

FCC LTE Band Test Data

FCC ID : 2BG5S-CLM920HE9NA

Company: : Shanghai Yuge information technology Co., Ltd.

EUT : 4G LTE Wireless Communication Module

Model Number : CLM920 HE9 NA

Reviewed By : Eric Wang

Appendix A: Conducted Power Output Data

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dBm)	Verdict
Band13	5MHz	QPSK	23205	1RB#0	23.02	PASS
Band13	5MHz	QPSK	23205	1RB#12	23.20	PASS
Band13	5MHz	QPSK	23205	1RB#24	22.83	PASS
Band13	5MHz	QPSK	23205	12RB#0	22.20	PASS
Band13	5MHz	QPSK	23205	12RB#6	22.18	PASS
Band13	5MHz	QPSK	23205	12RB#13	21.83	PASS
Band13	5MHz	QPSK	23205	25RB#0	22.08	PASS
Band13	5MHz	QPSK	23230	1RB#0	23.03	PASS
Band13	5MHz	QPSK	23230	1RB#12	22.42	PASS
Band13	5MHz	QPSK	23230	1RB#24	22.16	PASS
Band13	5MHz	QPSK	23230	12RB#0	21.57	PASS
Band13	5MHz	QPSK	23230	12RB#6	21.59	PASS
Band13	5MHz	QPSK	23230	12RB#13	21.18	PASS
Band13	5MHz	QPSK	23230	25RB#0	21.35	PASS
Band13	5MHz	QPSK	23255	1RB#0	22.40	PASS
Band13	5MHz	QPSK	23255	1RB#12	22.18	PASS
Band13	5MHz	QPSK	23255	1RB#24	22.37	PASS
Band13	5MHz	QPSK	23255	12RB#0	21.05	PASS
Band13	5MHz	QPSK	23255	12RB#6	21.09	PASS
Band13	5MHz	QPSK	23255	12RB#13	21.09	PASS
Band13	5MHz	QPSK	23255	25RB#0	21.06	PASS
Band13	5MHz	16QAM	23205	1RB#0	22.00	PASS
Band13	5MHz	16QAM	23205	1RB#12	22.28	PASS
Band13	5MHz	16QAM	23205	1RB#24	21.92	PASS
Band13	5MHz	16QAM	23205	12RB#0	21.24	PASS
Band13	5MHz	16QAM	23205	12RB#6	21.19	PASS
Band13	5MHz	16QAM	23205	12RB#13	20.98	PASS
Band13	5MHz	16QAM	23205	25RB#0	21.02	PASS
Band13	5MHz	16QAM	23230	1RB#0	21.86	PASS
Band13	5MHz	16QAM	23230	1RB#12	21.38	PASS
Band13	5MHz	16QAM	23230	1RB#24	21.05	PASS
Band13	5MHz	16QAM	23230	12RB#0	20.56	PASS
Band13	5MHz	16QAM	23230	12RB#6	20.54	PASS
Band13	5MHz	16QAM	23230	12RB#13	20.12	PASS
Band13	5MHz	16QAM	23230	25RB#0	20.36	PASS
Band13	5MHz	16QAM	23255	1RB#0	21.41	PASS

