

Appendix for N13

Product Name: 5G Window CPE
Model No: TITAN 5100

Appendix A: Average Power Output Data

Test Result

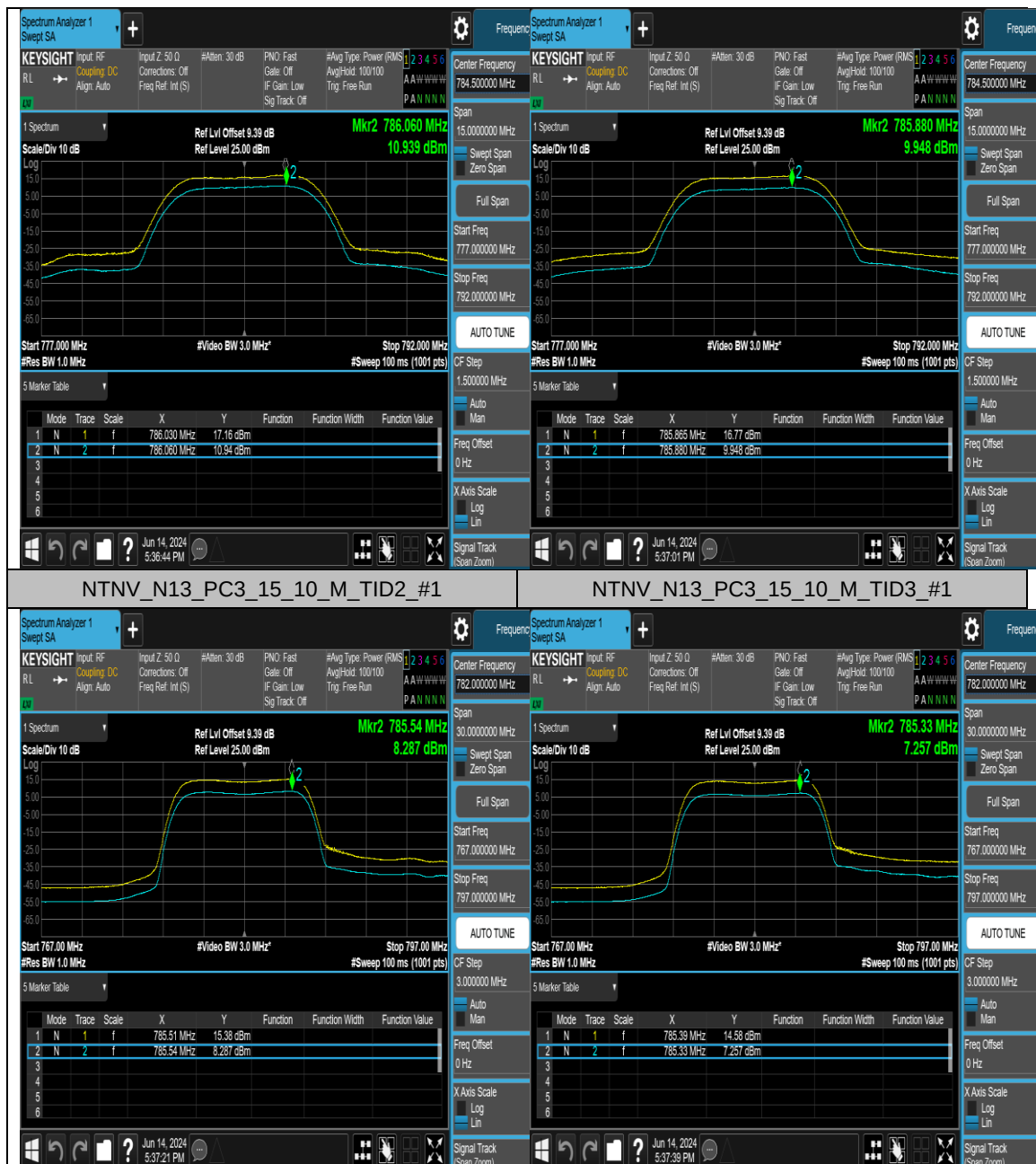
Band	SCS	Bandwidth	Modulation	Channel	RB Config	Power (dBm)	Power Class	Verdict
N13	15	5	DFT-QPSK	L	Outer_Full	23.02	PC3	PASS
N13	15	5	DFT-QPSK	L	Inner_Full	23.03	PC3	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	23.14	PC3	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	22.57	PC3	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	21.96	PC3	PASS
N13	15	5	DFT-16QAM	L	Inner_Full	23.11	PC3	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	21.81	PC3	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	21.51	PC3	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	22.94	PC3	PASS
N13	15	5	DFT-QPSK	M	Inner_Full	22.95	PC3	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	23.14	PC3	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	22.91	PC3	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	21.80	PC3	PASS
N13	15	5	DFT-16QAM	M	Inner_Full	22.90	PC3	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	22.31	PC3	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	22.22	PC3	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	23.01	PC3	PASS
N13	15	5	DFT-QPSK	H	Inner_Full	22.99	PC3	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Left	22.86	PC3	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	23.02	PC3	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	22.01	PC3	PASS
N13	15	5	DFT-16QAM	H	Inner_Full	23.01	PC3	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	21.64	PC3	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	21.85	PC3	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	22.96	PC3	PASS
N13	15	10	DFT-QPSK	M	Inner_Full	22.97	PC3	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	23.17	PC3	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Right	23.04	PC3	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	21.93	PC3	PASS
N13	15	10	DFT-16QAM	M	Inner_Full	23.03	PC3	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	22.82	PC3	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	22.10	PC3	PASS

