

Appendix for N71

Product Name: Smart Phone

Model No: K50

Appendix A: Average Power Output

Test Result

Band	SCS	Bandwidth	Modulation	Channel	RB Config	Power (dBm)	Power Class	Verdict
N71	15	5	CP-QPSK	L	Outer_Full	21.96	PC3	PASS
N71	15	5	CP-QPSK	L	Edge_1RB_Left	21.73	PC3	PASS
N71	15	5	CP-QPSK	L	Inner_Full	23.36	PC3	PASS
N71	15	5	CP-QPSK	L	Edge_1RB_Right	21.84	PC3	PASS
N71	15	5	CP-16QAM	L	Outer_Full	21.97	PC3	PASS
N71	15	5	CP-16QAM	L	Edge_1RB_Left	22.25	PC3	PASS
N71	15	5	CP-16QAM	L	Inner_Full	23.00	PC3	PASS
N71	15	5	CP-16QAM	L	Edge_1RB_Right	22.27	PC3	PASS
N71	15	5	CP-QPSK	M	Outer_Full	21.94	PC3	PASS
N71	15	5	CP-QPSK	M	Edge_1RB_Left	21.88	PC3	PASS
N71	15	5	CP-QPSK	M	Inner_Full	23.31	PC3	PASS
N71	15	5	CP-QPSK	M	Edge_1RB_Right	21.80	PC3	PASS
N71	15	5	CP-16QAM	M	Outer_Full	21.99	PC3	PASS
N71	15	5	CP-16QAM	M	Edge_1RB_Left	21.95	PC3	PASS
N71	15	5	CP-16QAM	M	Inner_Full	22.99	PC3	PASS
N71	15	5	CP-16QAM	M	Edge_1RB_Right	21.85	PC3	PASS
N71	15	5	CP-QPSK	H	Outer_Full	21.98	PC3	PASS
N71	15	5	CP-QPSK	H	Edge_1RB_Left	21.77	PC3	PASS
N71	15	5	CP-QPSK	H	Inner_Full	23.32	PC3	PASS
N71	15	5	CP-QPSK	H	Edge_1RB_Right	21.89	PC3	PASS
N71	15	5	CP-16QAM	H	Outer_Full	21.98	PC3	PASS
N71	15	5	CP-16QAM	H	Edge_1RB_Left	21.99	PC3	PASS
N71	15	5	CP-16QAM	H	Inner_Full	23.05	PC3	PASS
N71	15	5	CP-16QAM	H	Edge_1RB_Right	22.01	PC3	PASS
N71	15	10	CP-QPSK	L	Outer_Full	21.86	PC3	PASS
N71	15	10	CP-QPSK	L	Edge_1RB_Left	21.73	PC3	PASS
N71	15	10	CP-QPSK	L	Inner_Full	23.33	PC3	PASS
N71	15	10	CP-QPSK	L	Edge_1RB_Right	21.82	PC3	PASS
N71	15	10	CP-16QAM	L	Outer_Full	21.82	PC3	PASS
N71	15	10	CP-16QAM	L	Edge_1RB_Left	22.35	PC3	PASS
N71	15	10	CP-16QAM	L	Inner_Full	22.90	PC3	PASS
N71	15	10	CP-16QAM	L	Edge_1RB_Right	22.06	PC3	PASS
N71	15	10	CP-QPSK	M	Outer_Full	21.87	PC3	PASS
N71	15	10	CP-QPSK	M	Edge_1RB_Left	21.80	PC3	PASS
N71	15	10	CP-QPSK	M	Inner_Full	23.24	PC3	PASS

N71	15	10	CP-QPSK	M	Edge_1RB_Right	21.87	PC3	PASS
N71	15	10	CP-16QAM	M	Outer_Full	21.88	PC3	PASS
N71	15	10	CP-16QAM	M	Edge_1RB_Left	21.95	PC3	PASS
N71	15	10	CP-16QAM	M	Inner_Full	22.90	PC3	PASS
N71	15	10	CP-16QAM	M	Edge_1RB_Right	22.37	PC3	PASS
N71	15	10	CP-QPSK	H	Outer_Full	21.92	PC3	PASS
N71	15	10	CP-QPSK	H	Edge_1RB_Left	21.78	PC3	PASS
N71	15	10	CP-QPSK	H	Inner_Full	23.33	PC3	PASS
N71	15	10	CP-QPSK	H	Edge_1RB_Right	21.83	PC3	PASS
N71	15	10	CP-16QAM	H	Outer_Full	21.95	PC3	PASS
N71	15	10	CP-16QAM	H	Edge_1RB_Left	22.08	PC3	PASS
N71	15	10	CP-16QAM	H	Inner_Full	22.98	PC3	PASS
N71	15	10	CP-16QAM	H	Edge_1RB_Right	22.39	PC3	PASS
N71	15	15	CP-QPSK	L	Outer_Full	21.90	PC3	PASS
N71	15	15	CP-QPSK	L	Edge_1RB_Left	21.74	PC3	PASS
N71	15	15	CP-QPSK	L	Inner_Full	23.36	PC3	PASS
N71	15	15	CP-QPSK	L	Edge_1RB_Right	21.77	PC3	PASS
N71	15	15	CP-16QAM	L	Outer_Full	21.93	PC3	PASS
N71	15	15	CP-16QAM	L	Edge_1RB_Left	21.87	PC3	PASS
N71	15	15	CP-16QAM	L	Inner_Full	22.96	PC3	PASS
N71	15	15	CP-16QAM	L	Edge_1RB_Right	22.06	PC3	PASS
N71	15	15	CP-QPSK	M	Outer_Full	21.96	PC3	PASS
N71	15	15	CP-QPSK	M	Edge_1RB_Left	21.78	PC3	PASS
N71	15	15	CP-QPSK	M	Inner_Full	23.30	PC3	PASS
N71	15	15	CP-QPSK	M	Edge_1RB_Right	21.87	PC3	PASS
N71	15	15	CP-16QAM	M	Outer_Full	21.97	PC3	PASS
N71	15	15	CP-16QAM	M	Edge_1RB_Left	22.28	PC3	PASS
N71	15	15	CP-16QAM	M	Inner_Full	22.99	PC3	PASS
N71	15	15	CP-16QAM	M	Edge_1RB_Right	22.09	PC3	PASS
N71	15	15	CP-QPSK	H	Outer_Full	22.00	PC3	PASS
N71	15	15	CP-QPSK	H	Edge_1RB_Left	21.81	PC3	PASS
N71	15	15	CP-QPSK	H	Inner_Full	23.34	PC3	PASS
N71	15	15	CP-QPSK	H	Edge_1RB_Right	21.85	PC3	PASS
N71	15	15	CP-16QAM	H	Outer_Full	21.97	PC3	PASS
N71	15	15	CP-16QAM	H	Edge_1RB_Left	22.30	PC3	PASS
N71	15	15	CP-16QAM	H	Inner_Full	22.96	PC3	PASS
N71	15	15	CP-16QAM	H	Edge_1RB_Right	22.07	PC3	PASS
N71	15	20	CP-QPSK	L	Outer_Full	21.87	PC3	PASS
N71	15	20	CP-QPSK	L	Edge_1RB_Left	21.70	PC3	PASS
N71	15	20	CP-QPSK	L	Inner_Full	23.38	PC3	PASS
N71	15	20	CP-QPSK	L	Edge_1RB_Right	21.80	PC3	PASS
N71	15	20	CP-16QAM	L	Outer_Full	21.91	PC3	PASS