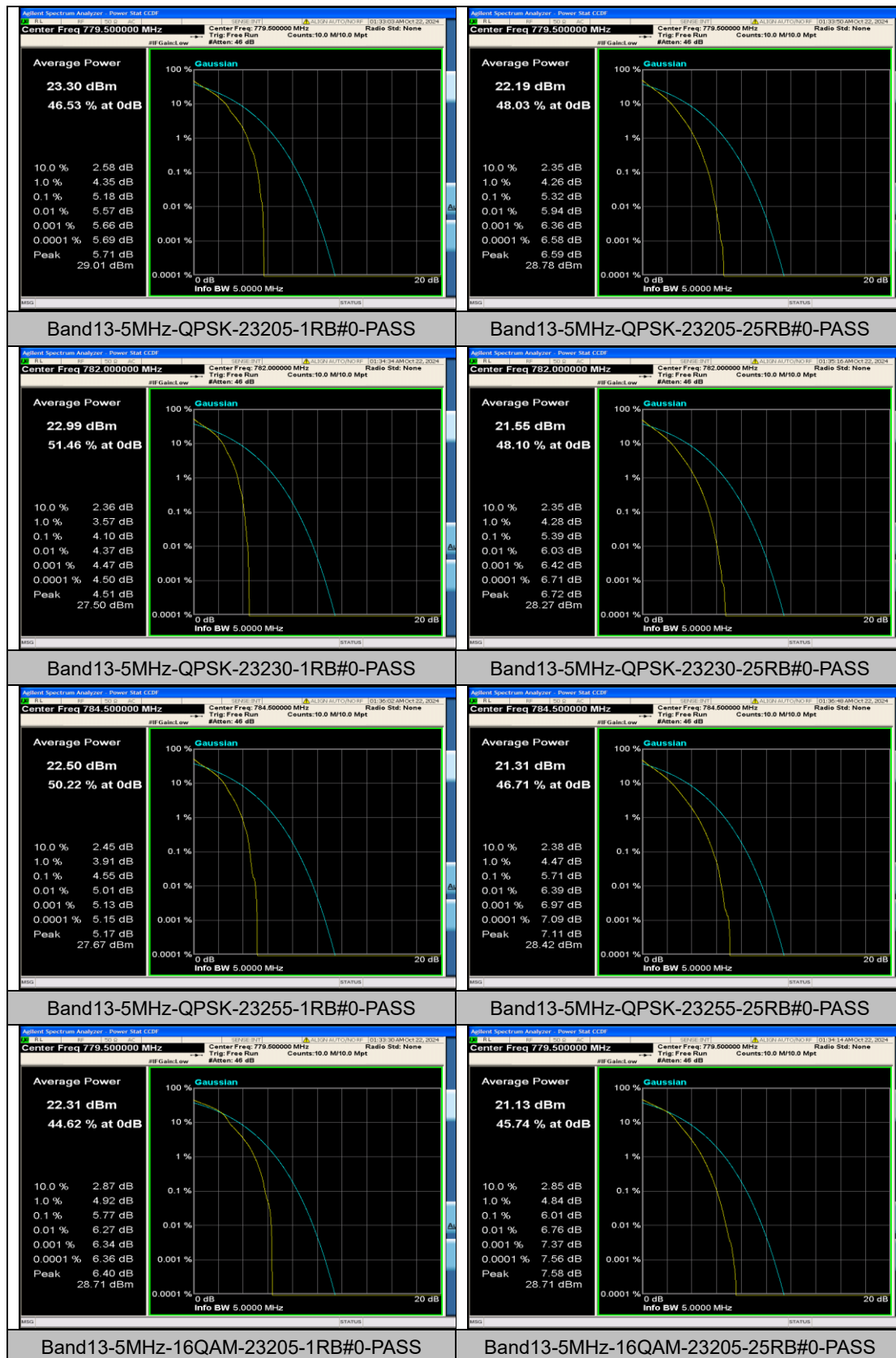
Band13	5MHz	16QAM	23255	1RB#12	21.21	PASS
Band13	5MHz	16QAM	23255	1RB#24	21.36	PASS
Band13	5MHz	16QAM	23255	12RB#0	20.17	PASS
Band13	5MHz	16QAM	23255	12RB#6	20.17	PASS
Band13	5MHz	16QAM	23255	12RB#13	20.14	PASS
Band13	5MHz	16QAM	23255	25RB#0	20.09	PASS
Band13	10MHz	QPSK	23230	1RB#0	22.93	PASS
Band13	10MHz	QPSK	23230	1RB#24	22.20	PASS
Band13	10MHz	QPSK	23230	1RB#49	22.29	PASS
Band13	10MHz	QPSK	23230	25RB#0	21.57	PASS
Band13	10MHz	QPSK	23230	25RB#12	21.60	PASS
Band13	10MHz	QPSK	23230	25RB#25	20.95	PASS
Band13	10MHz	QPSK	23230	50RB#0	21.17	PASS
Band13	10MHz	16QAM	23230	1RB#0	21.89	PASS
Band13	10MHz	16QAM	23230	1RB#24	21.25	PASS
Band13	10MHz	16QAM	23230	1RB#49	21.29	PASS
Band13	10MHz	16QAM	23230	25RB#0	20.58	PASS
Band13	10MHz	16QAM	23230	25RB#12	20.51	PASS
Band13	10MHz	16QAM	23230	25RB#25	19.87	PASS

