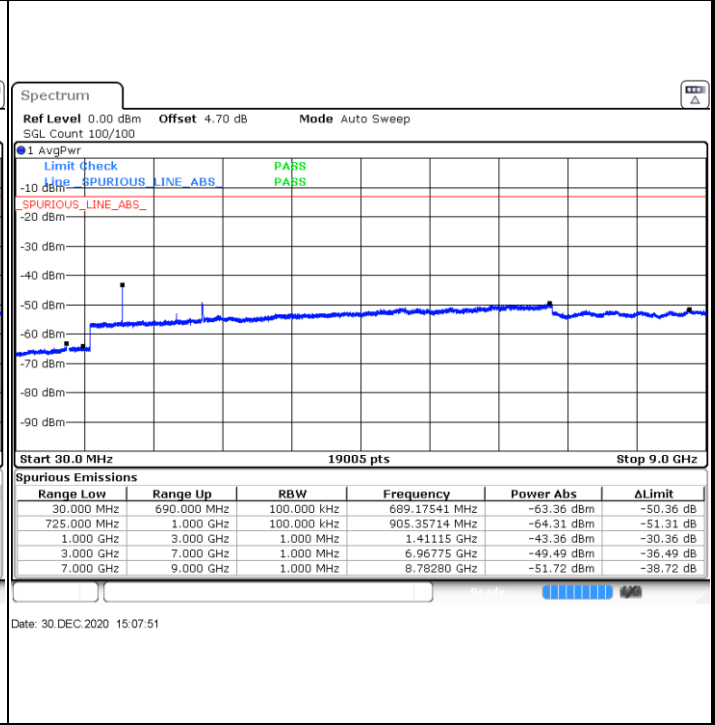


LTE Band 12 / 5MHz

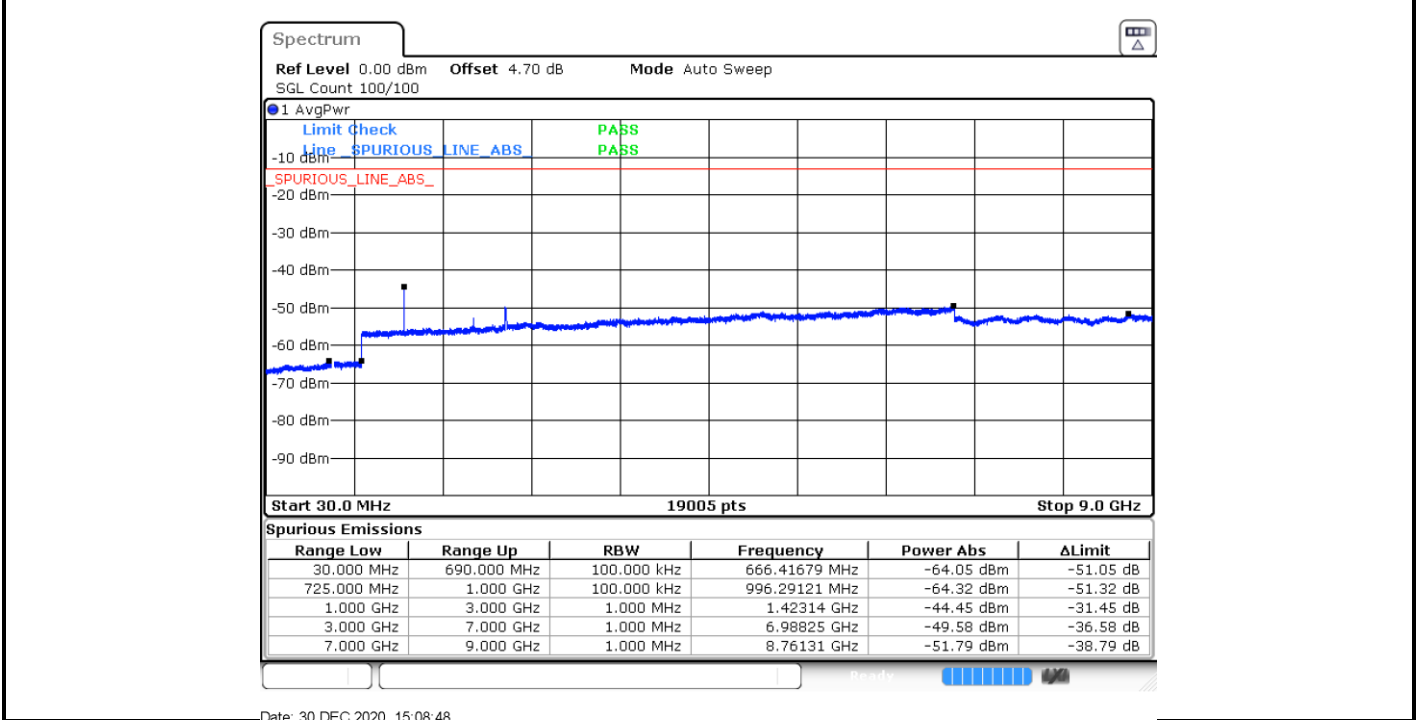
Lowest Channel / QPSK



Middle Channel / QPSK



Highest Channel / QPSK

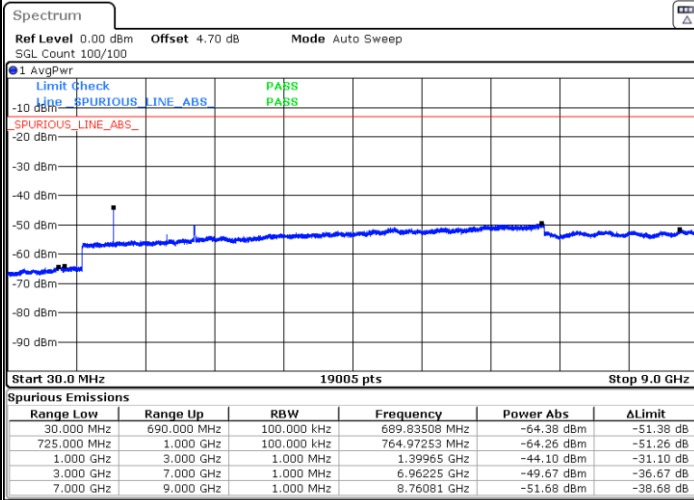




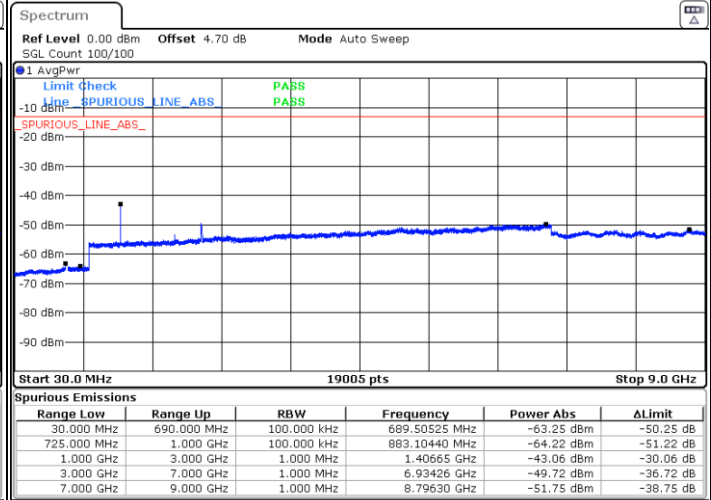
LTE Band 12 / 10MHz

Lowest Channel / QPSK

Middle Channel / QPSK

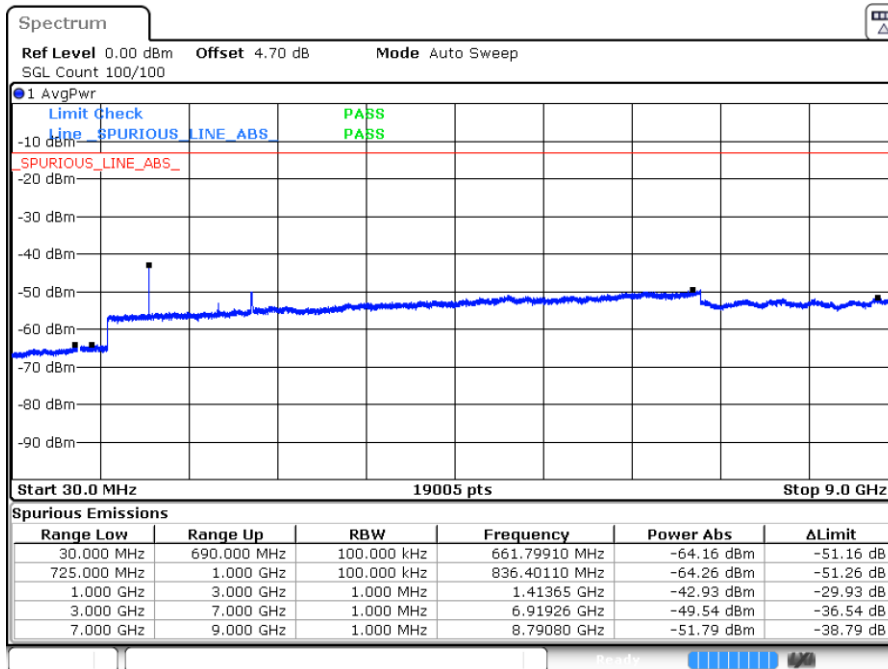


Date: 30 DEC 2020 15:00:09



Date: 30 DEC 2020 15:01:33

Highest Channel / QPSK



Date: 30 DEC 2020 15:00:40





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	0.0015	PASS
40	Normal Voltage	0.0034	
30	Normal Voltage	0.0002	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0017	
0	Normal Voltage	0.0012	