N71	15	20	CP-16QAM	L	Edge_1RB_Left	21.91	PC3	PASS
N71	15	20	CP-16QAM	L	Inner_Full	23.00	PC3	PASS
N71	15	20	CP-16QAM	L	Edge_1RB_Right	21.93	PC3	PASS
N71	15	20	CP-QPSK	M	Outer_Full	21.88	PC3	PASS
N71	15	20	CP-QPSK	M	Edge_1RB_Left	21.69	PC3	PASS
N71	15	20	CP-QPSK	M	Inner_Full	23.28	PC3	PASS
N71	15	20	CP-QPSK	M	Edge_1RB_Right	21.77	PC3	PASS
N71	15	20	CP-16QAM	M	Outer_Full	21.89	PC3	PASS
N71	15	20	CP-16QAM	M	Edge_1RB_Left	22.02	PC3	PASS
N71	15	20	CP-16QAM	M	Inner_Full	22.90	PC3	PASS
N71	15	20	CP-16QAM	M	Edge_1RB_Right	22.10	PC3	PASS
N71	15	20	CP-QPSK	H	Outer_Full	21.86	PC3	PASS
N71	15	20	CP-QPSK	H	Edge_1RB_Left	21.73	PC3	PASS
N71	15	20	CP-QPSK	H	Inner_Full	23.29	PC3	PASS
N71	15	20	CP-QPSK	H	Edge_1RB_Right	21.77	PC3	PASS
N71	15	20	CP-16QAM	H	Outer_Full	21.87	PC3	PASS
N71	15	20	CP-16QAM	H	Edge_1RB_Left	21.79	PC3	PASS
N71	15	20	CP-16QAM	H	Inner_Full	22.92	PC3	PASS
N71	15	20	CP-16QAM	H	Edge_1RB_Right	22.02	PC3	PASS
N71	15	5	DFT-QPSK	L	Outer_Full	23.79	PC3	PASS
N71	15	5	DFT-QPSK	L	Inner_Full	24.82	PC3	PASS
N71	15	5	DFT-QPSK	L	Edge_1RB_Left	23.62	PC3	PASS
N71	15	5	DFT-QPSK	L	Edge_1RB_Right	23.70	PC3	PASS
N71	15	5	DFT-16QAM	L	Outer_Full	22.88	PC3	PASS
N71	15	5	DFT-16QAM	L	Inner_Full	23.86	PC3	PASS
N71	15	5	DFT-16QAM	L	Edge_1RB_Left	23.00	PC3	PASS
N71	15	5	DFT-16QAM	L	Edge_1RB_Right	22.99	PC3	PASS
N71	15	5	DFT-QPSK	M	Outer_Full	23.81	PC3	PASS
N71	15	5	DFT-QPSK	M	Inner_Full	24.80	PC3	PASS
N71	15	5	DFT-QPSK	M	Edge_1RB_Left	23.69	PC3	PASS
N71	15	5	DFT-QPSK	M	Edge_1RB_Right	23.79	PC3	PASS
N71	15	5	DFT-16QAM	M	Outer_Full	22.93	PC3	PASS
N71	15	5	DFT-16QAM	M	Inner_Full	23.86	PC3	PASS
N71	15	5	DFT-16QAM	M	Edge_1RB_Left	22.98	PC3	PASS
N71	15	5	DFT-16QAM	M	Edge_1RB_Right	23.08	PC3	PASS
N71	15	5	DFT-QPSK	H	Outer_Full	23.83	PC3	PASS
N71	15	5	DFT-QPSK	H	Inner_Full	24.86	PC3	PASS
N71	15	5	DFT-QPSK	H	Edge_1RB_Left	23.81	PC3	PASS
N71	15	5	DFT-QPSK	H	Edge_1RB_Right	23.75	PC3	PASS
N71	15	5	DFT-16QAM	H	Outer_Full	22.91	PC3	PASS
N71	15	5	DFT-16QAM	H	Inner_Full	23.89	PC3	PASS
N71	15	5	DFT-16QAM	H	Edge_1RB_Left	23.15	PC3	PASS