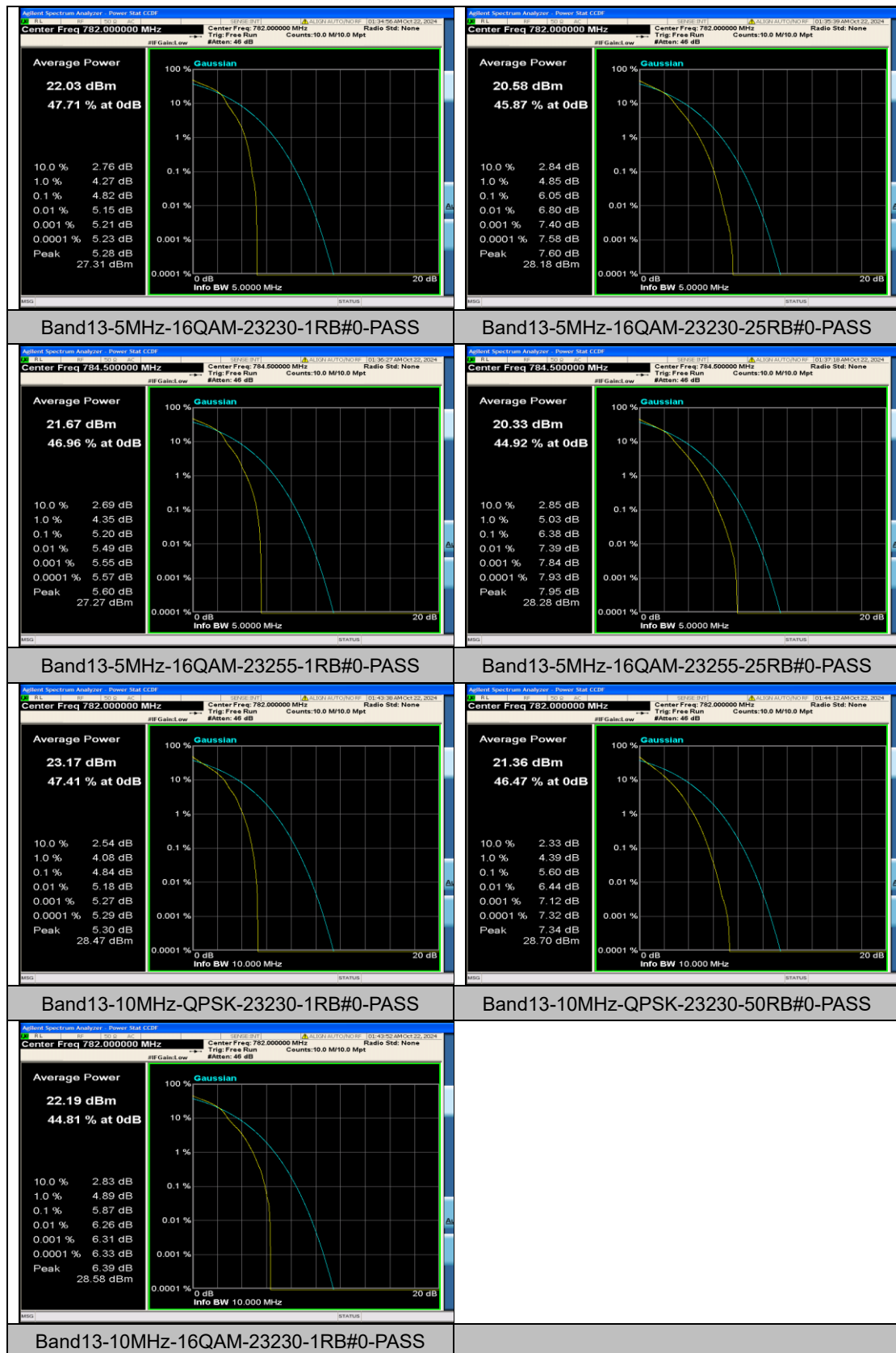
Appendix B: Peak-to-Average Ratio(CCDF)

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dB)	Limit(dB)	Verdict
Band13	5MHz	QPSK	23205	1RB#0	5.18	13	PASS
Band13	5MHz	QPSK	23205	25RB#0	5.32	13	PASS
Band13	5MHz	QPSK	23230	1RB#0	4.10	13	PASS
Band13	5MHz	QPSK	23230	25RB#0	5.39	13	PASS
Band13	5MHz	QPSK	23255	1RB#0	4.55	13	PASS
Band13	5MHz	QPSK	23255	25RB#0	5.71	13	PASS
Band13	5MHz	16QAM	23205	1RB#0	5.77	13	PASS
Band13	5MHz	16QAM	23205	25RB#0	6.01	13	PASS
Band13	5MHz	16QAM	23230	1RB#0	4.82	13	PASS
Band13	5MHz	16QAM	23230	25RB#0	6.05	13	PASS
Band13	5MHz	16QAM	23255	1RB#0	5.20	13	PASS
Band13	5MHz	16QAM	23255	25RB#0	6.38	13	PASS
Band13	10MHz	QPSK	23230	1RB#0	4.84	13	PASS
Band13	10MHz	QPSK	23230	50RB#0	5.60	13	PASS
Band13	10MHz	16QAM	23230	1RB#0	5.87	13	PASS

