

Appendix-A LTE Band 41

Effective (Isotropic) Radiated Power Output Data

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result (dBm)	EIRP (dBm)	Limit (dBm)	Verdict
Band41	5MHz	QPSK	39675	1RB#0	23.28	24.68	33.00	PASS
Band41	5MHz	QPSK	39675	1RB#12	23.35	24.75	33.00	PASS
Band41	5MHz	QPSK	39675	1RB#24	23.38	24.78	33.00	PASS
Band41	5MHz	QPSK	39675	25RB#0	22.58	23.98	33.00	PASS
Band41	5MHz	16QAM	39675	1RB#0	22.18	23.58	33.00	PASS
Band41	5MHz	16QAM	39675	1RB#12	22.18	23.58	33.00	PASS
Band41	5MHz	16QAM	39675	1RB#24	22.19	23.59	33.00	PASS
Band41	5MHz	16QAM	39675	25RB#0	21.71	23.11	33.00	PASS
Band41	5MHz	QPSK	40620	1RB#0	23.44	24.84	33.00	PASS
Band41	5MHz	QPSK	40620	1RB#12	23.49	24.89	33.00	PASS
Band41	5MHz	QPSK	40620	1RB#24	23.5	24.9	33.00	PASS
Band41	5MHz	QPSK	40620	25RB#0	22.76	24.16	33.00	PASS
Band41	5MHz	16QAM	40620	1RB#0	22.28	23.68	33.00	PASS
Band41	5MHz	16QAM	40620	1RB#12	22.01	23.41	33.00	PASS
Band41	5MHz	16QAM	40620	1RB#24	22.22	23.62	33.00	PASS
Band41	5MHz	16QAM	40620	25RB#0	21.64	23.04	33.00	PASS
Band41	5MHz	QPSK	41565	1RB#0	23.52	24.92	33.00	PASS
Band41	5MHz	QPSK	41565	1RB#12	23.46	24.86	33.00	PASS
Band41	5MHz	QPSK	41565	1RB#24	23.44	24.84	33.00	PASS
Band41	5MHz	QPSK	41565	25RB#0	22.73	24.13	33.00	PASS
Band41	5MHz	16QAM	41565	1RB#0	22.24	23.64	33.00	PASS
Band41	5MHz	16QAM	41565	1RB#12	22.26	23.66	33.00	PASS
Band41	5MHz	16QAM	41565	1RB#24	22.27	23.67	33.00	PASS
Band41	5MHz	16QAM	41565	25RB#0	21.53	22.93	33.00	PASS
Band41	10MHz	QPSK	39700	1RB#0	23.35	24.75	33.00	PASS
Band41	10MHz	QPSK	39700	1RB#24	23.53	24.93	33.00	PASS
Band41	10MHz	QPSK	39700	1RB#49	23.59	24.99	33.00	PASS
Band41	10MHz	QPSK	39700	50RB#0	22.66	24.06	33.00	PASS
Band41	10MHz	16QAM	39700	1RB#0	22.27	23.67	33.00	PASS
Band41	10MHz	16QAM	39700	1RB#24	22.23	23.63	33.00	PASS
Band41	10MHz	16QAM	39700	1RB#49	22.23	23.63	33.00	PASS
Band41	10MHz	16QAM	39700	50RB#0	21.43	22.83	33.00	PASS
Band41	10MHz	QPSK	40620	1RB#0	23.55	24.95	33.00	PASS
Band41	10MHz	QPSK	40620	1RB#24	23.76	25.16	33.00	PASS
Band41	10MHz	QPSK	40620	1RB#49	23.53	24.93	33.00	PASS
Band41	10MHz	QPSK	40620	50RB#0	22.75	24.15	33.00	PASS
Band41	10MHz	16QAM	40620	1RB#0	22.28	23.68	33.00	PASS

Band41	10MHz	16QAM	40620	1RB#24	22.25	23.65	33.00	PASS
Band41	10MHz	16QAM	40620	1RB#49	22.28	23.68	33.00	PASS
Band41	10MHz	16QAM	40620	50RB#0	21.59	22.99	33.00	PASS
Band41	10MHz	QPSK	41540	1RB#0	23.54	24.94	33.00	PASS
Band41	10MHz	QPSK	41540	1RB#24	23.63	25.03	33.00	PASS
Band41	10MHz	QPSK	41540	1RB#49	23.49	24.89	33.00	PASS
Band41	10MHz	QPSK	41540	50RB#0	22.83	24.23	33.00	PASS
Band41	10MHz	16QAM	41540	1RB#0	22.08	23.48	33.00	PASS
Band41	10MHz	16QAM	41540	1RB#24	22.12	23.52	33.00	PASS
Band41	10MHz	16QAM	41540	1RB#49	22.05	23.45	33.00	PASS
Band41	10MHz	16QAM	41540	50RB#0	21.74	23.14	33.00	PASS
Band41	15MHz	QPSK	39725	1RB#0	23.21	24.61	33.00	PASS
Band41	15MHz	QPSK	39725	1RB#38	23.42	24.82	33.00	PASS
Band41	15MHz	QPSK	39725	1RB#74	23.55	24.95	33.00	PASS
Band41	15MHz	QPSK	39725	75RB#0	22.62	24.02	33.00	PASS
Band41	15MHz	16QAM	39725	1RB#0	22.15	23.55	33.00	PASS
Band41	15MHz	16QAM	39725	1RB#38	22.1	23.5	33.00	PASS
Band41	15MHz	16QAM	39725	1RB#74	22.26	23.66	33.00	PASS
Band41	15MHz	16QAM	39725	75RB#0	21.45	22.85	33.00	PASS
Band41	15MHz	QPSK	40620	1RB#0	23.59	24.99	33.00	PASS
Band41	15MHz	QPSK	40620	1RB#38	23.51	24.91	33.00	PASS
Band41	15MHz	QPSK	40620	1RB#74	23.52	24.92	33.00	PASS
Band41	15MHz	QPSK	40620	75RB#0	22.78	24.18	33.00	PASS
Band41	15MHz	16QAM	40620	1RB#0	22.23	23.63	33.00	PASS
Band41	15MHz	16QAM	40620	1RB#38	22.21	23.61	33.00	PASS
Band41	15MHz	16QAM	40620	1RB#74	22.23	23.63	33.00	PASS
Band41	15MHz	16QAM	40620	75RB#0	21.64	23.04	33.00	PASS
Band41	15MHz	QPSK	41515	1RB#0	23.57	24.97	33.00	PASS
Band41	15MHz	QPSK	41515	1RB#38	23.39	24.79	33.00	PASS
Band41	15MHz	QPSK	41515	1RB#74	23.48	24.88	33.00	PASS
Band41	15MHz	QPSK	41515	75RB#0	22.67	24.07	33.00	PASS
Band41	15MHz	16QAM	41515	1RB#0	22.15	23.55	33.00	PASS
Band41	15MHz	16QAM	41515	1RB#38	22.24	23.64	33.00	PASS
Band41	15MHz	16QAM	41515	1RB#74	22.22	23.62	33.00	PASS
Band41	15MHz	16QAM	41515	75RB#0	21.55	22.95	33.00	PASS
Band41	20MHz	QPSK	39750	1RB#0	23.18	24.58	33.00	PASS
Band41	20MHz	QPSK	39750	1RB#49	23.59	24.99	33.00	PASS
Band41	20MHz	QPSK	39750	1RB#99	23.51	24.91	33.00	PASS
Band41	20MHz	QPSK	39750	100RB#0	22.63	24.03	33.00	PASS
Band41	20MHz	16QAM	39750	1RB#0	22.12	23.52	33.00	PASS
Band41	20MHz	16QAM	39750	1RB#49	22.18	23.58	33.00	PASS
Band41	20MHz	16QAM	39750	1RB#99	22.17	23.57	33.00	PASS
Band41	20MHz	16QAM	39750	100RB#0	21.58	22.98	33.00	PASS
Band41	20MHz	QPSK	40620	1RB#0	23.5	24.9	33.00	PASS
Band41	20MHz	QPSK	40620	1RB#49	23.83	25.23	33.00	PASS