N71	15	5	DFT-16QAM	H	Edge_1RB_Right	23.06	PC3	PASS
N71	15	10	DFT-QPSK	L	Outer_Full	23.82	PC3	PASS
N71	15	10	DFT-QPSK	L	Inner_Full	24.82	PC3	PASS
N71	15	10	DFT-QPSK	L	Edge_1RB_Left	23.79	PC3	PASS
N71	15	10	DFT-QPSK	L	Edge_1RB_Right	23.77	PC3	PASS
N71	15	10	DFT-16QAM	L	Outer_Full	22.85	PC3	PASS
N71	15	10	DFT-16QAM	L	Inner_Full	23.84	PC3	PASS
N71	15	10	DFT-16QAM	L	Edge_1RB_Left	22.98	PC3	PASS
N71	15	10	DFT-16QAM	L	Edge_1RB_Right	23.02	PC3	PASS
N71	15	10	DFT-QPSK	M	Outer_Full	23.74	PC3	PASS
N71	15	10	DFT-QPSK	M	Inner_Full	24.77	PC3	PASS
N71	15	10	DFT-QPSK	M	Edge_1RB_Left	23.70	PC3	PASS
N71	15	10	DFT-QPSK	M	Edge_1RB_Right	23.78	PC3	PASS
N71	15	10	DFT-16QAM	M	Outer_Full	22.88	PC3	PASS
N71	15	10	DFT-16QAM	M	Inner_Full	23.73	PC3	PASS
N71	15	10	DFT-16QAM	M	Edge_1RB_Left	23.03	PC3	PASS
N71	15	10	DFT-16QAM	M	Edge_1RB_Right	23.05	PC3	PASS
N71	15	10	DFT-QPSK	H	Outer_Full	23.77	PC3	PASS
N71	15	10	DFT-QPSK	H	Inner_Full	24.81	PC3	PASS
N71	15	10	DFT-QPSK	H	Edge_1RB_Left	23.77	PC3	PASS
N71	15	10	DFT-QPSK	H	Edge_1RB_Right	23.76	PC3	PASS
N71	15	10	DFT-16QAM	H	Outer_Full	22.91	PC3	PASS
N71	15	10	DFT-16QAM	H	Inner_Full	23.82	PC3	PASS
N71	15	10	DFT-16QAM	H	Edge_1RB_Left	23.03	PC3	PASS
N71	15	10	DFT-16QAM	H	Edge_1RB_Right	23.05	PC3	PASS
N71	15	15	DFT-QPSK	L	Outer_Full	23.75	PC3	PASS
N71	15	15	DFT-QPSK	L	Inner_Full	24.74	PC3	PASS
N71	15	15	DFT-QPSK	L	Edge_1RB_Left	23.66	PC3	PASS
N71	15	15	DFT-QPSK	L	Edge_1RB_Right	23.74	PC3	PASS
N71	15	15	DFT-16QAM	L	Outer_Full	22.85	PC3	PASS
N71	15	15	DFT-16QAM	L	Inner_Full	23.82	PC3	PASS
N71	15	15	DFT-16QAM	L	Edge_1RB_Left	22.87	PC3	PASS
N71	15	15	DFT-16QAM	L	Edge_1RB_Right	23.09	PC3	PASS
N71	15	15	DFT-QPSK	M	Outer_Full	23.80	PC3	PASS
N71	15	15	DFT-QPSK	M	Inner_Full	24.75	PC3	PASS
N71	15	15	DFT-QPSK	M	Edge_1RB_Left	23.71	PC3	PASS
N71	15	15	DFT-QPSK	M	Edge_1RB_Right	23.75	PC3	PASS
N71	15	15	DFT-16QAM	M	Outer_Full	22.85	PC3	PASS
N71	15	15	DFT-16QAM	M	Inner_Full	23.75	PC3	PASS
N71	15	15	DFT-16QAM	M	Edge_1RB_Left	23.02	PC3	PASS
N71	15	15	DFT-16QAM	M	Edge_1RB_Right	22.92	PC3	PASS
N71	15	15	DFT-QPSK	H	Outer_Full	23.79	PC3	PASS

