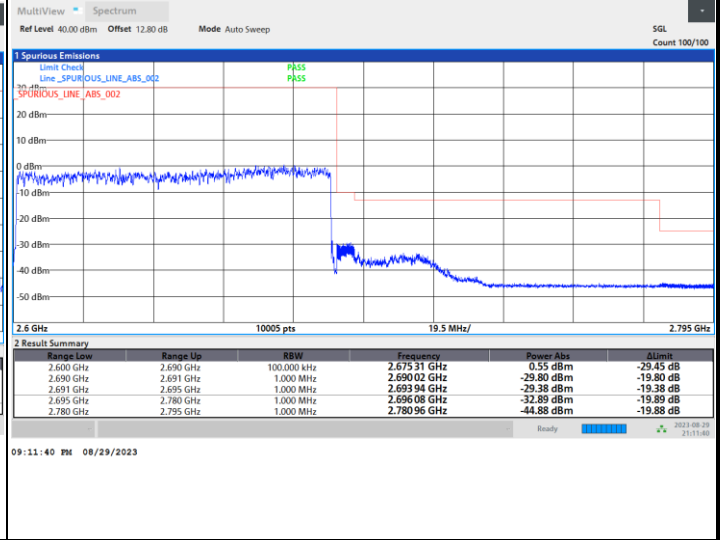
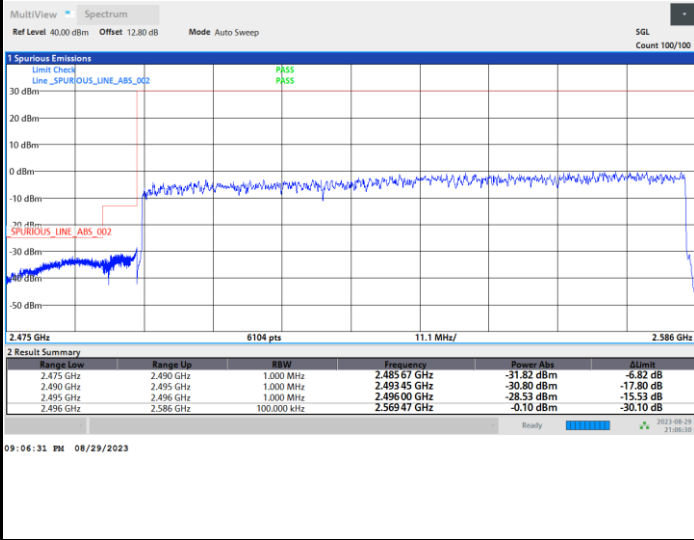