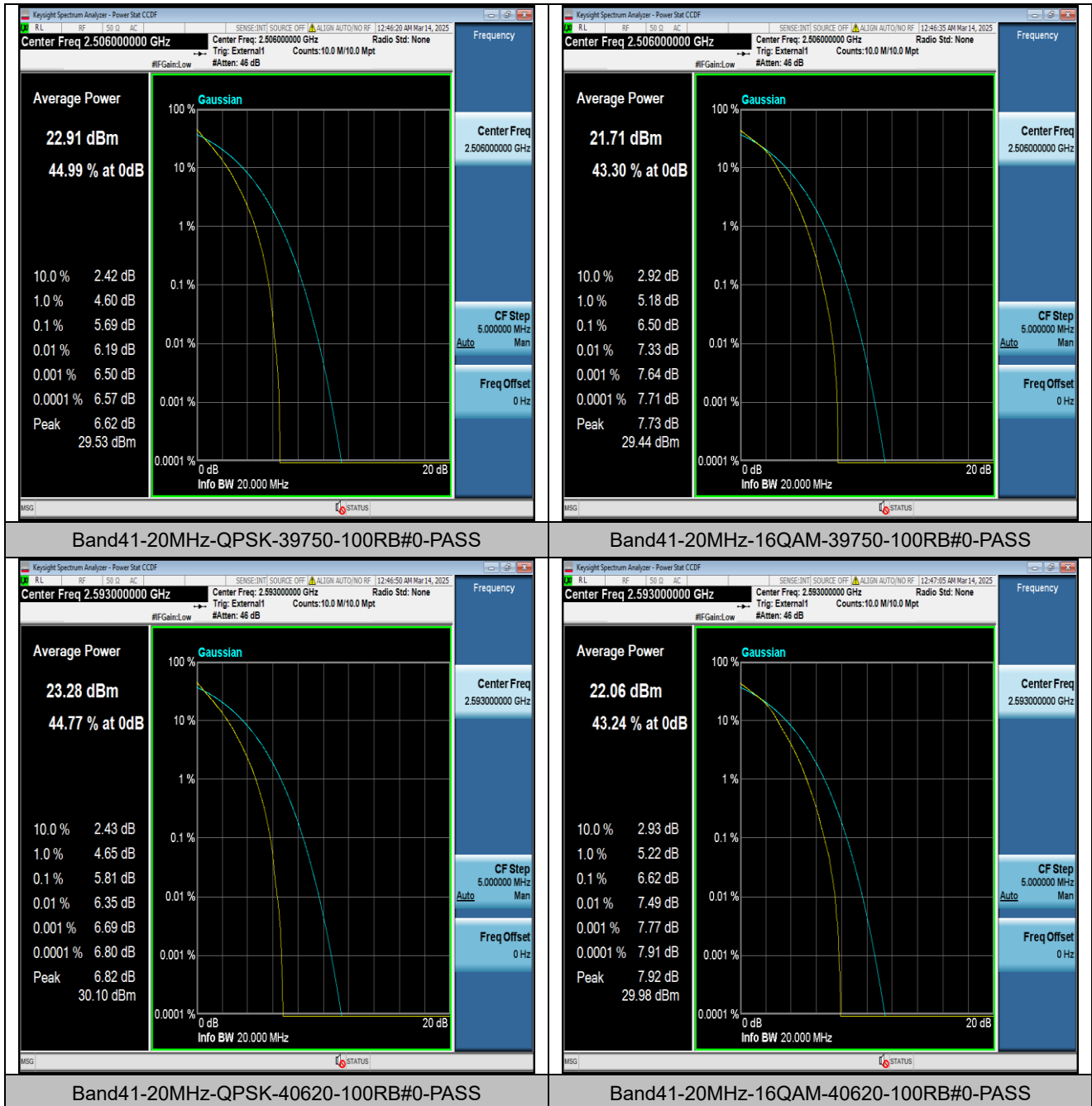
Band41	20MHz	QPSK	40620	1RB#99	23.52	24.92	33.00	PASS
Band41	20MHz	QPSK	40620	100RB#0	22.74	24.14	33.00	PASS
Band41	20MHz	16QAM	40620	1RB#0	22.21	23.61	33.00	PASS
Band41	20MHz	16QAM	40620	1RB#49	22.18	23.58	33.00	PASS
Band41	20MHz	16QAM	40620	1RB#99	22.29	23.69	33.00	PASS
Band41	20MHz	16QAM	40620	100RB#0	21.68	23.08	33.00	PASS
Band41	20MHz	QPSK	41490	1RB#0	23.65	25.05	33.00	PASS
Band41	20MHz	QPSK	41490	1RB#49	23.86	25.26	33.00	PASS
Band41	20MHz	QPSK	41490	1RB#99	23.43	24.83	33.00	PASS
Band41	20MHz	QPSK	41490	100RB#0	22.68	24.08	33.00	PASS
Band41	20MHz	16QAM	41490	1RB#0	22.06	23.46	33.00	PASS
Band41	20MHz	16QAM	41490	1RB#49	22.23	23.63	33.00	PASS
Band41	20MHz	16QAM	41490	1RB#99	22.19	23.59	33.00	PASS
Band41	20MHz	16QAM	41490	100RB#0	21.59	22.99	33.00	PASS

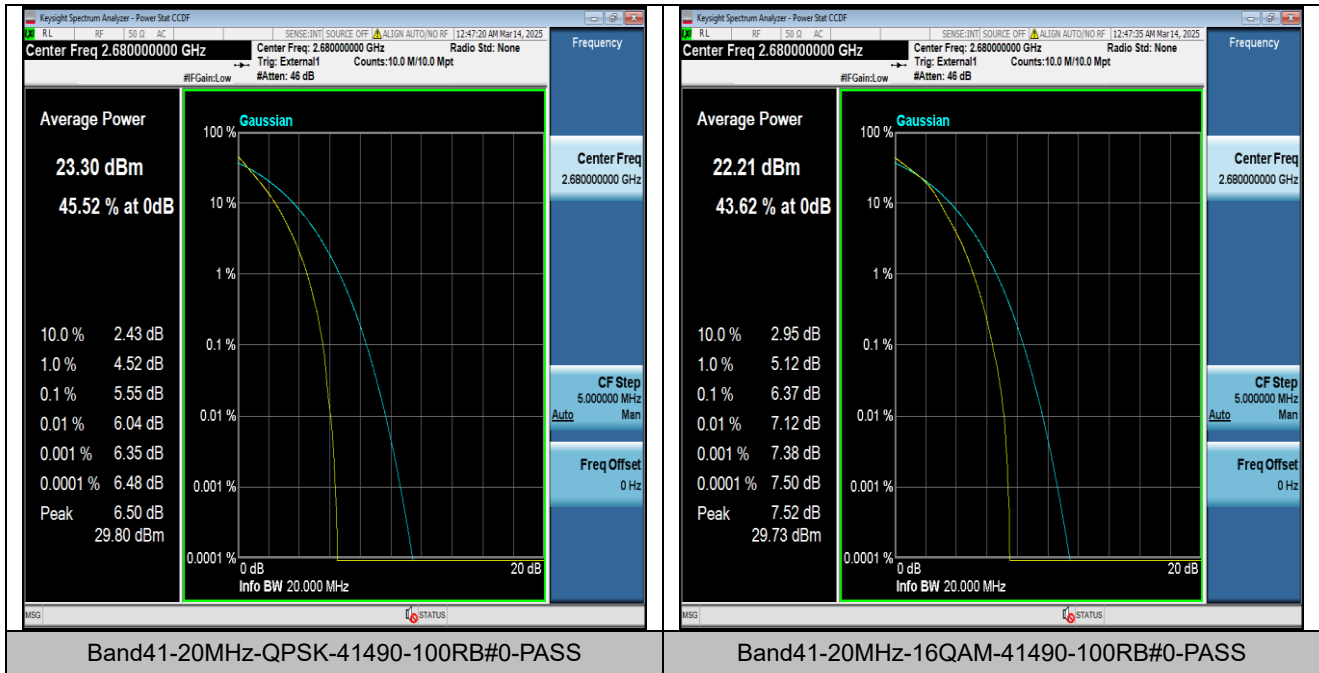
Peak-to-Average Ratio(CCDF)

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result (dB)	Limit (dB)	Verdict
Band41	20MHz	QPSK	39750	100RB#0	5.69	13	PASS
Band41	20MHz	16QAM	39750	100RB#0	6.50	13	PASS
Band41	20MHz	QPSK	40620	100RB#0	5.81	13	PASS
Band41	20MHz	16QAM	40620	100RB#0	6.62	13	PASS
Band41	20MHz	QPSK	41490	100RB#0	5.55	13	PASS
Band41	20MHz	16QAM	41490	100RB#0	6.37	13	PASS

