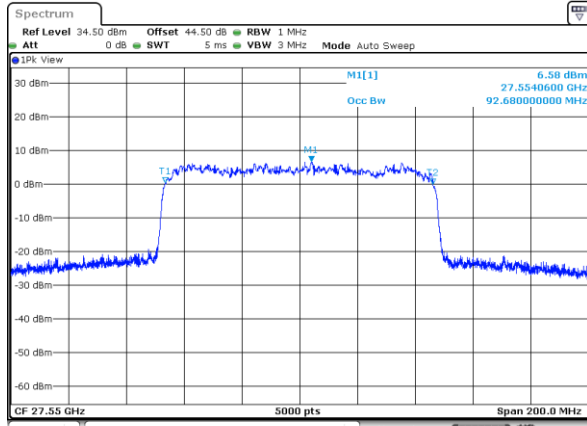




CP-OFDM Module 1

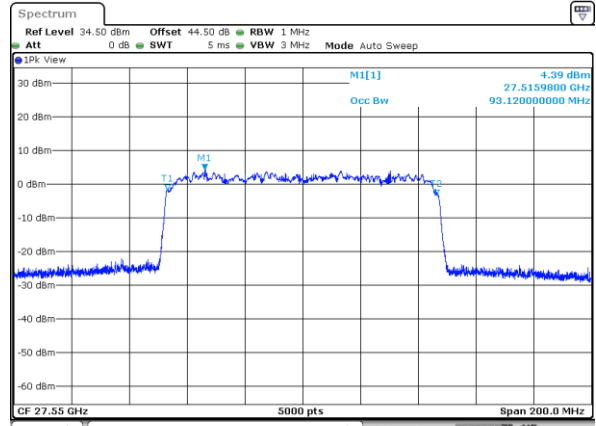
NR Band n261

Lowest Channel / 100MHz / 16QAM



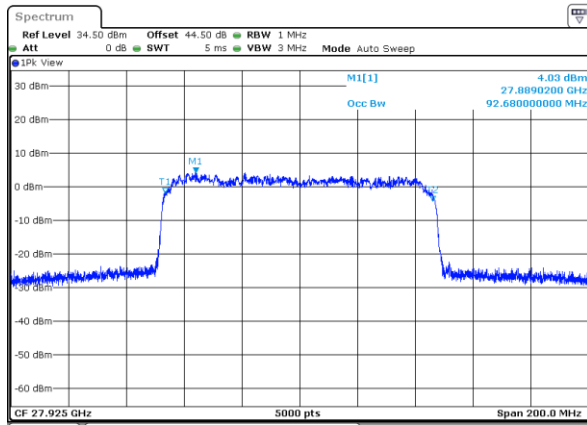
Date: 14.AUG.2020 20:20:05

Lowest Channel / 100MHz / 64QAM



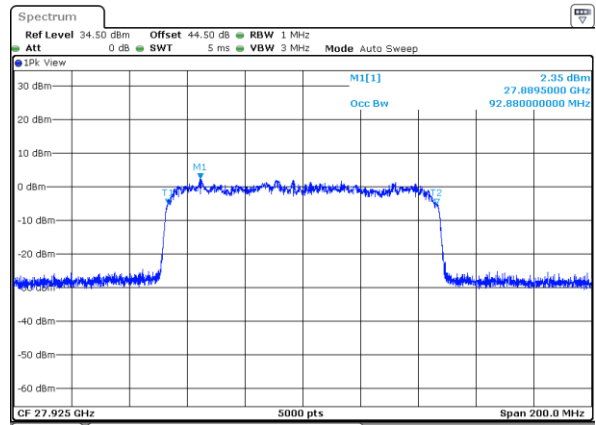
Date: 14.AUG.2020 20:23:05

Middle Channel / 100MHz / 16QAM



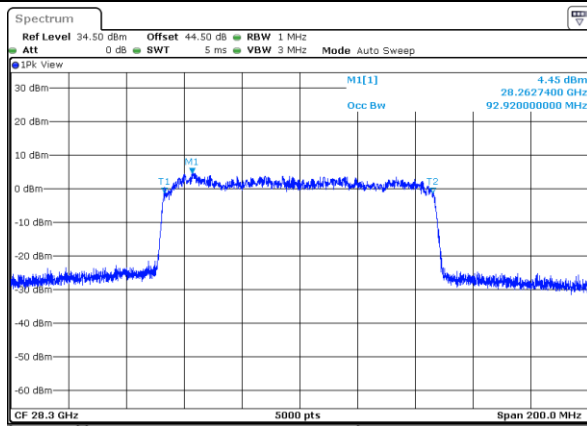
Date: 14.AUG.2020 23:27:48

Middle Channel / 100MHz / 64QAM



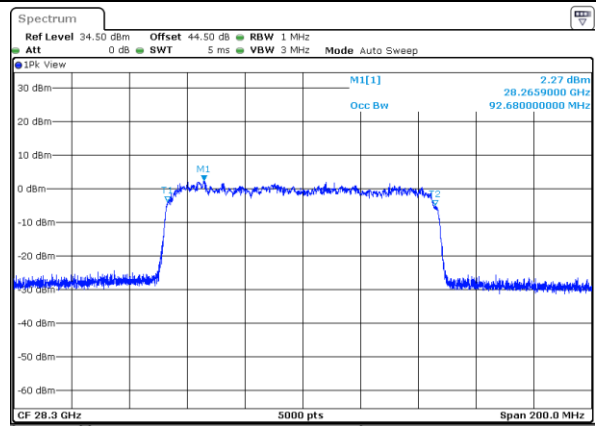
Date: 14.AUG.2020 23:27:06

Highest Channel / 100MHz / 16QAM



Date: 16.AUG.2020 14:14:46

Highest Channel / 100MHz / 64QAM



Date: 16.AUG.2020 14:16:45

Radiated Out of Band Emissions

Mode			DFT-s-OFDM Module 1 NR Band n261: BE (dBm) 1 RB							
BW			50MHz				100MHz			
Limit (dBm)			BPSK	QPSK	16QAM	64QAM	BPSK	QPSK	16QAM	64QAM
Low CH	0~10%OB	≤ -5	-19.29	-18.29	-18.31	-19.05	-20.94	-17.49	-21.03	-23.06
	>10%OB	≤ -13	-33.29	-32.78	-33.35	-33.83	-33.73	-33.23	-33.78	-33.93
High CH	0~10%OB	≤ -5	-25.4	-22.89	-23.96	-25.17	-24.61	-24.94	-26.36	-28.37
	>10%OB	≤ -13	-34.38	-34.11	-34.24	-34.55	-34.5	-34.63	-34.46	-34.73
Result			Compliance							

Mode			CP-OFDM Module 1 NR Band n261: BE (dBm) 1 RB					
BW			50MHz			100MHz		
Limit (dBm)			QPSK	16QAM	64QAM	QPSK	16QAM	64QAM
Low CH	0~10%OB	≤ -5	-18.29	-20.16	-22.64	-22.54	-26.45	-26.45
	>10%OB	≤ -13	-33.63	-33.75	-34.22	-34.03	-34.05	-34.05
High CH	0~10%OB	≤ -5	-26.62	-25.54	-27.66	-28.53	-28.14	-28.85
	>10%OB	≤ -13	-34.44	-34.53	-34.49	-34.46	-34.56	-34.5
Result			Compliance					

Mode			DFT-s-OFDM Module 1 NR Band n261: BE (dBm) Full RB							
BW			50MHz				100MHz			
Limit (dBm)			BPSK	QPSK	16QAM	64QAM	BPSK	QPSK	16QAM	64QAM
Low CH	0~10%OB	≤ -5	-27.88	-25.38	-26.85	-28.82	-30.29	-27.57	-29.59	-31.33
	>10%OB	≤ -13	-31.09	-26.56	-27.7	-30.29	-32.41	-29.21	-30.57	-32.25
High CH	0~10%OB	≤ -5	-31.09	-28.57	-29.59	-32.03	-34.12	-31.98	-32.74	-34
	>10%OB	≤ -13	-34.33	-32.11	-32.8	-34.19	-34.49	-33.55	-34.07	-34.53
Result			Compliance							

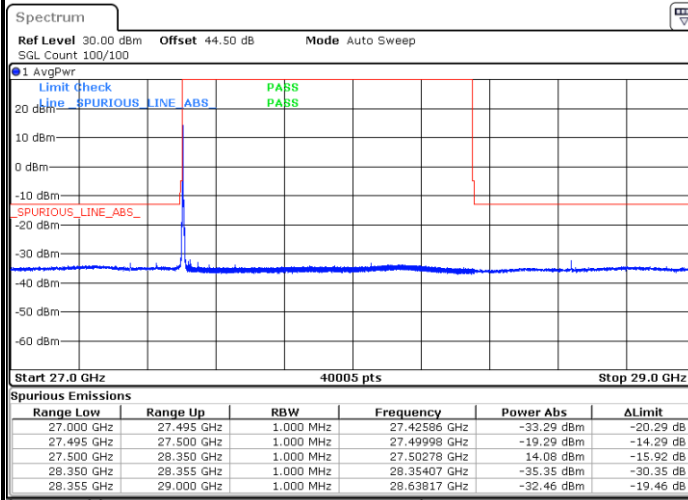
Mode			CP-OFDM Module 1 NR Band n261: BE (dBm) Full RB					
BW			50MHz			100MHz		
Limit (dBm)			QPSK	16QAM	64QAM	QPSK	16QAM	64QAM
Low CH	0~10%OB	≤ -5	-25.46	-26.74	-30.13	-28.52	-28.52	-32.31
	>10%OB	≤ -13	-26.99	-28.83	-31.79	-29.42	-29.42	-32.98
High CH	0~10%OB	≤ -5	-28.82	-29.8	-32.71	-31.65	-33.14	-34.22
	>10%OB	≤ -13	-32.43	-33.39	-34.46	-33.31	-34.3	-34.43
Result			Compliance					