FR1 n41 / 90MHz / DFT-S OFDM / 16QAM

Lowest Band Edge / Full RB

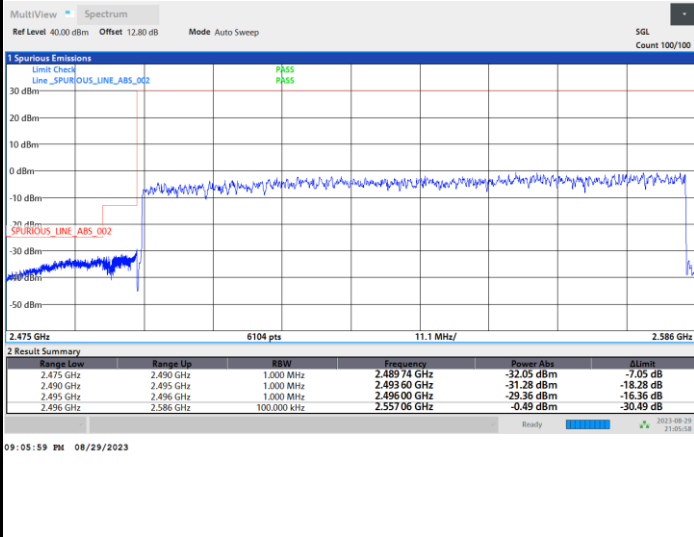
Highest Band Edge / Full RB



FR1 n41 / 90MHz / DFT-S OFDM / 64QAM

Lowest Band Edge / Full RB

Highest Band Edge / Full RB

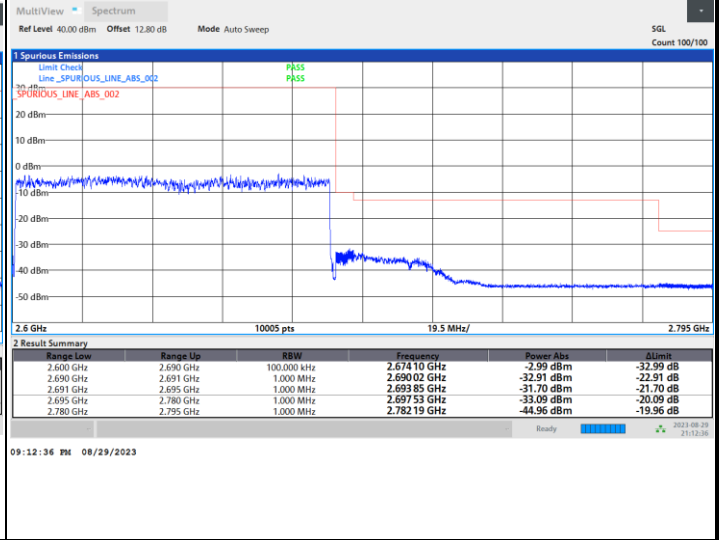
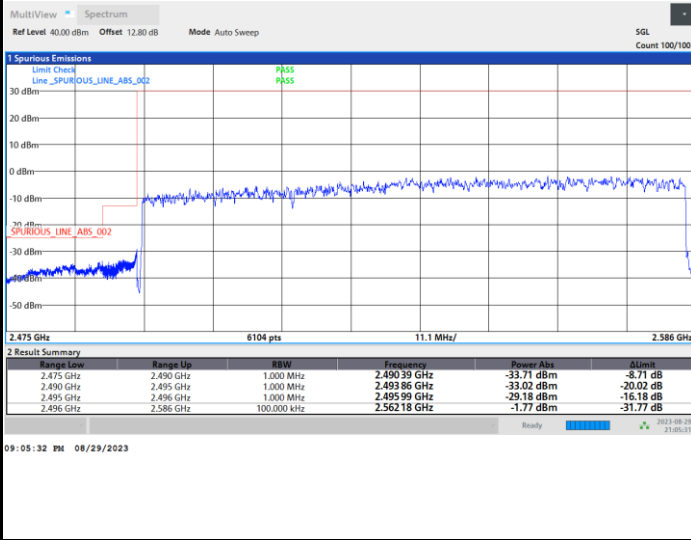




FR1 n41 / 90MHz / DFT-S OFDM / 256QAM

Lowest Band Edge / Full RB

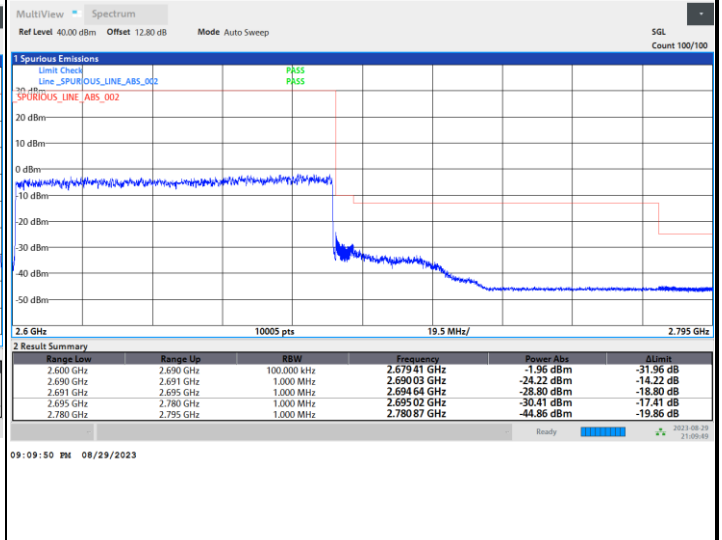
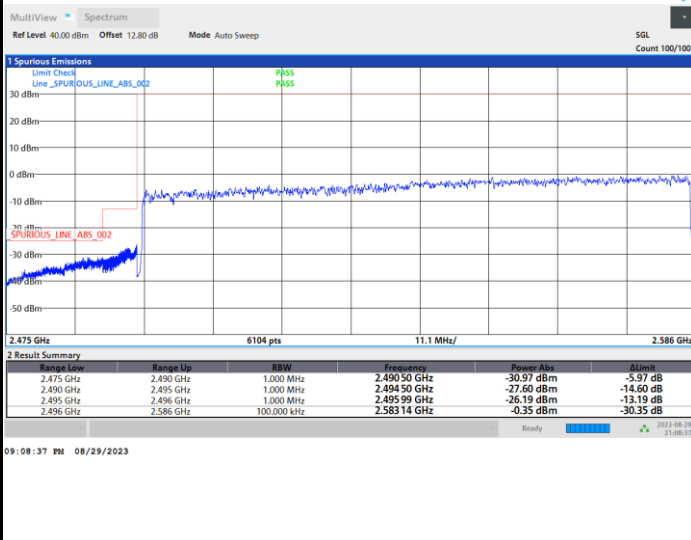
Highest Band Edge / Full RB