Test Graphs



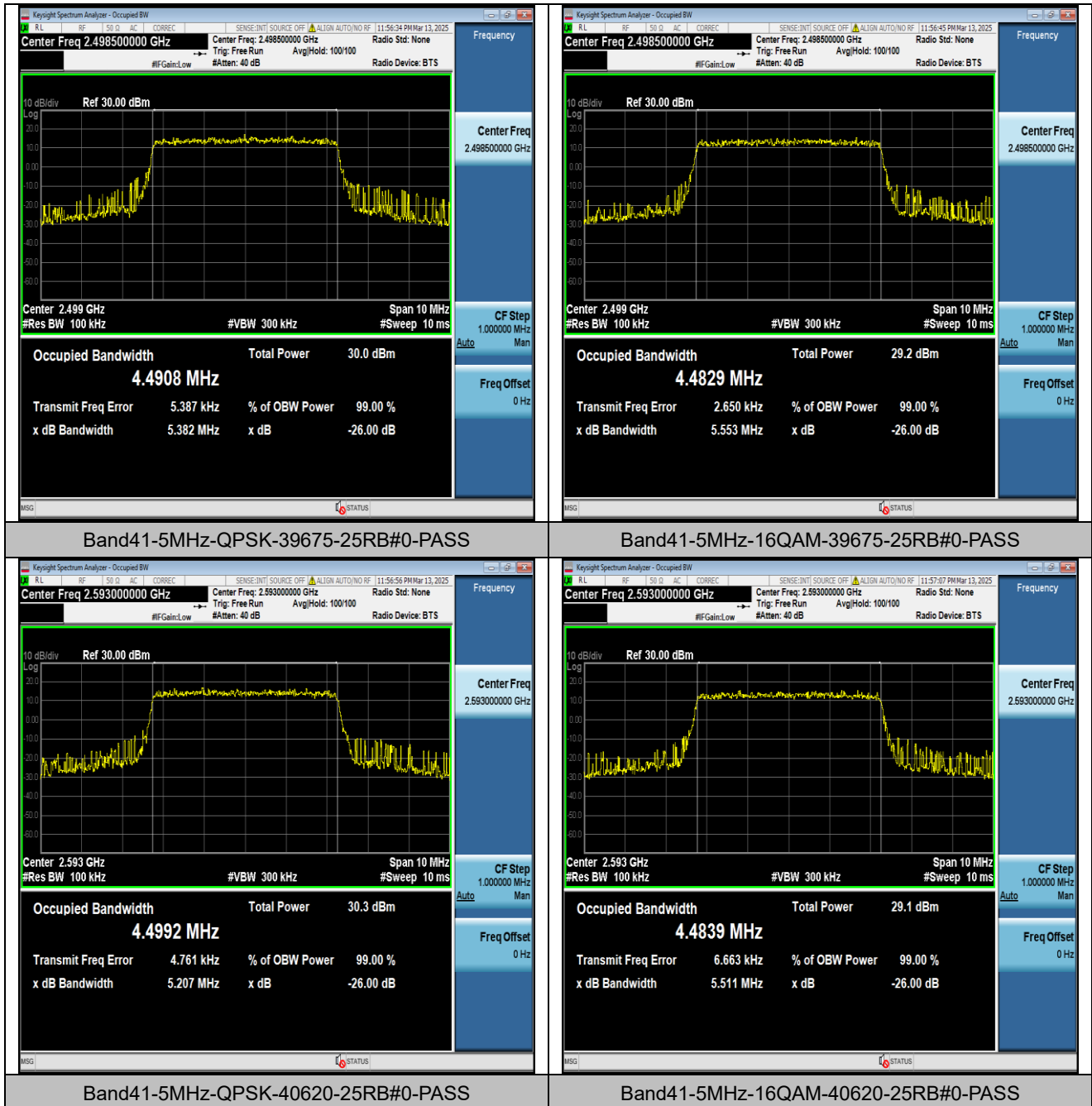


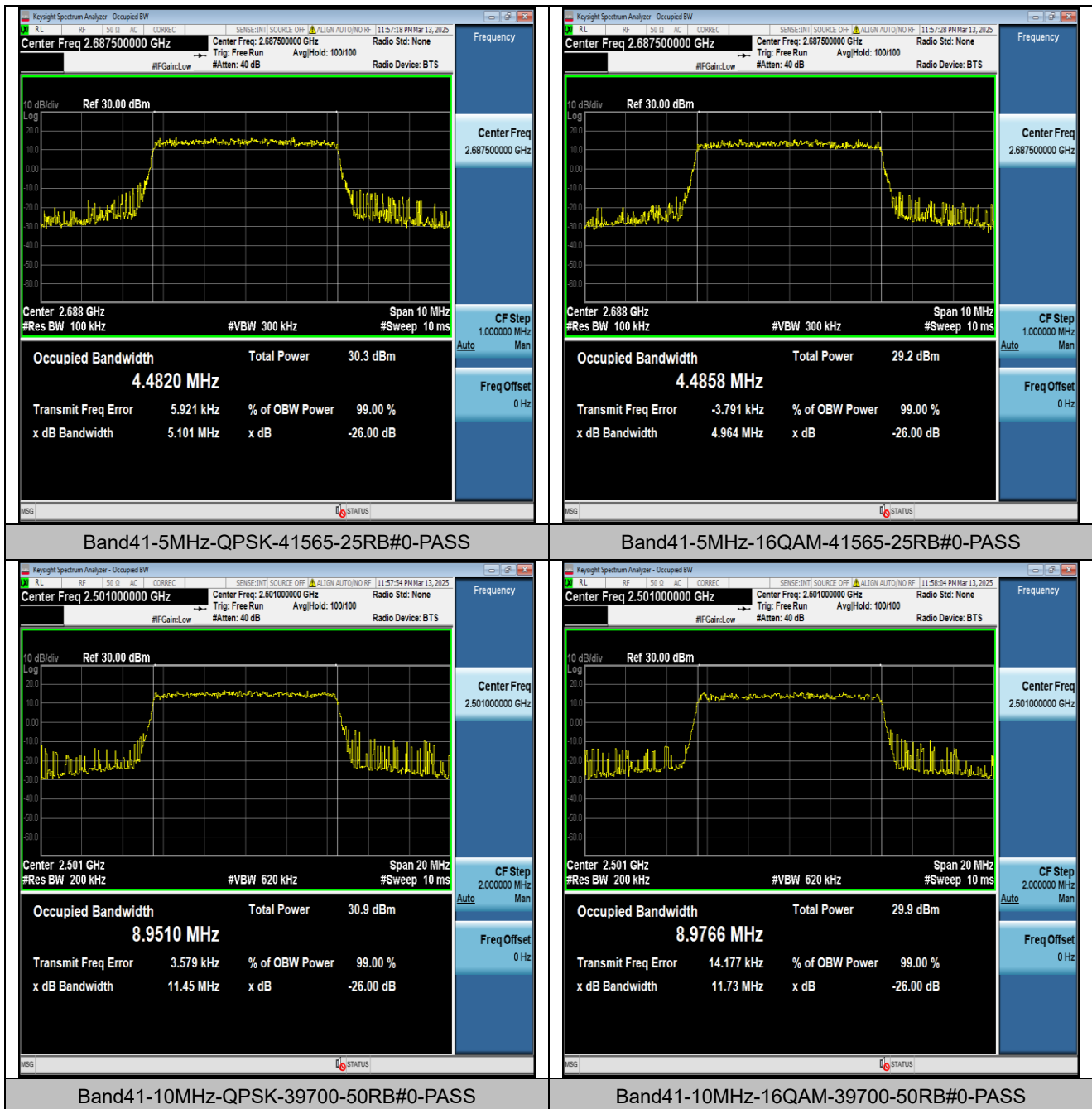
26dB Bandwidth and Occupied Bandwidth

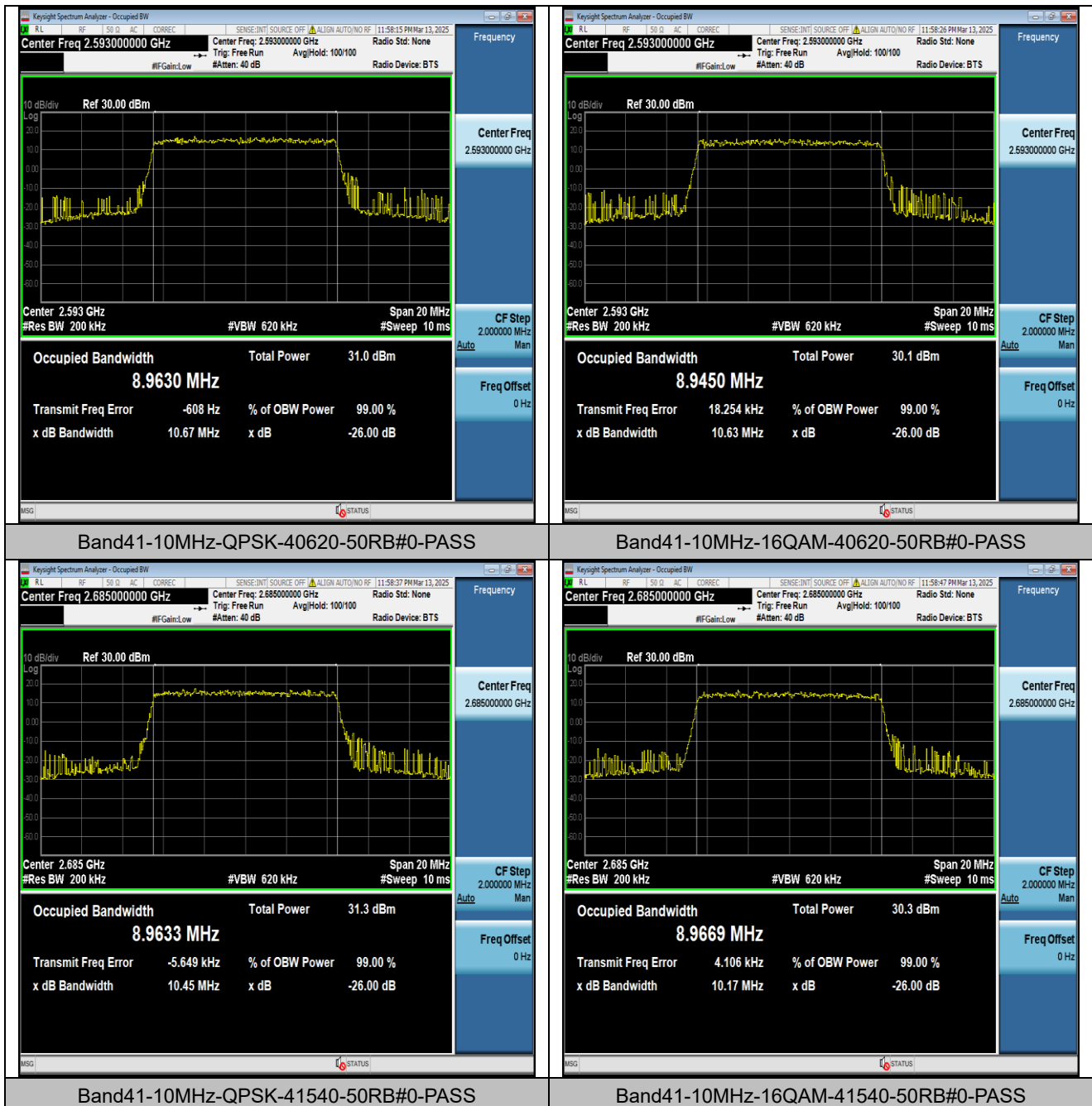
Test Result

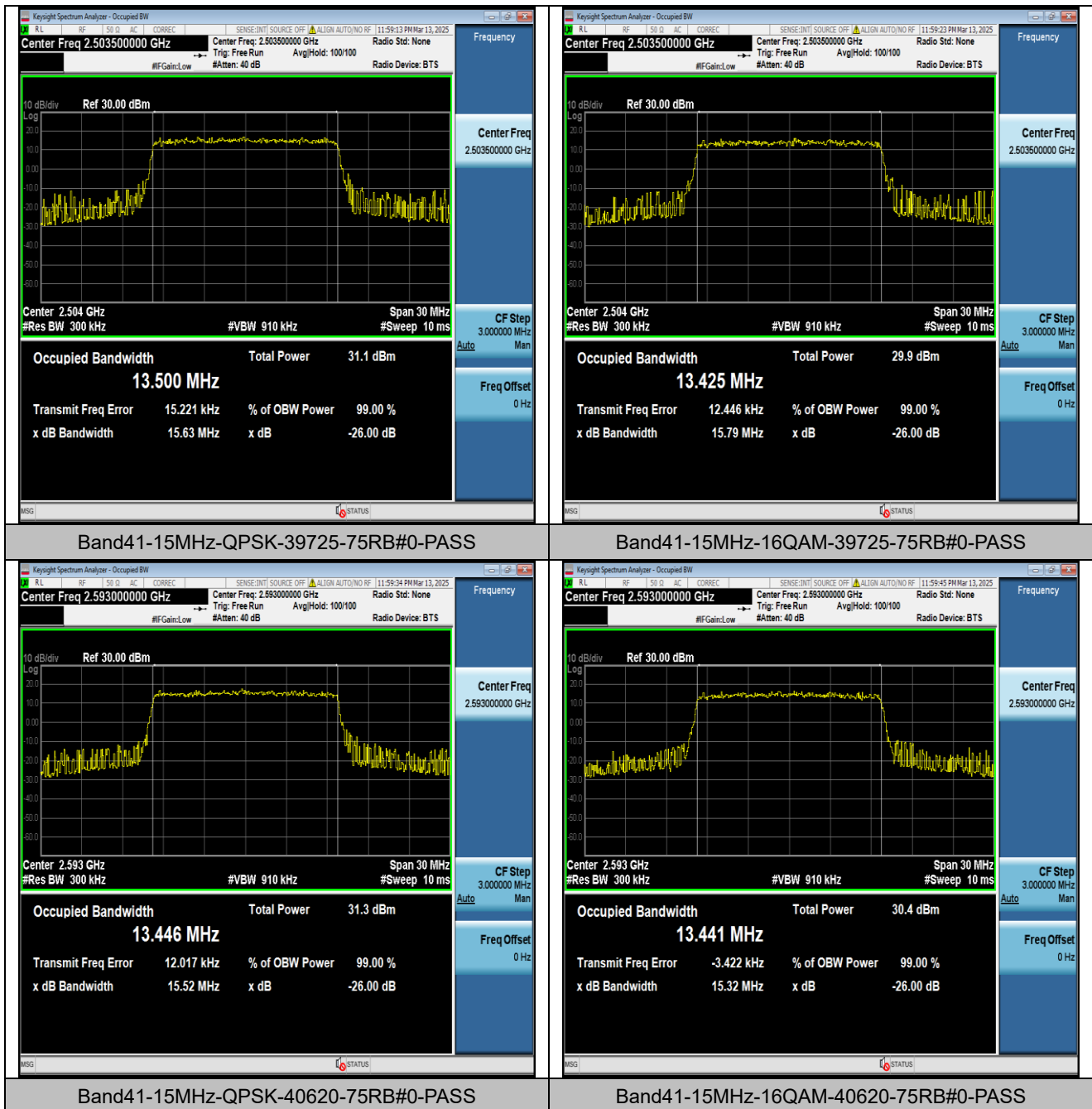
Band	Bandwidth	Modulation	Channel	RB Configuration	OBW (MHz)	26dB EBW (MHz)	Verdict
Band41	5MHz	QPSK	39675	25RB#0	4.4908	5.382	PASS
Band41	5MHz	16QAM	39675	25RB#0	4.4829	5.553	PASS
Band41	5MHz	QPSK	40620	25RB#0	4.4992	5.207	PASS
Band41	5MHz	16QAM	40620	25RB#0	4.4839	5.511	PASS
Band41	5MHz	QPSK	41565	25RB#0	4.4820	5.101	PASS
Band41	5MHz	16QAM	41565	25RB#0	4.4858	4.964	PASS
Band41	10MHz	QPSK	39700	50RB#0	8.9510	11.45	PASS
Band41	10MHz	16QAM	39700	50RB#0	8.9766	11.73	PASS
Band41	10MHz	QPSK	40620	50RB#0	8.9630	10.67	PASS