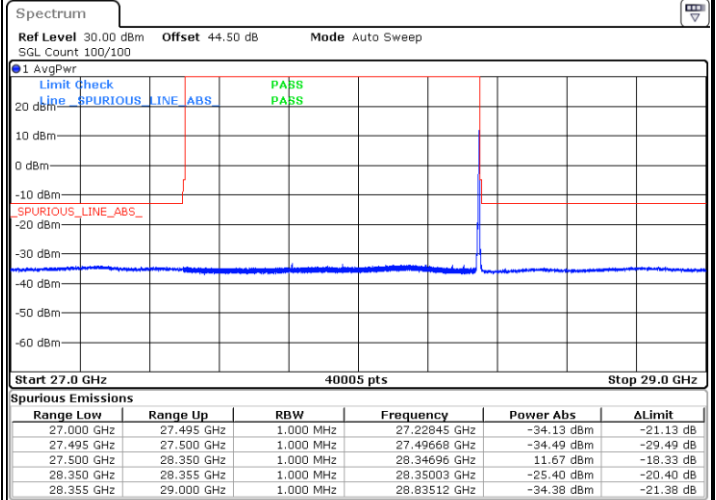
DFT-s-OFDM Module 1

NR Band n261/ 50MHz / BPSK

Lowest Band Edge / 1 RB

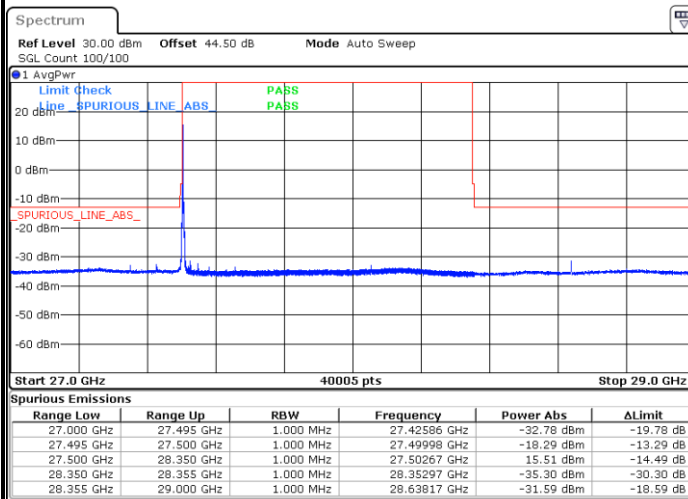


Highest Band Edge / 1 RB

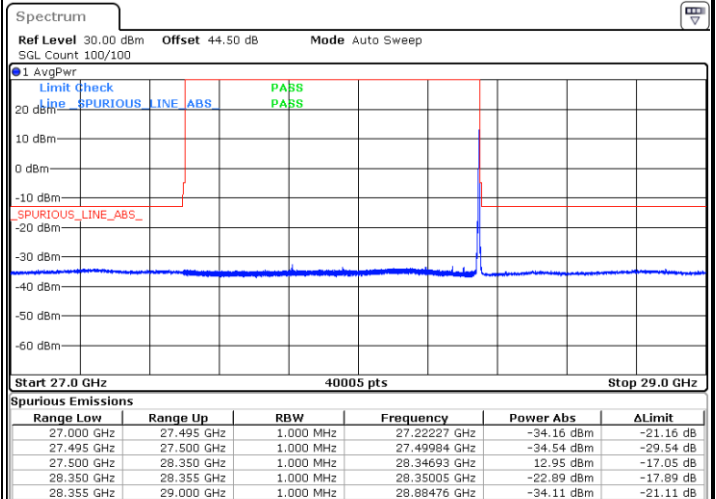


NR Band n261/ 50MHz / QPSK

Lowest Band Edge / 1 RB



Highest Band Edge / 1 RB

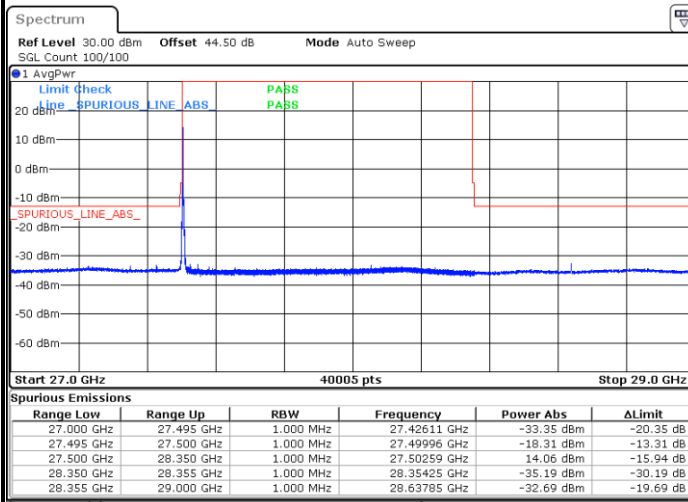




DFT-s-OFDM Module 1

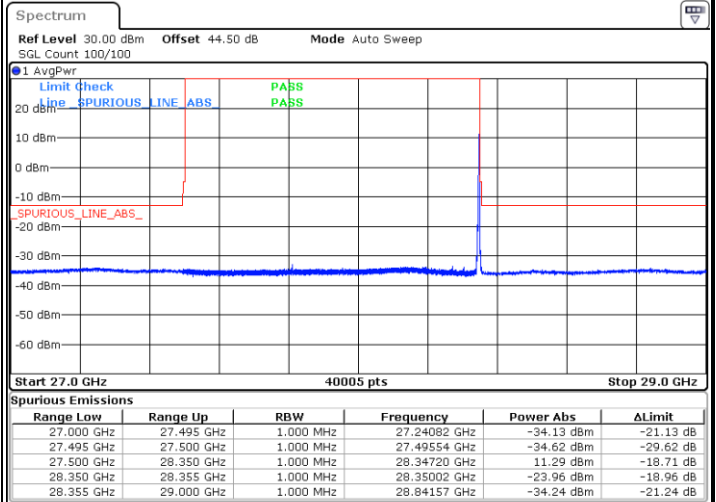
NR Band n261/ 50MHz / 16QAM

Lowest Band Edge / 1 RB



Date: 14.AUG.2020 18:57:57

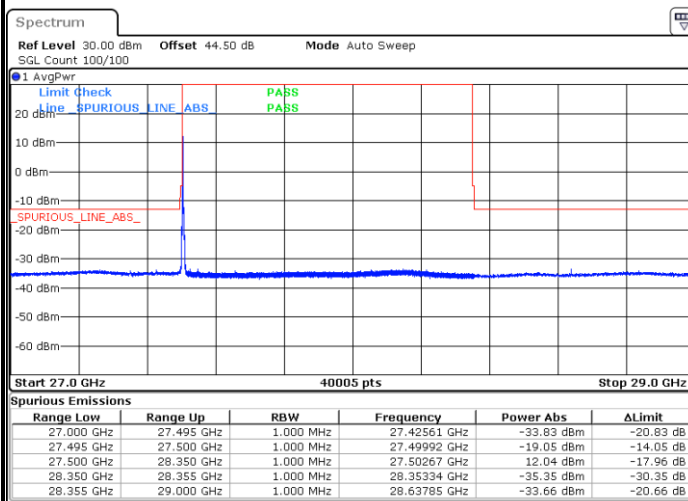
Highest Band Edge / 1 RB



Date: 15.AUG.2020 00:03:10

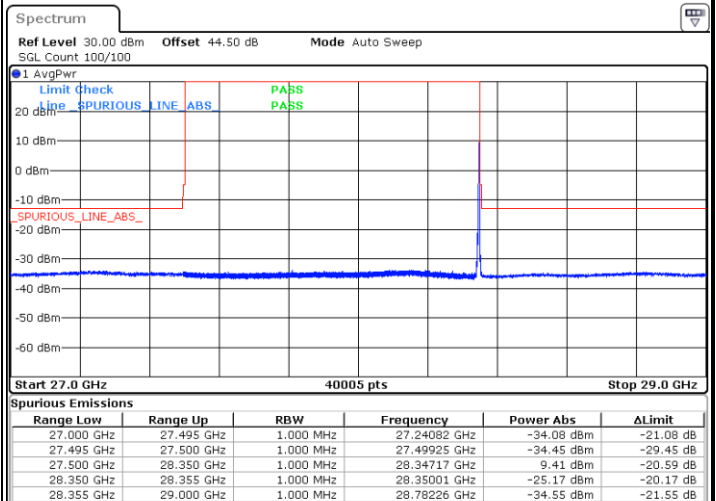
NR Band n261/ 50MHz / 64QAM

Lowest Band Edge / 1 RB



Date: 14.AUG.2020 18:57:00

Highest Band Edge / 1 RB



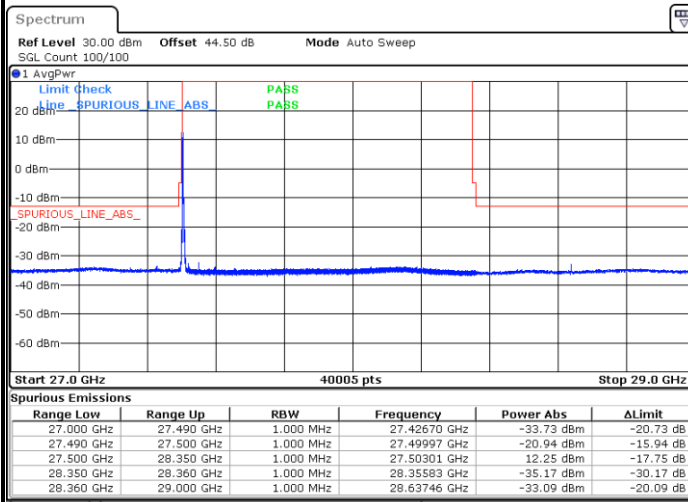
Date: 15.AUG.2020 00:03:59



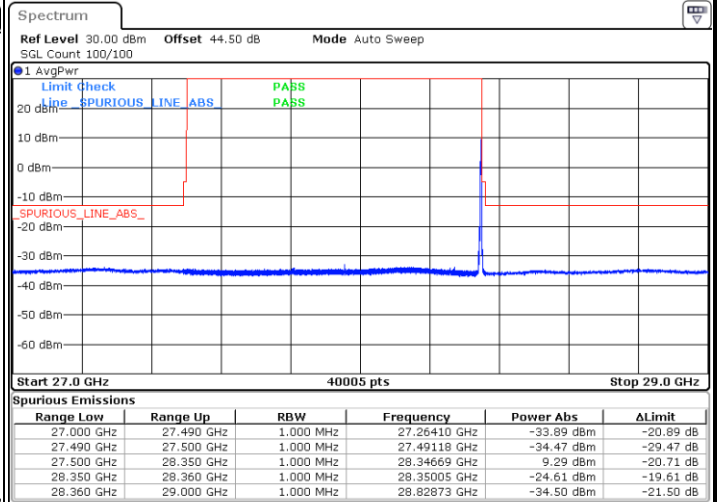
DFT-s-OFDM Module 1

NR Band n261/ 100MHz / BPSK

Lowest Band Edge / 1 RB

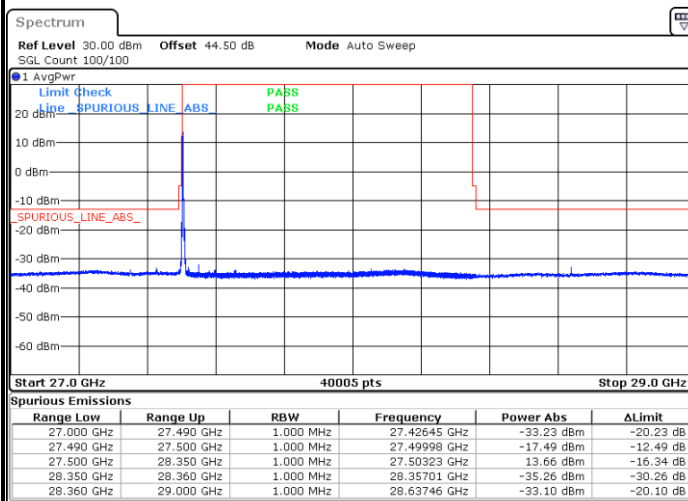


Highest Band Edge / 1 RB

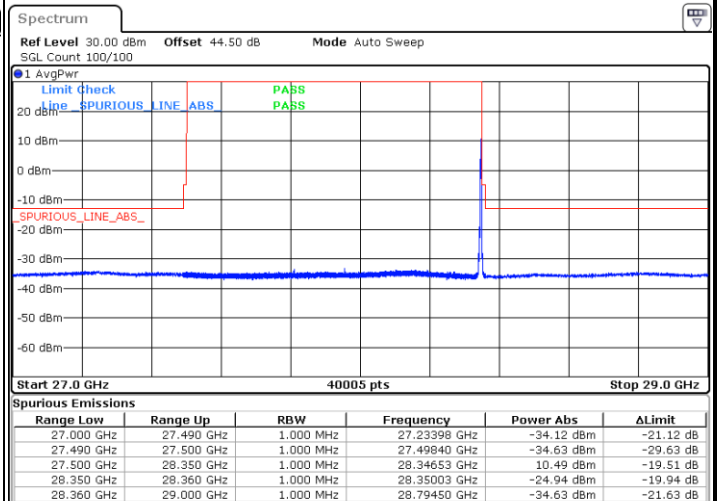


NR Band n261/ 100MHz / QPSK

Lowest Band Edge / 1 RB



Highest Band Edge / 1 RB

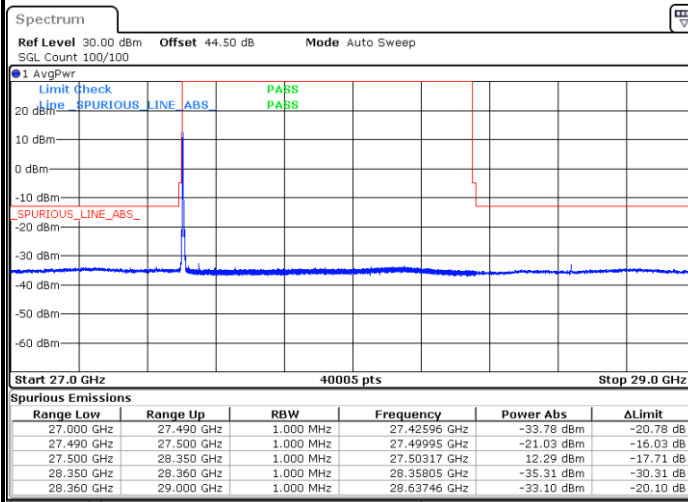




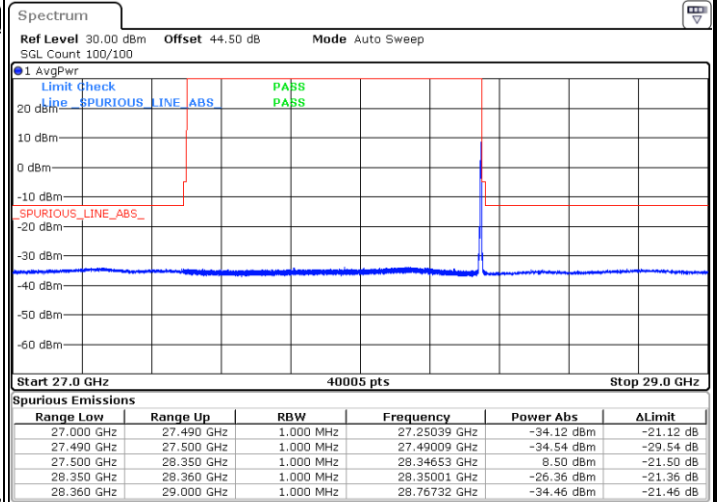
DFT-s-OFDM Module 1

NR Band n261/ 100MHz / 16QAM

Lowest Band Edge / 1 RB

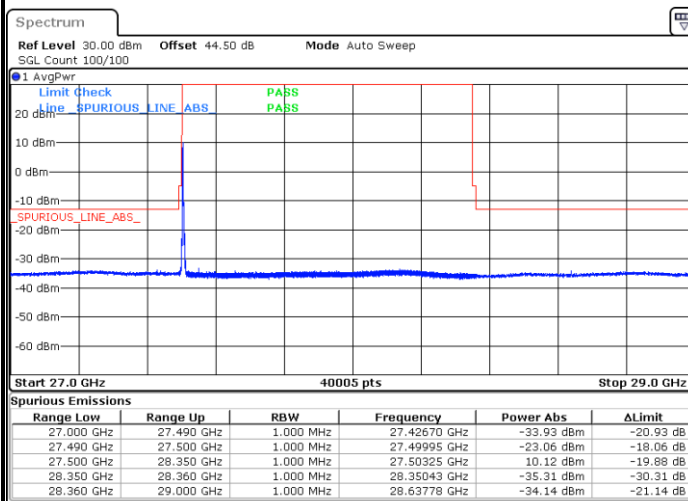


Highest Band Edge / 1 RB

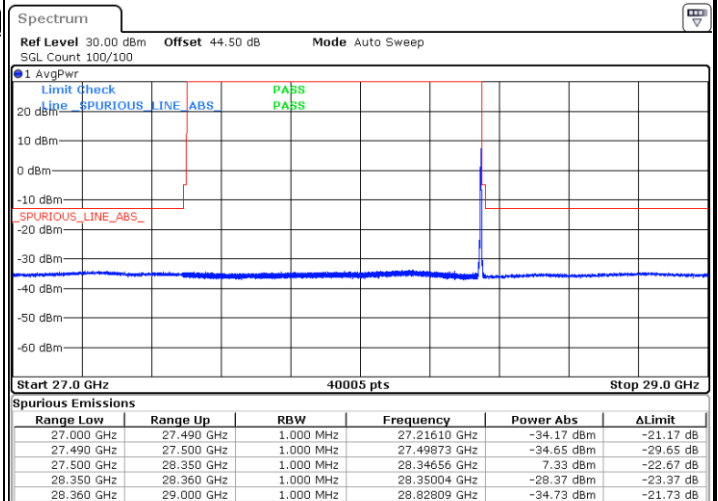


NR Band n261/ 100MHz / 64QAM