FR1 n41 / 90MHz / CP OFDM / QPSK / Full RB

Lowest Band Edge

Highest Band Edge

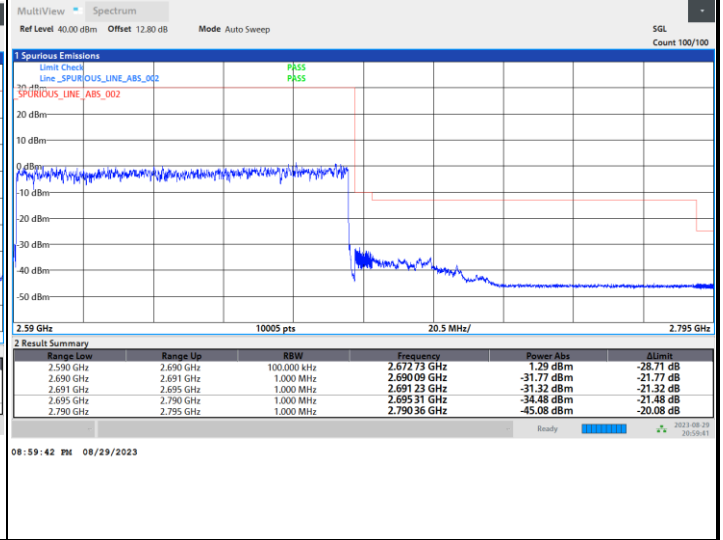
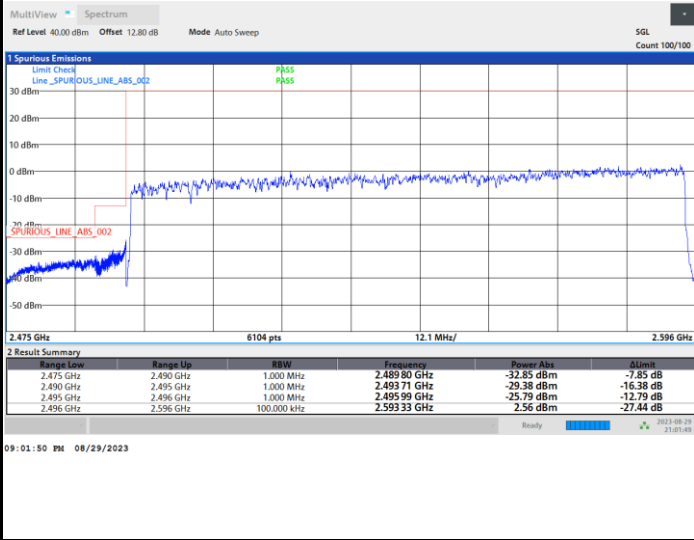




FR1 n41 / 100MHz / DFT-S OFDM / PI/2 BPSK

Lowest Band Edge / Full RB

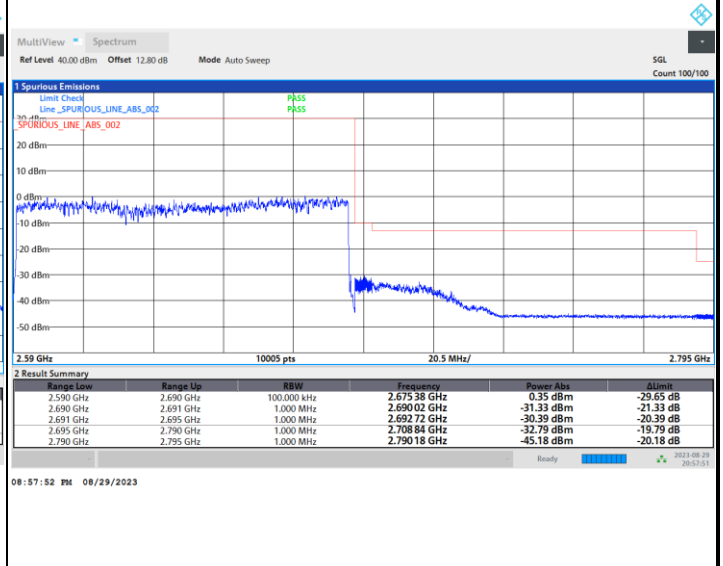
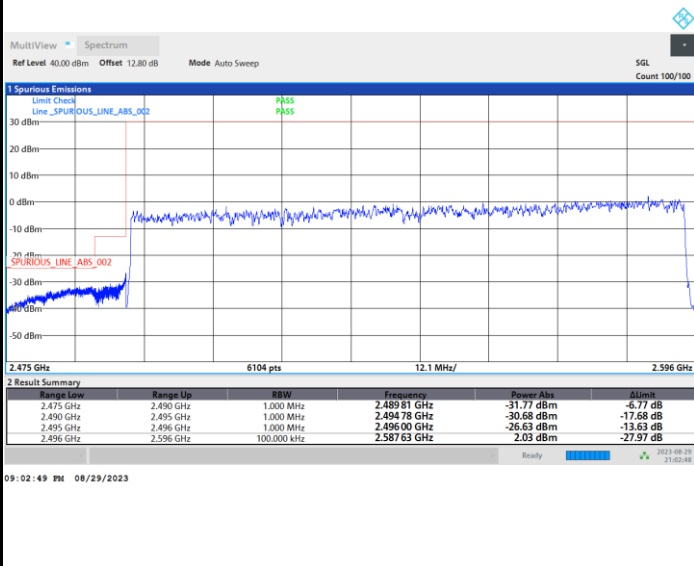
Highest Band Edge / Full RB