-10	Normal Voltage	0.0023	
-20	Normal Voltage	0.0024	
-30	Normal Voltage	0.0031	
20	Maximum Voltage	0.0027	
20	Normal Voltage	0.0000	
20	Battery End Point	0.0015	

Note:

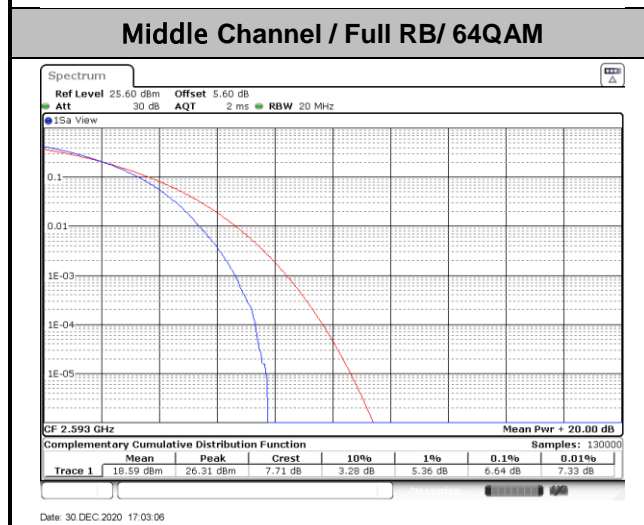
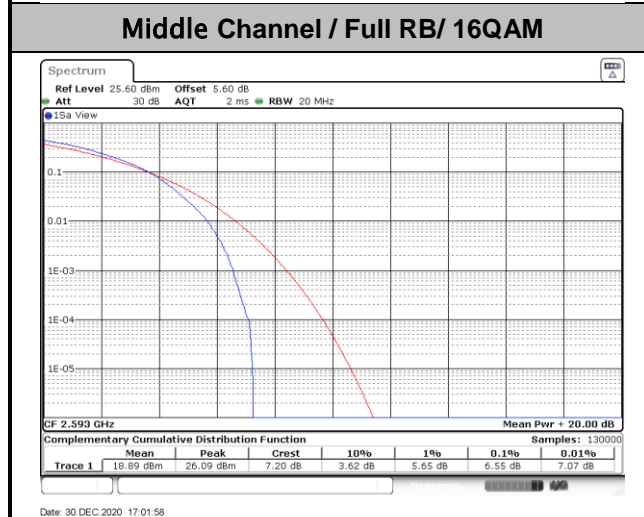
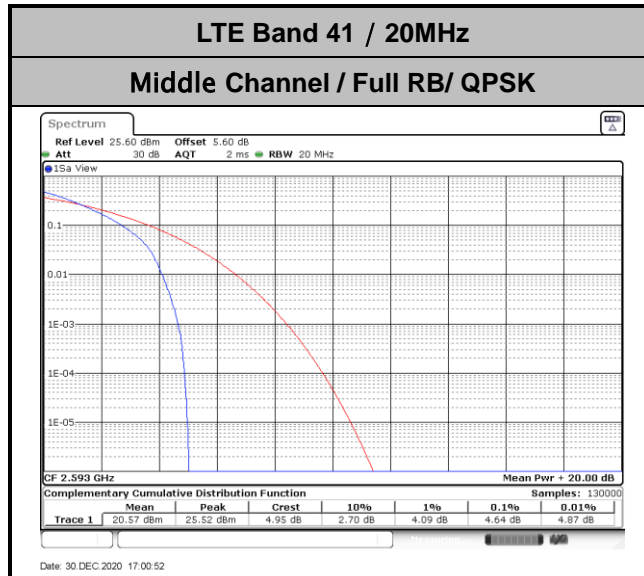
1. Normal Voltage =4 V. ; Battery End Point (BEP) =3.8 V. ; Maximum Voltage =4.4 V.
2. Note: The frequency fundamental emissions stay within the authorized frequency block.



## LTE Band 41

### Peak-to-Average Ratio

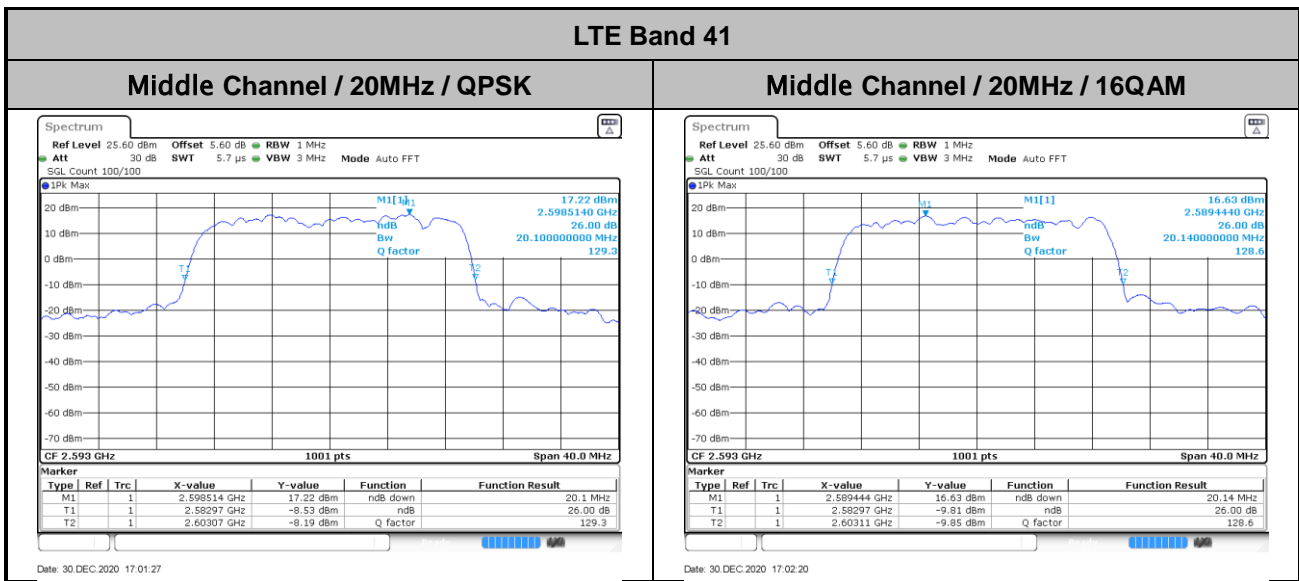
Mode	LTE Band 41 / 20MHz			
Mod.	QPSK	16QAM	64QAM	Limit: 13dB
RB Size	Full RB	Full RB	Full RB	Result
Middle CH	4.64	6.55	6.64	<b>PASS</b>