Lowest Band Edge / 1 RB



Highest Band Edge / 1 RB

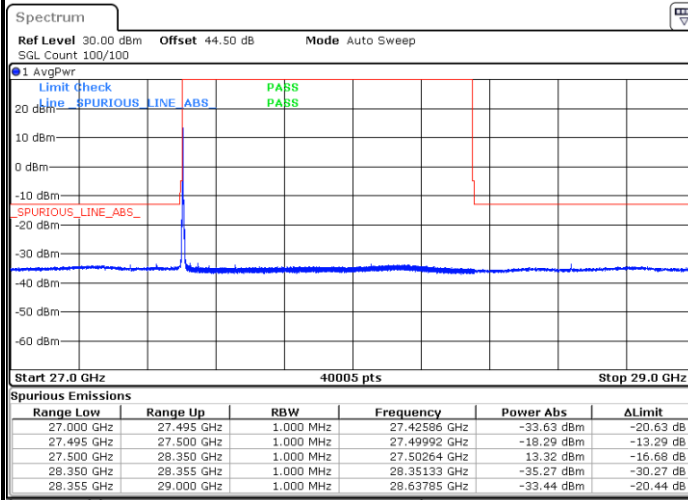




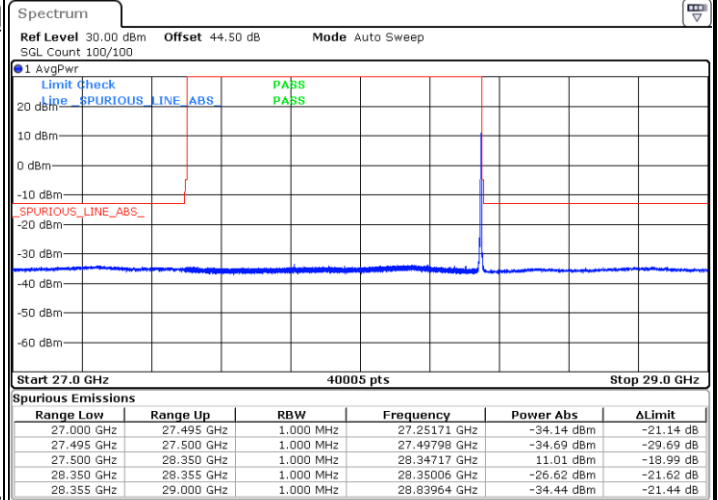
CP-OFDM Module 1

NR Band n261/ 50MHz / QPSK

Lowest Band Edge / 1 RB

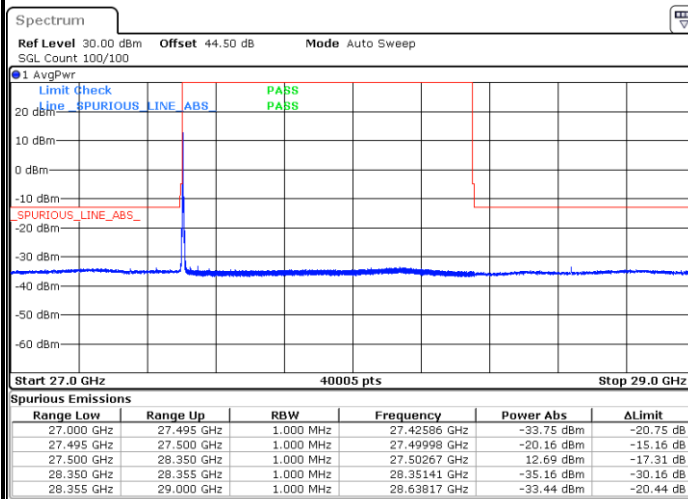


Highest Band Edge / 1 RB

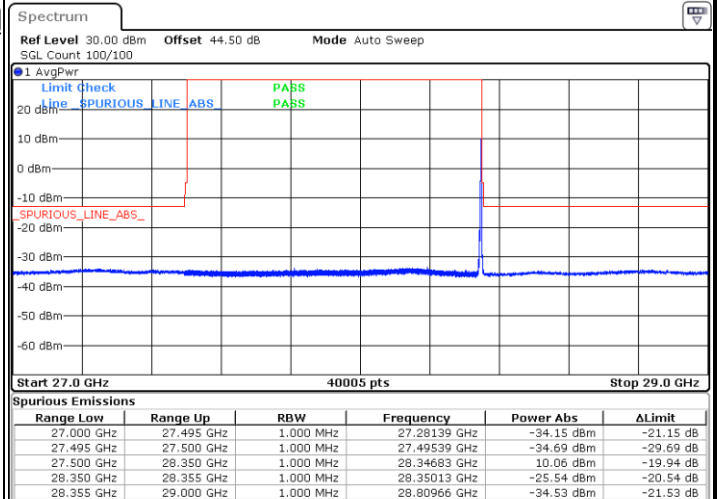


NR Band n261/ 50MHz / 16QAM

Lowest Band Edge / 1 RB



Highest Band Edge / 1 RB

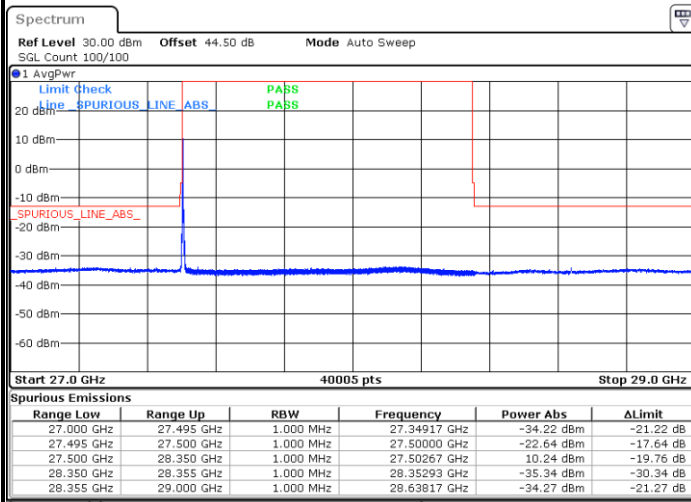




CP-OFDM Module 1

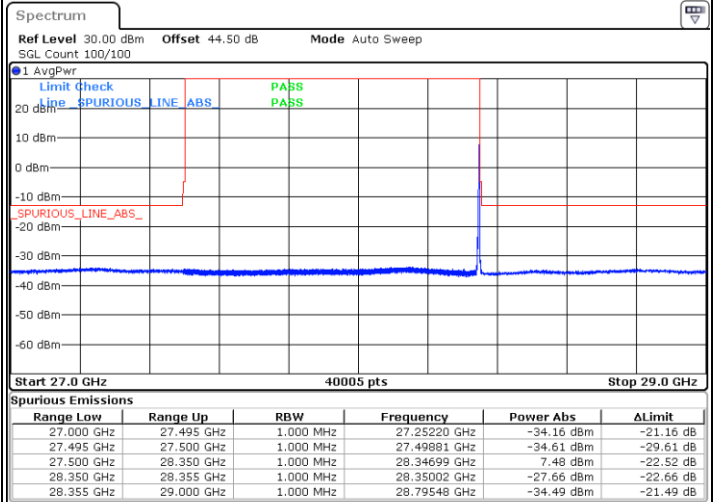
NR Band n261/ 50MHz / 64QAM

Lowest Band Edge / 1 RB



Date: 14.AUG.2020 19:07:53

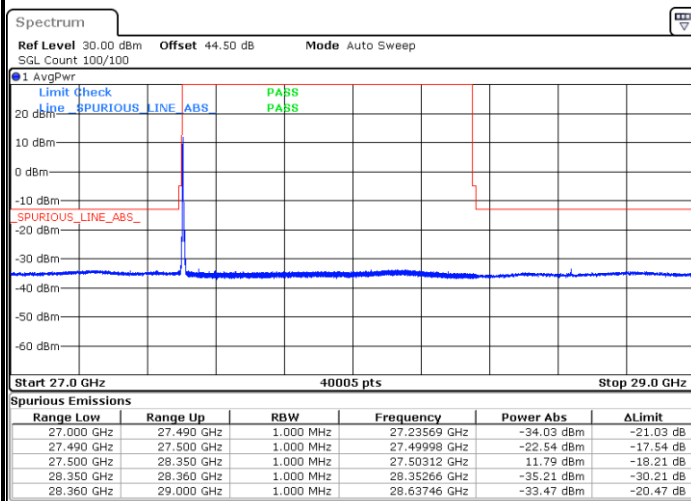
Highest Band Edge / 1 RB



Date: 15.AUG.2020 00:32:33

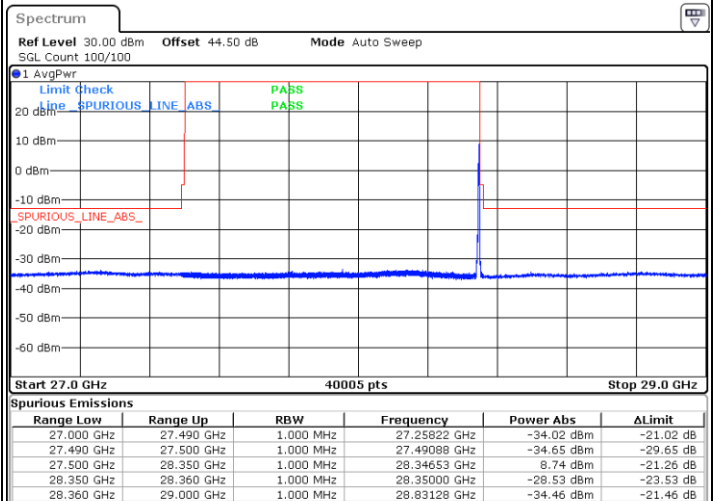
NR Band n261/ 100MHz / QPSK

Lowest Band Edge / 1 RB



Date: 14.AUG.2020 20:30:26

Highest Band Edge / 1 RB



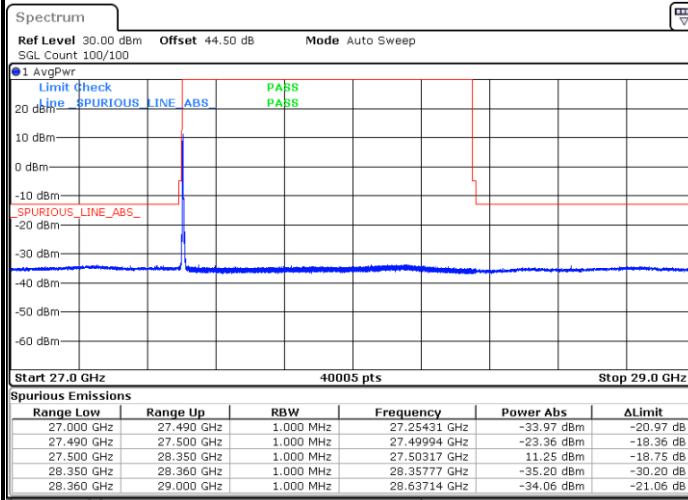
Date: 16.AUG.2020 13:52:40



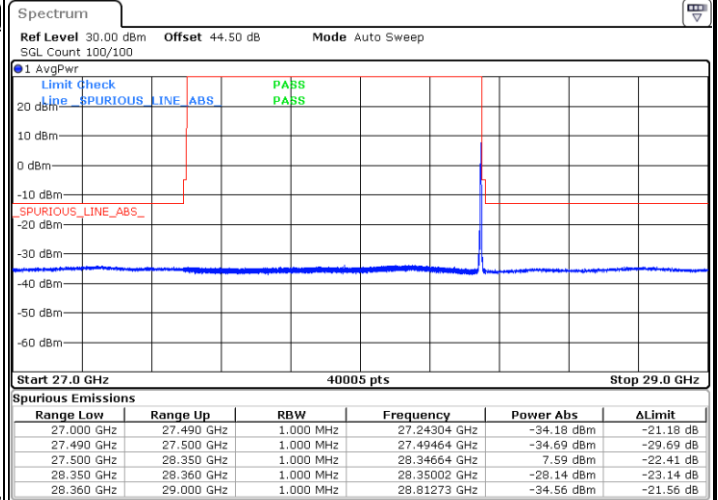
CP-OFDM Module 1

NR Band n261/ 100MHz / 16QAM

Lowest Band Edge / 1 RB

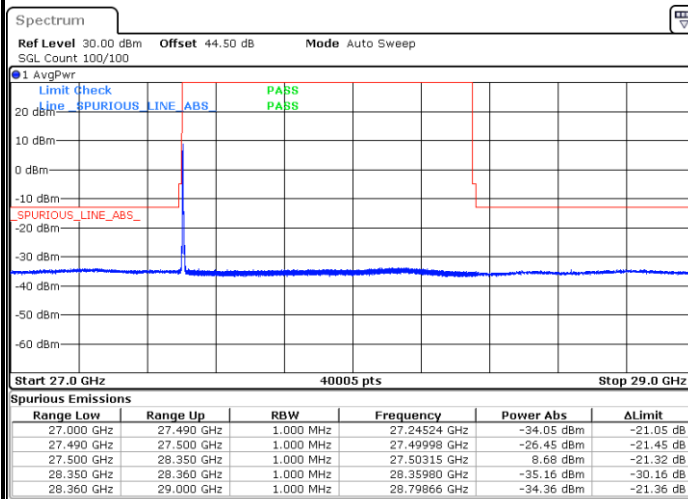


Highest Band Edge / 1 RB

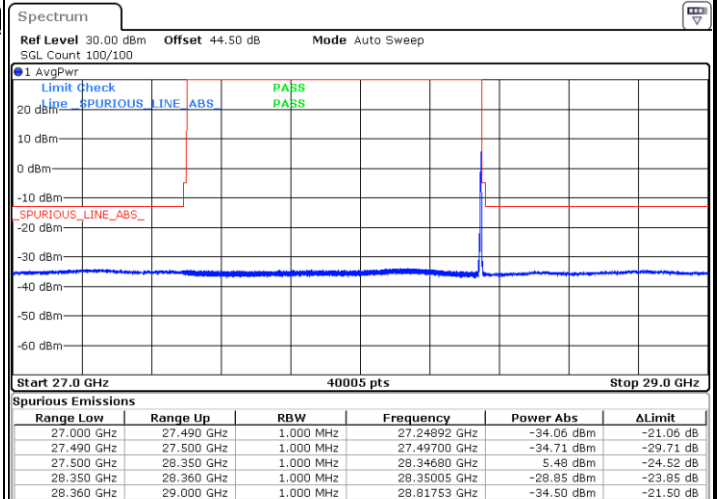


NR Band n261/ 100MHz / 64QAM

Lowest Band Edge / 1 RB



Highest Band Edge / 1 RB

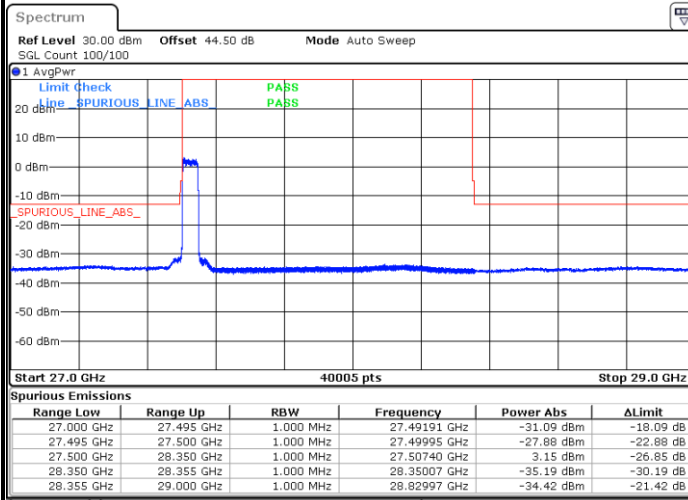




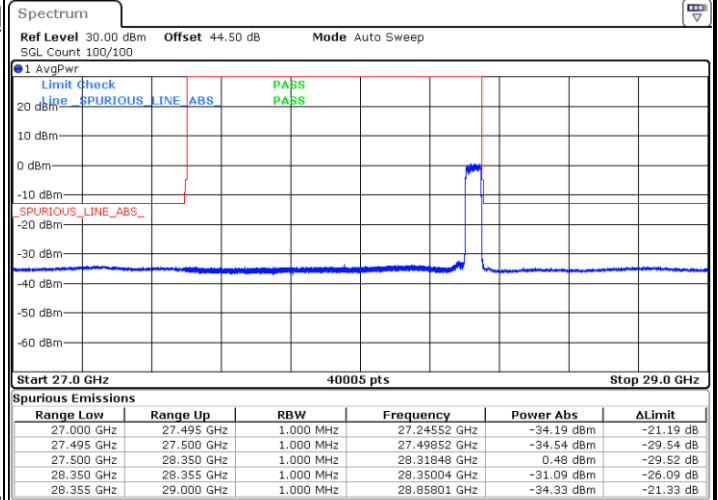
DFT-s-OFDM Module 1

NR Band n261/ 50MHz / BPSK

Lowest Band Edge / Full RB

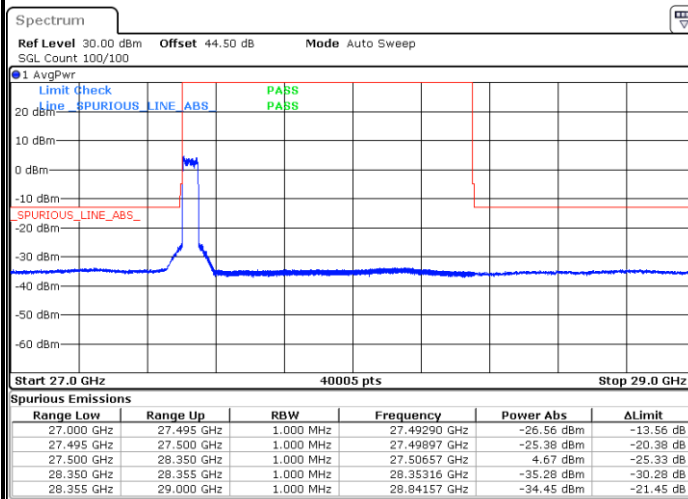


Highest Band Edge / Full RB