FR1 n41 / 100MHz / DFT-S OFDM / QPSK

Lowest Band Edge / Full RB

Highest Band Edge / Full RB

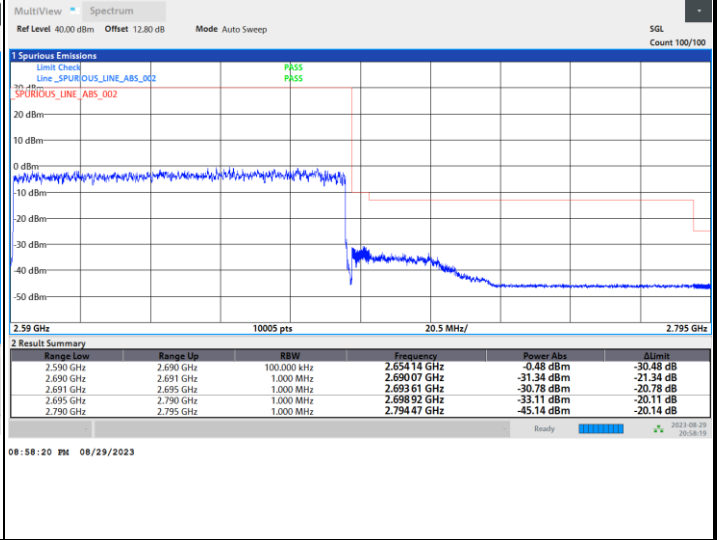
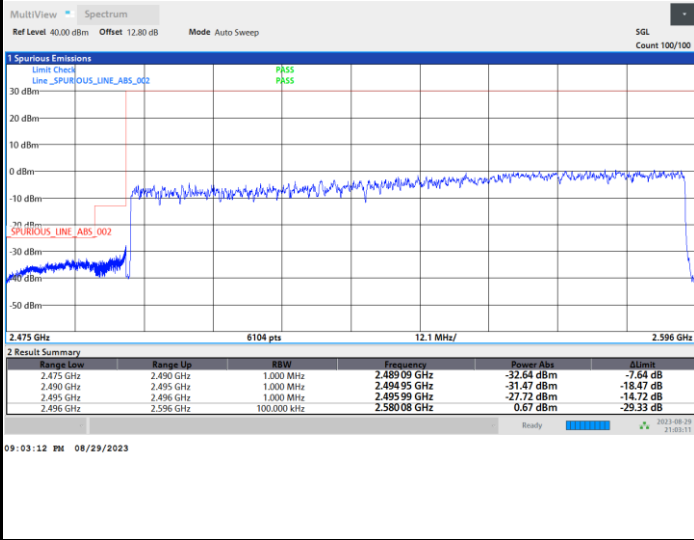




FR1 n41 / 100MHz / DFT-S OFDM / 16QAM

Lowest Band Edge / Full RB

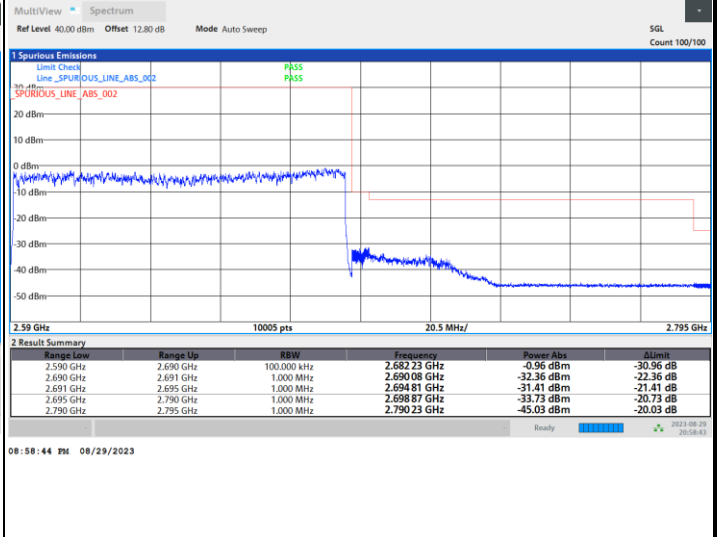
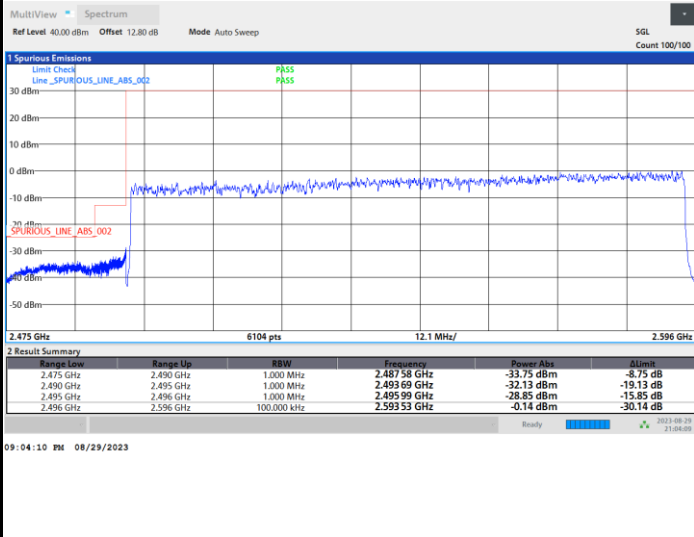
Highest Band Edge / Full RB