## 26dB Bandwidth

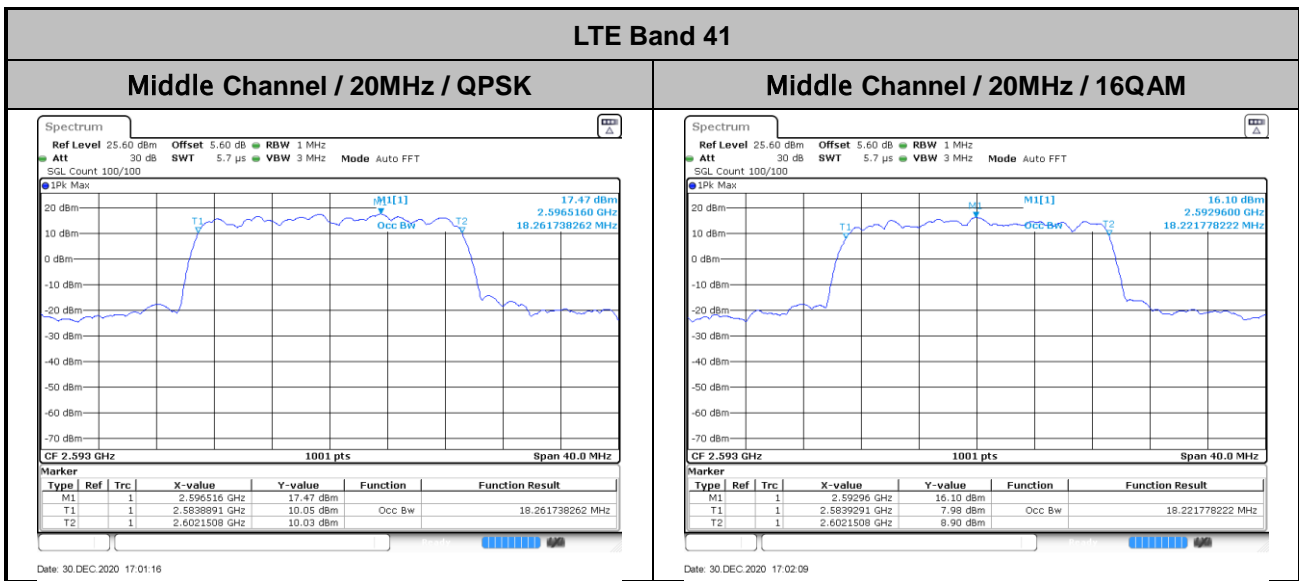
<b>Mode</b>	<b>LTE Band 41 : 26dB BW(MHz)</b>	
<b>BW</b>	<b>20MHz</b>	
<b>Mod.</b>	<b>QPSK</b>	<b>16QAM</b>
<b>Middle CH</b>	20.10	20.14