Appendix B: Peak-to-Average Ratio for SA**Peak-to-Average Ratio(PAPR)****Test Result**

Band	SCS	Bandwidth	Modulation	Channel	RB Config	DutyCycle	Factor	Result	Limit	Verdict
N13	15	5	DFT-QPSK	L	Outer_Full	100%	0.00	5.88	≤13	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	100%	0.00	7.61	≤13	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	100%	0.00	6.28	≤13	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	100%	0.00	6.94	≤13	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	100%	0.00	6.22	≤13	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	100%	0.00	6.82	≤13	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	100%	0.00	7.10	≤13	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	100%	0.00	7.32	≤13	PASS

Test Graphs



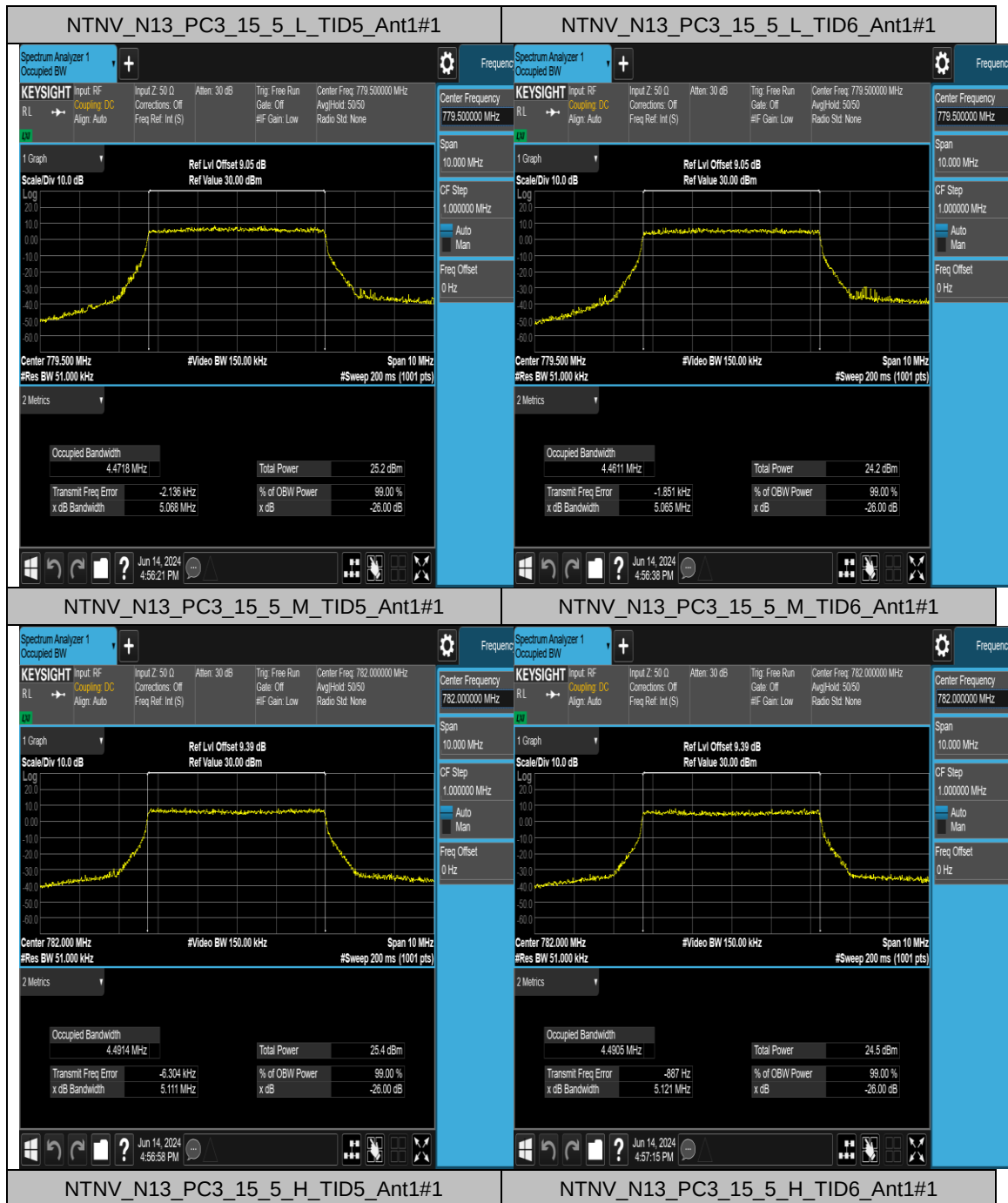


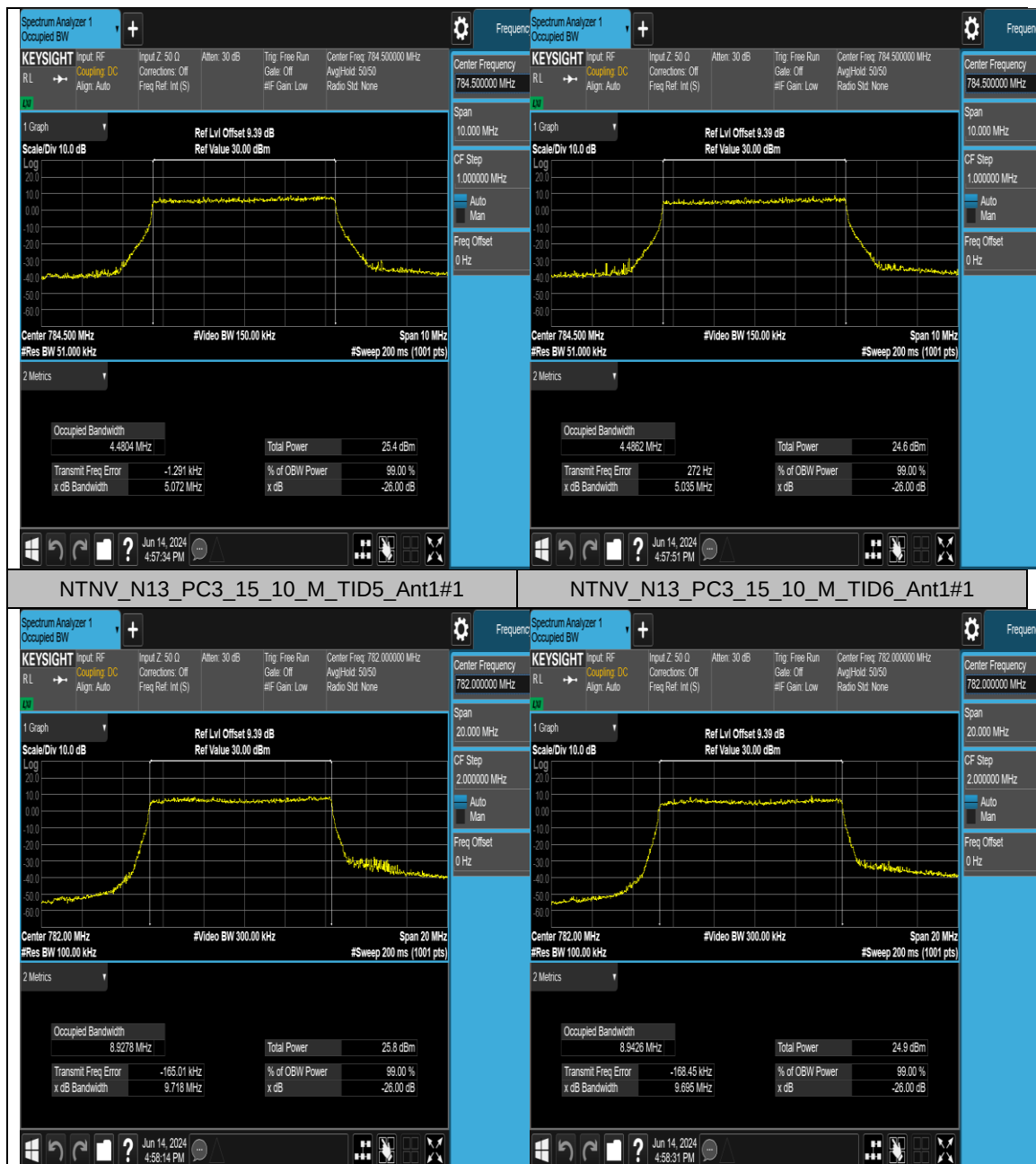
Appendix C: 26dB Bandwidth and Occupied Bandwidth for SA