Band41	10MHz	16QAM	40620	50RB#0	8.9450	10.63	PASS
Band41	10MHz	QPSK	41540	50RB#0	8.9633	10.45	PASS
Band41	10MHz	16QAM	41540	50RB#0	8.9669	10.17	PASS
Band41	15MHz	QPSK	39725	75RB#0	13.500	15.63	PASS
Band41	15MHz	16QAM	39725	75RB#0	13.425	15.79	PASS
Band41	15MHz	QPSK	40620	75RB#0	13.446	15.52	PASS
Band41	15MHz	16QAM	40620	75RB#0	13.441	15.32	PASS
Band41	15MHz	QPSK	41515	75RB#0	13.460	14.85	PASS
Band41	15MHz	16QAM	41515	75RB#0	13.393	14.64	PASS
Band41	20MHz	QPSK	39750	100RB#0	17.961	19.77	PASS
Band41	20MHz	16QAM	39750	100RB#0	17.900	20.49	PASS
Band41	20MHz	QPSK	40620	100RB#0	17.960	19.24	PASS
Band41	20MHz	16QAM	40620	100RB#0	17.875	20.34	PASS
Band41	20MHz	QPSK	41490	100RB#0	17.893	19.45	PASS
Band41	20MHz	16QAM	41490	100RB#0	17.876	20.53	PASS