# Occupied Bandwidth

Mode	LTE Band 41 : 99%OBW(MHz)	
BW	20MHz	
Mod.	QPSK	16QAM
Middle CH	18.26	18.22



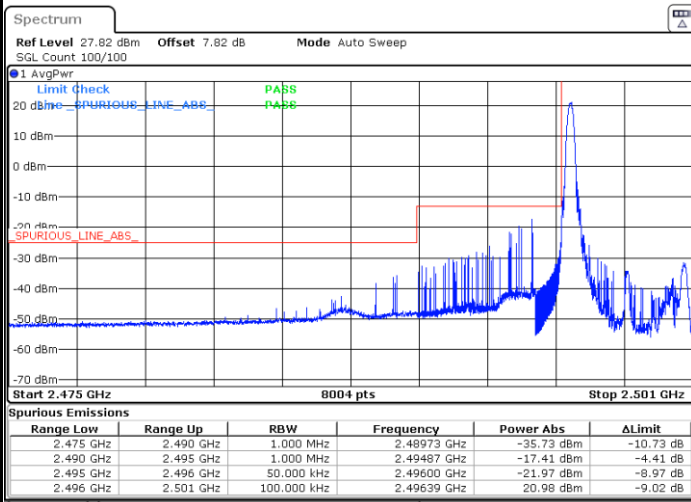


## **Conducted Band Edge**



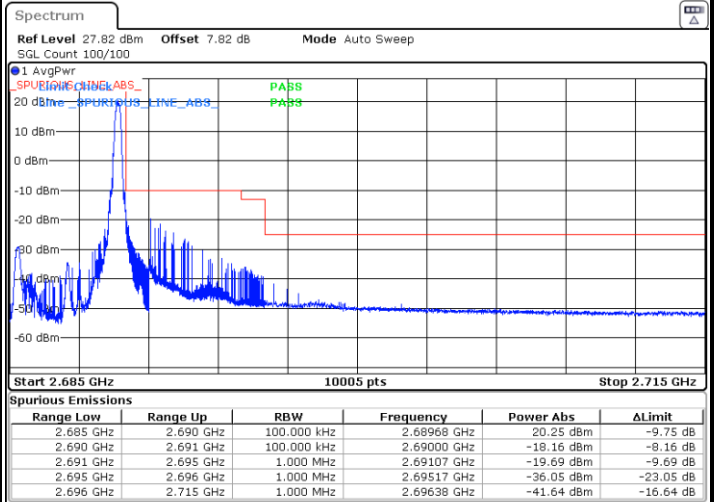
LTE Band 41 / 5MHz / QPSK

Lowest Band Edge / 1RB



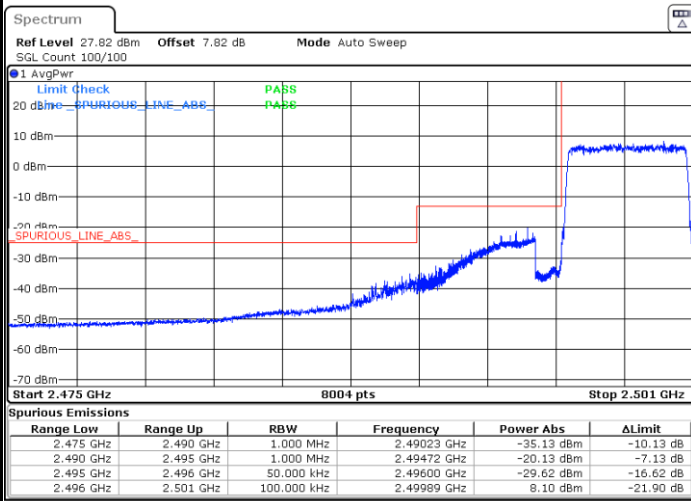
Date: 30 DEC 2020 15:44:44

Highest Band Edge / 1RB



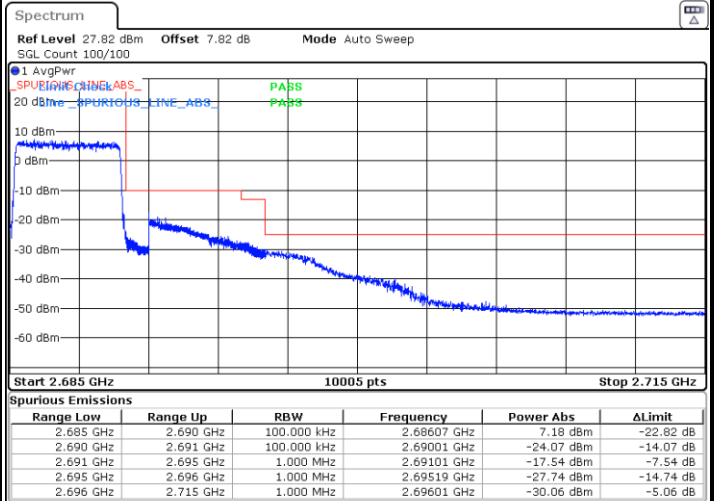
Date: 30 DEC 2020 15:49:17

Lowest Band Edge / Full RB



Date: 30 DEC 2020 15:47:00

Highest Band Edge / Full RB

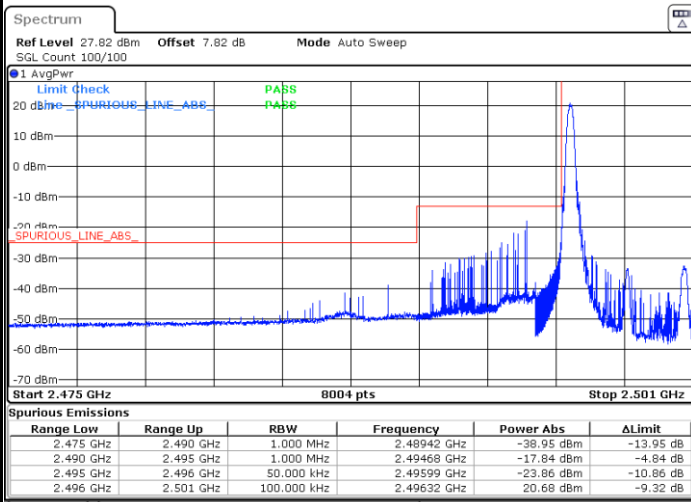


Date: 30 DEC 2020 15:51:33



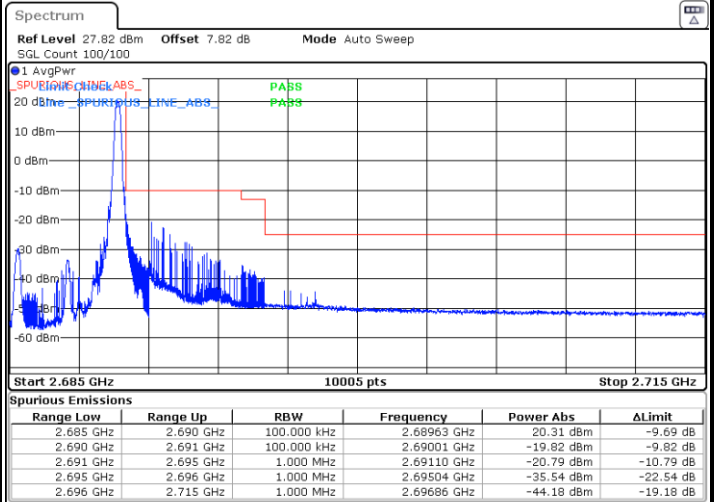
LTE Band 41 / 5MHz / 16QAM

Lowest Band Edge / 1 RB



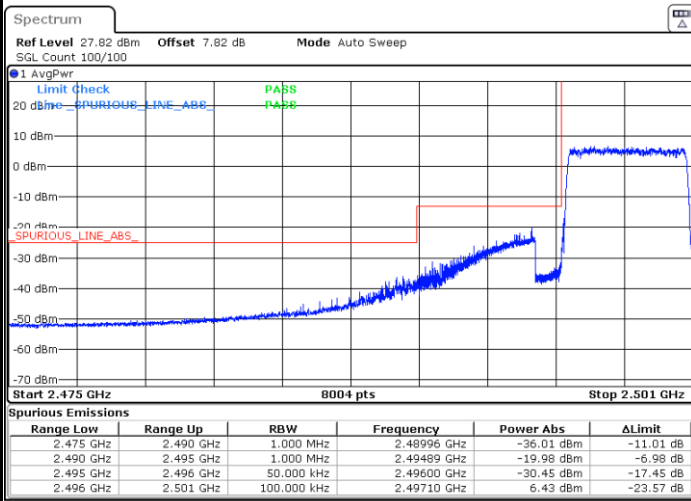
Date: 30 DEC 2020 15:45:52

Highest Band Edge / 1 RB



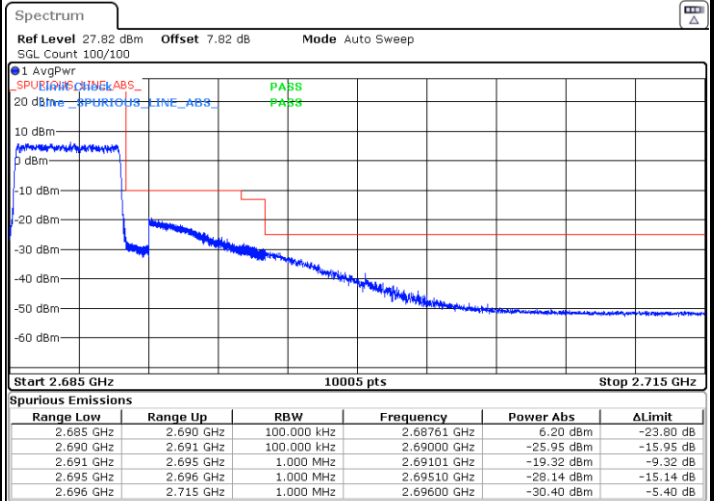
Date: 30 DEC 2020 15:50:25