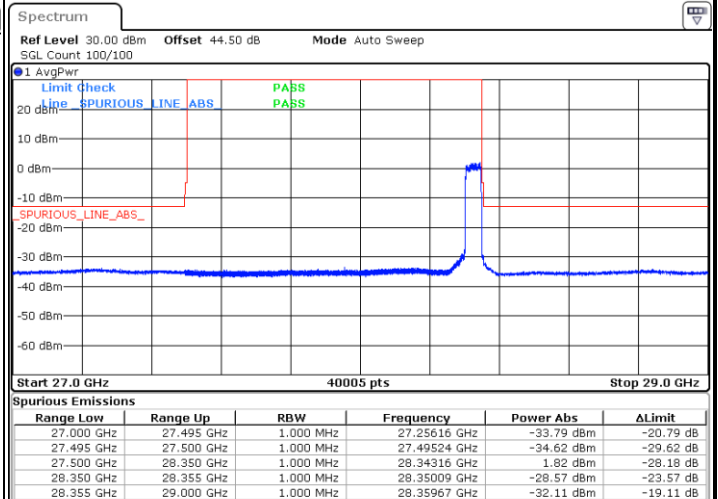


NR Band n261/ 50MHz / QPSK

Lowest Band Edge / Full RB



Highest Band Edge / Full RB

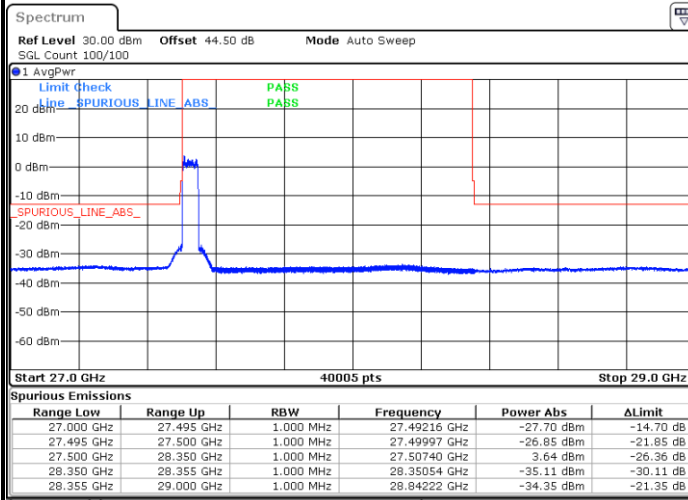




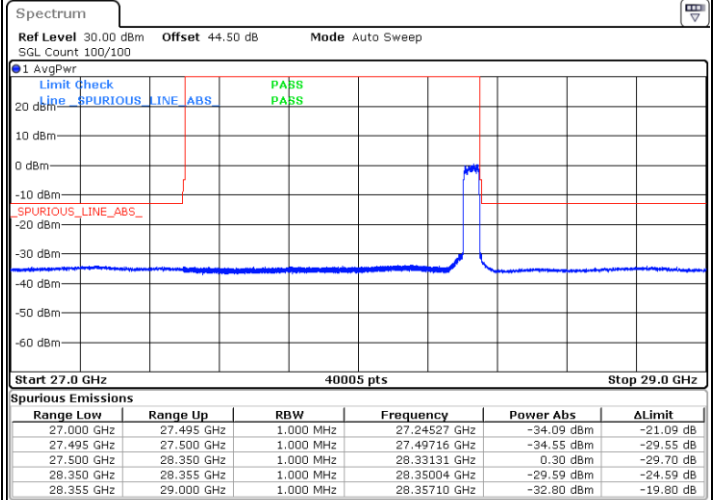
DFT-s-OFDM Module 1

NR Band n261/ 50MHz / 16QAM

Lowest Band Edge / Full RB

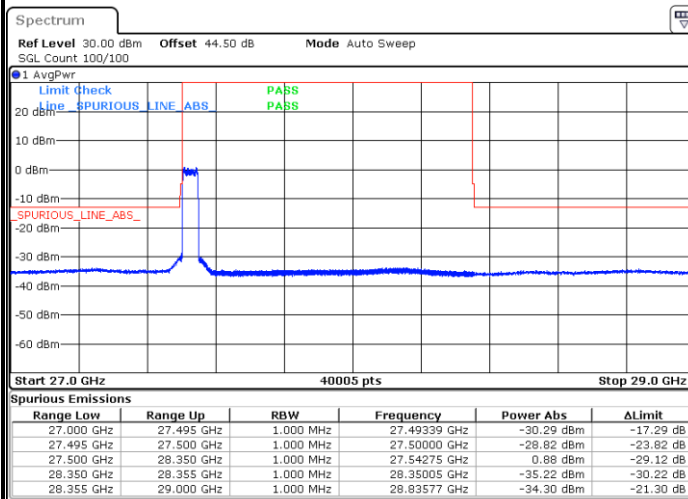


Highest Band Edge / Full RB

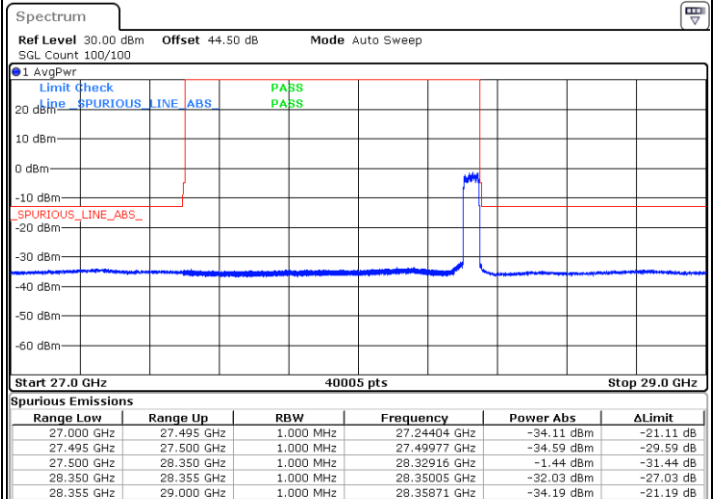


NR Band n261/ 50MHz / 64QAM

Lowest Band Edge / Full RB



Highest Band Edge / Full RB

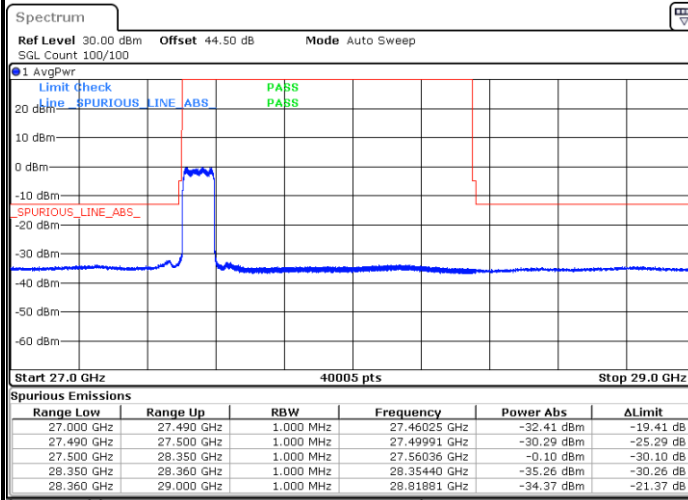




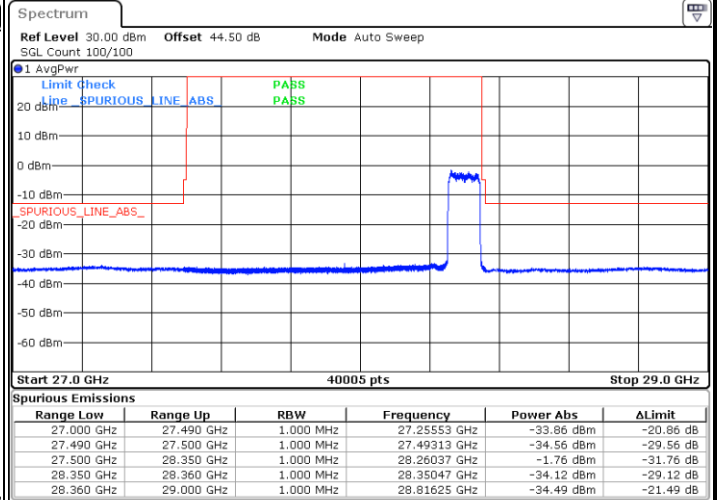
DFT-s-OFDM Module 1

NR Band n261/ 100MHz / BPSK

Lowest Band Edge / Full RB

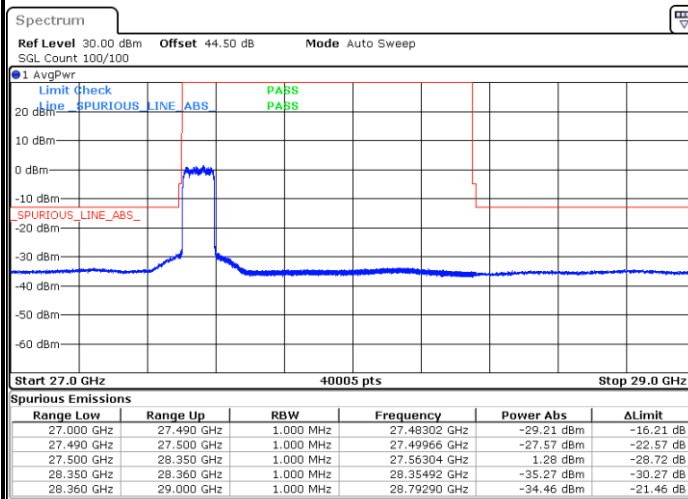


Highest Band Edge / Full RB

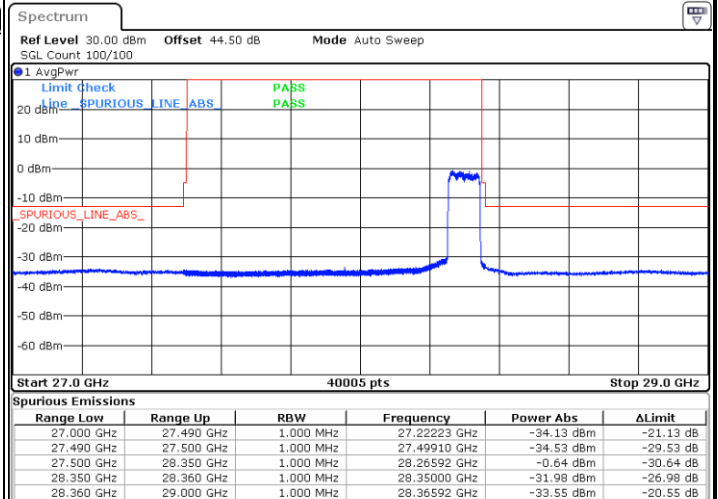


NR Band n261/ 100MHz / QPSK

Lowest Band Edge / Full RB



Highest Band Edge / Full RB

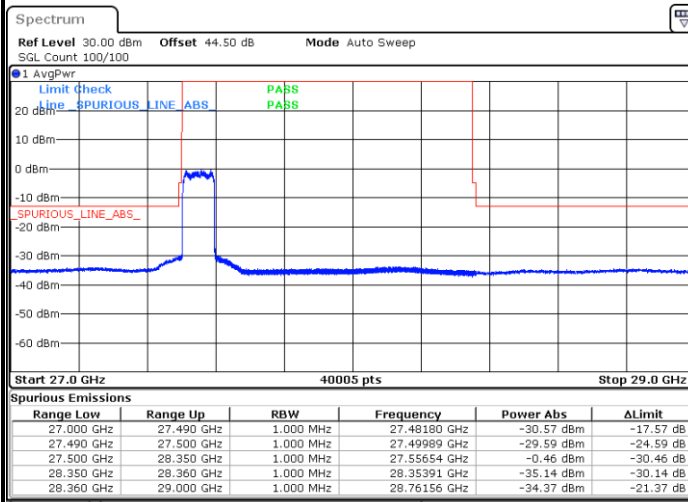




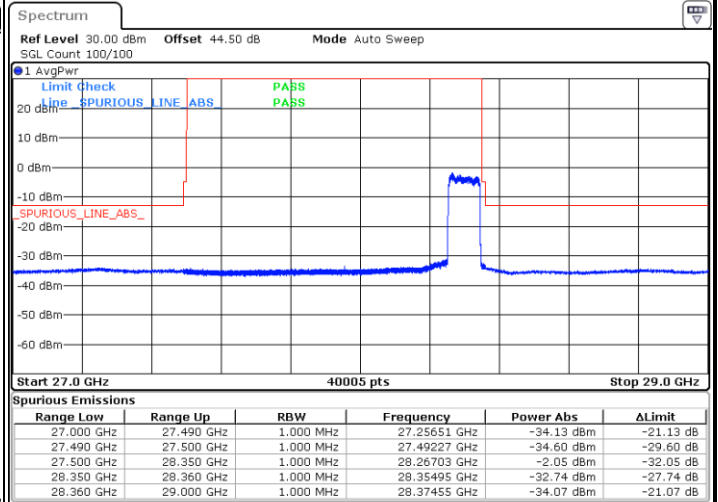
DFT-s-OFDM Module 1

NR Band n261/ 100MHz / 16QAM

Lowest Band Edge / Full RB

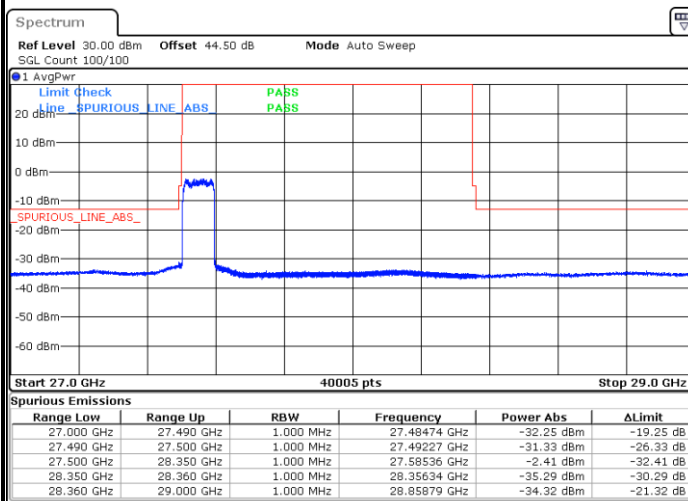


Highest Band Edge / Full RB

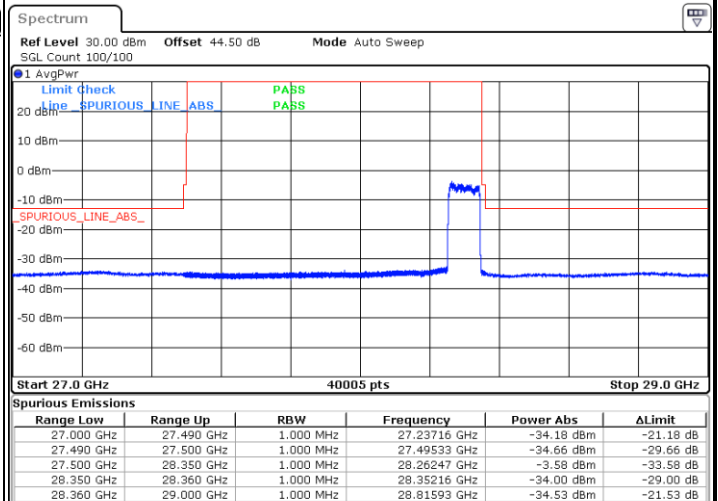


NR Band n261/ 100MHz / 64QAM

Lowest Band Edge / Full RB



Highest Band Edge / Full RB

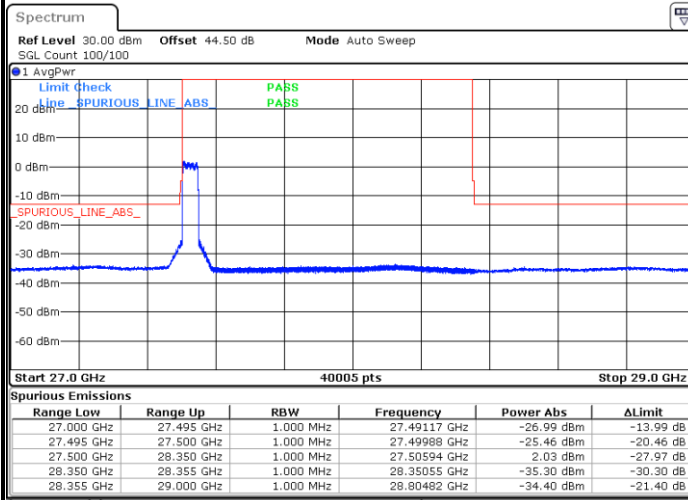




CP-OFDM Module 1

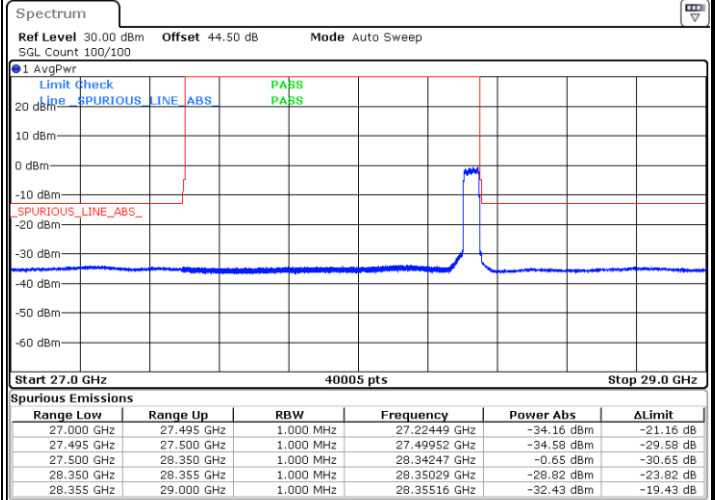
NR Band n261/ 50MHz / QPSK

Lowest Band Edge / Full RB



Date: 14.AUG.2020 19:11:52