N71	15	15	DFT-QPSK	H	Inner_Full	24.79	PC3	PASS
N71	15	15	DFT-QPSK	H	Edge_1RB_Left	23.76	PC3	PASS
N71	15	15	DFT-QPSK	H	Edge_1RB_Right	23.75	PC3	PASS
N71	15	15	DFT-16QAM	H	Outer_Full	22.88	PC3	PASS
N71	15	15	DFT-16QAM	H	Inner_Full	23.81	PC3	PASS
N71	15	15	DFT-16QAM	H	Edge_1RB_Left	23.09	PC3	PASS
N71	15	15	DFT-16QAM	H	Edge_1RB_Right	23.06	PC3	PASS
N71	15	20	DFT-QPSK	L	Outer_Full	23.81	PC3	PASS
N71	15	20	DFT-QPSK	L	Inner_Full	24.84	PC3	PASS
N71	15	20	DFT-QPSK	L	Edge_1RB_Left	23.82	PC3	PASS
N71	15	20	DFT-QPSK	L	Edge_1RB_Right	23.78	PC3	PASS
N71	15	20	DFT-16QAM	L	Outer_Full	22.86	PC3	PASS
N71	15	20	DFT-16QAM	L	Inner_Full	23.83	PC3	PASS
N71	15	20	DFT-16QAM	L	Edge_1RB_Left	22.98	PC3	PASS
N71	15	20	DFT-16QAM	L	Edge_1RB_Right	23.17	PC3	PASS
N71	15	20	DFT-QPSK	M	Outer_Full	23.75	PC3	PASS
N71	15	20	DFT-QPSK	M	Inner_Full	24.81	PC3	PASS
N71	15	20	DFT-QPSK	M	Edge_1RB_Left	23.74	PC3	PASS
N71	15	20	DFT-QPSK	M	Edge_1RB_Right	23.70	PC3	PASS
N71	15	20	DFT-16QAM	M	Outer_Full	22.85	PC3	PASS
N71	15	20	DFT-16QAM	M	Inner_Full	23.83	PC3	PASS
N71	15	20	DFT-16QAM	M	Edge_1RB_Left	22.94	PC3	PASS
N71	15	20	DFT-16QAM	M	Edge_1RB_Right	23.07	PC3	PASS
N71	15	20	DFT-QPSK	H	Outer_Full	23.86	PC3	PASS
N71	15	20	DFT-QPSK	H	Inner_Full	24.89	PC3	PASS
N71	15	20	DFT-QPSK	H	Edge_1RB_Left	23.71	PC3	PASS
N71	15	20	DFT-QPSK	H	Edge_1RB_Right	23.70	PC3	PASS
N71	15	20	DFT-16QAM	H	Outer_Full	22.91	PC3	PASS
N71	15	20	DFT-16QAM	H	Inner_Full	23.87	PC3	PASS
N71	15	20	DFT-16QAM	H	Edge_1RB_Left	23.03	PC3	PASS
N71	15	20	DFT-16QAM	H	Edge_1RB_Right	23.05	PC3	PASS

Appendix B: Peak-to-Average Ratio for SA

Peak-to-Average Ratio(CCDF)

Test Result

Band	SCS	Bandwidth	Modulation	Channel	RB Config	Result	Limit	Verdict
N71	15	5	CP-QPSK	L	Outer_Full	7.55	≤13	PASS
N71	15	5	CP-16QAM	L	Outer_Full	7.51	≤13	PASS
N71	15	5	CP-QPSK	M	Outer_Full	7.70	≤13	PASS
N71	15	5	CP-16QAM	M	Outer_Full	7.68	≤13	PASS
N71	15	5	CP-QPSK	H	Outer_Full	7.75	≤13	PASS
N71	15	5	CP-16QAM	H	Outer_Full	7.66	≤13	PASS
N71	15	10	CP-QPSK	L	Outer_Full	7.72	≤13	PASS
N71	15	10	CP-16QAM	L	Outer_Full	8.04	≤13	PASS
N71	15	10	CP-QPSK	M	Outer_Full	7.48	≤13	PASS
N71	15	10	CP-16QAM	M	Outer_Full	7.97	≤13	PASS
N71	15	10	CP-QPSK	H	Outer_Full	7.47	≤13	PASS
N71	15	10	CP-16QAM	H	Outer_Full	7.85	≤13	PASS
N71	15	15	CP-QPSK	L	Outer_Full	7.87	≤13	PASS
N71	15	15	CP-16QAM	L	Outer_Full	7.83	≤13	PASS
N71	15	15	CP-QPSK	M	Outer_Full	7.69	≤13	PASS
N71	15	15	CP-16QAM	M	Outer_Full	7.57	≤13	PASS
N71	15	15	CP-QPSK	H	Outer_Full	7.78	≤13	PASS
N71	15	15	CP-16QAM	H	Outer_Full	7.63	≤13	PASS
N71	15	20	CP-QPSK	L	Outer_Full	8.06	≤13	PASS
N71	15	20	CP-16QAM	L	Outer_Full	7.88	≤13	PASS
N71	15	20	CP-QPSK	M	Outer_Full	7.91	≤13	PASS
N71	15	20	CP-16QAM	M	Outer_Full	7.83	≤13	PASS
N71	15	20	CP-QPSK	H	Outer_Full	7.93	≤13	PASS
N71	15	20	CP-16QAM	H	Outer_Full	7.89	≤13	PASS

The figure displays four screenshots of a Keysight Spectrum Analyzer, arranged in a 2x2 grid. Each screenshot shows the power spectrum of a signal, with a table of power levels and a graph of power vs. frequency.

Top Left: L_TID6

Power Level	Power (dBm)
Average Power	22.01 dBm
36.97 % at 0 dB	
10.0 %	3.76 dB
1.0 %	6.47 dB
0.1 %	7.55 dB
0.01 %	7.70 dB
0.001 %	7.85 dB
0.0001 %	-dB
Peak	7.85 dB
29.86 dBm	