Lowest Band Edge / Full RB



Date: 30 DEC 2020 15:48:08

Highest Band Edge / Full RB



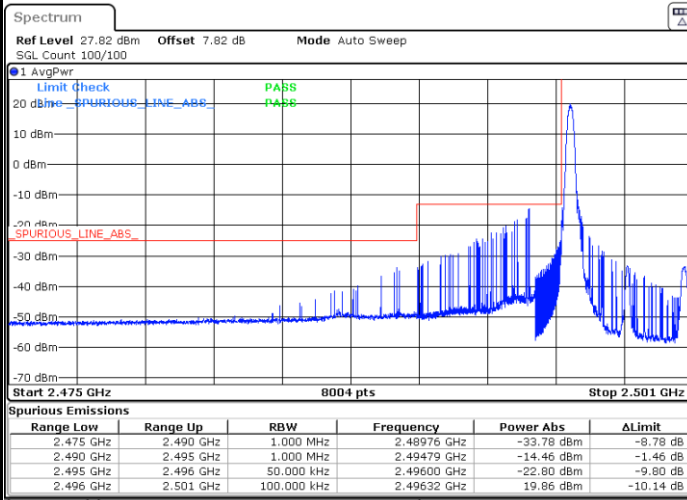
Date: 30 DEC 2020 15:52:41





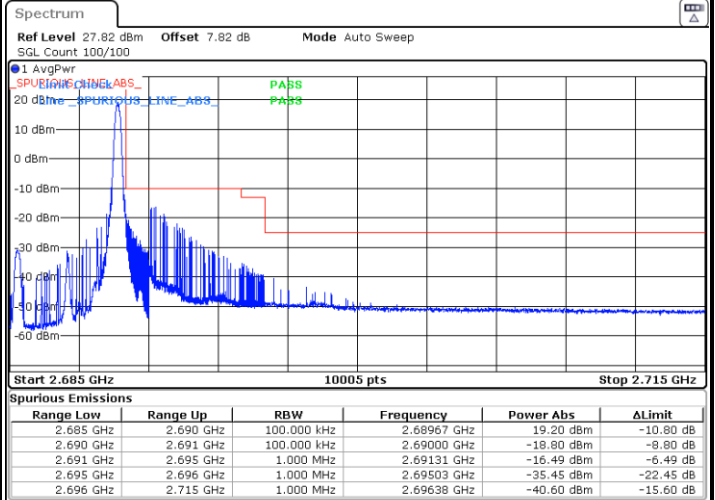
LTE Band 41 / 5MHz / 64QAM

Lowest Band Edge / 1 RB



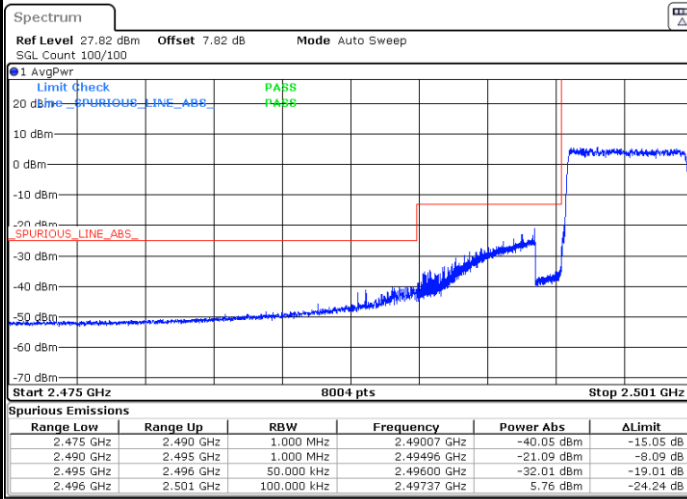
Date: 30 DEC 2020 16:16:33

Highest Band Edge / 1 RB



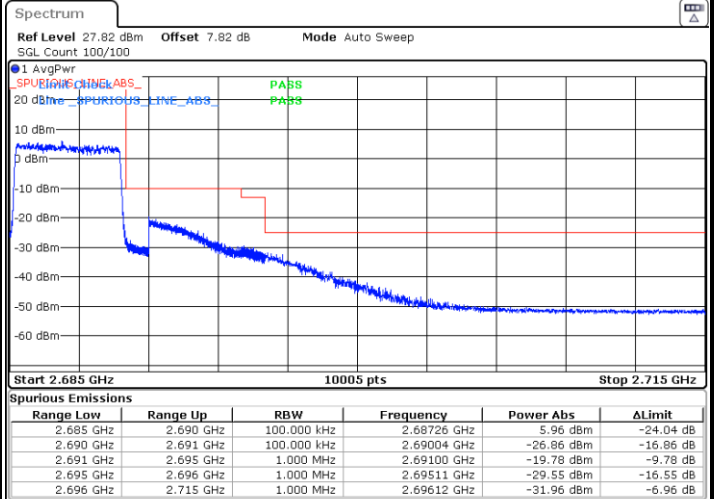
Date: 30 DEC 2020 16:19:57

Lowest Band Edge / Full RB



Date: 30 DEC 2020 16:17:41

Highest Band Edge / Full RB

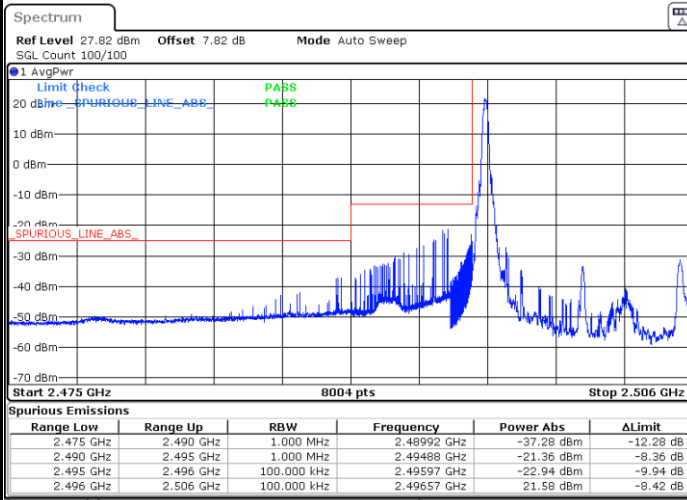


Date: 30 DEC 2020 16:18:49



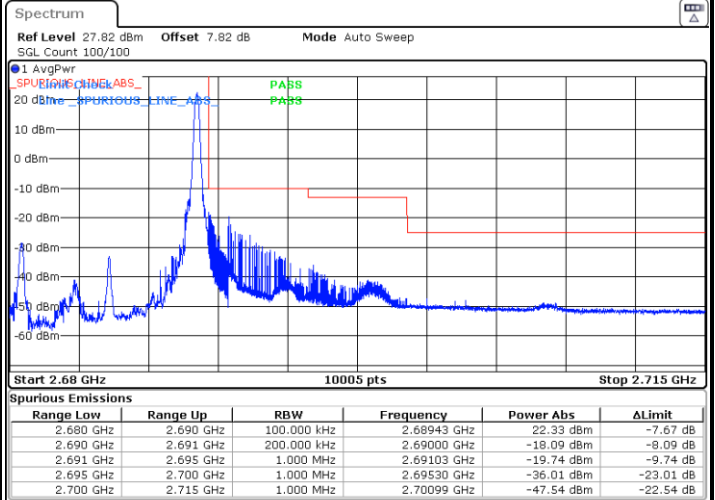
LTE Band 41 / 10MHz / QPSK

Lowest Band Edge / 1RB



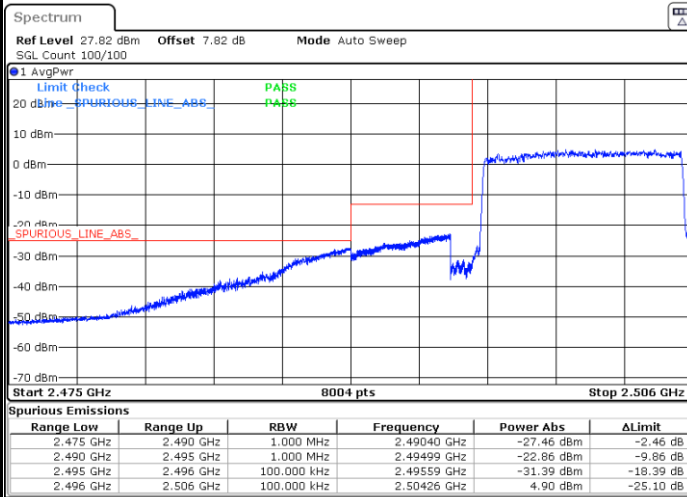
Date: 30 DEC 2020 15:53:49

Highest Band Edge / 1 RB



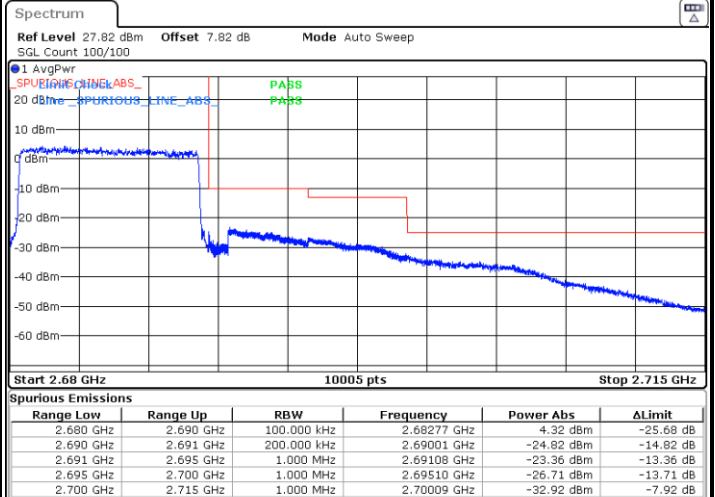
Date: 30 DEC 2020 15:58:22

Lowest Band Edge / Full RB