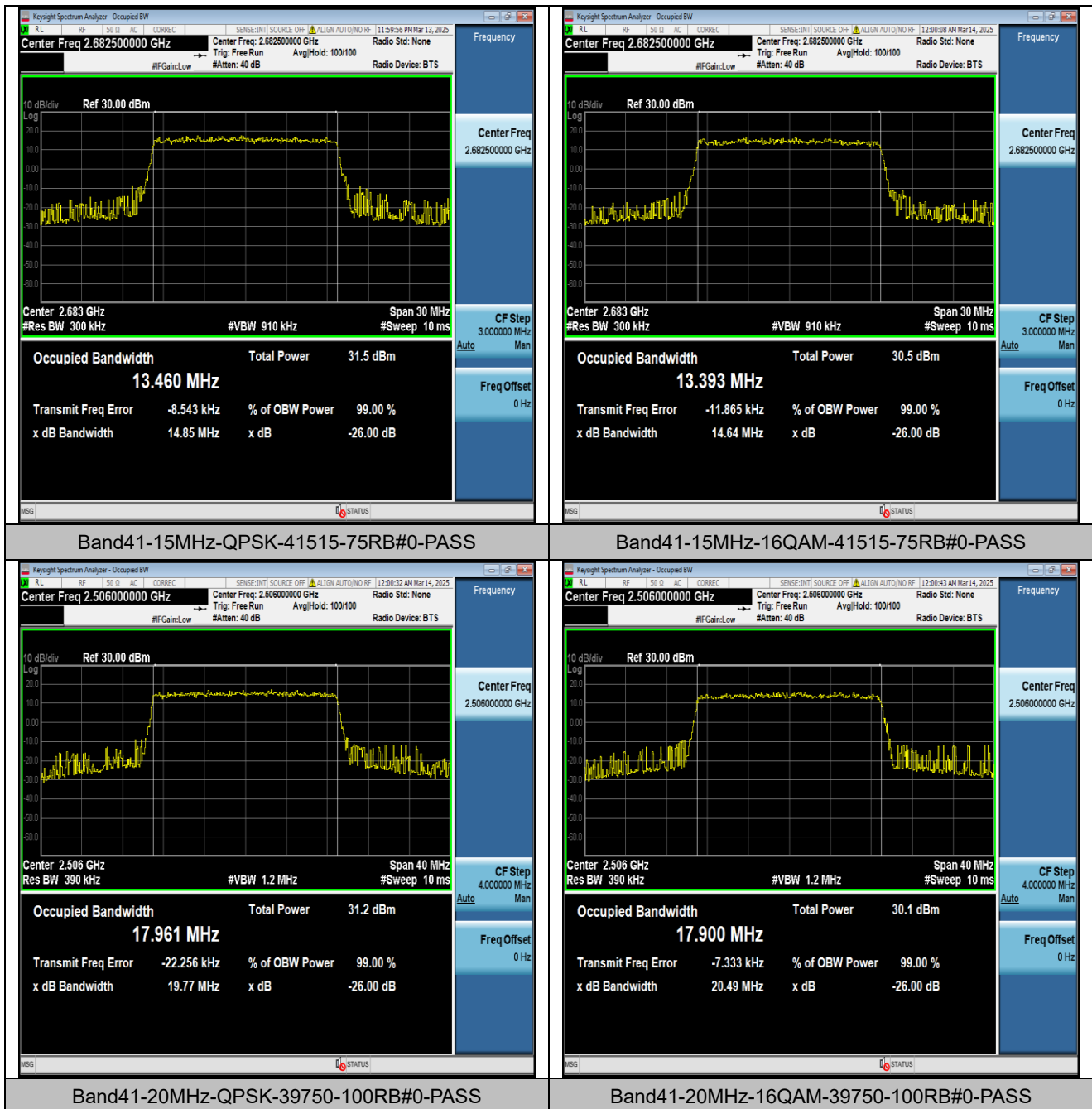
Test Graphs

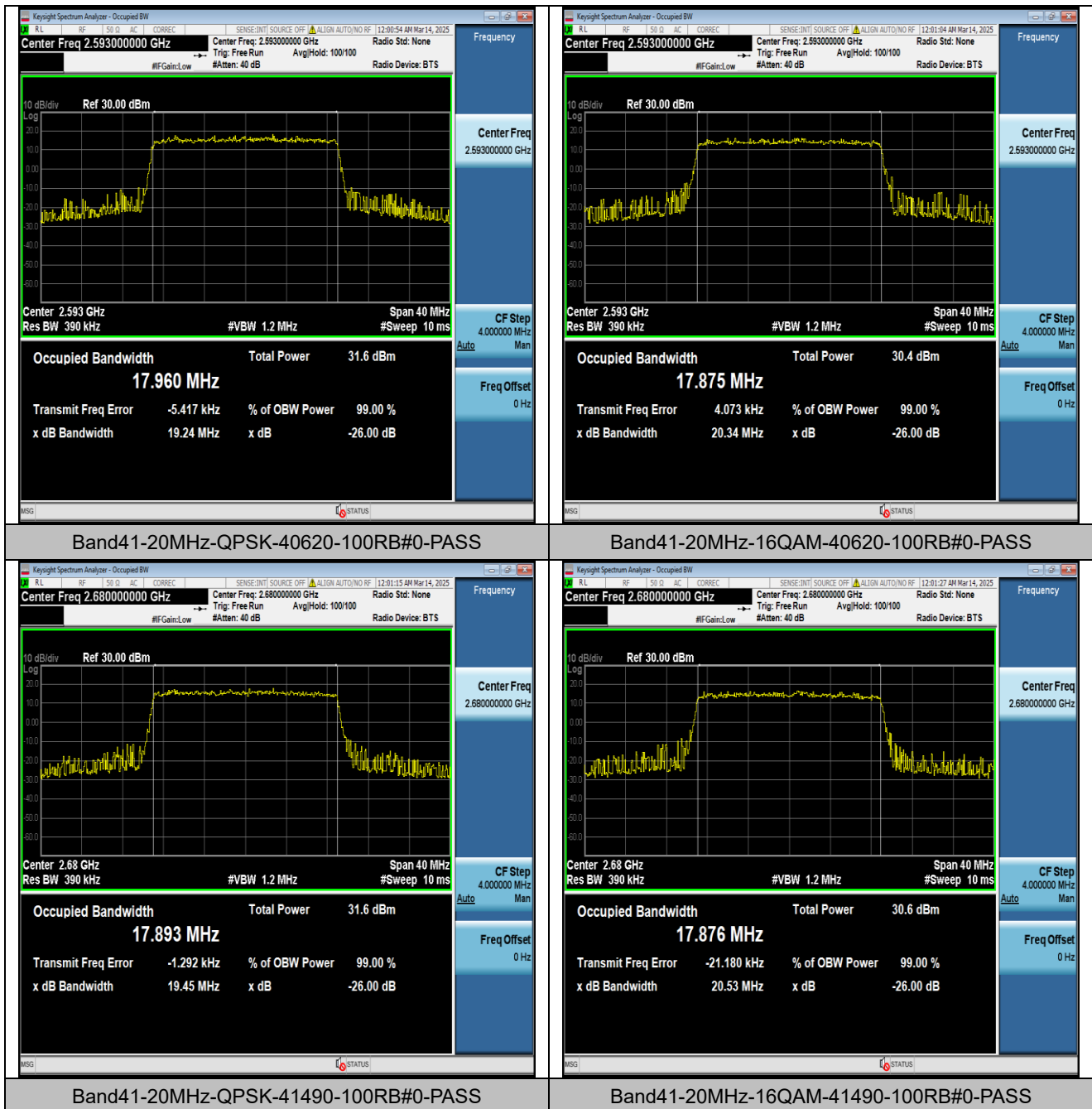






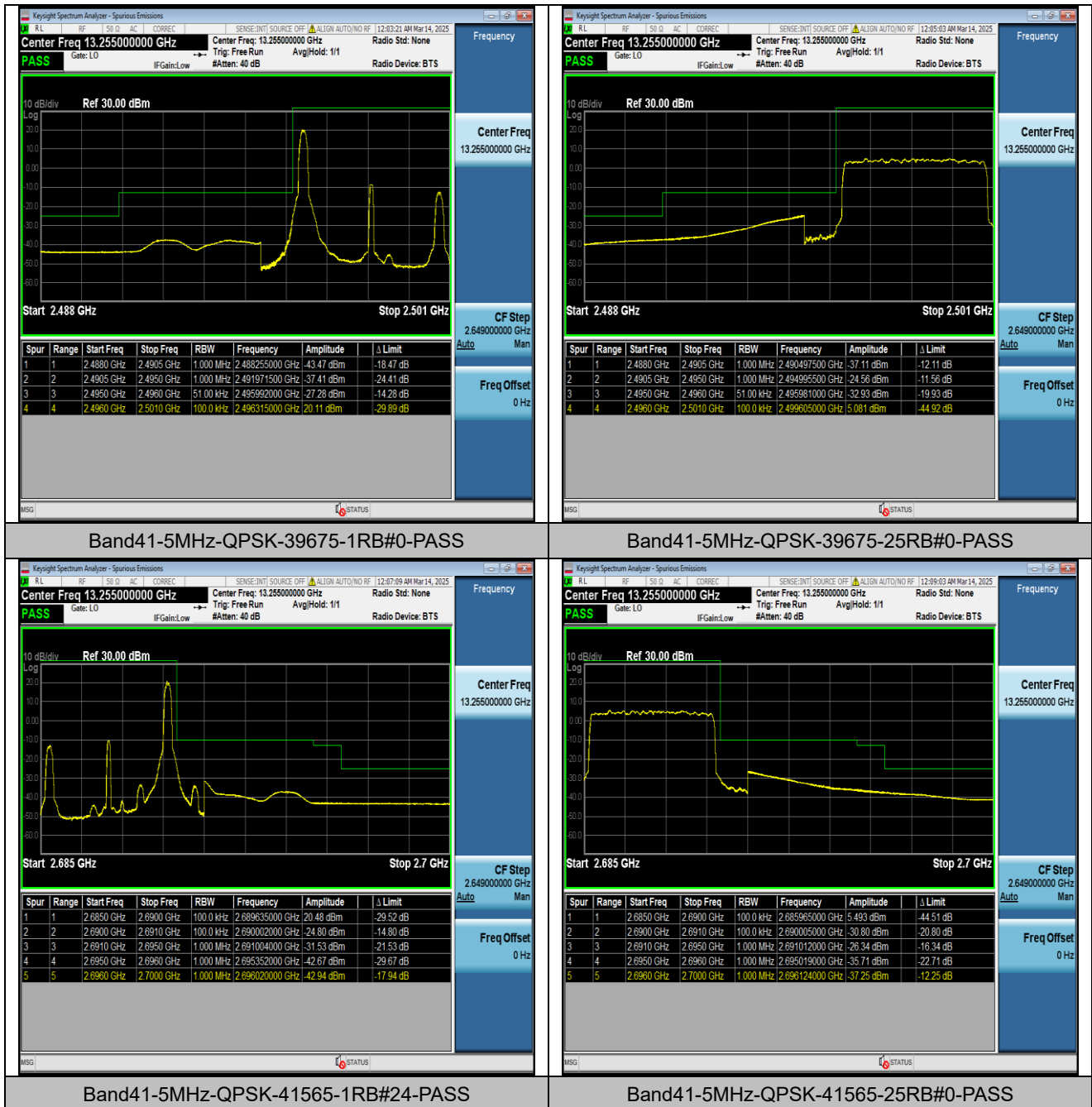


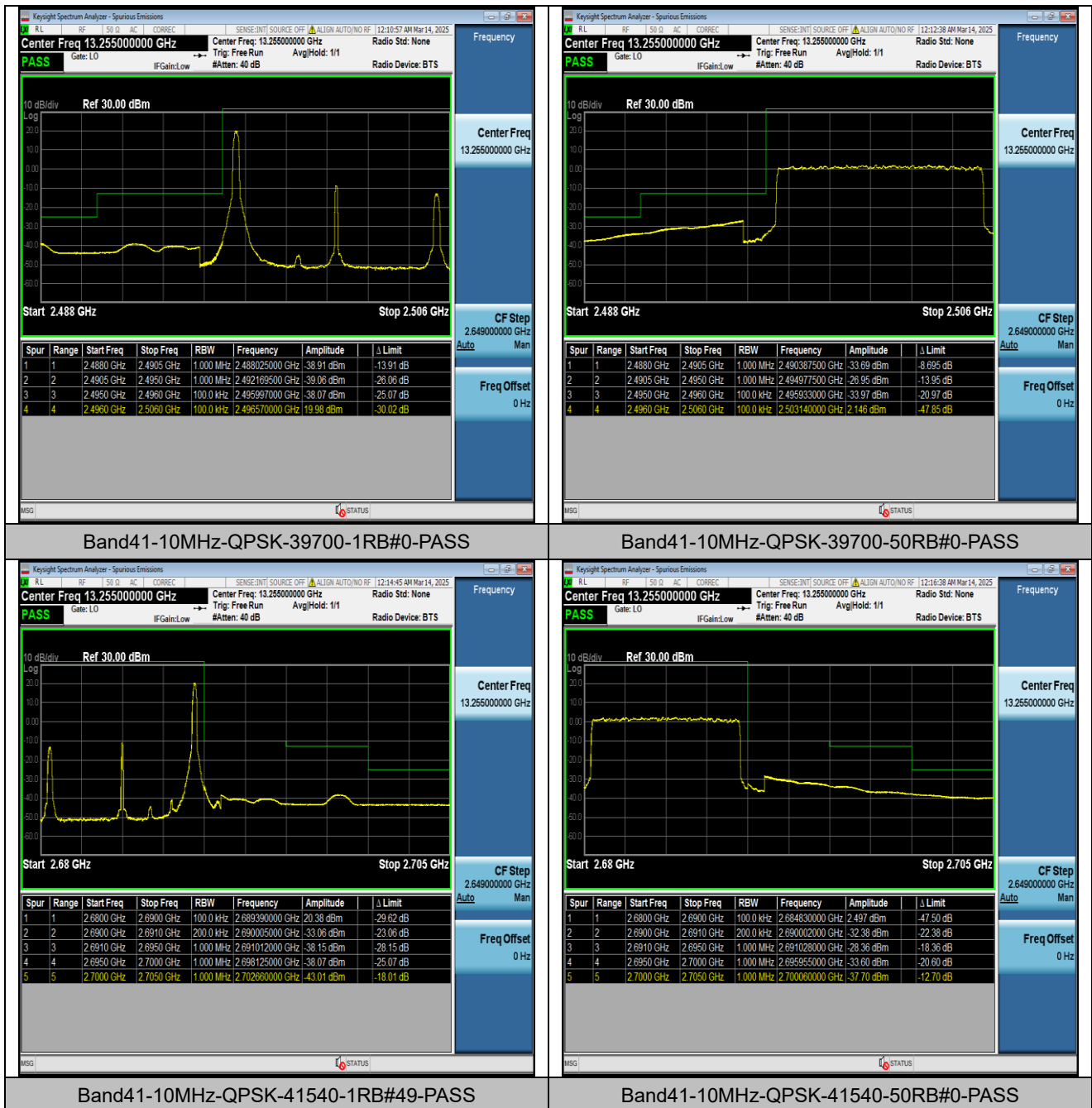


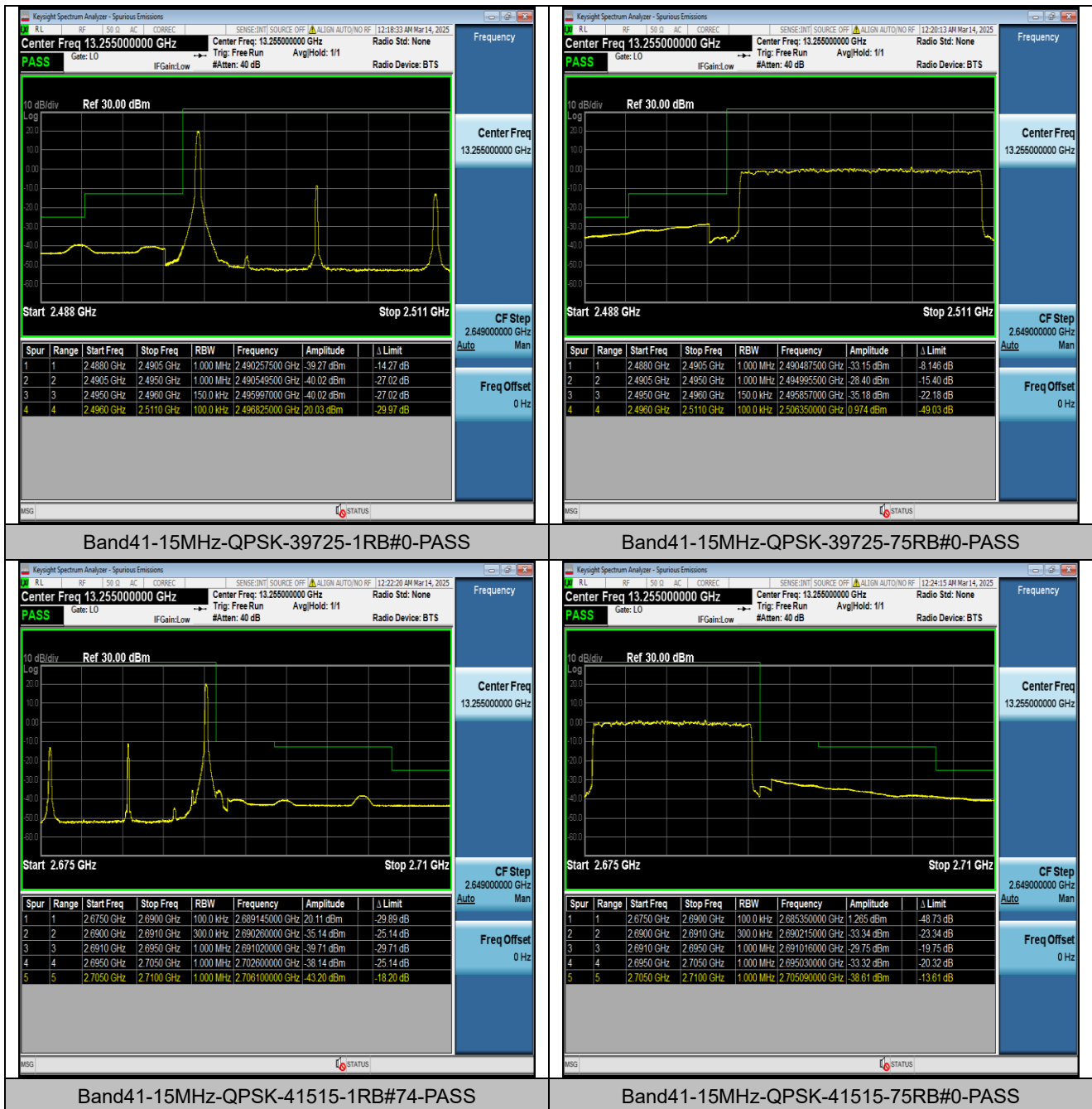