Test Result

Band	SCS	Bandwidth	Modulation	Channel	RB Config	Result (99%)	Result (26dB)	Verdict
N13	15	5	DFT-QPSK	L	Outer_Full	4.4718	5.068	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	4.4611	5.065	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	4.4914	5.111	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	4.4905	5.121	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	4.4804	5.072	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	4.4862	5.035	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	8.9278	9.718	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	8.9426	9.695	PASS

Test Graphs



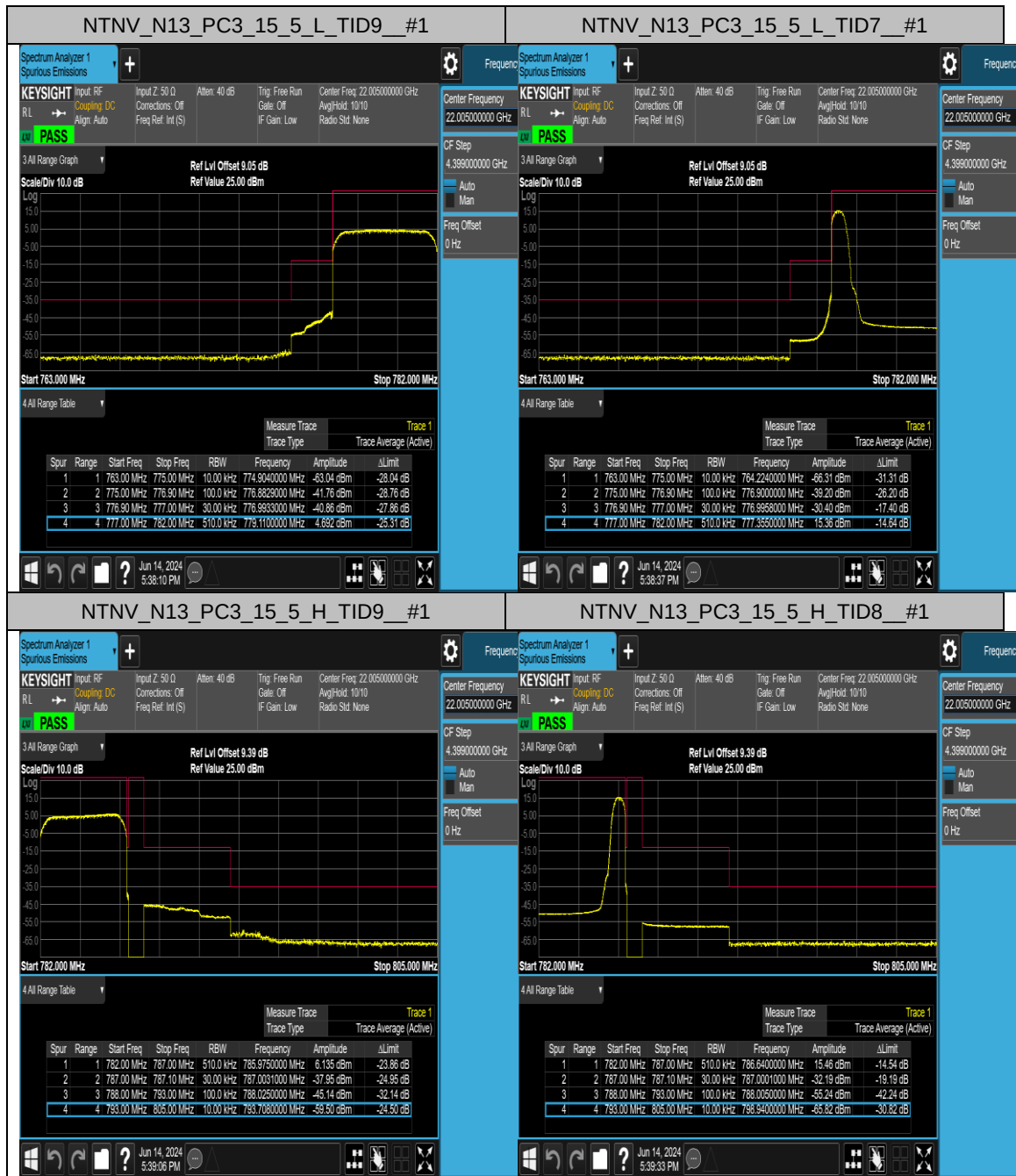


Appendix D: Band Edge for SA

Test Result

Band	SCS	Bandwidth	Modulation	Channel	RB Config	Verdict
N13	15	5	DFT-QPSK	L	Outer_Full	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	PASS

Test Graphs



Appendix E: Conducted Spurious Emission for SA

Test Result

Band	SCS	Bandwidth	Modulation	Channel	RB Config	StartFreq	StopFreq	Result	Limit	Verdict
N13	15	5	DFT-QPSK	L	Outer_Full	0.009	0.15	-62.24	-33	PASS
N13	15	5	DFT-QPSK	L	Outer_Full	0.15	30	-71.82	-23	PASS
N13	15	5	DFT-QPSK	L	Outer_Full	30	1000	-52.43	-13	PASS
N13	15	5	DFT-QPSK	L	Outer_Full	1000	3000	-36.62	-13	PASS
N13	15	5	DFT-QPSK	L	Outer_Full	3000	12000	-44.12	-13	PASS
N13	15	5	DFT-QPSK	L	Outer_Full	12000	20000	-45.28	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	0.009	0.15	-62.92	-33	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	0.15	30	-71.30	-23	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	30	1000	-52.54	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	1000	3000	-36.77	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	3000	12000	-44.04	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Left	12000	20000	-45.48	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	0.009	0.15	-62.58	-33	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	0.15	30	-71.51	-23	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	30	1000	-52.59	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	1000	3000	-36.77	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	3000	12000	-44.10	-13	PASS
N13	15	5	DFT-QPSK	L	Edge_1RB_Right	12000	20000	-45.45	-13	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	0.009	0.15	-62.27	-33	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	0.15	30	-72.79	-23	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	30	1000	-52.20	-13	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	1000	3000	-36.75	-13	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	3000	12000	-44.07	-13	PASS
N13	15	5	DFT-16QAM	L	Outer_Full	12000	20000	-45.46	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	0.009	0.15	-62.51	-33	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	0.15	30	-72.35	-23	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	30	1000	-52.51	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	1000	3000	-36.35	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	3000	12000	-44.16	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Left	12000	20000	-45.47	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	0.009	0.15	-63.41	-33	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	0.15	30	-72.96	-23	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	30	1000	-52.43	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	1000	3000	-36.38	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	3000	12000	-44.09	-13	PASS
N13	15	5	DFT-16QAM	L	Edge_1RB_Right	12000	20000	-45.47	-13	PASS