Date: 30 DEC 2020 15:56:05

Highest Band Edge / Full RB

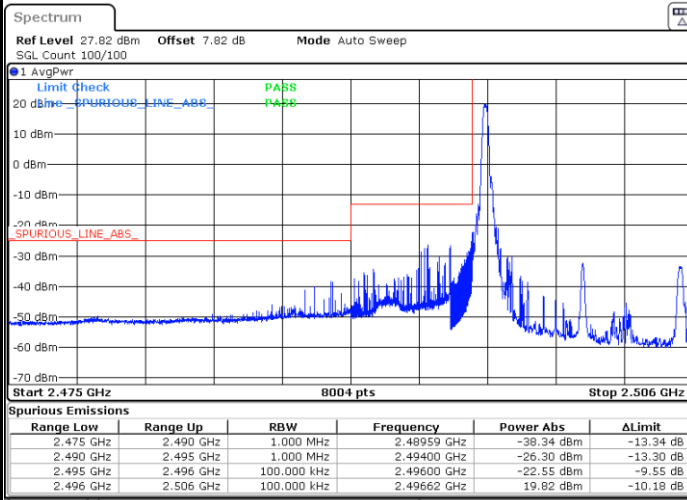


Date: 30 DEC 2020 16:00:38



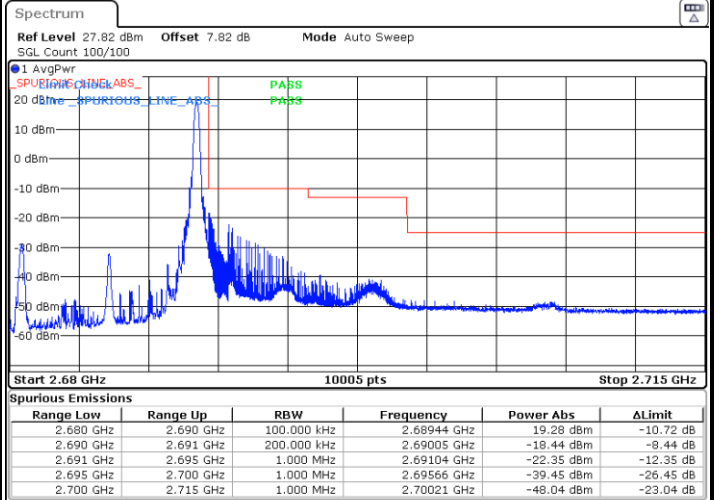
LTE Band 41 / 10MHz / 16QAM

Lowest Band Edge / 1 RB



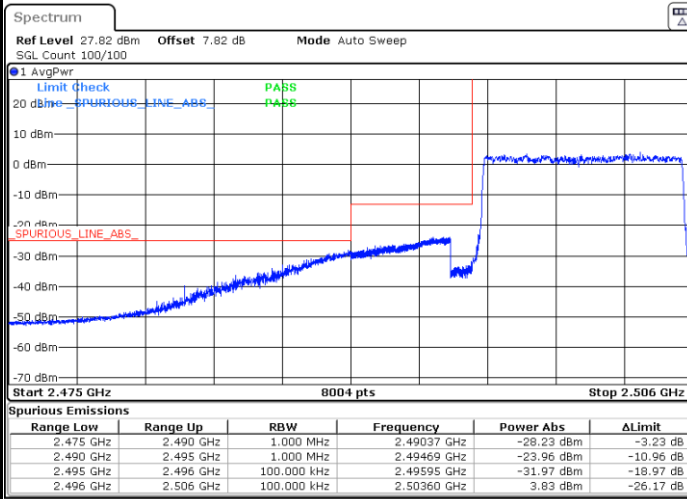
Date: 30 DEC 2020 15:54:57

Highest Band Edge / 1 RB



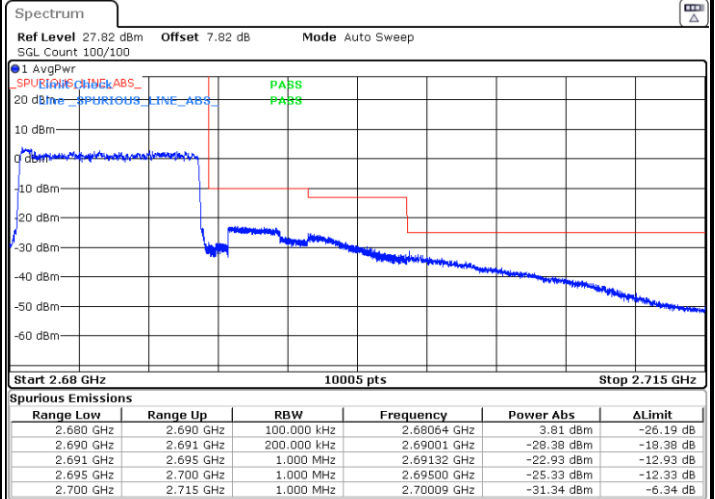
Date: 30 DEC 2020 15:59:30

Lowest Band Edge / Full RB



Date: 30 DEC 2020 15:57:14

Highest Band Edge / Full RB

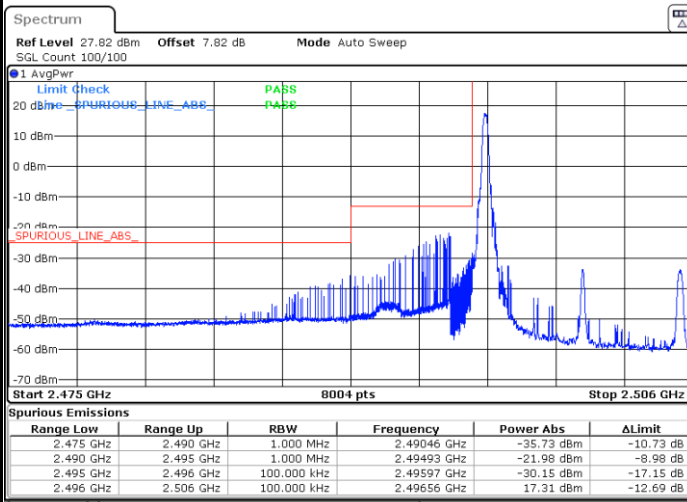


Date: 30 DEC 2020 16:01:46



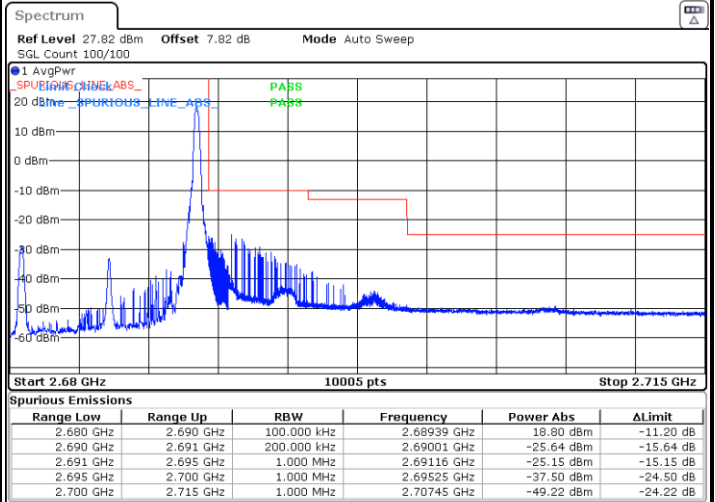
LTE Band 41 / 10MHz / 64QAM

Lowest Band Edge / 1 RB



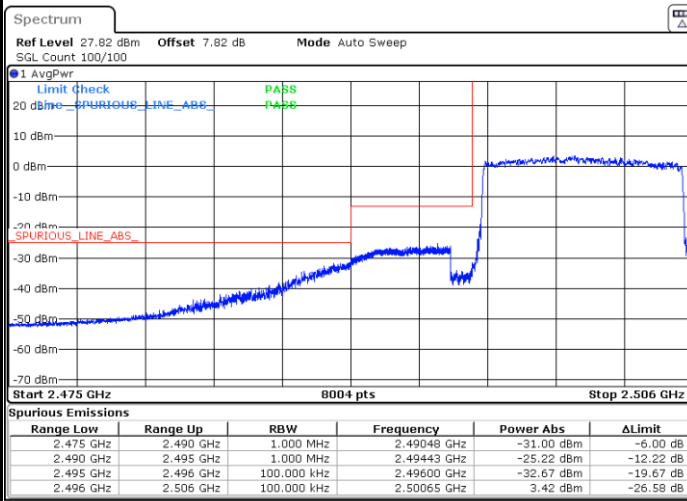
Date: 30 DEC 2020 16:21:06

Highest Band Edge / 1 RB



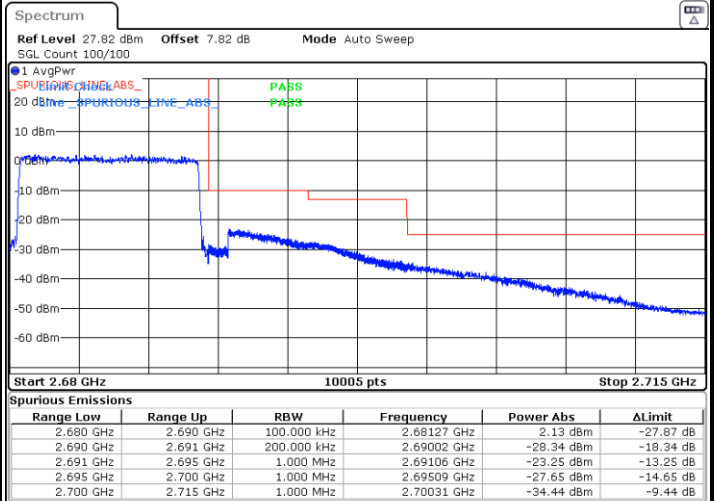
Date: 30 DEC 2020 16:24:30

Lowest Band Edge / Full RB



Date: 30 DEC 2020 16:22:14