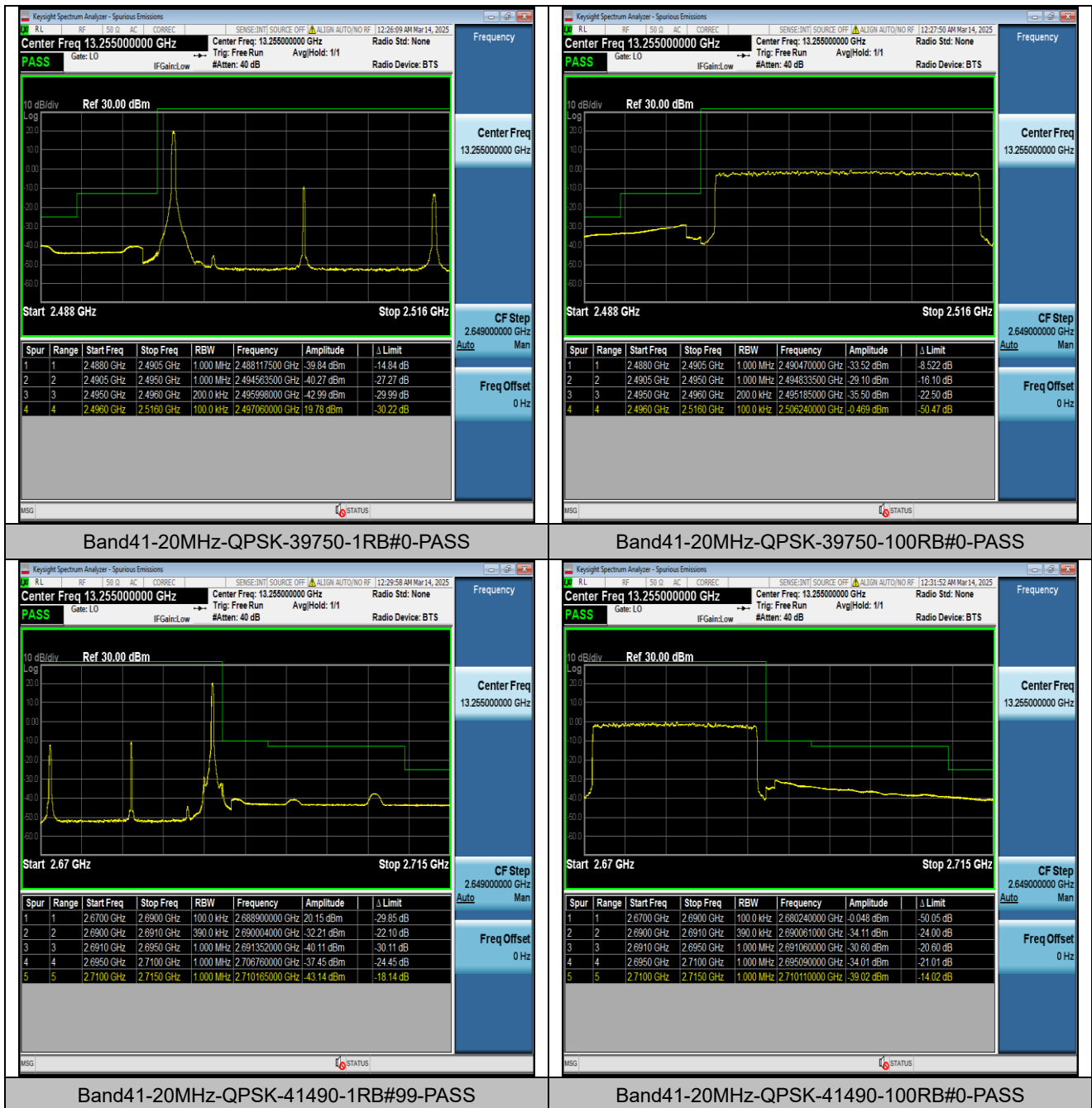
Band Edge

Test Graphs



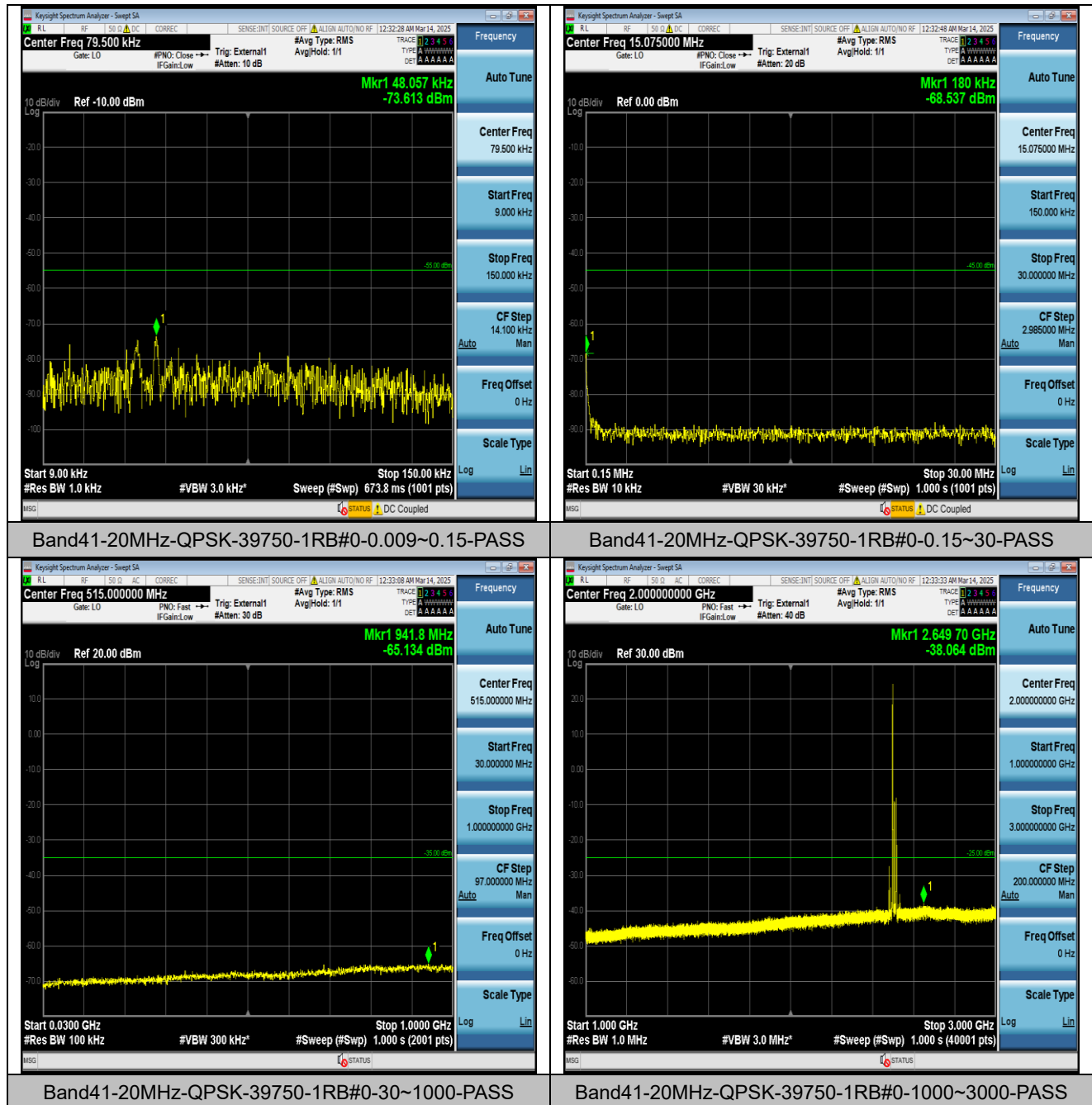


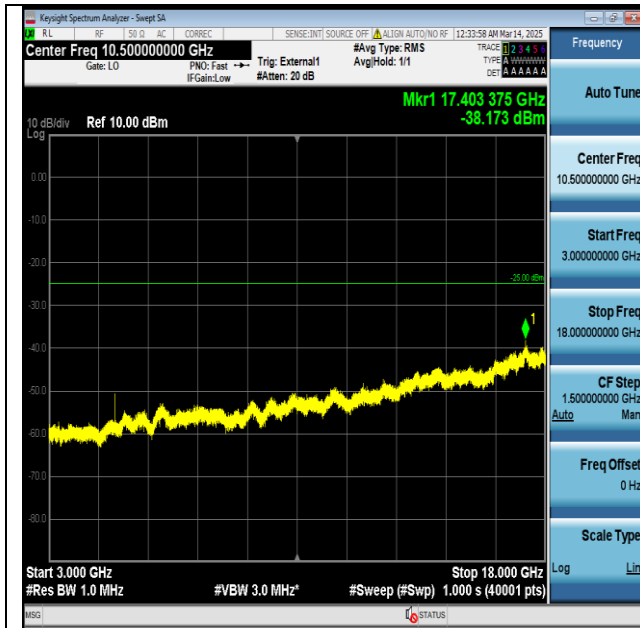




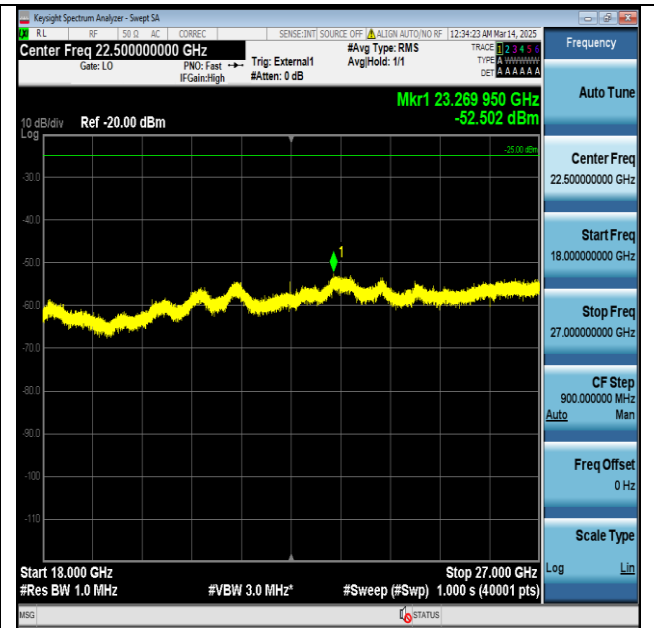
Conducted Spurious Emission