Top Right: L_TID7

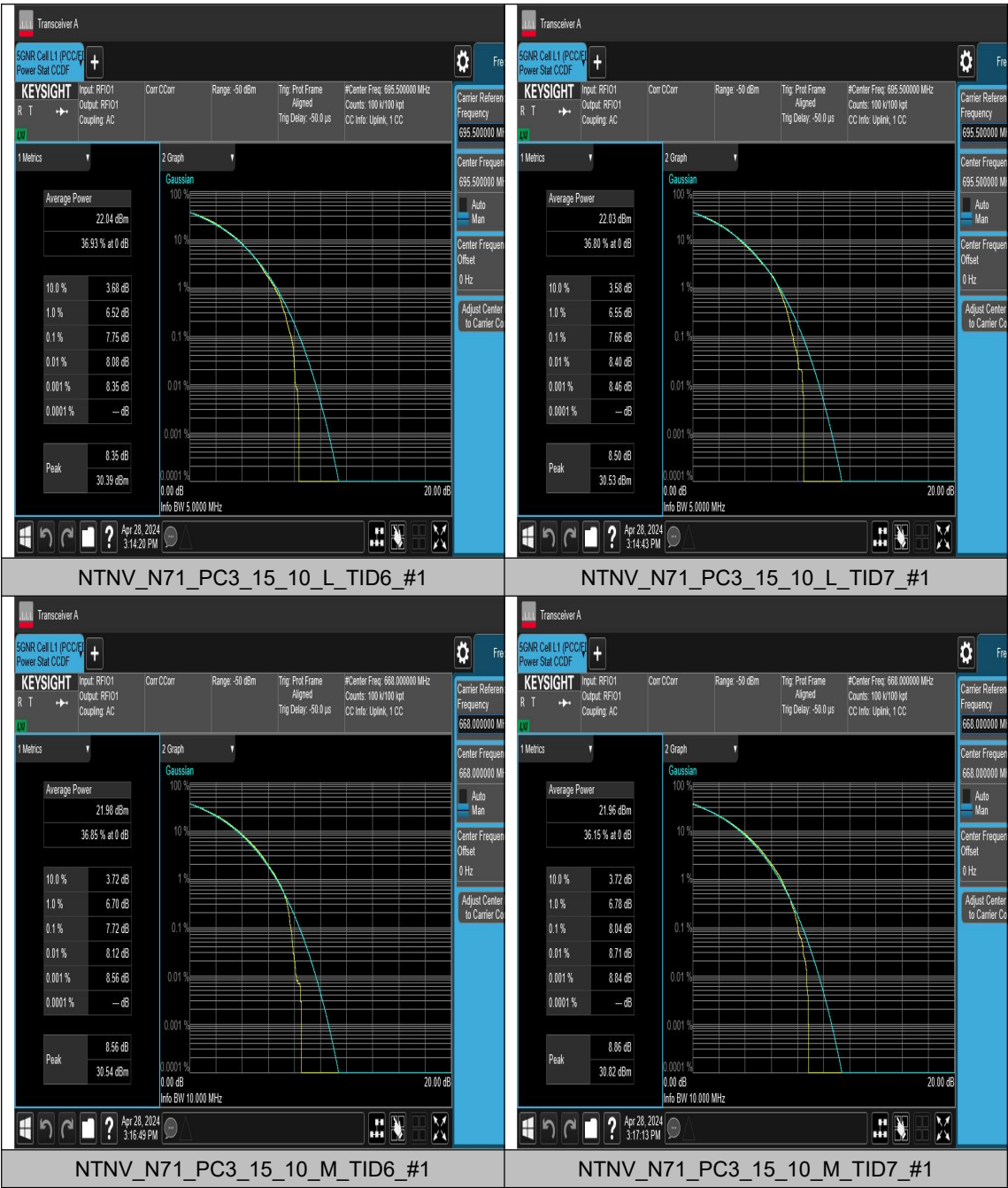
Power Level	Power (dBm)
Average Power	21.97 dBm
36.93 % at 0 dB	
10.0 %	3.68 dB
1.0 %	6.48 dB
0.1 %	7.51 dB
0.01 %	8.22 dB
0.001 %	8.27 dB
0.0001 %	-dB
Peak	8.28 dB
30.25 dBm	