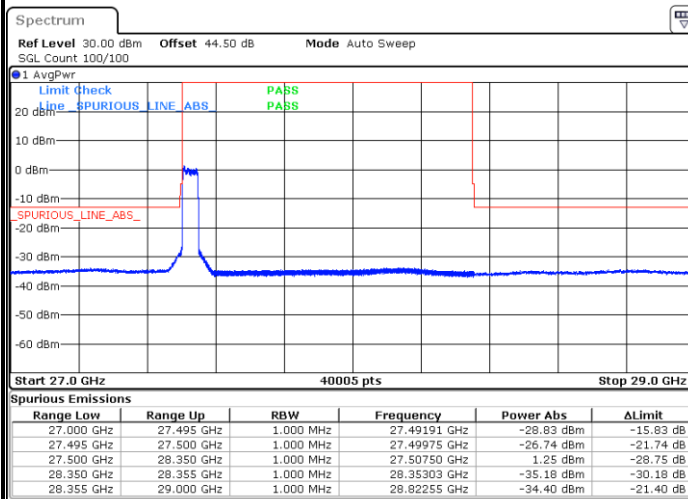
Highest Band Edge / Full RB



Date: 15.AUG.2020 00:35:40

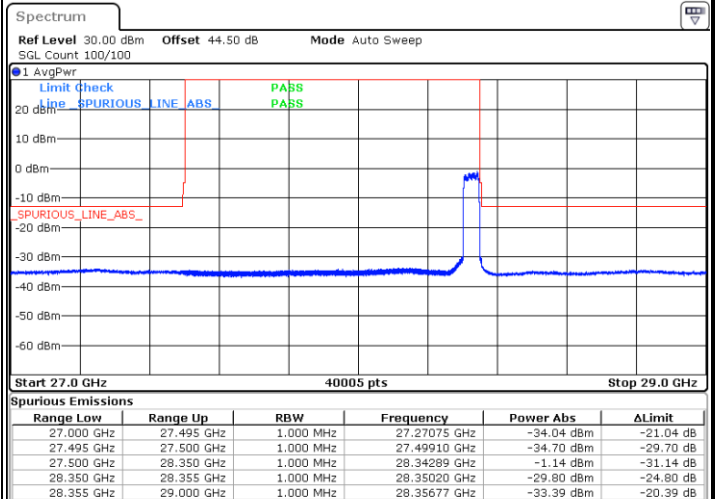
NR Band n261/ 50MHz / 16QAM

Lowest Band Edge / Full RB



Date: 14.AUG.2020 19:10:23

Highest Band Edge / Full RB



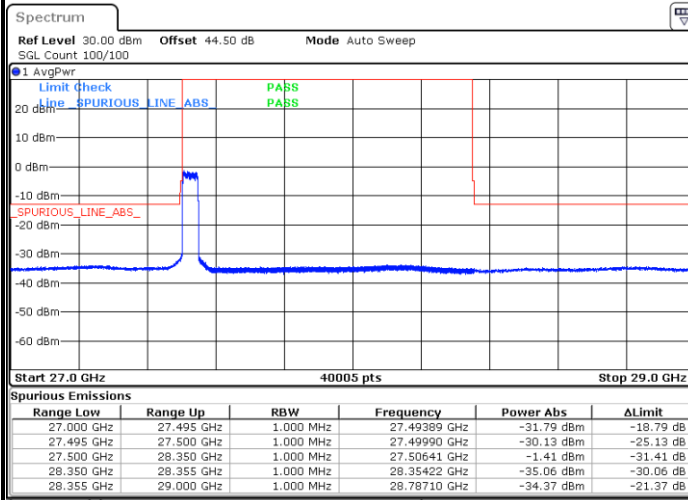
Date: 15.AUG.2020 00:37:00



CP-OFDM Module 1

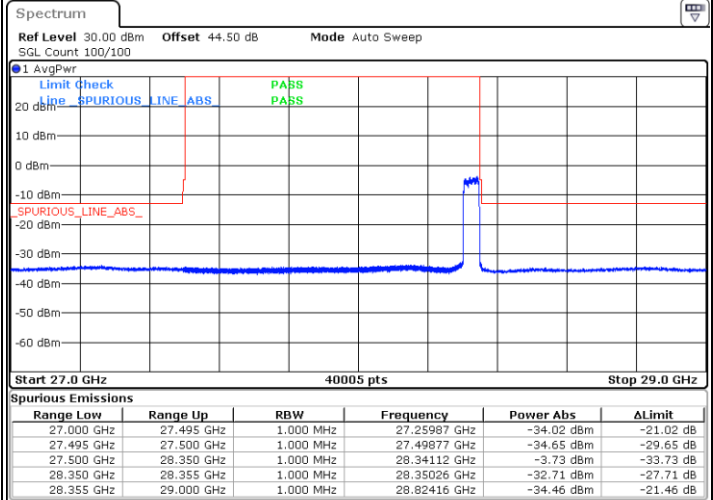
NR Band n261/ 50MHz / 64QAM

Lowest Band Edge / Full RB



Date: 14.AUG.2020 19:09:21

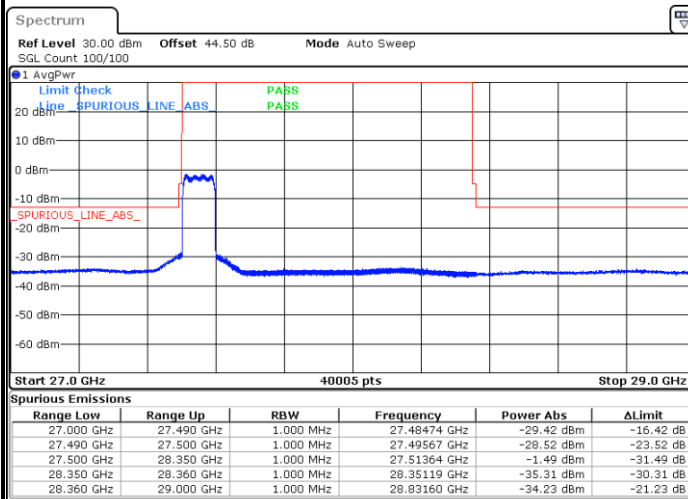
Highest Band Edge / Full RB



Date: 15.AUG.2020 00:38:01

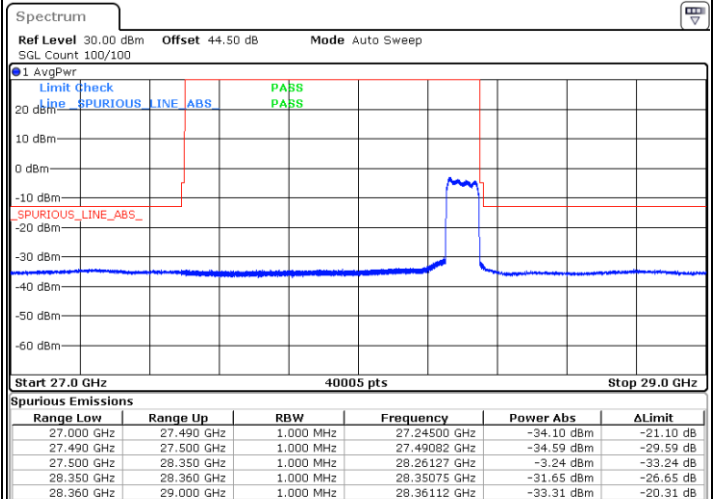
NR Band n261/ 100MHz / QPSK

Lowest Band Edge / Full RB



Date: 14.AUG.2020 20:15:10

Highest Band Edge / Full RB



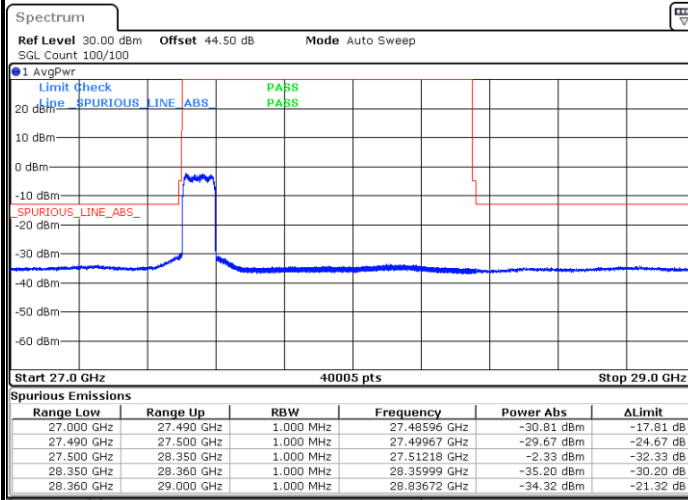
Date: 16.AUG.2020 14:13:14



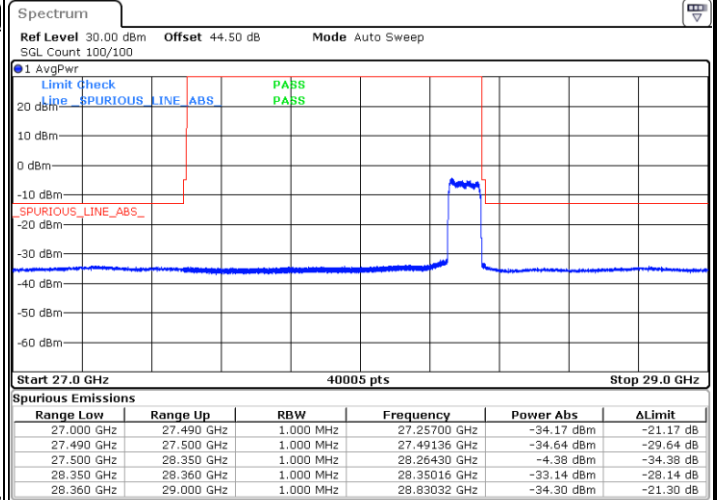
CP-OFDM Module 1

NR Band n261/ 100MHz / 16QAM

Lowest Band Edge / Full RB

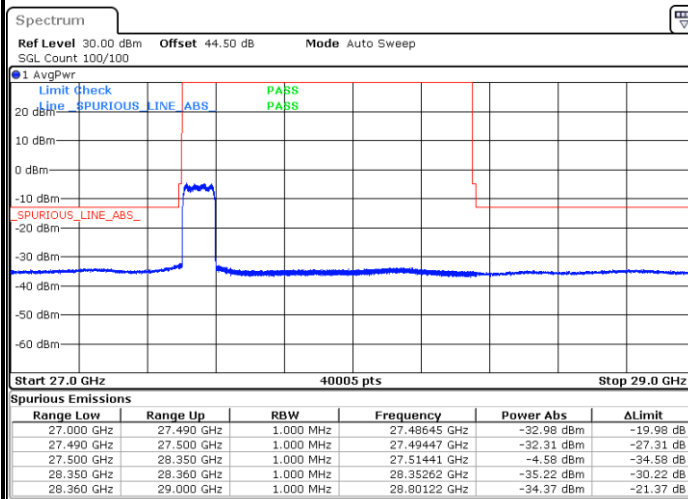


Highest Band Edge / Full RB

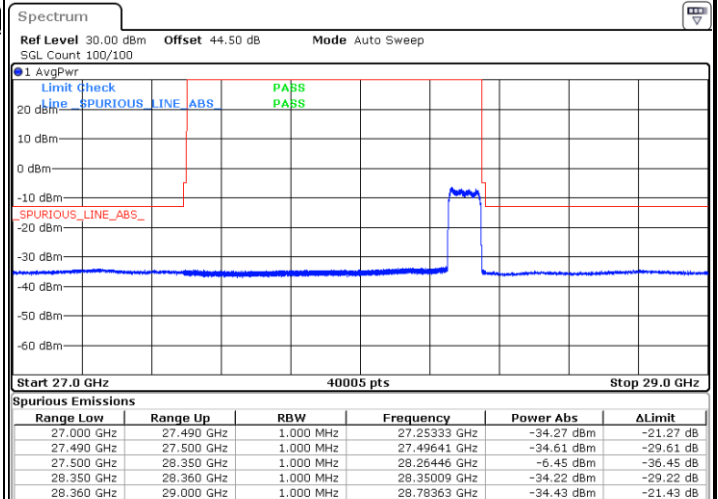


NR Band n261/ 100MHz / 64QAM

Lowest Band Edge / Full RB



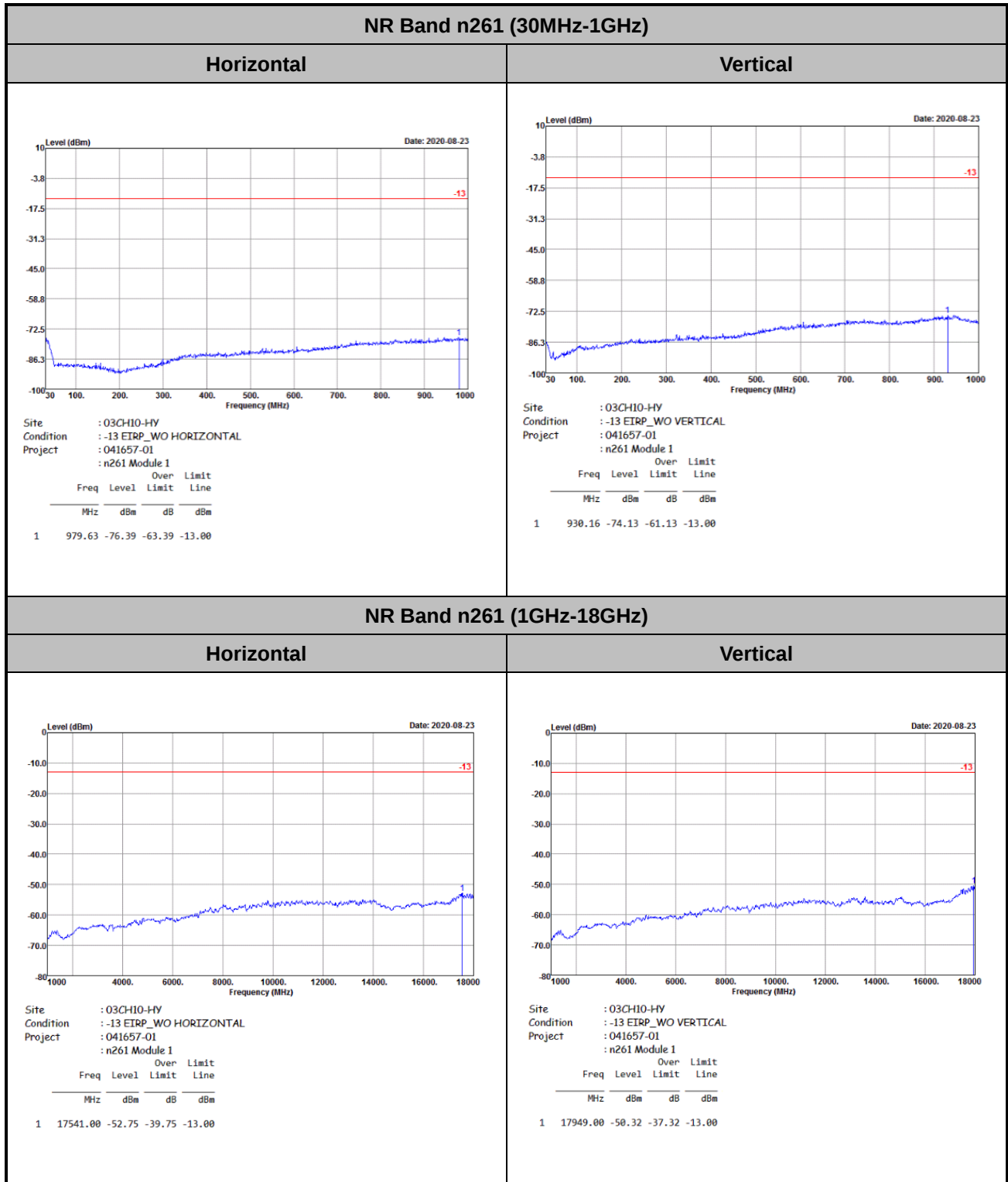
Highest Band Edge / Full RB



Spurious Emission

There is no significant spurious emission signal found for frequency started from 30MHz up to 18GHz.

Only the noise floor is reported.



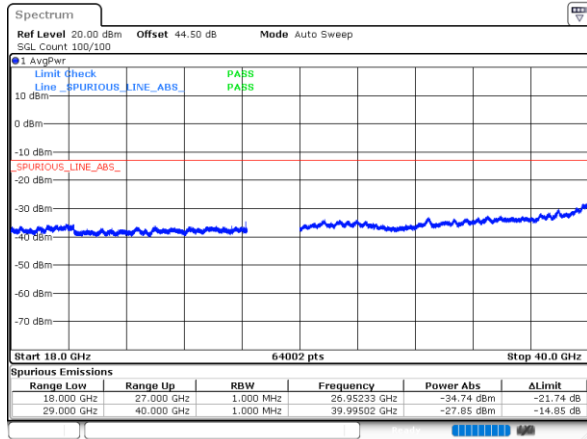


Spurious emission between 18GHz to 40GHz worst case plot is reported as following.