Test Graphs

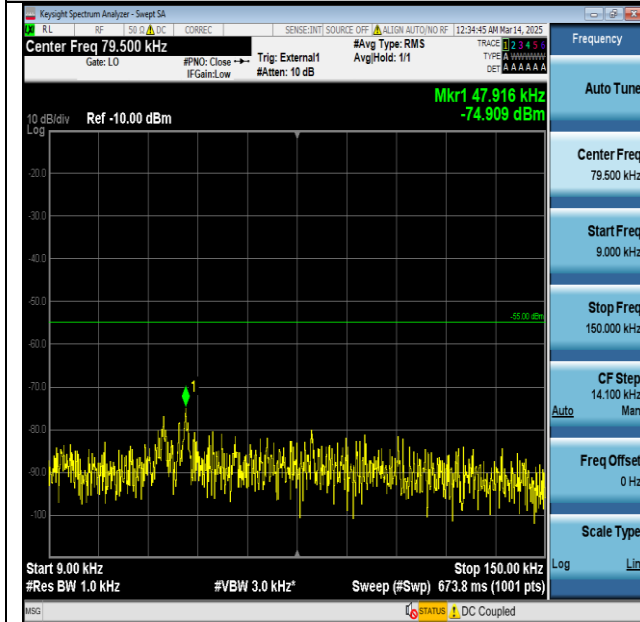




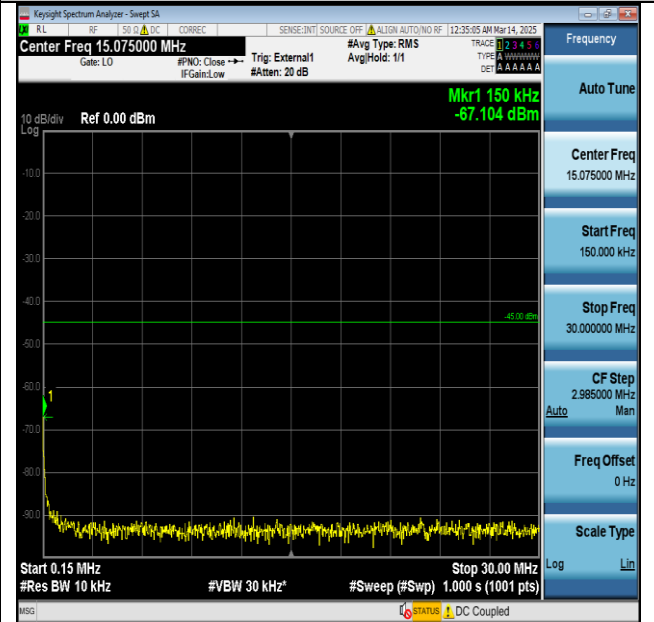
Band41-20MHz-QPSK-39750-1RB#0-3000~18000-PASS



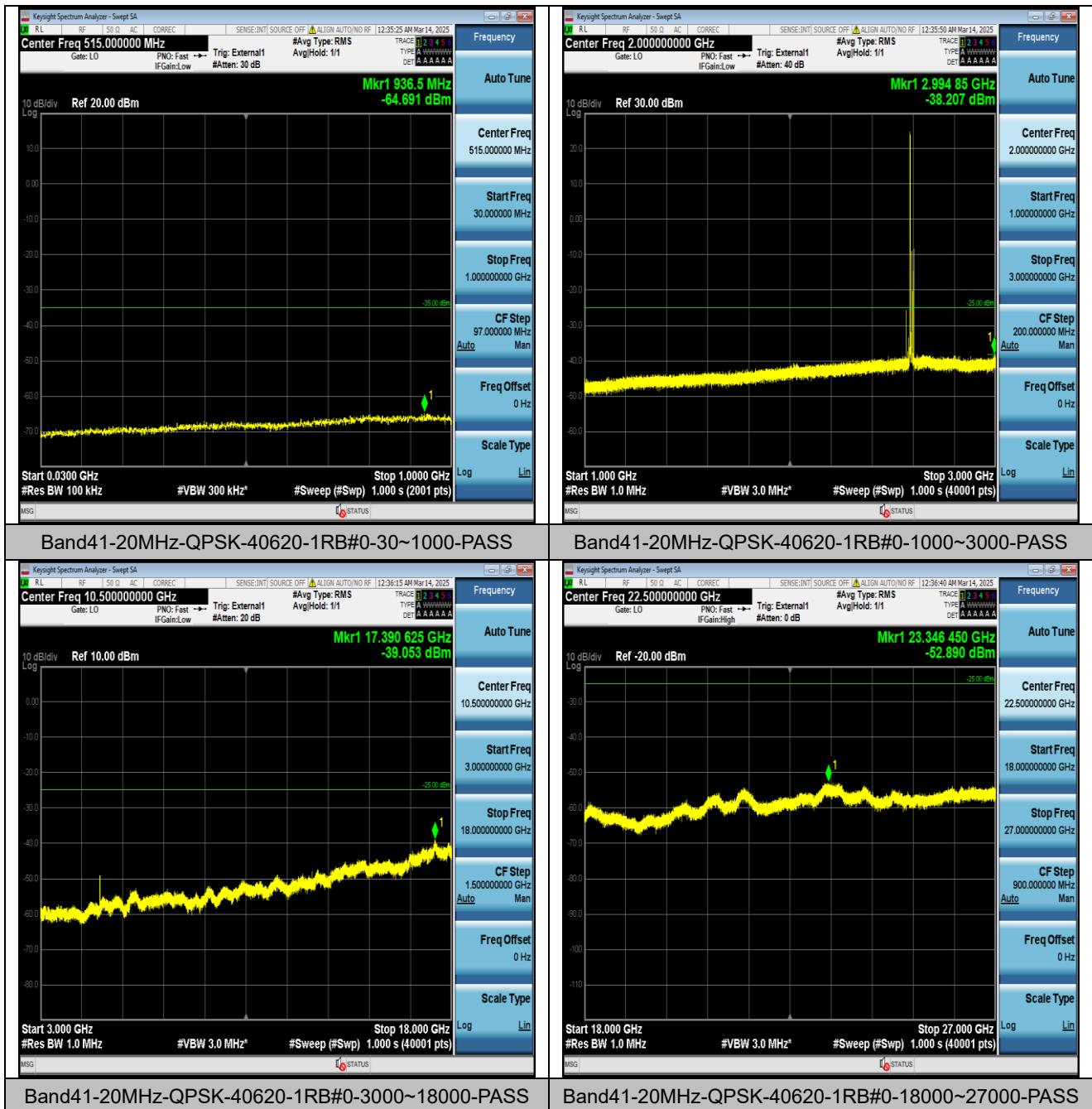
Band41-20MHz-QPSK-39750-1RB#0-18000~27000-PASS