Test Graphs



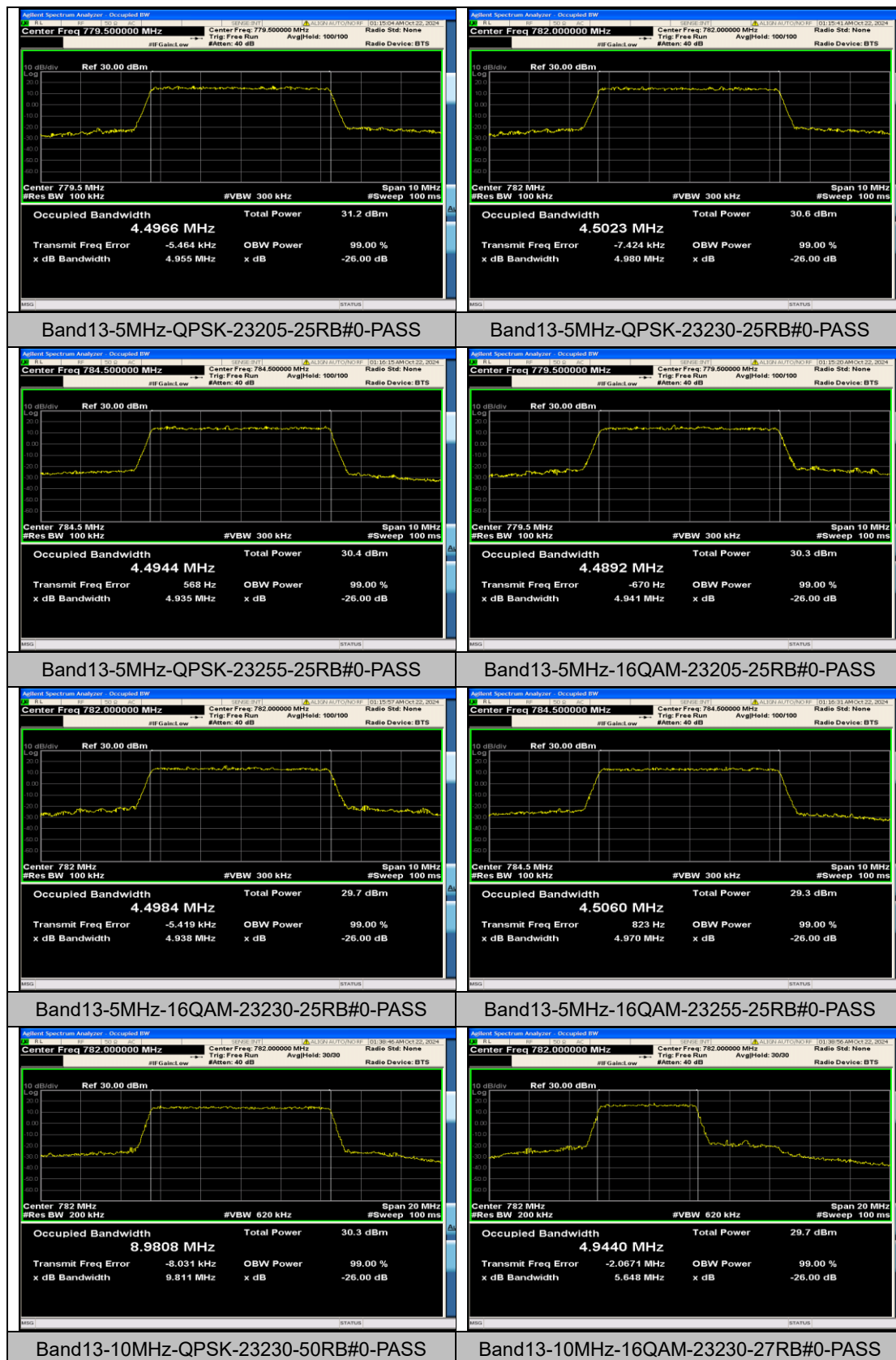


Appendix C: 26dB Bandwidth and Occupied Bandwidth

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Occupied Bandwidth (MHz)	26dB Bandwidth (MHz)	Verdict
Band13	5MHz	QPSK	23205	25RB#0	4.4966	4.955	PASS
Band13	5MHz	QPSK	23230	25RB#0	4.5023	4.980	PASS
Band13	5MHz	QPSK	23255	25RB#0	4.4944	4.935	PASS
Band13	5MHz	16QAM	23205	25RB#0	4.4892	4.941	PASS
Band13	5MHz	16QAM	23230	25RB#0	4.4984	4.938	PASS
Band13	5MHz	16QAM	23255	25RB#0	4.5060	4.970	PASS
Band13	10MHz	QPSK	23230	50RB#0	8.9808	9.811	PASS
Band13	10MHz	16QAM	23230	27RB#0	4.9440	5.648	PASS