Highest Band Edge / Full RB

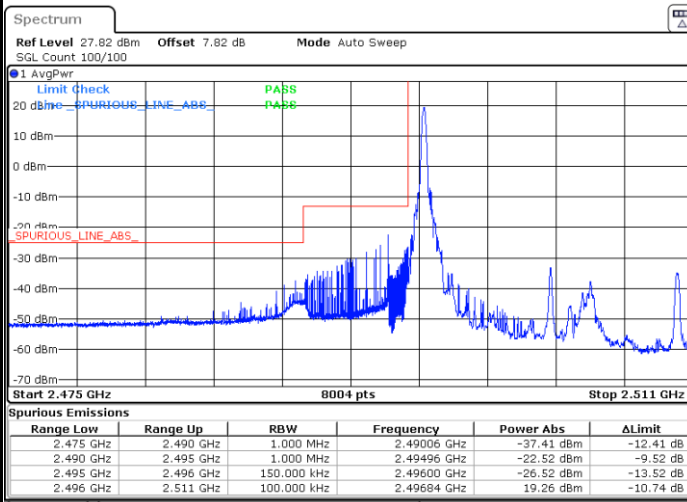


Date: 30 DEC 2020 16:23:22



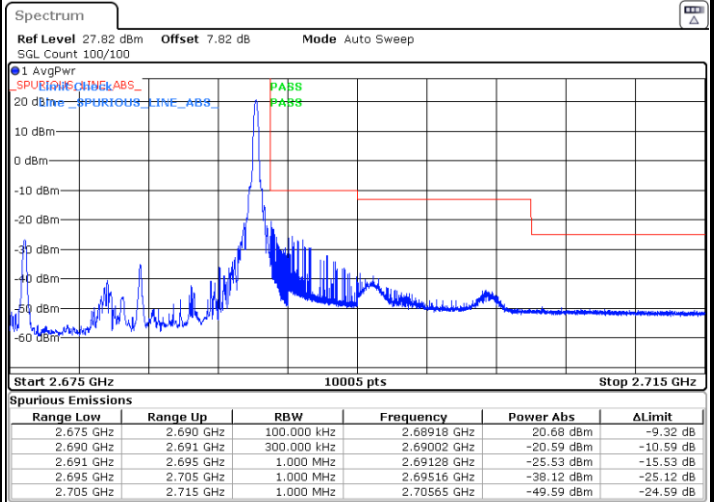
LTE Band 41 / 15MHz / QPSK

Lowest Band Edge / 1 RB



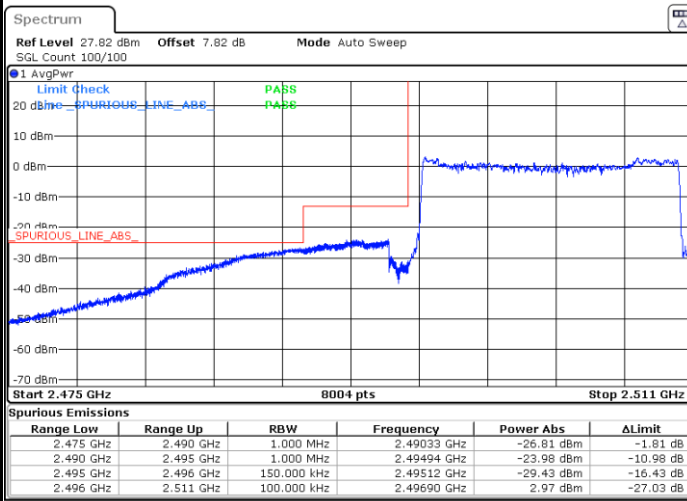
Date: 30 DEC 2020 16:02:55

Highest Band Edge / 1 RB



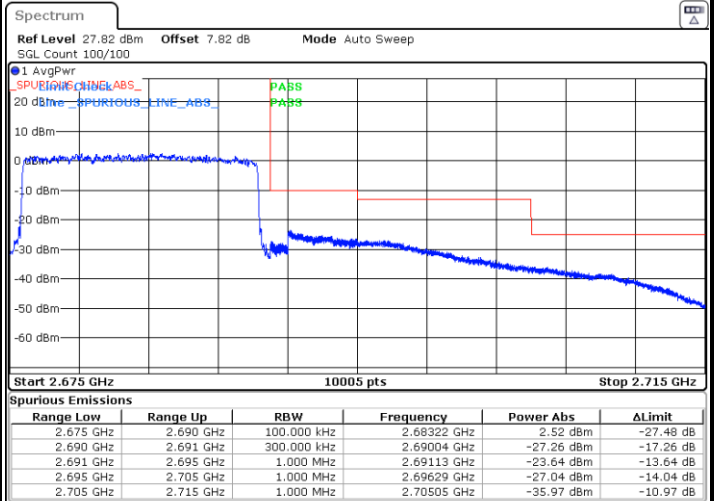
Date: 30 DEC 2020 16:07:27

Lowest Band Edge / Full RB



Date: 30 DEC 2020 16:37:29

Highest Band Edge / Full RB

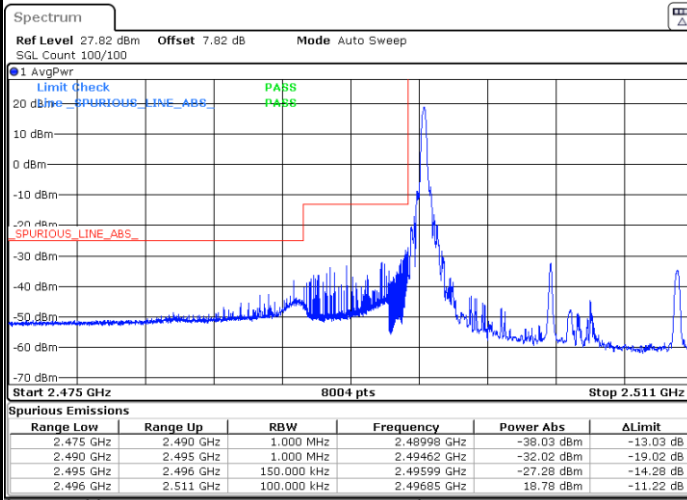


Date: 30 DEC 2020 16:09:44



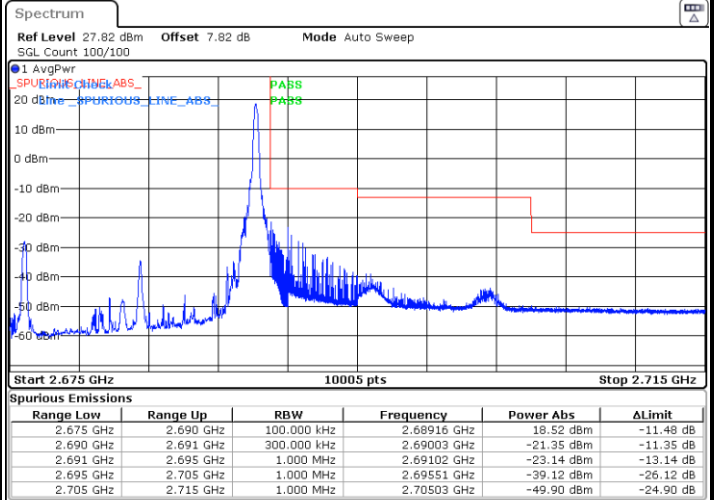
LTE Band 41 / 15MHz / 16QAM

Lowest Band Edge / 1RB



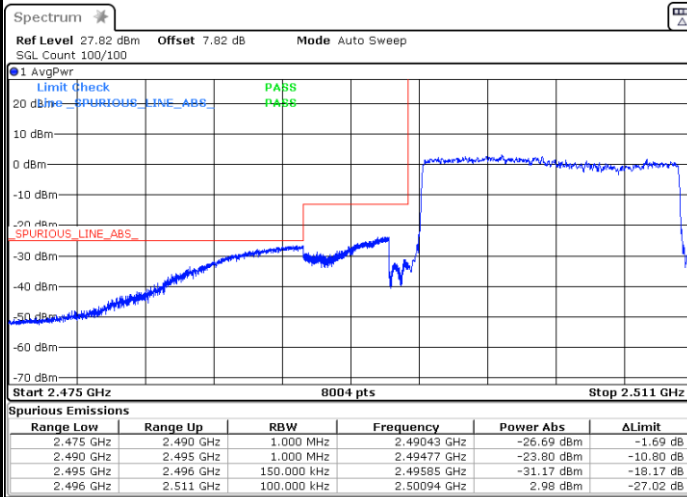
Date: 30 DEC 2020 16:04:03

Highest Band Edge / 1 RB



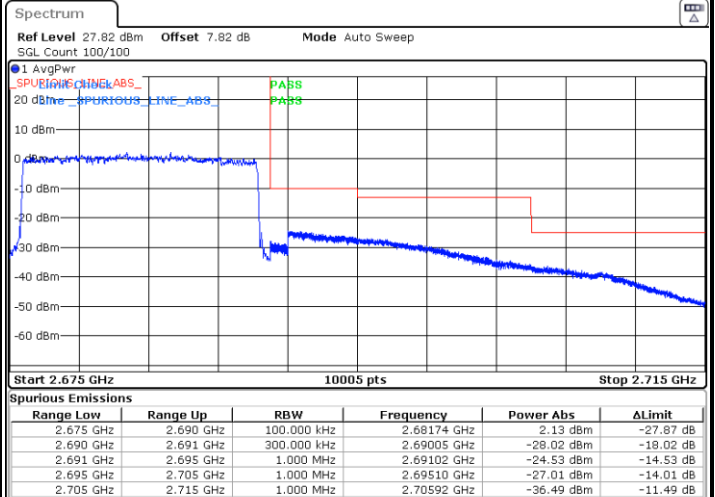
Date: 30 DEC 2020 16:08:36

Lowest Band Edge / Full RB



Date: 30 DEC 2020 16:38:43

Highest Band Edge / Full RB