N13	15	5	DFT-QPSK	M	Outer_Full	0.009	0.15	-62.74	-33	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	0.15	30	-72.38	-23	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	30	1000	-52.33	-13	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	1000	3000	-36.70	-13	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	3000	12000	-43.91	-13	PASS
N13	15	5	DFT-QPSK	M	Outer_Full	12000	20000	-45.30	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	0.009	0.15	-60.82	-33	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	0.15	30	-70.59	-23	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	30	1000	-52.24	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	1000	3000	-36.82	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	3000	12000	-44.02	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Left	12000	20000	-45.36	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	0.009	0.15	-62.36	-33	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	0.15	30	-70.97	-23	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	30	1000	-52.27	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	1000	3000	-36.84	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	3000	12000	-44.20	-13	PASS
N13	15	5	DFT-QPSK	M	Edge_1RB_Right	12000	20000	-45.43	-13	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	0.009	0.15	-61.81	-33	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	0.15	30	-73.19	-23	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	30	1000	-52.45	-13	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	1000	3000	-36.73	-13	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	3000	12000	-43.91	-13	PASS
N13	15	5	DFT-16QAM	M	Outer_Full	12000	20000	-45.46	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	0.009	0.15	-61.88	-33	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	0.15	30	-70.63	-23	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	30	1000	-52.52	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	1000	3000	-36.67	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	3000	12000	-44.17	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Left	12000	20000	-45.46	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	0.009	0.15	-62.20	-33	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	0.15	30	-72.15	-23	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	30	1000	-51.95	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	1000	3000	-36.67	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	3000	12000	-44.05	-13	PASS
N13	15	5	DFT-16QAM	M	Edge_1RB_Right	12000	20000	-45.43	-13	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	0.009	0.15	-61.86	-33	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	0.15	30	-73.73	-23	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	30	1000	-52.50	-13	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	1000	3000	-35.71	-13	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	3000	12000	-44.12	-13	PASS
N13	15	5	DFT-QPSK	H	Outer_Full	12000	20000	-45.49	-13	PASS

N13	15	5	DFT-QPSK	H	Edge_1RB_Left	0.009	0.15	-62.67	-33	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Left	0.15	30	-73.63	-23	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Left	30	1000	-52.48	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Left	1000	3000	-36.76	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Left	3000	12000	-44.08	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Left	12000	20000	-45.42	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	0.009	0.15	-62.38	-33	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	0.15	30	-72.12	-23	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	30	1000	-52.66	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	1000	3000	-36.71	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	3000	12000	-44.03	-13	PASS
N13	15	5	DFT-QPSK	H	Edge_1RB_Right	12000	20000	-45.32	-13	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	0.009	0.15	-62.42	-33	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	0.15	30	-72.26	-23	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	30	1000	-52.35	-13	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	1000	3000	-36.55	-13	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	3000	12000	-44.08	-13	PASS
N13	15	5	DFT-16QAM	H	Outer_Full	12000	20000	-45.17	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	0.009	0.15	-63.06	-33	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	0.15	30	-71.93	-23	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	30	1000	-52.57	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	1000	3000	-36.64	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	3000	12000	-44.11	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Left	12000	20000	-45.38	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	0.009	0.15	-63.03	-33	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	0.15	30	-72.13	-23	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	30	1000	-52.59	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	1000	3000	-36.20	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	3000	12000	-43.86	-13	PASS
N13	15	5	DFT-16QAM	H	Edge_1RB_Right	12000	20000	-45.22	-13	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	0.009	0.15	-62.45	-33	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	0.15	30	-70.93	-23	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	30	1000	-52.18	-13	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	1000	3000	-36.74	-13	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	3000	12000	-44.19	-13	PASS
N13	15	10	DFT-QPSK	M	Outer_Full	12000	20000	-45.36	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	0.009	0.15	-61.61	-33	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	0.15	30	-71.42	-23	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	30	1000	-52.70	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	1000	3000	-36.42	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	3000	12000	-44.14	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Left	12000	20000	-45.34	-13	PASS

N13	15	10	DFT-QPSK	M	Edge_1RB_Right	0.009	0.15	-62.38	-33	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Right	0.15	30	-71.90	-23	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Right	30	1000	-52.46	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Right	1000	3000	-36.68	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Right	3000	12000	-44.07	-13	PASS
N13	15	10	DFT-QPSK	M	Edge_1RB_Right	12000	20000	-45.22	-13	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	0.009	0.15	-61.85	-33	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	0.15	30	-72.83	-23	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	30	1000	-52.22	-13	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	1000	3000	-36.67	-13	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	3000	12000	-44.13	-13	PASS
N13	15	10	DFT-16QAM	M	Outer_Full	12000	20000	-45.45	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	0.009	0.15	-62.06	-33	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	0.15	30	-71.80	-23	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	30	1000	-52.45	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	1000	3000	-36.73	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	3000	12000	-43.99	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Left	12000	20000	-45.40	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	0.009	0.15	-61.44	-33	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	0.15	30	-73.50	-23	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	30	1000	-52.16	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	1000	3000	-36.68	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	3000	12000	-43.94	-13	PASS
N13	15	10	DFT-16QAM	M	Edge_1RB_Right	12000	20000	-45.28	-13	PASS

Test Graphs