Test Graphs

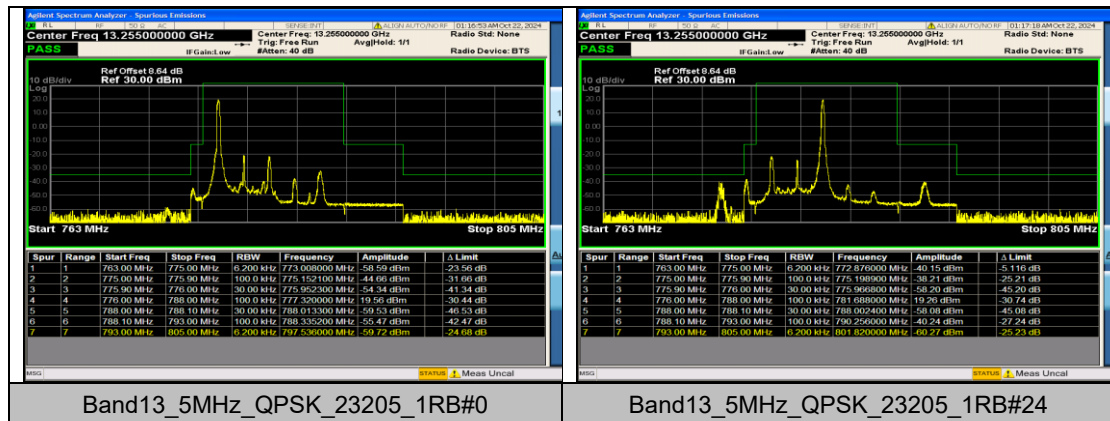


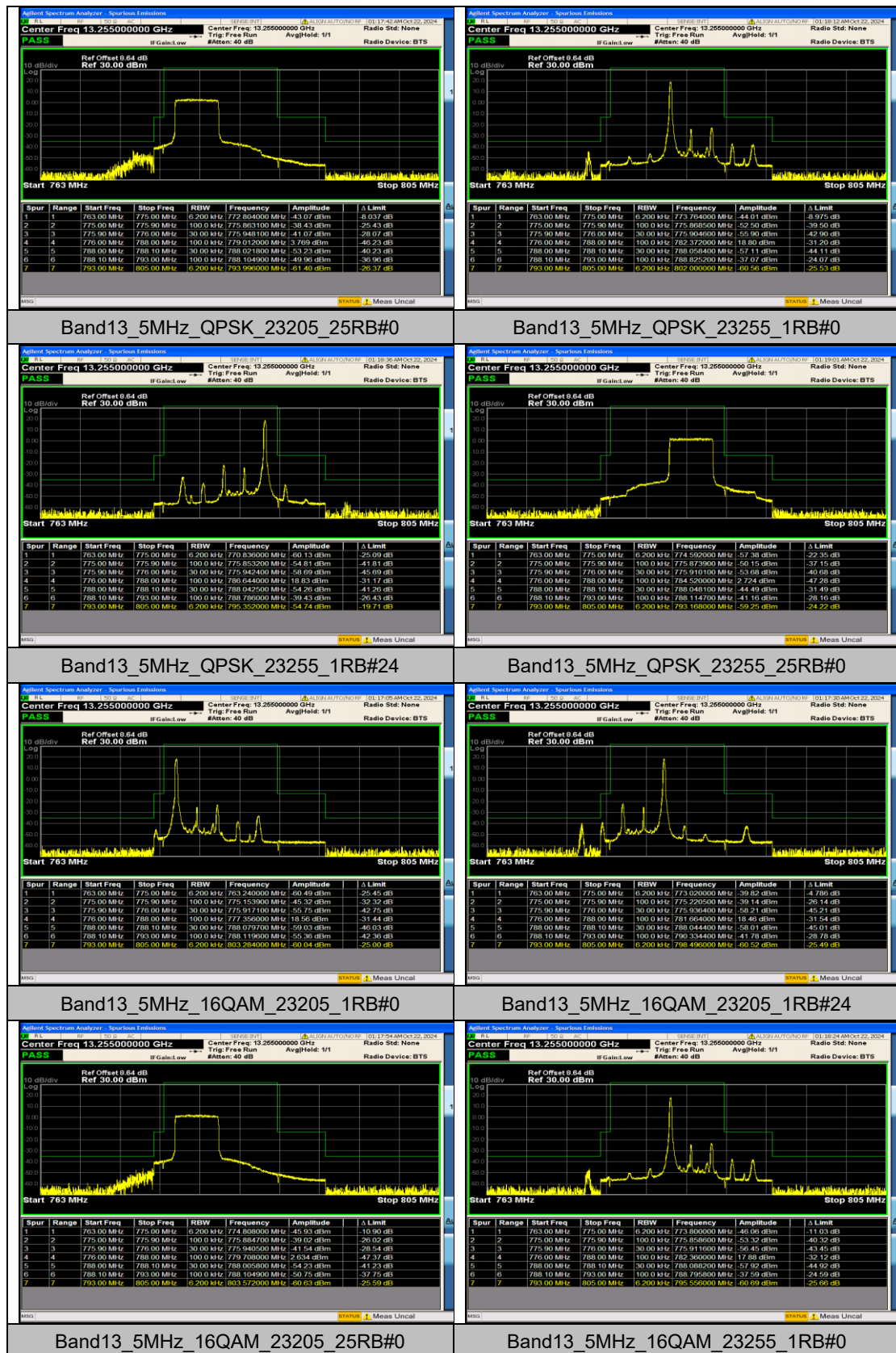
Appendix D: Band Edge

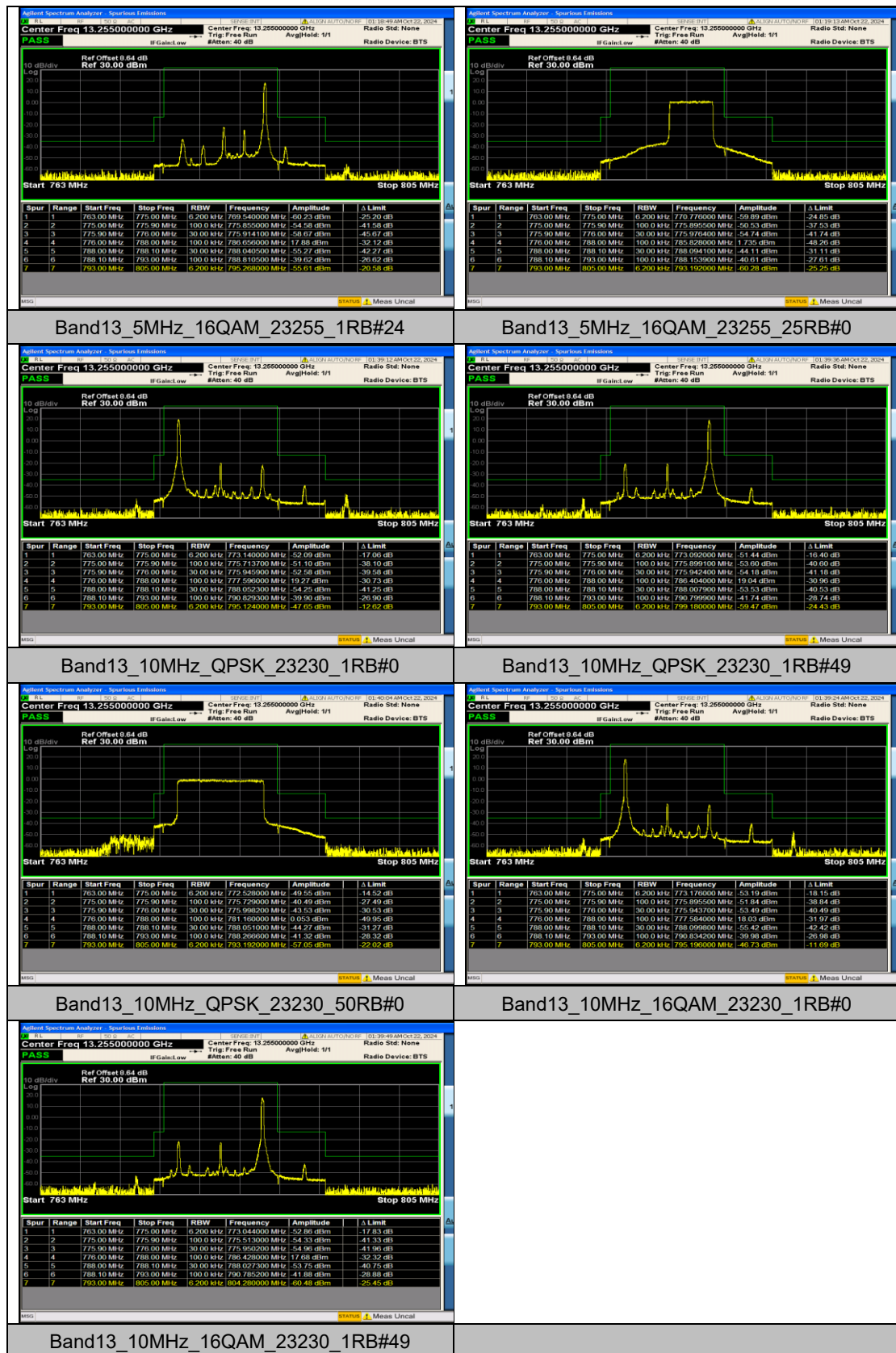
Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dBm)	Verdict
Band13	5MHz	QPSK	23205	1RB#0	-58.59	PASS
Band13	5MHz	QPSK	23205	1RB#24	-40.15	PASS
Band13	5MHz	QPSK	23205	25RB#0	-43.07	PASS
Band13	5MHz	QPSK	23255	1RB#0	-44.01	PASS
Band13	5MHz	QPSK	23255	1RB#24	-54.74	PASS
Band13	5MHz	QPSK	23255	25RB#0	-57.38	PASS
Band13	5MHz	16QAM	23205	1RB#0	-60.04	PASS
Band13	5MHz	16QAM	23205	1RB#24	-39.82	PASS
Band13	5MHz	16QAM	23205	25RB#0	-45.93	PASS
Band13	5MHz	16QAM	23255	1RB#0	-46.06	PASS
Band13	5MHz	16QAM	23255	1RB#24	-55.61	PASS
Band13	5MHz	16QAM	23255	25RB#0	-59.89	PASS
Band13	10MHz	QPSK	23230	1RB#0	-47.65	PASS
Band13	10MHz	QPSK	23230	1RB#49	-51.44	PASS
Band13	10MHz	QPSK	23230	50RB#0	-49.55	PASS
Band13	10MHz	16QAM	23230	1RB#0	-46.73	PASS
Band13	10MHz	16QAM	23230	1RB#49	-52.86	PASS