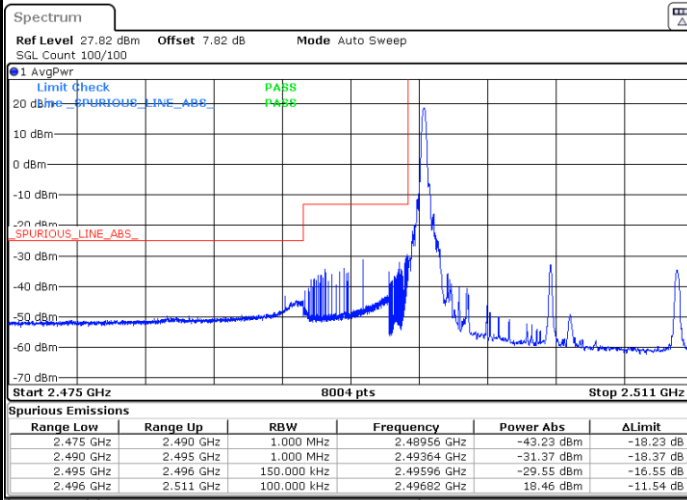


Date: 30 DEC 2020 16:10:52



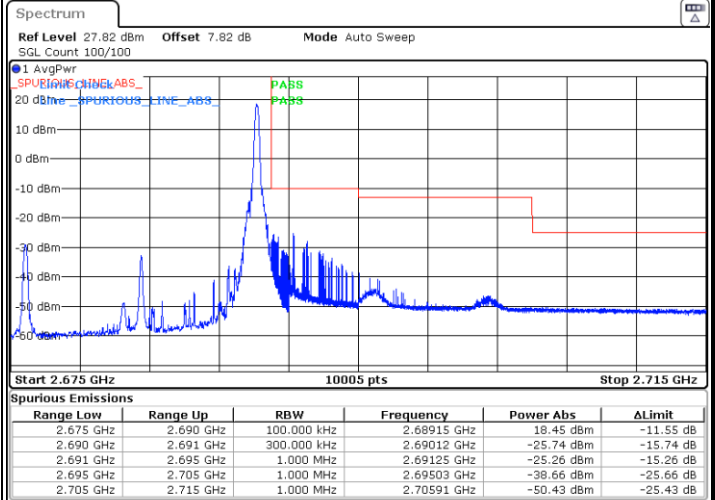
LTE Band 41 / 15MHz / 64QAM

Lowest Band Edge / 1RB



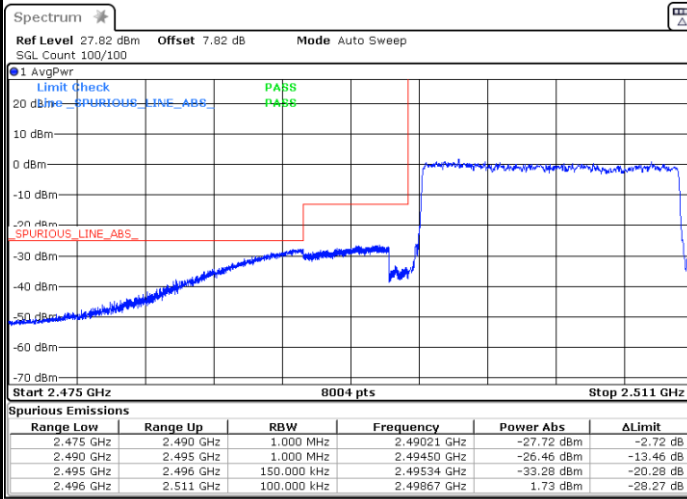
Date: 30 DEC 2020 16:25:38

Highest Band Edge / 1 RB



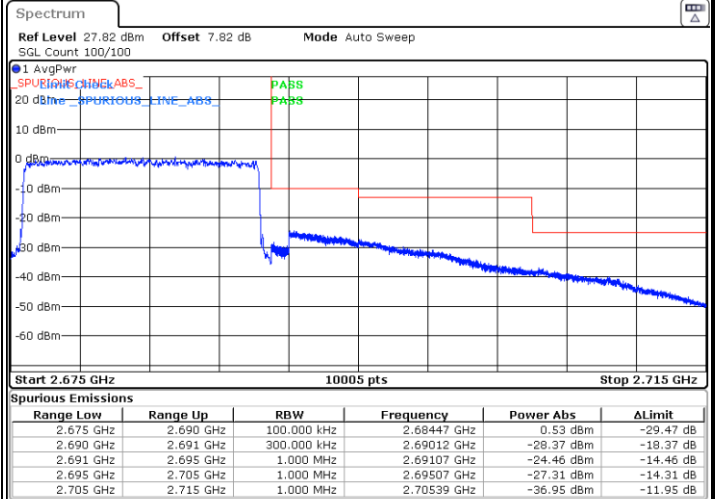
Date: 30 DEC 2020 16:29:03

Lowest Band Edge / Full RB



Date: 30 DEC 2020 16:40:29

Highest Band Edge / Full RB



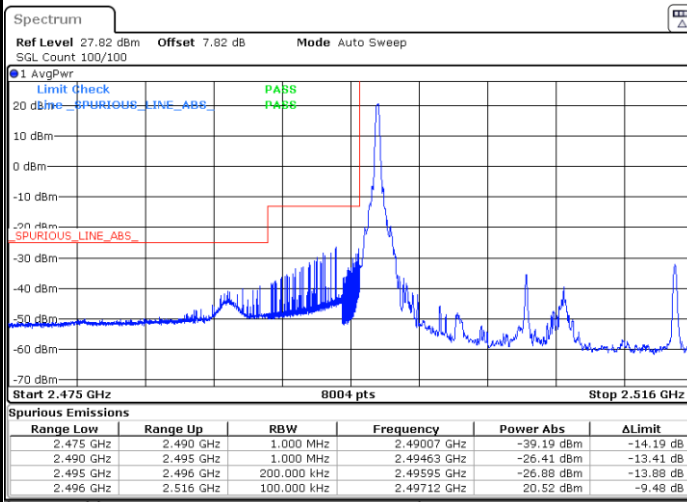
Date: 30 DEC 2020 16:27:55





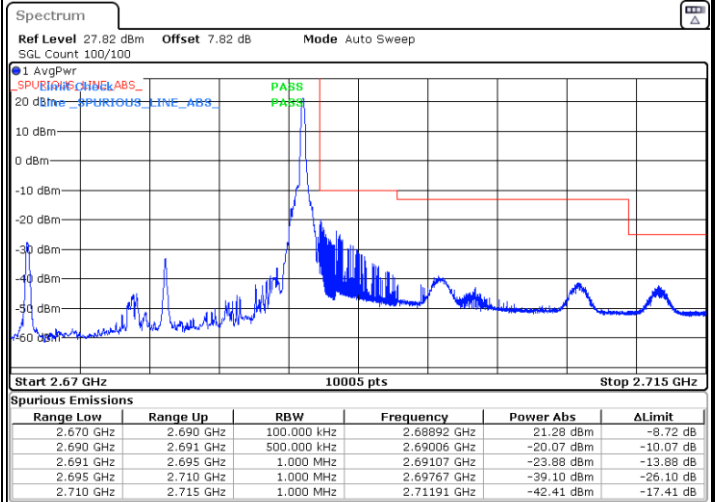
LTE Band 41 / 20MHz / QPSK

Lowest Band Edge / 1 RB



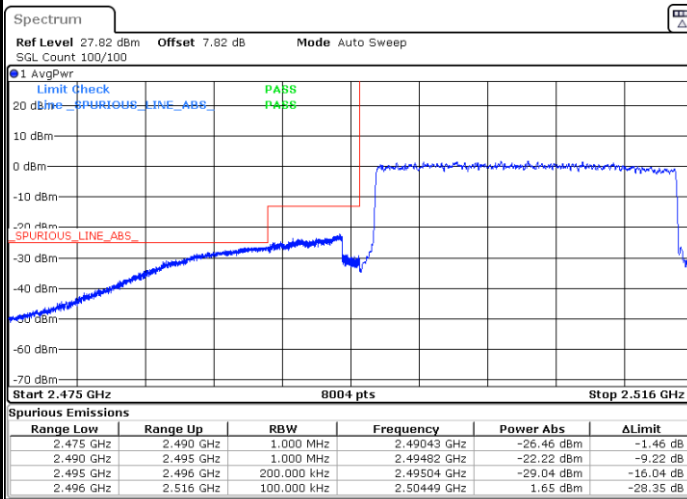
Date: 30 DEC 2020 16:12:00

Highest Band Edge / 1 RB



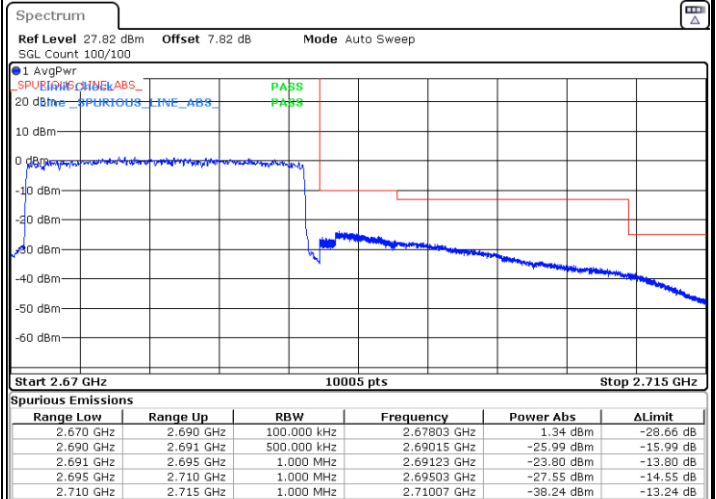
Date: 30 DEC 2020 16:46:55

Lowest Band Edge / Full RB



Date: 30 DEC 2020 16:42:17

Highest Band Edge / Full RB



Date: 30 DEC 2020 16:44:03