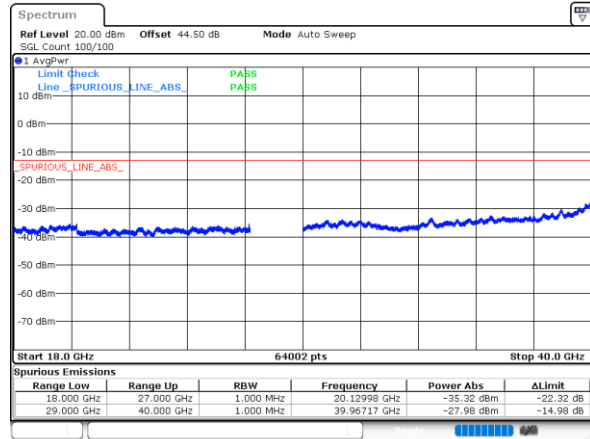
DFT-s-OFDM Module 1

NR Band n261BPSK (18-40GHz)

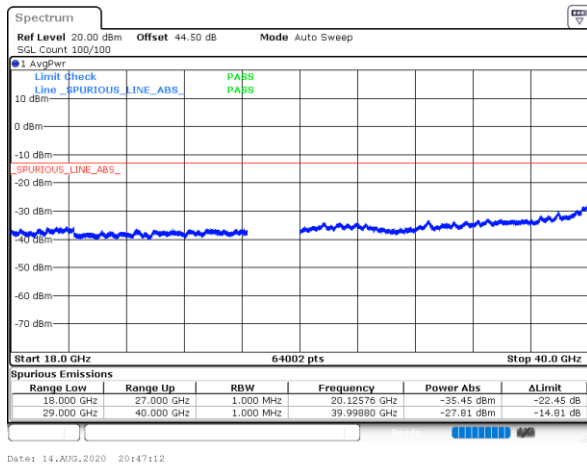
Lowest Channel / 50MHz



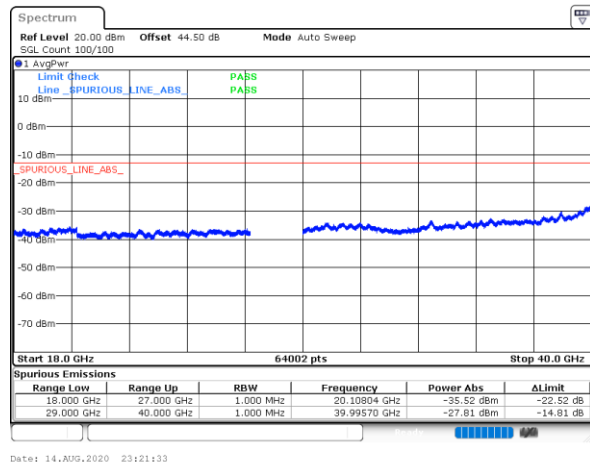
Lowest Channel / 100MHz



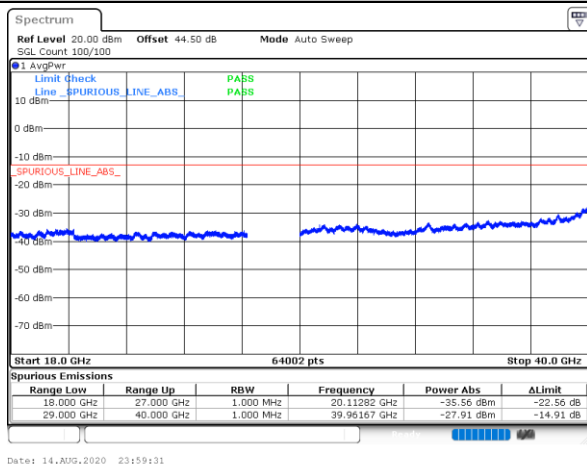
Middle Channel / 50MHz



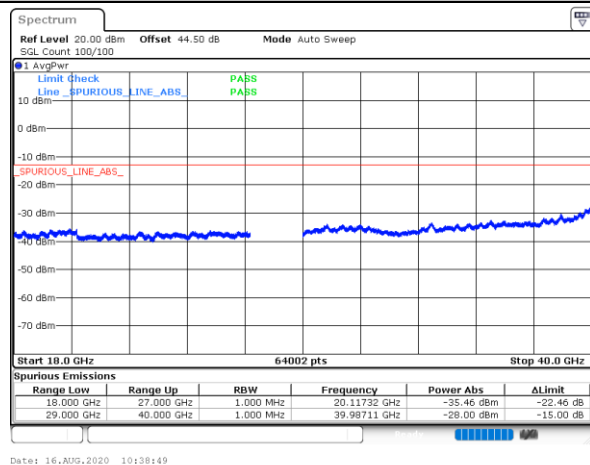
Middle Channel / 100MHz



Highest Channel / 50MHz



Highest Channel / 100MHz

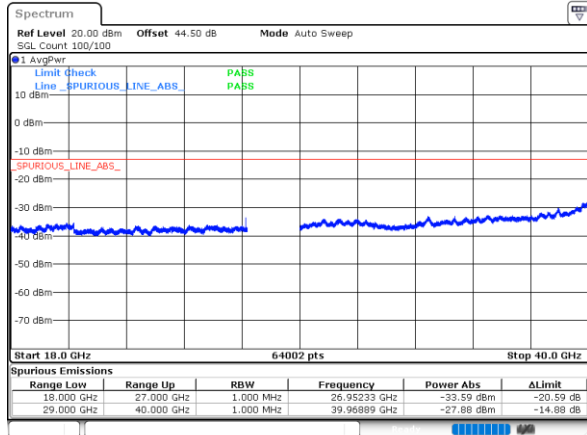




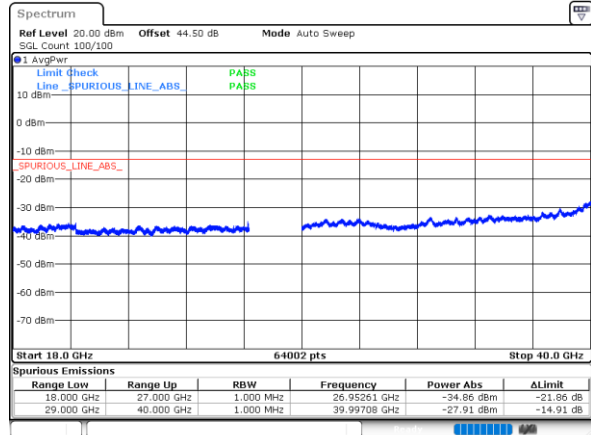
DFT-s-OFDM Module 1

NR Band n261QPSK (18-40GHz)

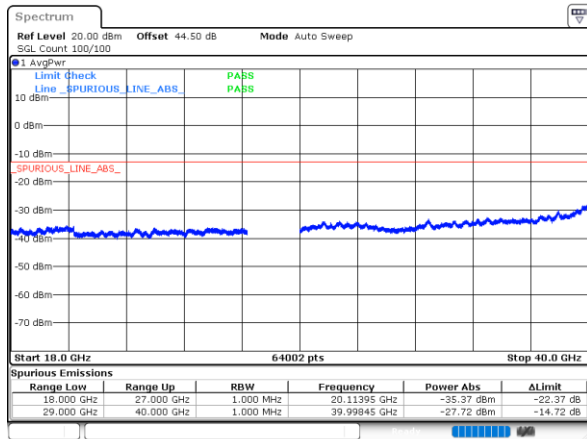
Lowest Channel / 50MHz



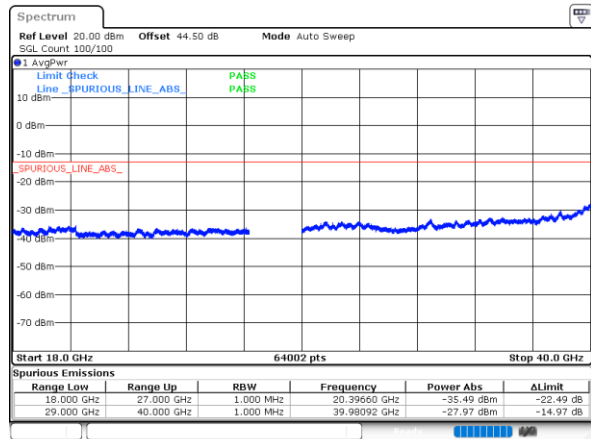
Lowest Channel / 100MHz



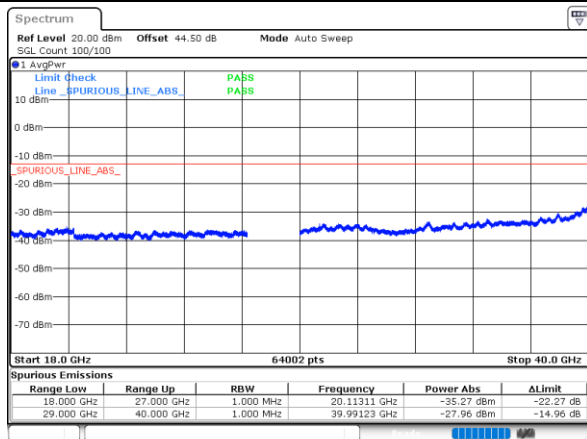
Middle Channel / 50MHz



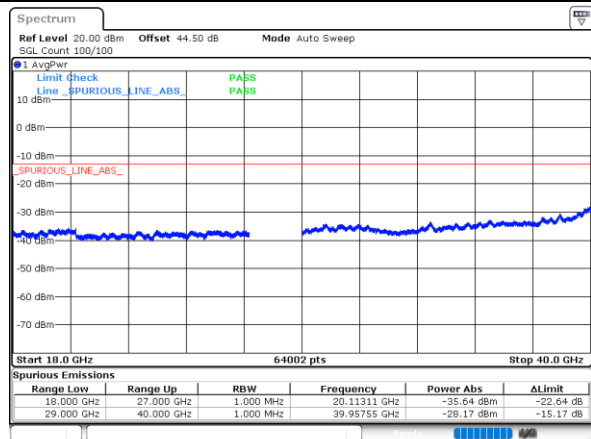
Middle Channel / 100MHz



Highest Channel / 50MHz



Highest Channel / 100MHz

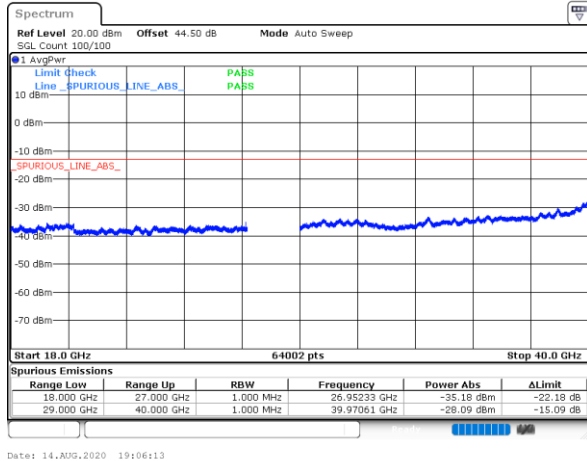




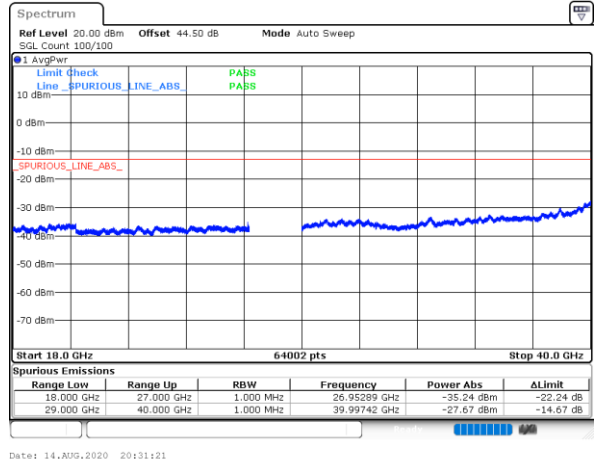
CP-OFDM Module 1

NR Band n261QPSK (18-40GHz)