Test Graphs







Appendix E: Conducted Spurious Emission

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Frequency Range	Result (dBm)	Verdict
Band13	5MHz	QPSK	23205	1RB#0	0.009~0.15	-45.52	PASS
Band13	5MHz	QPSK	23205	1RB#0	0.15~30	-53.90	PASS
Band13	5MHz	QPSK	23205	1RB#0	30~1000	-56.46	PASS
Band13	5MHz	QPSK	23205	1RB#0	1000~3000	-45.03	PASS
Band13	5MHz	QPSK	23205	1RB#0	3000~10000	-43.56	PASS
Band13	5MHz	QPSK	23205	1RB#24	0.009~0.15	-47.39	PASS
Band13	5MHz	QPSK	23205	1RB#24	0.15~30	-52.75	PASS
Band13	5MHz	QPSK	23205	1RB#24	30~1000	-58.71	PASS
Band13	5MHz	QPSK	23205	1RB#24	1000~3000	-46.09	PASS
Band13	5MHz	QPSK	23205	1RB#24	3000~10000	-43.45	PASS
Band13	5MHz	QPSK	23205	25RB#0	0.009~0.15	-45.24	PASS
Band13	5MHz	QPSK	23205	25RB#0	0.15~30	-52.83	PASS
Band13	5MHz	QPSK	23205	25RB#0	30~1000	-57.90	PASS
Band13	5MHz	QPSK	23205	25RB#0	1000~3000	-46.80	PASS
Band13	5MHz	QPSK	23205	25RB#0	3000~10000	-43.20	PASS
Band13	5MHz	QPSK	23230	1RB#0	0.009~0.15	-44.29	PASS
Band13	5MHz	QPSK	23230	1RB#0	0.15~30	-55.25	PASS
Band13	5MHz	QPSK	23230	1RB#0	30~1000	-58.73	PASS
Band13	5MHz	QPSK	23230	1RB#0	1000~3000	-44.66	PASS
Band13	5MHz	QPSK	23230	1RB#0	3000~10000	-43.20	PASS
Band13	5MHz	QPSK	23230	1RB#24	0.009~0.15	-50.01	PASS
Band13	5MHz	QPSK	23230	1RB#24	0.15~30	-54.39	PASS
Band13	5MHz	QPSK	23230	1RB#24	30~1000	-59.20	PASS
Band13	5MHz	QPSK	23230	1RB#24	1000~3000	-43.72	PASS
Band13	5MHz	QPSK	23230	1RB#24	3000~10000	-43.41	PASS
Band13	5MHz	QPSK	23230	25RB#0	0.009~0.15	-46.99	PASS
Band13	5MHz	QPSK	23230	25RB#0	0.15~30	-53.13	PASS
Band13	5MHz	QPSK	23230	25RB#0	30~1000	-59.45	PASS
Band13	5MHz	QPSK	23230	25RB#0	1000~3000	-46.16	PASS
Band13	5MHz	QPSK	23230	25RB#0	3000~10000	-43.47	PASS
Band13	5MHz	QPSK	23255	1RB#0	0.009~0.15	-48.36	PASS
Band13	5MHz	QPSK	23255	1RB#0	0.15~30	-51.82	PASS
Band13	5MHz	QPSK	23255	1RB#0	30~1000	-59.67	PASS
Band13	5MHz	QPSK	23255	1RB#0	1000~3000	-44.18	PASS
Band13	5MHz	QPSK	23255	1RB#0	3000~10000	-43.19	PASS
Band13	5MHz	QPSK	23255	1RB#24	0.009~0.15	-45.65	PASS

Band13	5MHz	QPSK	23255	1RB#24	0.15~30	-53.63	PASS
Band13	5MHz	QPSK	23255	1RB#24	30~1000	-59.99	PASS
Band13	5MHz	QPSK	23255	1RB#24	1000~3000	-46.02	PASS
Band13	5MHz	QPSK	23255	1RB#24	3000~10000	-43.62	PASS
Band13	5MHz	QPSK	23255	25RB#0	0.009~0.15	-45.23	PASS
Band13	5MHz	QPSK	23255	25RB#0	0.15~30	-53.39	PASS
Band13	5MHz	QPSK	23255	25RB#0	30~1000	-58.64	PASS
Band13	5MHz	QPSK	23255	25RB#0	1000~3000	-46.45	PASS
Band13	5MHz	QPSK	23255	25RB#0	3000~10000	-43.23	PASS
Band13	5MHz	16QAM	23205	1RB#0	0.009~0.15	-46.61	PASS
Band13	5MHz	16QAM	23205	1RB#0	0.15~30	-53.68	PASS
Band13	5MHz	16QAM	23205	1RB#0	30~1000	-59.07	PASS
Band13	5MHz	16QAM	23205	1RB#0	1000~3000	-44.53	PASS
Band13	5MHz	16QAM	23205	1RB#0	3000~10000	-43.34	PASS
Band13	5MHz	16QAM	23205	1RB#24	0.009~0.15	-44.70	PASS
Band13	5MHz	16QAM	23205	1RB#24	0.15~30	-55.26	PASS
Band13	5MHz	16QAM	23205	1RB#24	30~1000	-54.72	PASS
Band13	5MHz	16QAM	23205	1RB#24	1000~3000	-46.02	PASS
Band13	5MHz	16QAM	23205	1RB#24	3000~10000	-43.44	PASS
Band13	5MHz	16QAM	23205	25RB#0	0.009~0.15	-47.17	PASS
Band13	5MHz	16QAM	23205	25RB#0	0.15~30	-56.32	PASS
Band13	5MHz	16QAM	23205	25RB#0	30~1000	-58.55	PASS
Band13	5MHz	16QAM	23205	25RB#0	1000~3000	-46.19	PASS
Band13	5MHz	16QAM	23205	25RB#0	3000~10000	-43.63	PASS
Band13	5MHz	16QAM	23230	1RB#0	0.009~0.15	-50.31	PASS
Band13	5MHz	16QAM	23230	1RB#0	0.15~30	-52.00	PASS
Band13	5MHz	16QAM	23230	1RB#0	30~1000	-60.43	PASS
Band13	5MHz	16QAM	23230	1RB#0	1000~3000	-45.29	PASS
Band13	5MHz	16QAM	23230	1RB#0	3000~10000	-43.28	PASS
Band13	5MHz	16QAM	23230	1RB#24	0.009~0.15	-44.73	PASS
Band13	5MHz	16QAM	23230	1RB#24	0.15~30	-52.98	PASS
Band13	5MHz	16QAM	23230	1RB#24	30~1000	-59.87	PASS
Band13	5MHz	16QAM	23230	1RB#24	1000~3000	-44.74	PASS
Band13	5MHz	16QAM	23230	1RB#24	3000~10000	-43.48	PASS
Band13	5MHz	16QAM	23230	25RB#0	0.009~0.15	-48.45	PASS
Band13	5MHz	16QAM	23230	25RB#0	0.15~30	-53.43	PASS
Band13	5MHz	16QAM	23230	25RB#0	30~1000	-59.67	PASS
Band13	5MHz	16QAM	23230	25RB#0	1000~3000	-46.87	PASS
Band13	5MHz	16QAM	23230	25RB#0	3000~10000	-43.22	PASS
Band13	5MHz	16QAM	23255	1RB#0	0.009~0.15	-45.84	PASS
Band13	5MHz	16QAM	23255	1RB#0	0.15~30	-54.73	PASS
Band13	5MHz	16QAM	23255	1RB#0	30~1000	-59.54	PASS
Band13	5MHz	16QAM	23255	1RB#0	1000~3000	-44.20	PASS