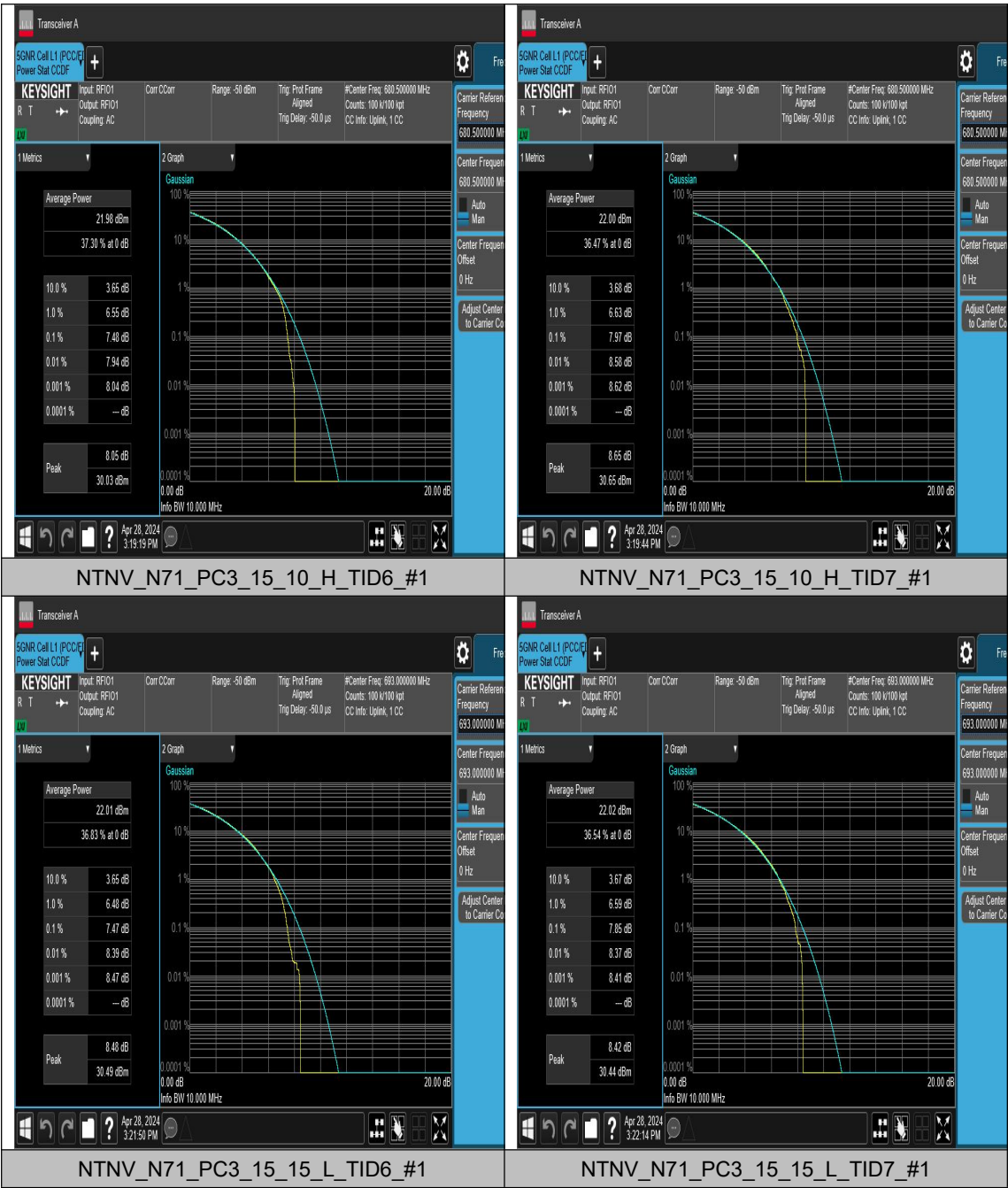
Bottom Left: M_TID6

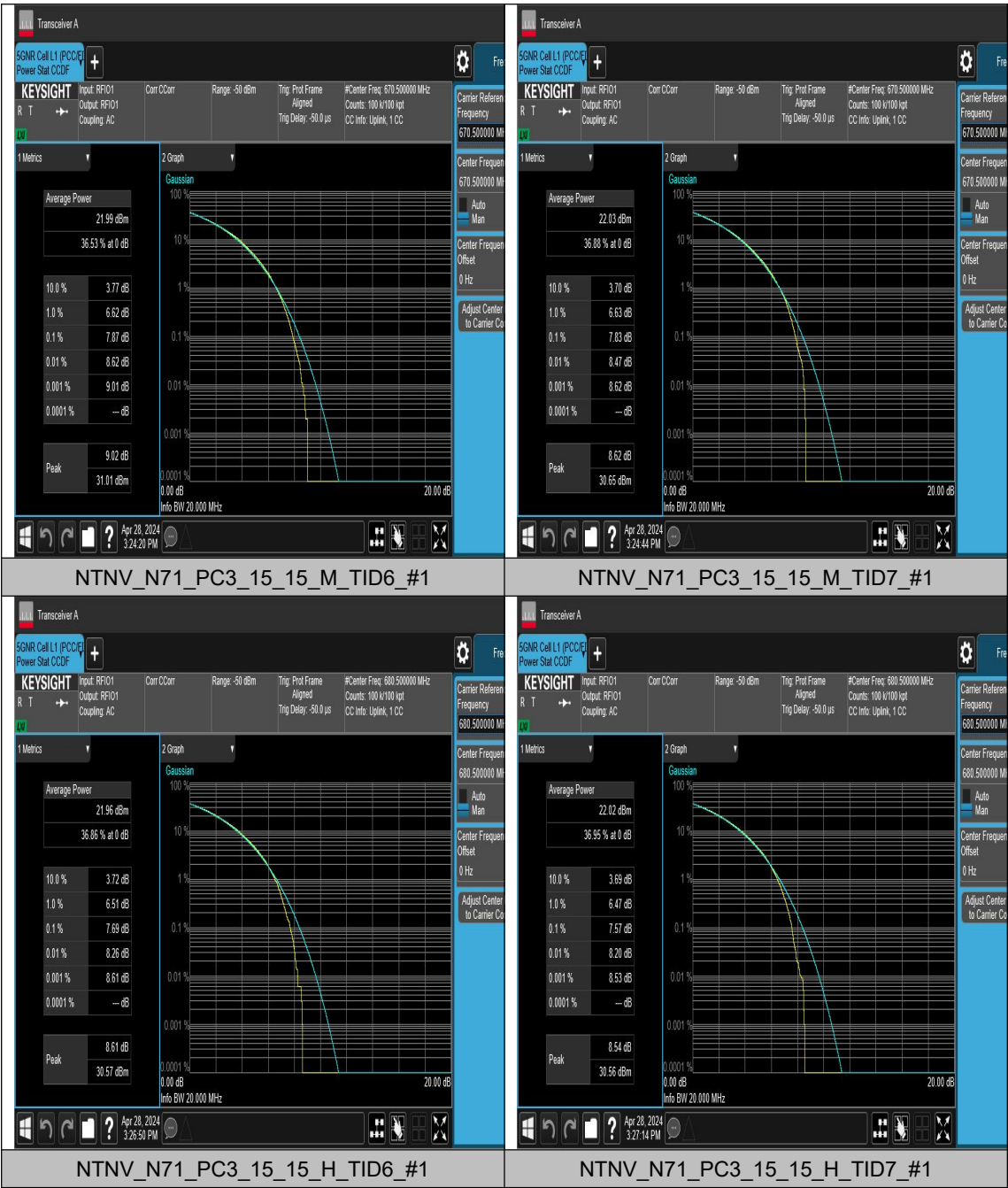
Power Level	Power (dBm)
Average Power	22.02 dBm
37.34 % at 0 dB	
10.0 %	3.69 dB
1.0 %	6.53 dB
0.1 %	7.70 dB
0.01 %	8.10 dB
0.001 %	8.13 dB
0.0001 %	-dB
Peak	8.14 dB
30.16 dBm	