FR1 n41 / 100MHz / DFT-S OFDM / 64QAM

Lowest Band Edge / Full RB

Highest Band Edge / Full RB

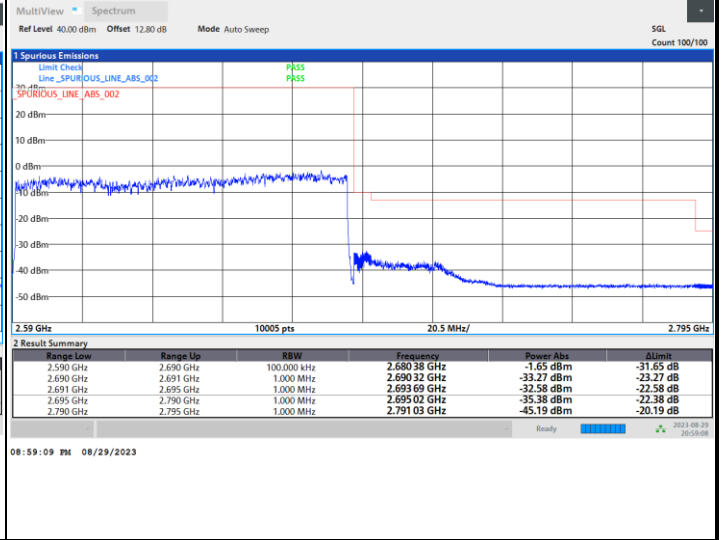
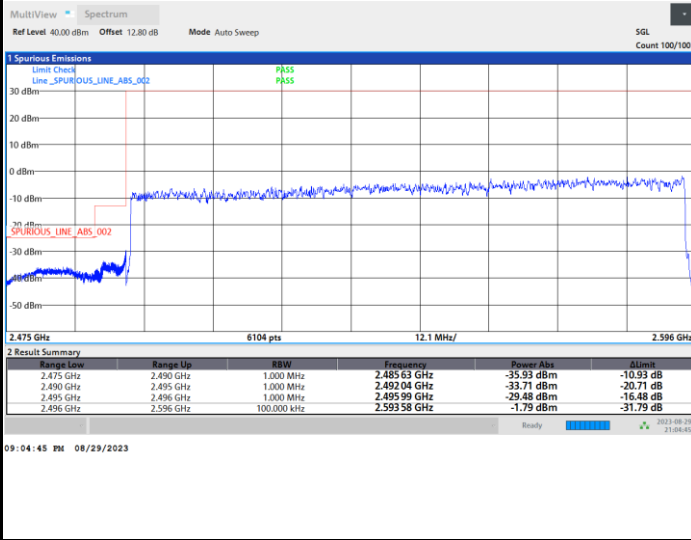




FR1 n41 / 100MHz / DFT-S OFDM / 256QAM

Lowest Band Edge / Full RB

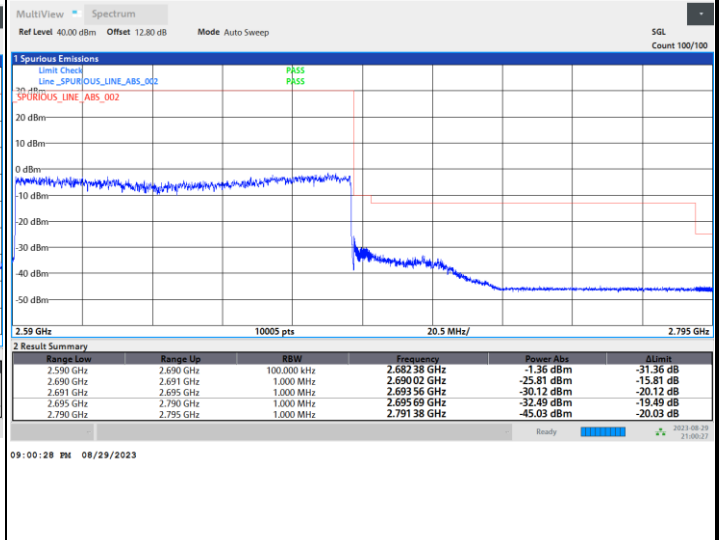
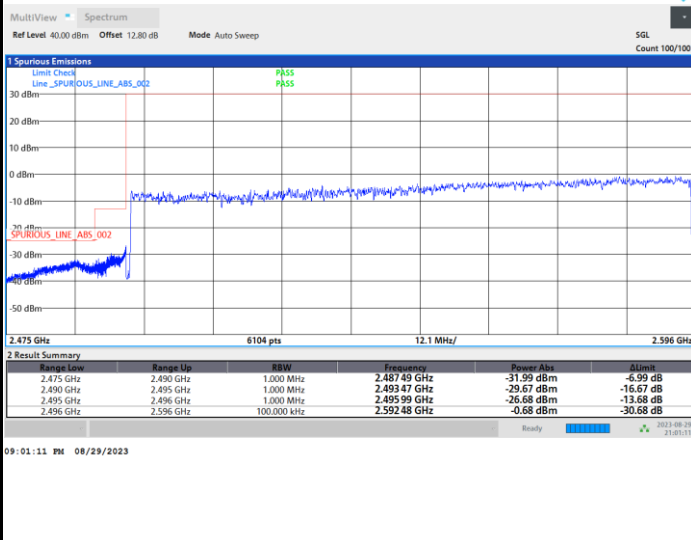
Highest Band Edge / Full RB