Band13	5MHz	16QAM	23255	1RB#0	3000~10000	-43.67	PASS
Band13	5MHz	16QAM	23255	1RB#24	0.009~0.15	-48.90	PASS
Band13	5MHz	16QAM	23255	1RB#24	0.15~30	-53.90	PASS
Band13	5MHz	16QAM	23255	1RB#24	30~1000	-59.44	PASS
Band13	5MHz	16QAM	23255	1RB#24	1000~3000	-45.37	PASS
Band13	5MHz	16QAM	23255	1RB#24	3000~10000	-43.13	PASS
Band13	5MHz	16QAM	23255	25RB#0	0.009~0.15	-48.48	PASS
Band13	5MHz	16QAM	23255	25RB#0	0.15~30	-55.87	PASS
Band13	5MHz	16QAM	23255	25RB#0	30~1000	-59.74	PASS
Band13	5MHz	16QAM	23255	25RB#0	1000~3000	-46.28	PASS
Band13	5MHz	16QAM	23255	25RB#0	3000~10000	-43.27	PASS
Band13	10MHz	QPSK	23230	1RB#0	0.009~0.15	-47.97	PASS
Band13	10MHz	QPSK	23230	1RB#0	0.15~30	-53.54	PASS
Band13	10MHz	QPSK	23230	1RB#0	30~1000	-61.64	PASS
Band13	10MHz	QPSK	23230	1RB#0	1000~3000	-44.71	PASS
Band13	10MHz	QPSK	23230	1RB#0	3000~10000	-43.51	PASS
Band13	10MHz	QPSK	23230	1RB#49	0.009~0.15	-52.05	PASS
Band13	10MHz	QPSK	23230	1RB#49	0.15~30	-52.53	PASS
Band13	10MHz	QPSK	23230	1RB#49	30~1000	-61.77	PASS
Band13	10MHz	QPSK	23230	1RB#49	1000~3000	-46.48	PASS
Band13	10MHz	QPSK	23230	1RB#49	3000~10000	-43.47	PASS
Band13	10MHz	QPSK	23230	50RB#0	0.009~0.15	-46.33	PASS
Band13	10MHz	QPSK	23230	50RB#0	0.15~30	-54.55	PASS
Band13	10MHz	QPSK	23230	50RB#0	30~1000	-61.87	PASS
Band13	10MHz	QPSK	23230	50RB#0	1000~3000	-46.55	PASS
Band13	10MHz	QPSK	23230	50RB#0	3000~10000	-43.81	PASS
Band13	10MHz	16QAM	23230	1RB#0	0.009~0.15	-48.17	PASS
Band13	10MHz	16QAM	23230	1RB#0	0.15~30	-55.03	PASS
Band13	10MHz	16QAM	23230	1RB#0	30~1000	-61.73	PASS
Band13	10MHz	16QAM	23230	1RB#0	1000~3000	-44.33	PASS
Band13	10MHz	16QAM	23230	1RB#0	3000~10000	-43.55	PASS
Band13	10MHz	16QAM	23230	1RB#49	0.009~0.15	-48.14	PASS
Band13	10MHz	16QAM	23230	1RB#49	0.15~30	-52.66	PASS
Band13	10MHz	16QAM	23230	1RB#49	30~1000	-62.05	PASS
Band13	10MHz	16QAM	23230	1RB#49	1000~3000	-46.75	PASS
Band13	10MHz	16QAM	23230	1RB#49	3000~10000	-43.44	PASS

Test Graphs