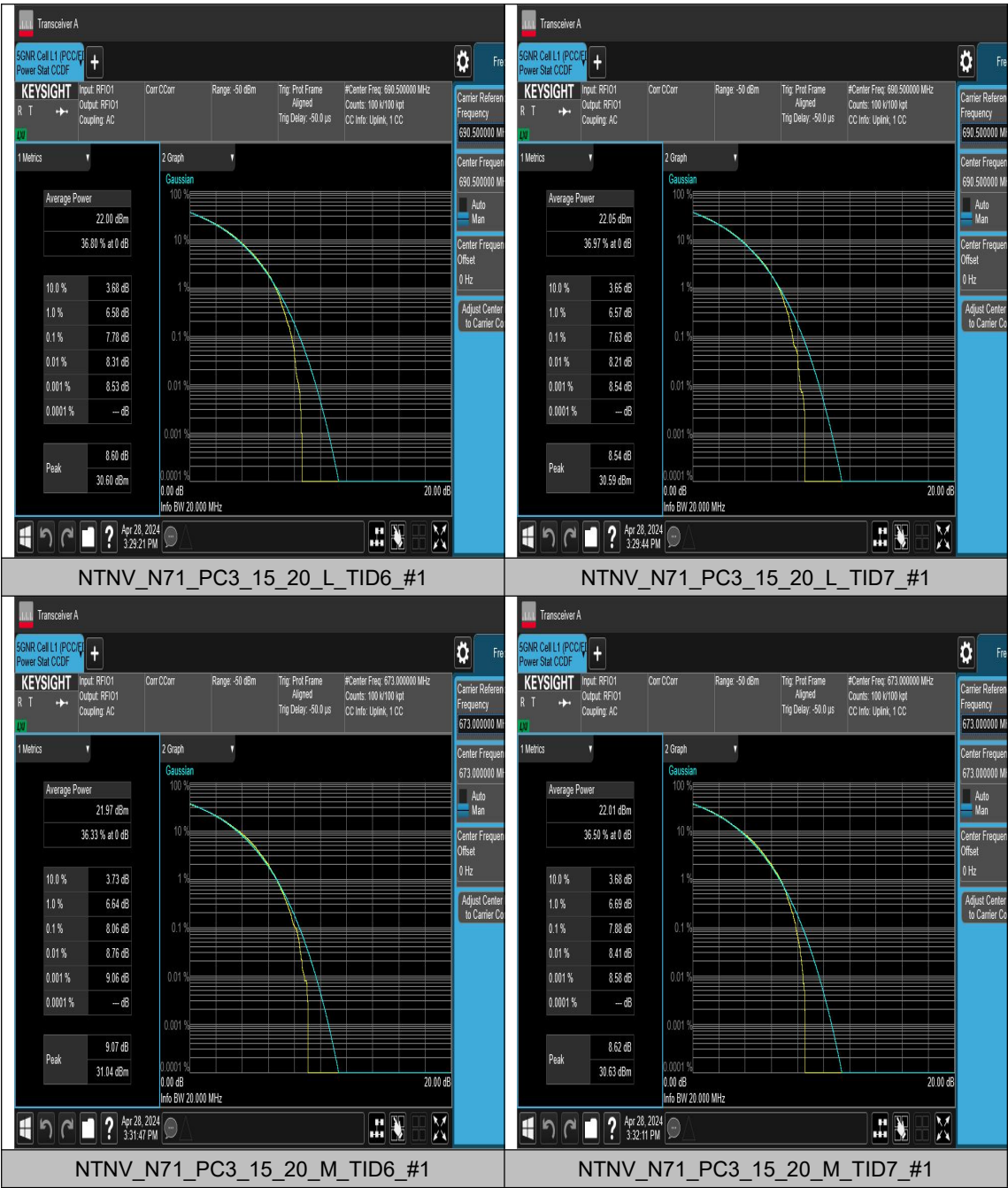
Bottom Right: M_TID7

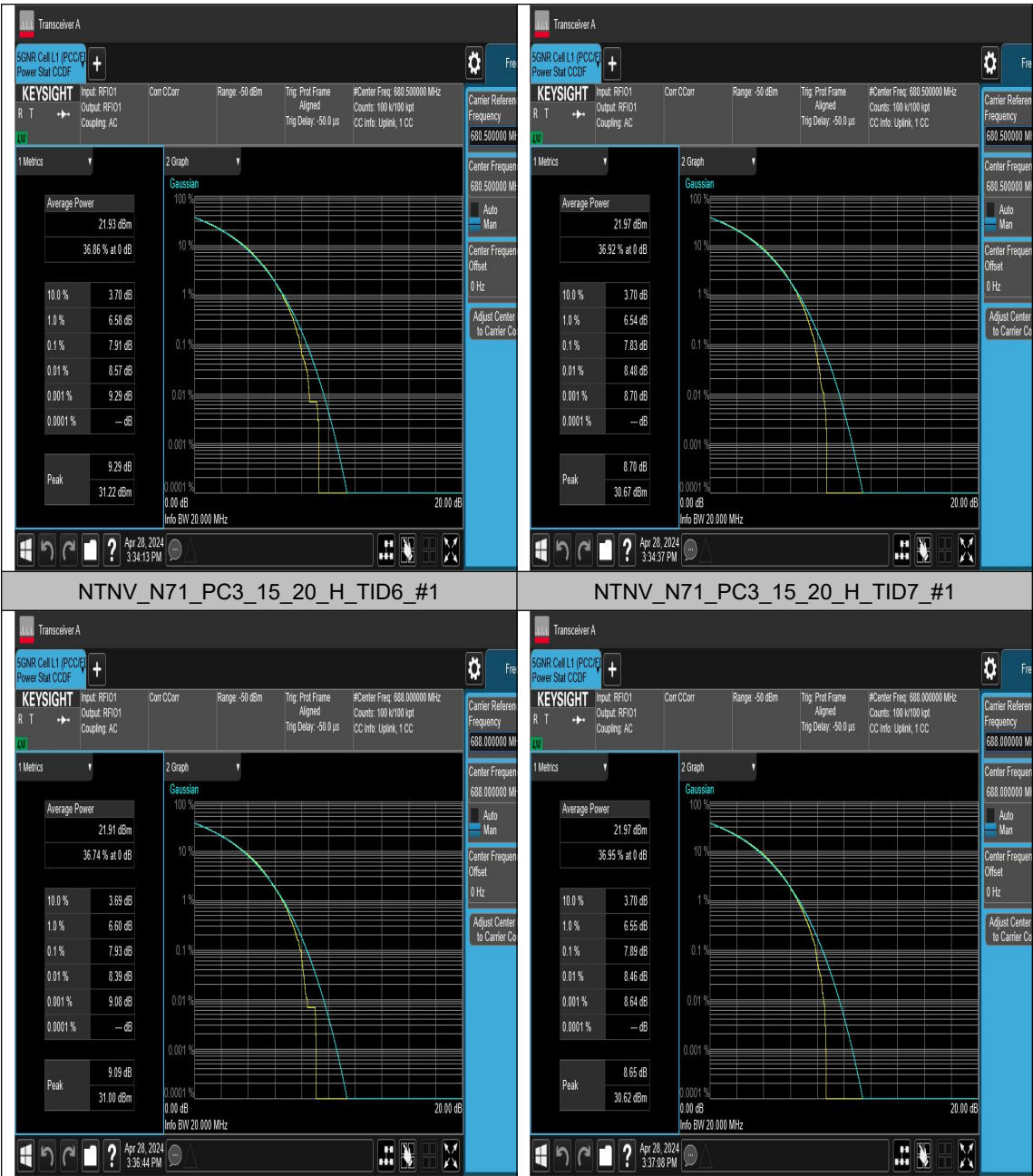
Power Level	Power (dBm)
Average Power	22.05 dBm
37.33 % at 0 dB	
10.0 %	3.61 dB
1.0 %	6.51 dB
0.1 %	7.68 dB
0.01 %	8.70 dB
0.001 %	8.73 dB
0.0001 %	-dB
Peak	8.75 dB
30.88 dBm	











Appendix C: 26dB Bandwidth and Occupied Bandwidth for SA

Test Result

Band	SCS	Bandwidth	Modulation	Channel	RB Config	Result (99%)	Result (26dB)	Verdict
N71	15	5	CP-QPSK	L	Outer_Full	4.4622	4.842	PASS
N71	15	5	CP-16QAM	L	Outer_Full	4.4620	4.831	PASS
N71	15	5	CP-QPSK	M	Outer_Full	4.4764	4.880	PASS
N71	15	5	CP-16QAM	M	Outer_Full	4.4587	4.813	PASS
N71	15	5	CP-QPSK	H	Outer_Full	4.4610	4.840	PASS
N71	15	5	CP-16QAM	H	Outer_Full	4.4592	4.831	PASS
N71	15	10	CP-QPSK	L	Outer_Full	9.2661	9.764	PASS
N71	15	10	CP-16QAM	L	Outer_Full	9.2523	9.765	PASS