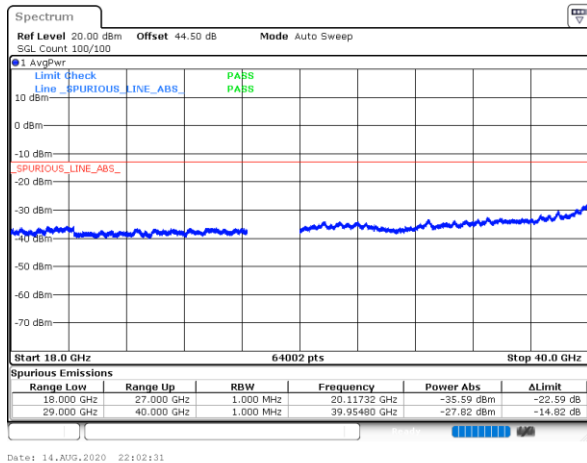
Lowest Channel / 50MHz



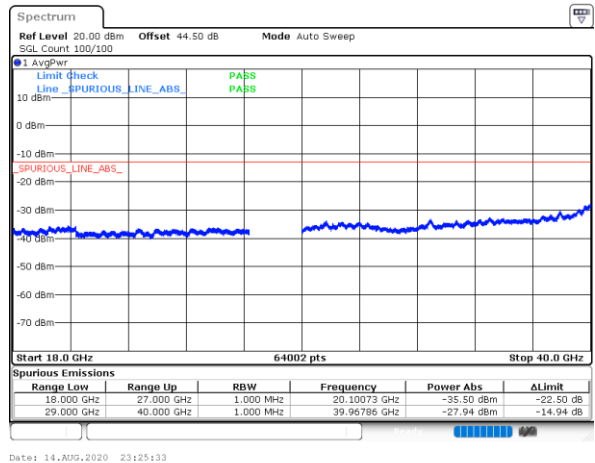
Lowest Channel / 100MHz



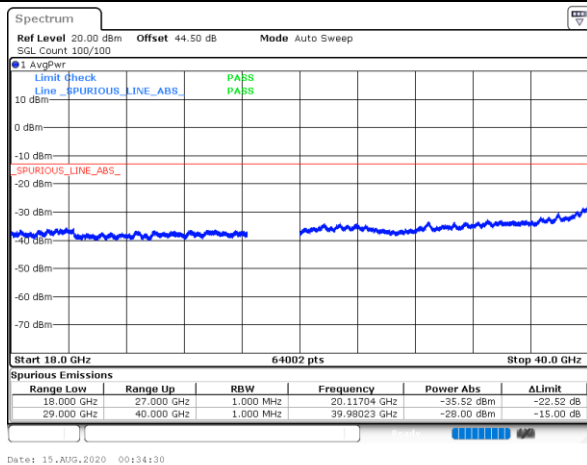
Middle Channel / 50MHz



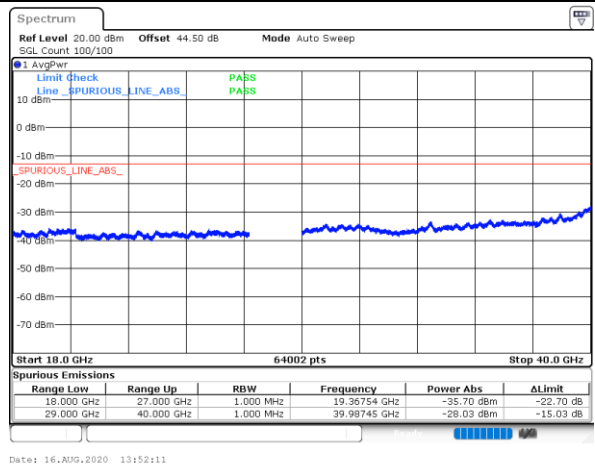
Middle Channel / 100MHz



Highest Channel / 50MHz

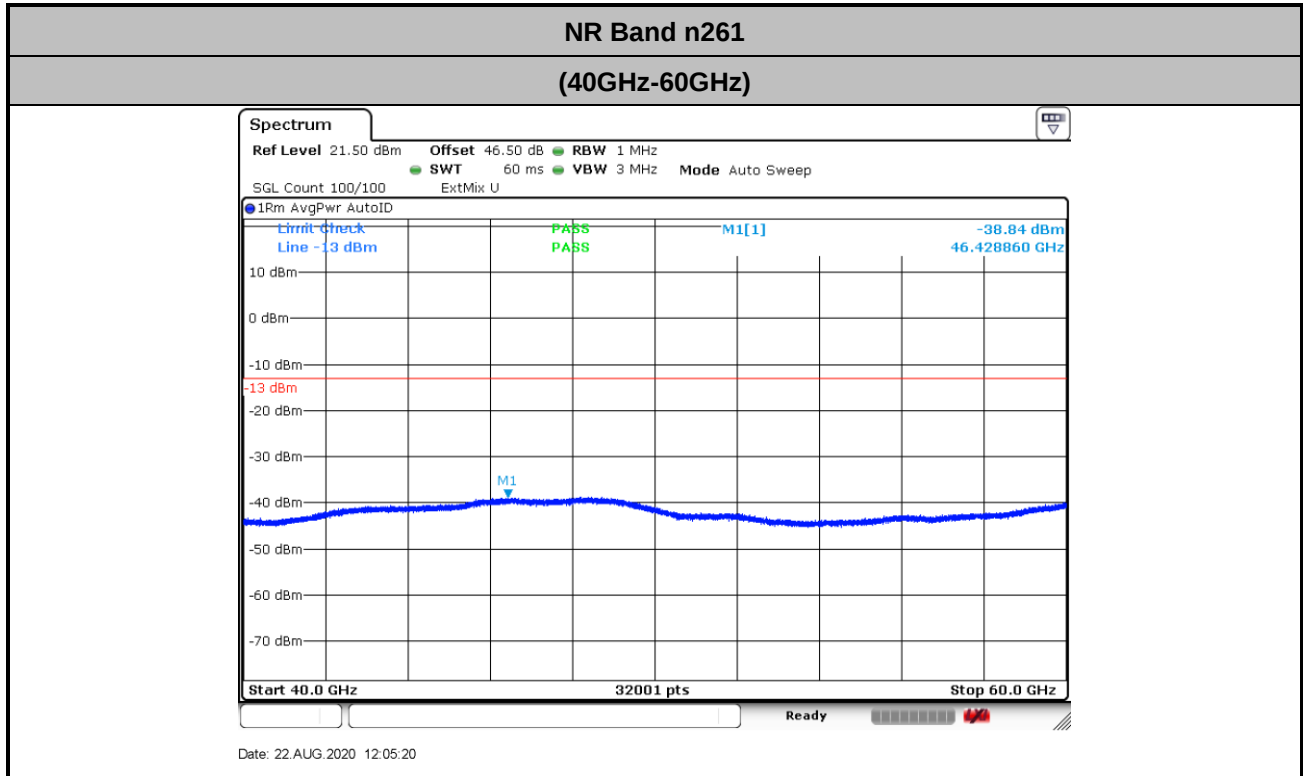


Highest Channel / 100MHz

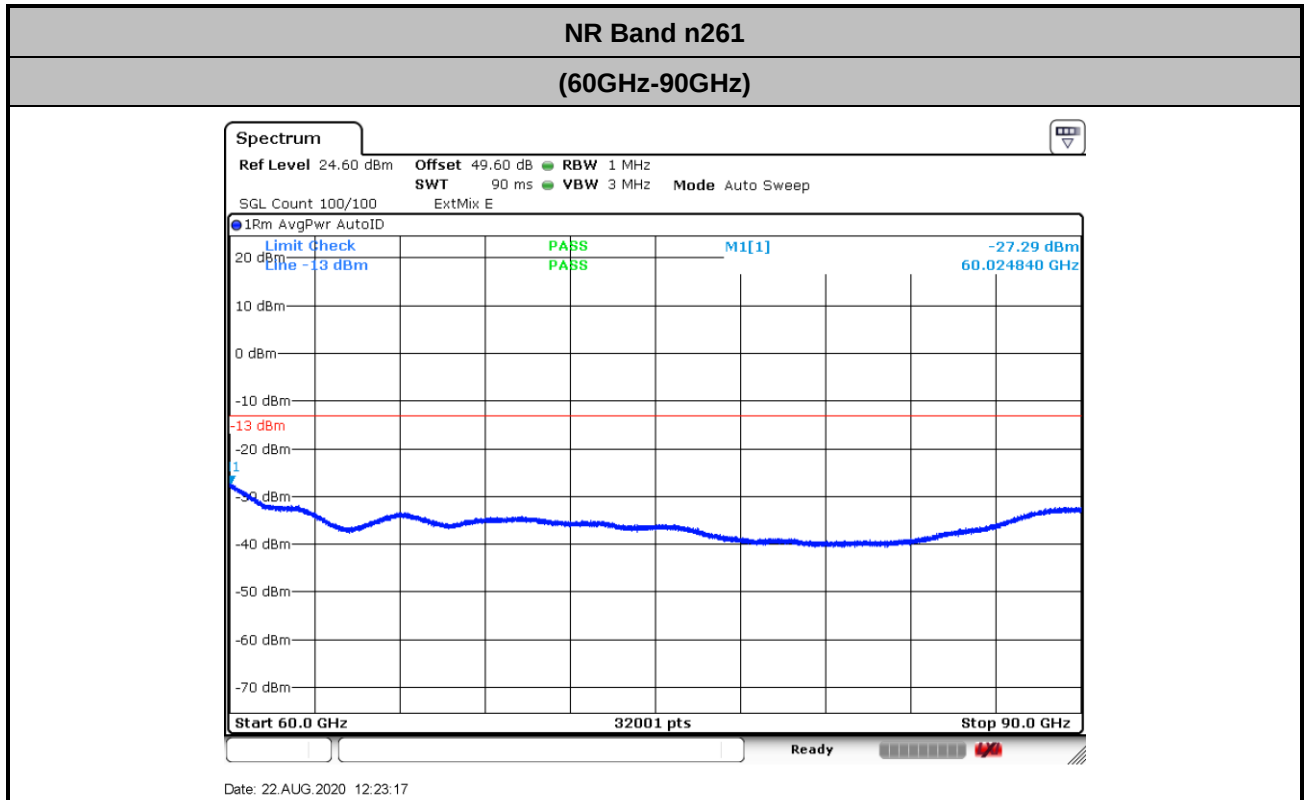




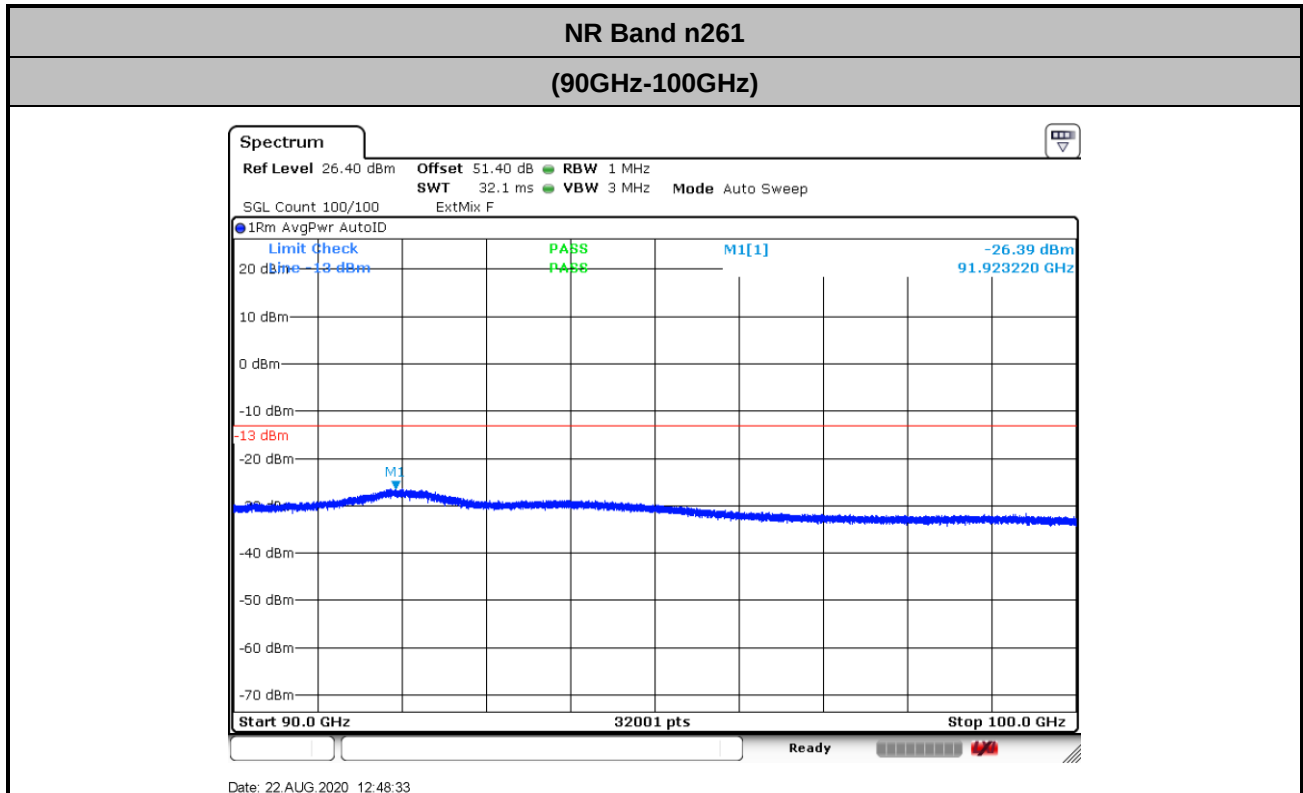
There is no significant spurious emission signal found for frequency started from 40GHz up to 100GHz.
Only the noise floor is reported.



$$\begin{aligned}\text{Offset} &= \text{Antenna Factor (dB/m)} + \text{Cable Loss (dB)} + 107 + 20\log(D) - 104.8 \\ &= 42.3 + 2 + 107 + 20\log(1) - 104.8 = 46.5 \text{ (dB)}\end{aligned}$$



$$\begin{aligned}\text{Offset} &= \text{Antenna Factor (dB/m)} + \text{Cable Loss (dB)} + 107 + 20\log(D) - 104.8 \\ &= 45.4 + 2 + 107 + 20\log(1) - 104.8 = 49.6 \text{ (dB)}\end{aligned}$$



$$\begin{aligned} \text{Offset} &= \text{Antenna Factor (dB/m)} + \text{Cable Loss (dB)} + 107 + 20\log(D) - 104.8 \\ &= 49.0 + 2.2 + 107 + 20\log(1) - 104.8 = 51.4 \text{ (dB)} \end{aligned}$$

$$\begin{aligned} \text{Offset} &= \text{Antenna Factor (dB/m)} + \text{Cable Loss (dB)} + 107 + 20\log(D) - 104.8 \\ &= 47.2 + 2 + 107 + 20\log(1) - 104.8 = 51.4 \text{ (dB)} \end{aligned}$$



NR Band n261 Module 1 AG1

Occupied Bandwidth

Mode	DFT-s-OFDM Module 1 NR Band n261: 99%OBW(MHz)							
BW	50MHz				100MHz			
Mod.	BPSK	QPSK	16QAM	64QAM	BPSK	QPSK	16QAM	64QAM
Lowest CH	45.18	45.34	45.24	45.20	90.80	90.52	90.60	90.48
Middle CH	45.08	45.28	45.18	45.16	90.40	90.28	90.36	90.20
Highest CH	45.02	45.22	45.10	45.08	90.32	90.16	90.28	90.16

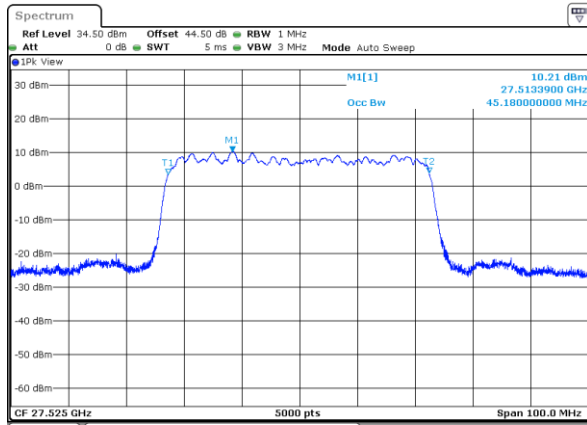
Mode	CP-OFDM Module 1 NR Band n261: 99%OBW(MHz)					
BW	50MHz			100MHz		
Mod.	QPSK	16QAM	64QAM	QPSK	16QAM	64QAM
Lowest CH	45.58	45.40	45.50	92.84	93.32	93.20
Middle CH	45.42	45.30	45.36	92.96	93.08	92.72
Highest CH	45.42	45.38	45.34	92.80	93.00	92.68