FR1 n41 / 100MHz / CP OFDM / QPSK / Full RB

Lowest Band Edge

Highest Band Edge



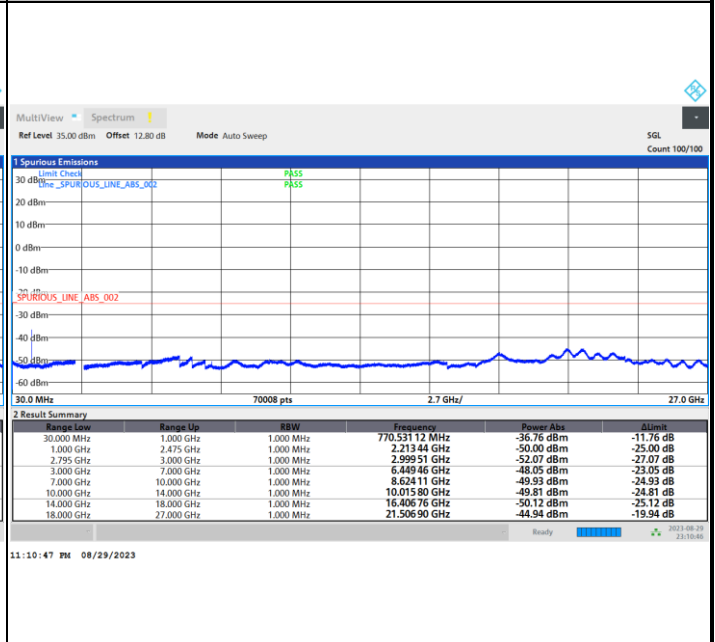
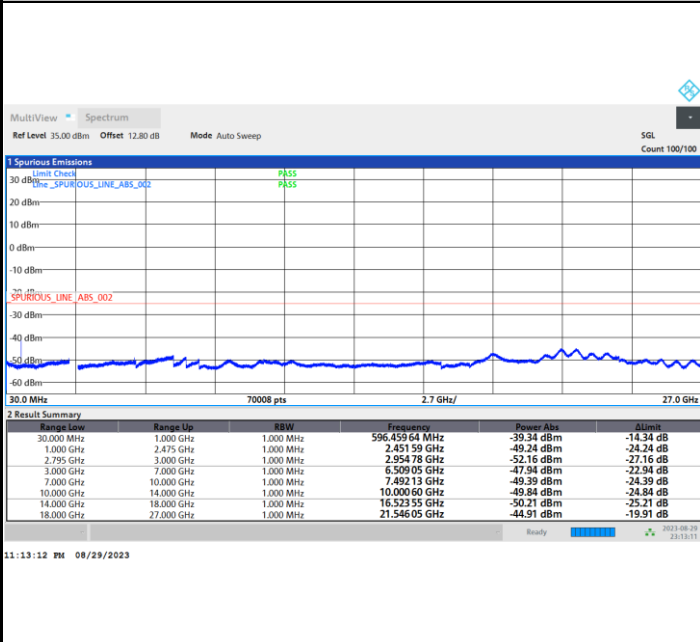


# Conducted Spurious Emission

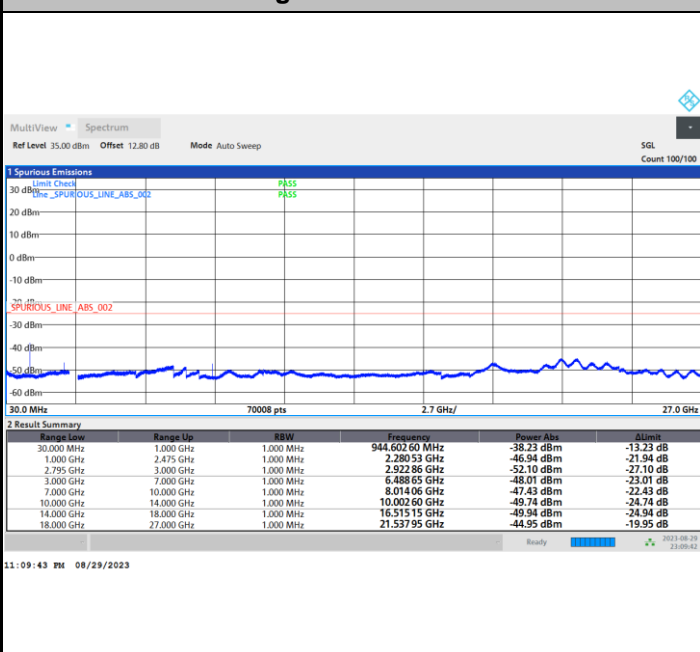
FR1 n41 / 20MHz / DFT-S OFDM / QPSK / 1RB1

Lowest Channel

Middle Channel



Highest Channel





### Frequency Stability

Test Conditions		FR1 n41 (BPSK) / Middle Channel	Limit
Temperature (°C)	Voltage (Volt)	BW 20MHz	Note 2.
		Deviation (ppm)	Result
50	Normal Voltage	0.0036	PASS
40	Normal Voltage	0.0000	
30	Normal Voltage	0.0025	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0032	
0	Normal Voltage	0.0036	
-10	Normal Voltage	0.0033	
-20	Normal Voltage	0.0017	
-30	Normal Voltage	0.0028	
20	Maximum Voltage	0.0023	
20	Normal Voltage	0.0000	
20	Battery End Point	0.0017	

**Note:**

1. Normal Voltage = 3.3 V. ; Battery End Point (BEP) = 3.135 V. ; Maximum Voltage = 3.63 V.
2. The frequency fundamental emissions stay within the authorized frequency block.



## Appendix B. Test Results of Radiated Test

MIMO <Ant. 0+1>

### 5G NR n41(HPUE) MIMO

5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	4998	-56.74	-25	-31.74	-81.61	-64.1	2.34	9.70	H
	7494	-53.84	-25	-28.84	-82.1	-63.2	2.43	11.79	H
	9990	-49.59	-25	-24.59	-82.92	-59.1	2.69	12.21	H
									H
									H
									H
									H
	4998	-55.54	-25	-30.54	-80.43	-62.9	2.34	9.70	V
	7494	-54.04	-25	-29.04	-82.32	-63.4	2.43	11.79	V
	9990	-49.99	-25	-24.99	-83.31	-59.5	2.69	12.21	V
									V
	Middle	5086	-55.99	-25	-30.99	-81.01	-63.3	2.39	9.70
7629		-54.01	-25	-29.01	-82.41	-63.5	2.39	11.88	H
10172		-48.53	-25	-23.53	-82.23	-58.1	2.70	12.27	H
									H
									H
									H
									H
5086		-56.49	-25	-31.49	-81.53	-63.8	2.39	9.70	V
7629		-53.61	-25	-28.61	-82.56	-63.1	2.39	11.88	V
10172		-48.93	-25	-23.93	-82.72	-58.5	2.70	12.27	V
									V
									V
								V	
								V	