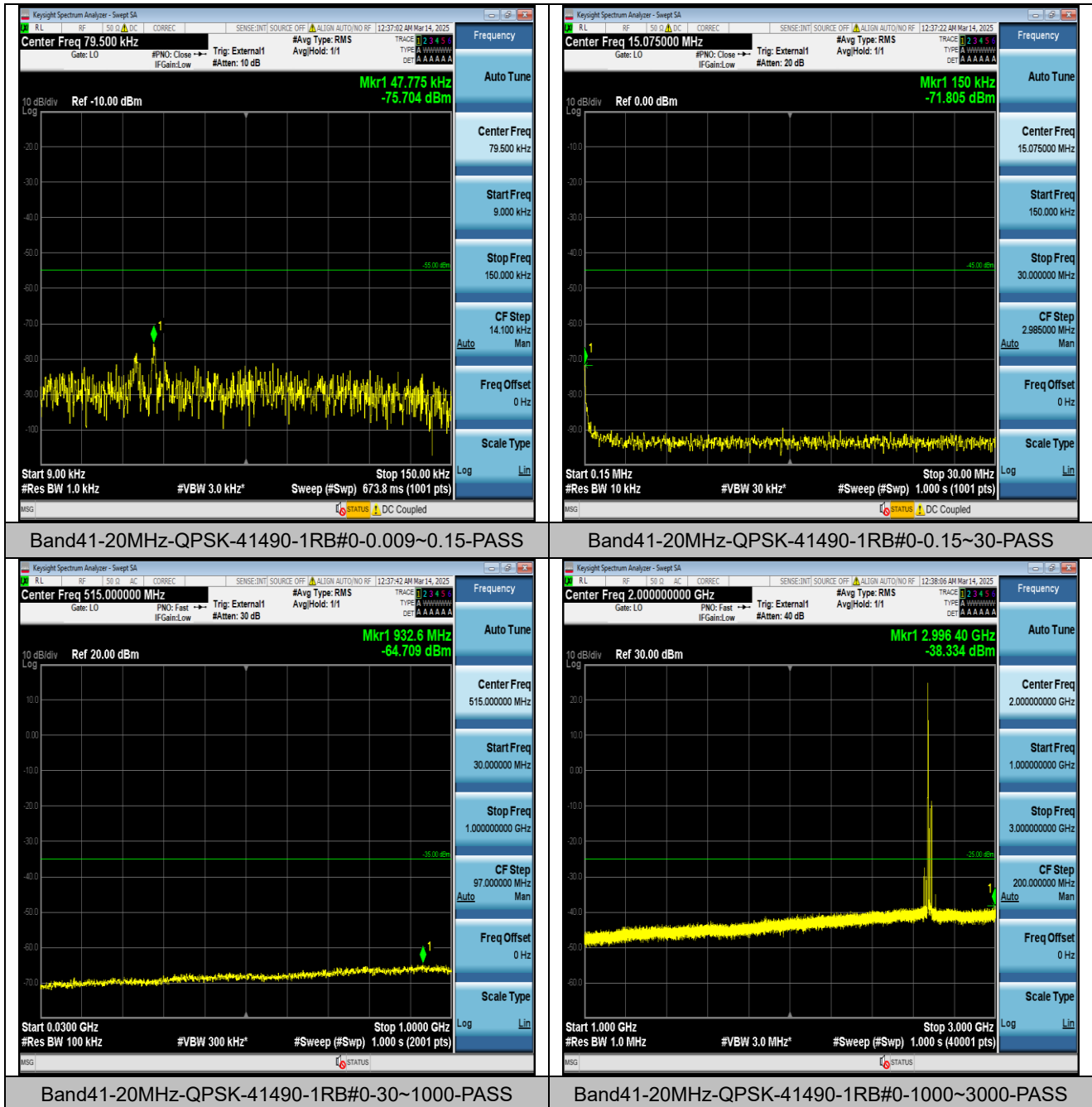


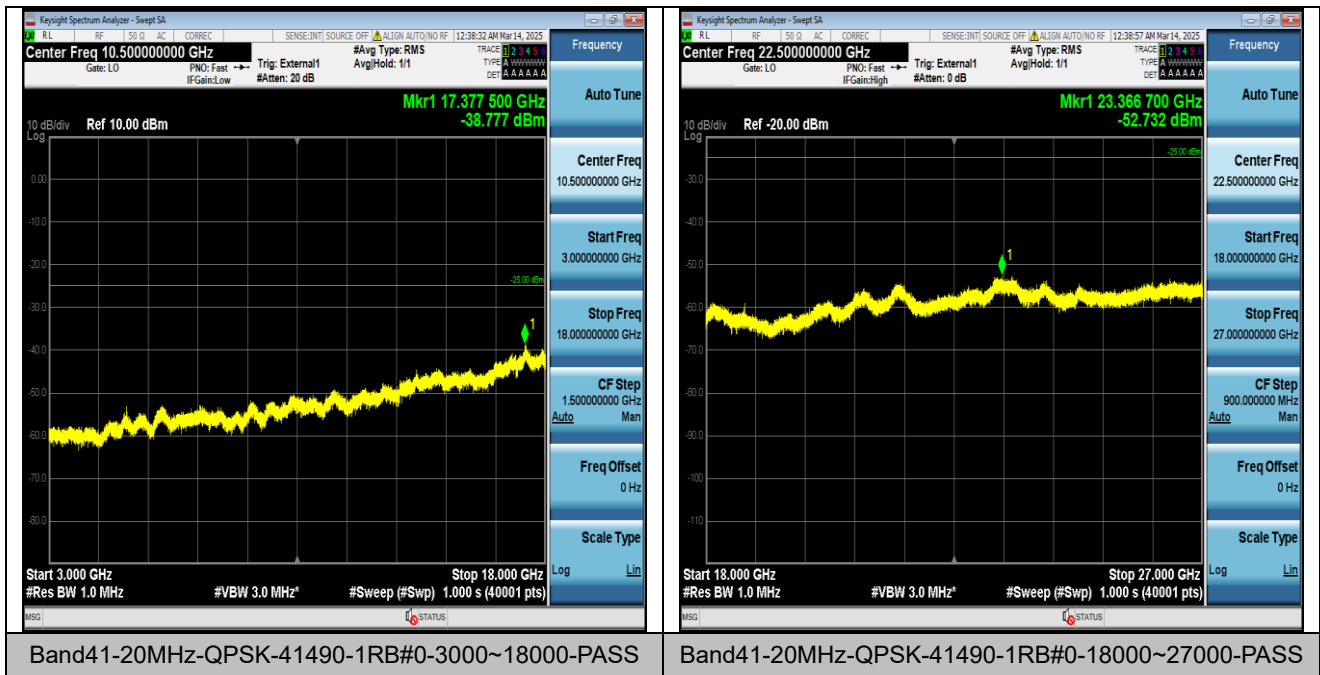
Band41-20MHz-QPSK-40620-1RB#0-0.009~0.15-PASS



Band41-20MHz-QPSK-40620-1RB#0-0.15~30-PASS







Frequency Stability

Test Result

Voltage									
Band	Bandwidth	Modulation	Channel	RB Configure	Voltage [Vdc]	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Verdict
Band41	20MHz	QPSK	40620	100RB#0	VN	NT	1.00	0.000386	PASS
Band41	20MHz	QPSK	40620	100RB#0	VL	NT	1.40	0.000540	PASS
Band41	20MHz	QPSK	40620	100RB#0	VH	NT	2.80	0.001080	PASS

Temperature									
Band	Bandwidth	Modulation	Channel	RB Configure	Voltage [Vdc]	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Verdict
Band41	20MHz	QPSK	40620	100RB#0	NV	-30	5.60	0.002160	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	-20	0.70	0.000270	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	-10	5.40	0.002083	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	0	2.00	0.000771	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	10	2.50	0.000964	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	20	1.70	0.000656	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	30	3.20	0.001234	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	40	3.40	0.001311	PASS
Band41	20MHz	QPSK	40620	100RB#0	NV	50	3.90	0.001504	PASS

~The End~