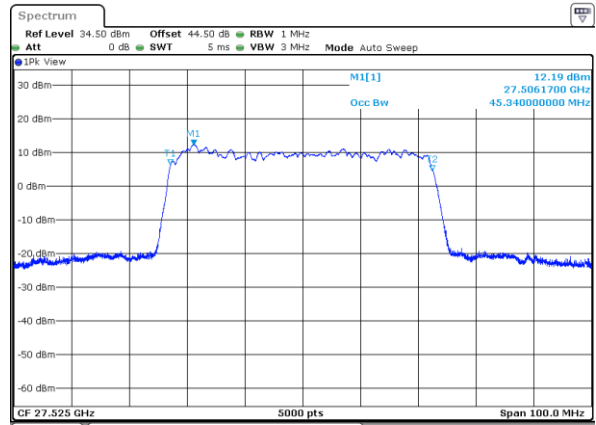
DFT-s-OFDM Module 1

NR Band n261

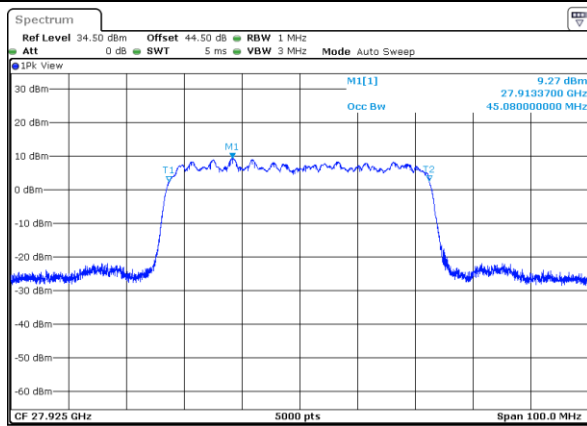
Lowest Channel / 50MHz / BPSK



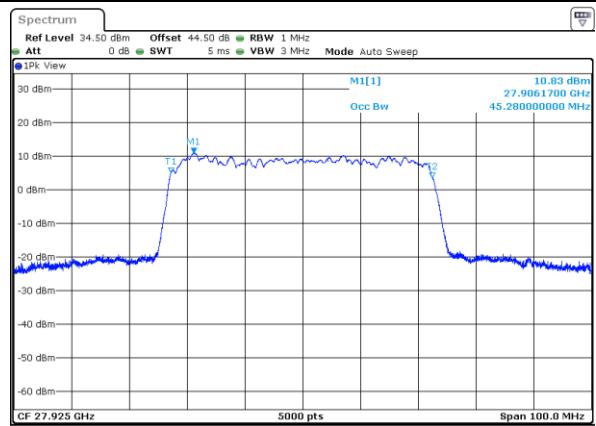
Lowest Channel / 50MHz / QPSK



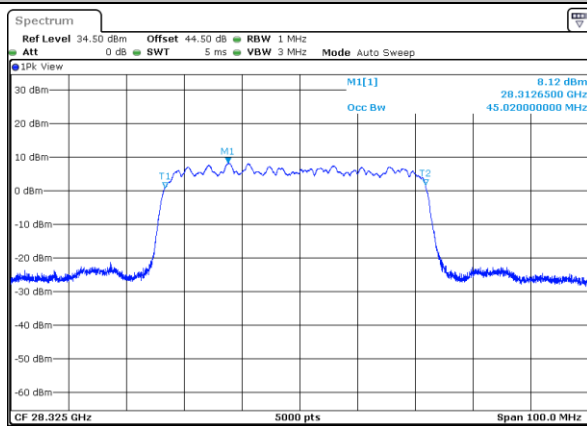
Middle Channel / 50MHz / BPSK



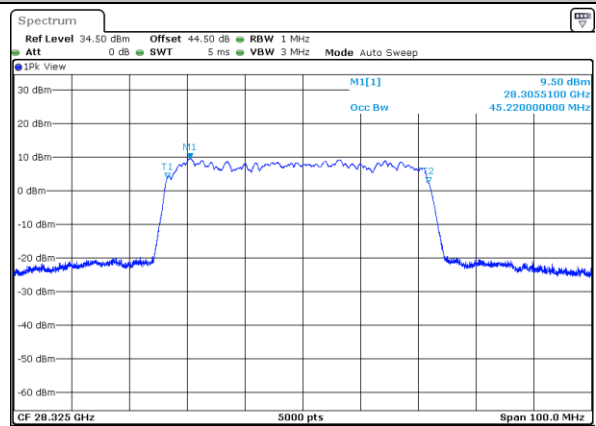
Middle Channel / 50MHz / QPSK



Highest Channel / 50MHz / BPSK



Highest Channel / 50MHz / QPSK

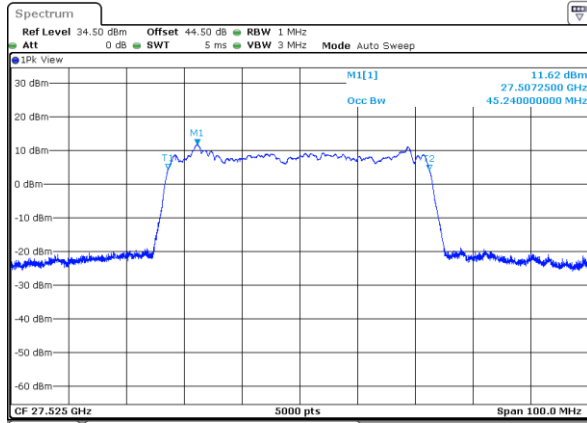




DFT-s-OFDM Module 1

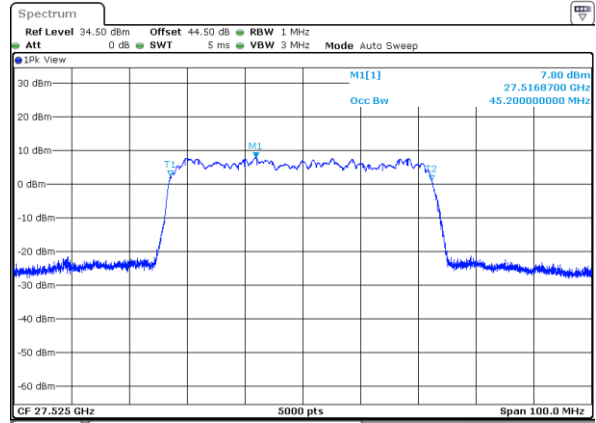
NR Band n261

Lowest Channel / 50MHz / 16QAM



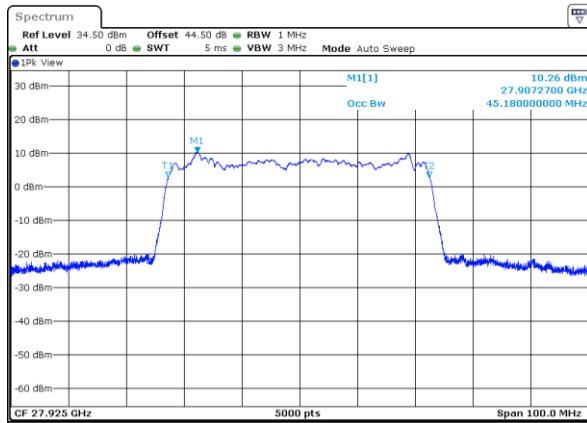
Date: 16.AUG.2020 17:28:34

Lowest Channel / 50MHz / 64QAM



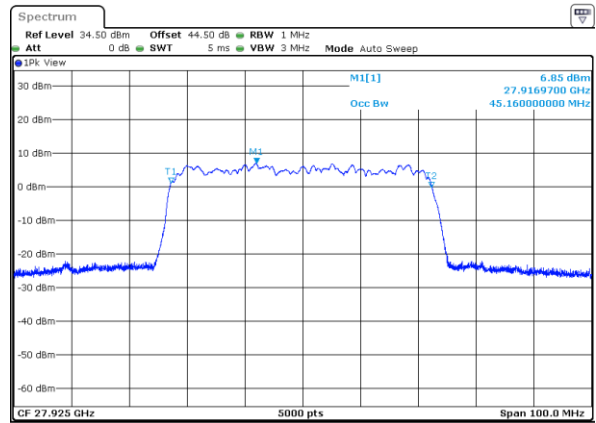
Date: 16.AUG.2020 17:29:30

Middle Channel / 50MHz / 16QAM



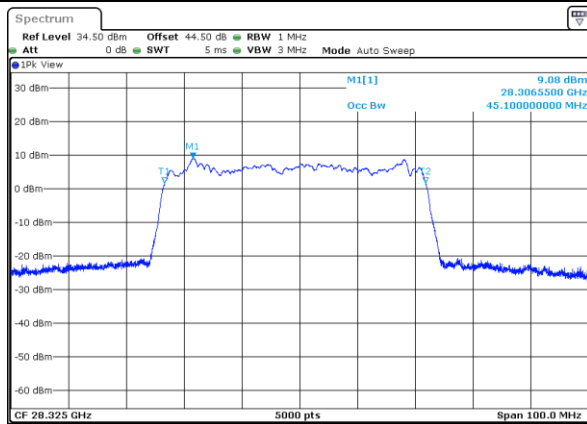
Date: 17.AUG.2020 11:56:22

Middle Channel / 50MHz / 64QAM



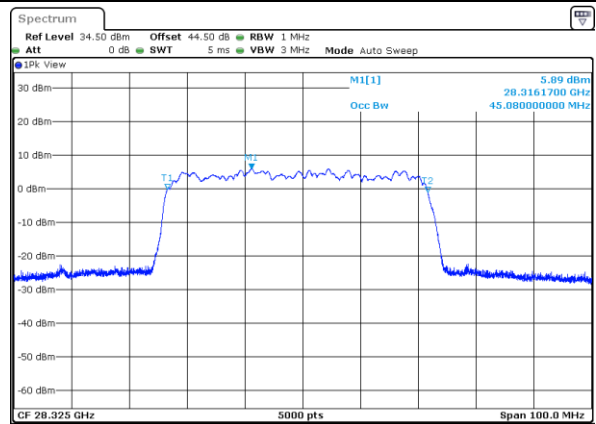
Date: 17.AUG.2020 11:51:40

Highest Channel / 50MHz / 16QAM



Date: 17.AUG.2020 19:47:54

Highest Channel / 50MHz / 64QAM



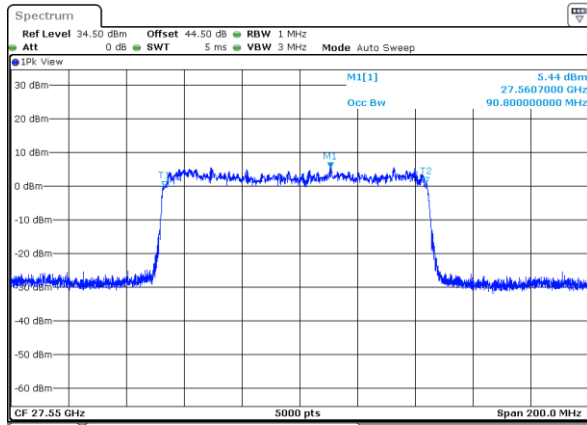
Date: 17.AUG.2020 19:49:38



DFT-s-OFDM Module 1

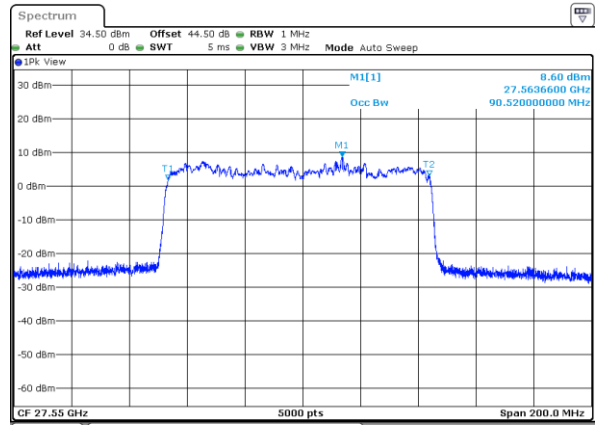
NR Band n261

Lowest Channel / 100MHz / BPSK



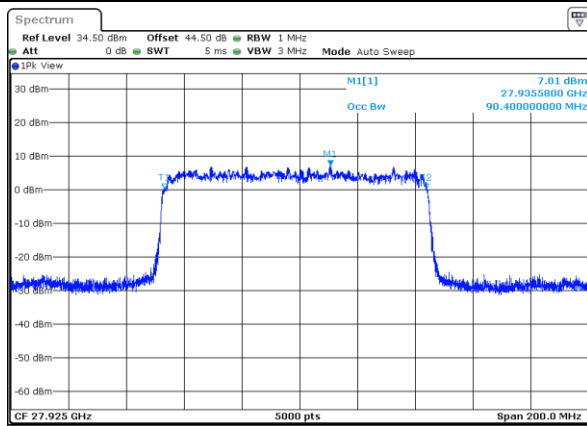
Date: 17.AUG.2020 10:01:08

Lowest Channel / 100MHz / QPSK



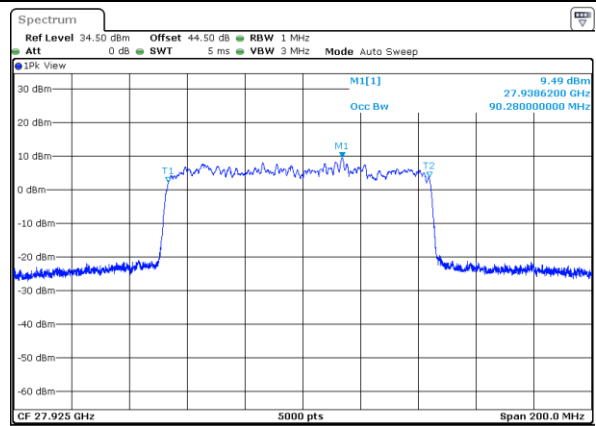
Date: 17.AUG.2020 09:57:11

Middle Channel / 100MHz / BPSK



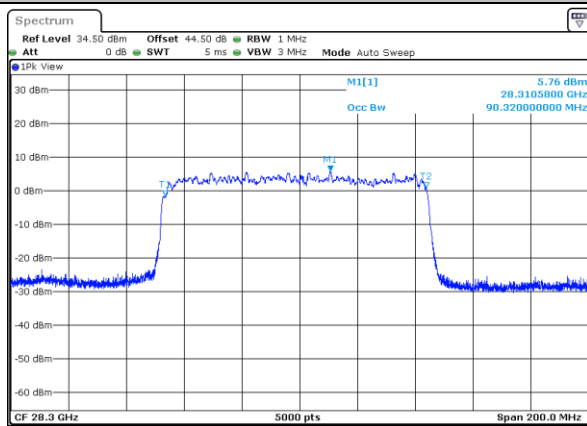
Date: 17.AUG.2020 15:35:06

Middle Channel / 100MHz / QPSK



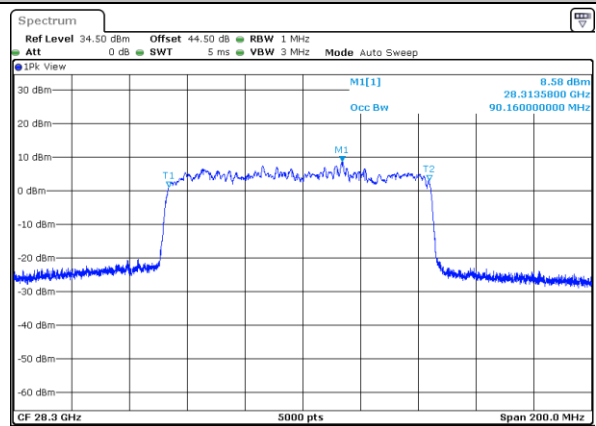
Date: 17.AUG.2020 15:32:29

Highest Channel / 100MHz / BPSK

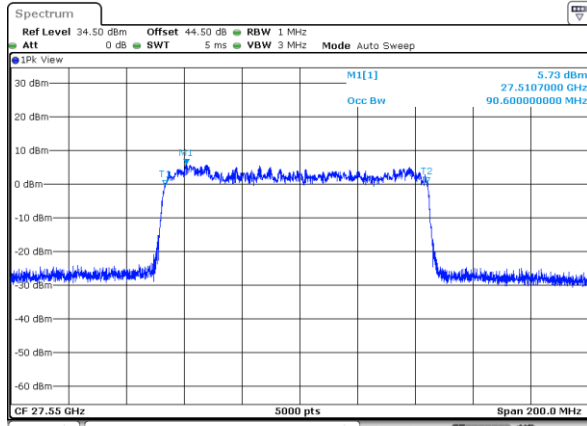
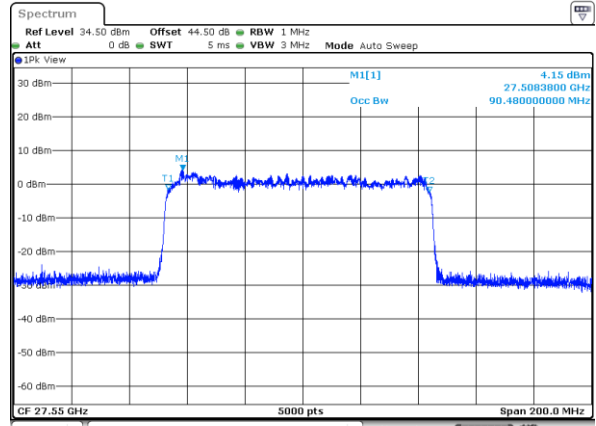
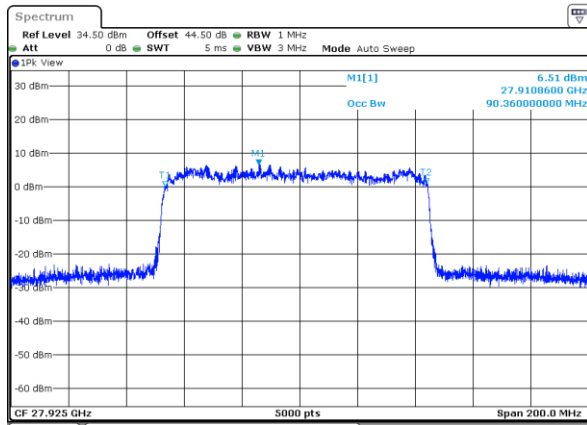
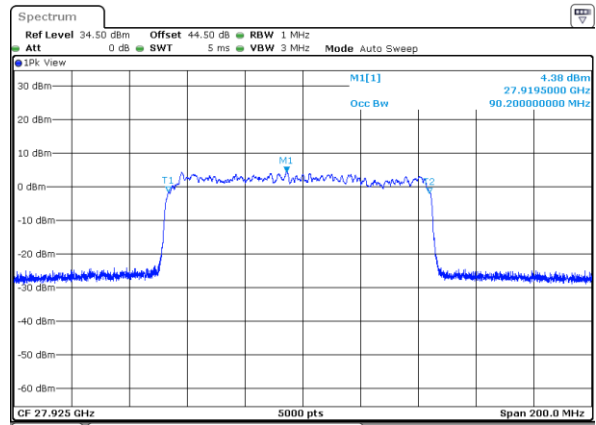
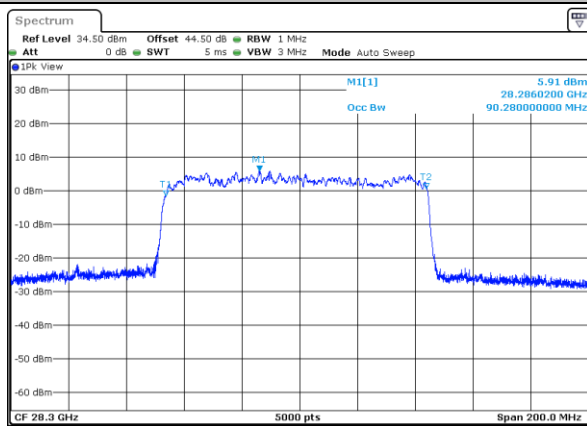


Date: 17.AUG.2020 22:00:04

Highest Channel / 100MHz / QPSK



Date: 17.AUG.2020 22:02:12

**DFT-s-OFDM Module 1****NR Band n261****Lowest Channel / 100MHz / 16QAM****Lowest Channel / 100MHz / 64QAM****Middle Channel / 100MHz / 16QAM****Middle Channel / 100MHz / 64QAM****Highest Channel / 100MHz / 16QAM****Highest Channel / 100MHz / 64QAM**