5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Highest	5180	-56.64	-25	-31.64	-81.69	-63.9	2.44	9.70	H
	7770	-53.58	-25	-28.58	-82.87	-63.2	2.34	11.96	H
	10360	-49.45	-25	-24.45	-83.36	-59.1	2.69	12.34	H
									H
									H
									H
									H
	5180	-56.94	-25	-31.94	-81.84	-64.2	2.44	9.70	V
	7770	-53.08	-25	-28.08	-82.67	-62.7	2.34	11.96	V
	10360	-49.25	-25	-24.25	-83.07	-58.9	2.69	12.34	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.



MIMO <Ant. 0+2>

5G NR n41

5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	4998	-56.54	-25	-31.54	-81.67	-63.9	2.34	9.70	H
	7494	-52.74	-25	-27.74	-80.83	-62.1	2.43	11.79	H
	9990	-49.19	-25	-24.19	-82.65	-58.7	2.69	12.21	H
									H
									H
									H
									H
	4998	-54.94	-25	-29.94	-80.1	-62.3	2.34	9.70	V
	7494	-52.04	-25	-27.04	-80.78	-61.4	2.43	11.79	V
	9990	-49.39	-25	-24.39	-82.64	-58.9	2.69	12.21	V
									V
									V
									V
									V
Middle	5086	-56.89	-25	-31.89	-81.88	-64.2	2.39	9.70	H
	7629	-53.61	-25	-28.61	-82.42	-63.1	2.39	11.88	H
	10172	-48.53	-25	-23.53	-82.31	-58.1	2.70	12.27	H
									H
									H
									H
									H
	5086	-56.79	-25	-31.79	-81.82	-64.1	2.39	9.70	V
	7629	-53.01	-25	-28.01	-82.06	-62.5	2.39	11.88	V
	10172	-48.33	-25	-23.33	-82.28	-57.9	2.70	12.27	V
									V
									V
									V
									V



ANT 0+2 SA NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Highest	5180	-56.84	-25	-31.84	-81.88	-64.1	2.44	9.70	H
	7770	-53.68	-25	-28.68	-82.9	-63.3	2.34	11.96	H
	10360	-48.55	-25	-23.55	-82.98	-58.2	2.69	12.34	H
									H
									H
									H
									H
	5180	-56.34	-25	-31.34	-81.4	-63.6	2.44	9.70	V
	7770	-53.68	-25	-28.68	-82.74	-63.3	2.34	11.96	V
	10360	-48.35	-25	-23.35	-82.79	-58	2.69	12.34	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.



MIMO <Ant. 0+3>

**5G NR n41**

5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	4998	-56.17	-25	-31.17	-81.61	-63.53	2.34	9.70	H
	7494	-54.38	-25	-29.38	-82.95	-63.74	2.43	11.79	H
	9990	-49.47	-25	-24.47	-83.14	-58.98	2.69	12.21	H
									H
									H
									H
									H
	4998	-54.58	-25	-29.58	-79.82	-61.94	2.34	9.70	V
	7494	-53.90	-25	-28.90	82.74	-63.26	2.43	11.79	V
	9990	-49.73	-25	-24.73	-83.34	-59.24	2.69	12.21	V
									V
									V
									V
									V
Middle	5088	-55.37	-25	-30.37	-80.85	-62.68	2.39	9.70	H
	7632	-53.60	-25	-28.60	-82.61	-63.09	2.39	11.88	H
	10170	-49.73	-25	-24.73	-83.78	-59.3	2.70	12.27	H
									H
									H
									H
									H
	5088	-55.35	-25	-30.35	-80.66	-62.66	2.39	9.70	V
	7632	-53.07	-25	-28.07	-82.34	-62.56	2.39	11.88	V
	10170	-49.75	-25	-24.75	-83.7	-59.32	2.70	12.27	V
									V
									V
									V
									V



5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Highest	5180	-55.53	-25	-30.53	-81.08	-62.79	2.44	9.70	H
	7770	-53.19	-25	-28.19	-82.59	-62.81	2.34	11.96	H
	10360	-49.08	-25	-24.08	-83.59	-58.73	2.69	12.34	H
									H
									H
									H
									H
	5180	-55.79	-25	-30.79	-81.2	-63.05	2.44	9.70	V
	7770	-53.17	-25	-28.17	-82.86	-62.79	2.34	11.96	V
	10360	-49.48	-25	-24.48	-83.85	-59.13	2.69	12.34	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.