N71	15	10	CP-QPSK	M	Outer_Full	9.2750	9.785	PASS
N71	15	10	CP-16QAM	M	Outer_Full	9.2625	9.751	PASS
N71	15	10	CP-QPSK	H	Outer_Full	9.2626	9.751	PASS
N71	15	10	CP-16QAM	H	Outer_Full	9.2732	9.776	PASS
N71	15	15	CP-QPSK	L	Outer_Full	14.043	14.72	PASS
N71	15	15	CP-16QAM	L	Outer_Full	14.078	14.77	PASS
N71	15	15	CP-QPSK	M	Outer_Full	14.081	14.71	PASS
N71	15	15	CP-16QAM	M	Outer_Full	14.092	14.74	PASS
N71	15	15	CP-QPSK	H	Outer_Full	14.084	14.74	PASS
N71	15	15	CP-16QAM	H	Outer_Full	14.087	14.73	PASS
N71	15	20	CP-QPSK	L	Outer_Full	18.843	19.76	PASS
N71	15	20	CP-16QAM	L	Outer_Full	18.854	19.73	PASS
N71	15	20	CP-QPSK	M	Outer_Full	18.892	19.74	PASS
N71	15	20	CP-16QAM	M	Outer_Full	18.889	19.77	PASS
N71	15	20	CP-QPSK	H	Outer_Full	18.887	19.74	PASS
N71	15	20	CP-16QAM	H	Outer_Full	18.885	19.72	PASS

Test Graphs