MIMO <Ant. 1+3>

5G NR n41

5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	4992	-53.78	-25	-28.78	-59.17	-61.13	2.33	9.68	H
	7494	-53.68	-25	-28.68	-82.28	-63.04	2.43	11.79	H
	9990	-49.81	-25	-24.81	-83.41	-59.32	2.69	12.21	H
									H
									H
									H
									H
	4992	-54.28	-25	-29.28	-79.51	-61.63	2.33	9.68	V
	7494	-50.89	-25	-25.89	-79.78	-60.25	2.43	11.79	V
	9990	-50.07	-25	-25.07	-83.71	-59.58	2.69	12.21	V
									V
									V
									V
									V
Middle	5088	-55.24	-25	-30.24	-80.55	-62.55	2.39	9.70	H
	7632	-51.78	-25	-26.78	-80.84	-61.27	2.39	11.88	H
	10170	-49.65	-25	-24.65	-83.71	-59.22	2.70	12.27	H
									H
									H
									H
									H
	5088	-55.38	-25	-30.38	-80.65	-62.69	2.39	9.70	V
	7632	-50.51	-25	-25.51	-79.78	-60	2.39	11.88	V
	10170	-49.89	-25	-24.89	-83.8	-59.46	2.70	12.27	V
									V
									V
									V
									V



5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Highest	5178	-55.48	-25	-30.48	-81.12	-62.74	2.44	9.70	H
	7770	-53.43	-25	-28.43	-82.82	-63.05	2.34	11.96	H
	10368	-48.96	-25	-23.96	-83.48	-58.61	2.69	12.35	H
									H
									H
									H
									H
	5178	-56.02	-25	-31.02	-81.39	-63.28	2.44	9.70	V
	7770	-53.19	-25	-28.19	-82.77	-62.81	2.34	11.96	V
	10360	-49.46	-25	-24.46	-83.86	-59.11	2.69	12.34	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.



MIMO <Ant. 2+1>

**5G NR n41**

5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	4992	-55.34	-25	-30.34	-80.93	-62.69	2.33	9.68	H
	7494	-54.32	-25	-29.32	-82.82	-63.68	2.43	11.79	H
	9990	-49.82	-25	-24.82	-83.44	-59.33	2.69	12.21	H
									H
									H
									H
									H
	4992	-54.11	-25	-29.11	-79.39	-61.46	2.33	9.68	V
	7494	-51.03	-25	-26.03	-79.93	-60.39	2.43	11.79	V
	9990	-49.61	-25	-24.61	-83.19	-59.12	2.69	12.21	V
									V
									V
									V
									V
Middle	5088	-55.57	-25	-30.57	-81.04	-62.88	2.39	9.70	H
	7632	-53.54	-25	-28.54	-82.55	-63.03	2.39	11.88	H
	10170	-49.44	-25	-24.44	-83.49	-59.01	2.70	12.27	H
									H
									H
									H
									H
	5088	-55.05	-25	-30.05	-80.47	-62.36	2.39	9.70	V
	7632	-52.84	-25	-27.84	-82.16	-62.33	2.39	11.88	V
	10170	-49.78	-25	-24.78	-83.72	-59.35	2.70	12.27	V
									V
									V
									V
									V





ANT 2+1 SA NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Highest	5178	-55.86	-25	-30.86	-81.39	-63.12	2.44	9.70	H
	7770	-53.23	-25	-28.23	-82.63	-62.85	2.34	11.96	H
	10368	-49.41	-25	-24.41	-83.95	-59.06	2.69	12.35	H
									H
									H
									H
									H
	5178	-56.13	-25	-31.13	-81.45	-63.39	2.44	9.70	V
	7770	-52.93	-25	-27.93	-82.68	-62.55	2.34	11.96	V
	10368	-49.59	-25	-24.59	-84.04	-59.24	2.69	12.35	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.



MIMO <Ant. 2+3>

**5G NR n41**

5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	4998	-49.74	-25	-24.74	-75	-57.1	2.34	9.70	H
	7494	-53.54	-25	-28.54	-81.71	-62.9	2.43	11.79	H
	9985	-50.18	-25	-25.18	-83.51	-59.7	2.69	12.21	H
									H
									H
									H
									H
	4998	-44.74	-25	-19.74	-69.46	-52.1	2.34	9.70	V
	7494	-53.94	-25	-28.94	-82.15	-63.3	2.43	11.79	V
	9985	-50.08	-25	-25.08	-83.57	-59.6	2.69	12.21	V
									V
									V
									V
									V
Middle	5088	-46.69	-25	-21.69	-71.97	-54	2.39	9.70	H
	7632	-53.71	-25	-28.71	-82.42	-63.2	2.39	11.88	H
	10170	-49.93	-25	-24.93	-83.54	-59.5	2.70	12.27	H
									H
									H
									H
									H
	5088	-46.29	-25	-21.29	-71.47	-53.6	2.39	9.70	V
	7632	-52.21	-25	-27.21	-81.28	-61.7	2.39	11.88	V
	10170	-50.23	-25	-25.23	-83.88	-59.8	2.70	12.27	V
									V
									V
									V
									V



5G NR n41 / 100MHz / BPSK									
Channel	Frequency ( MHz )	EIRP ( dBm )	Limit ( dBm )	Over Limit ( dB )	SPA Reading (dBm)	S.G. Power ( dBm )	TX Cable loss ( dB )	TX Antenna Gain (dBi)	Polarization (H/V)
Highest	5184	-52.04	-25	-27.04	-77.2	-59.3	2.44	9.70	H
	7776	-52.27	-25	-27.27	-81.24	-61.9	2.34	11.97	H
	10360	-49.65	-25	-24.65	-83.78	-59.3	2.69	12.34	H
									H
									H
									H
									H
	5184	-55.24	-25	-30.24	-80.57	-62.5	2.44	9.70	V
	7776	-51.57	-25	-26.57	-81	-61.2	2.34	11.97	V
	10360	-49.55	-25	-24.55	-83.68	-59.2	2.69	12.34	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.