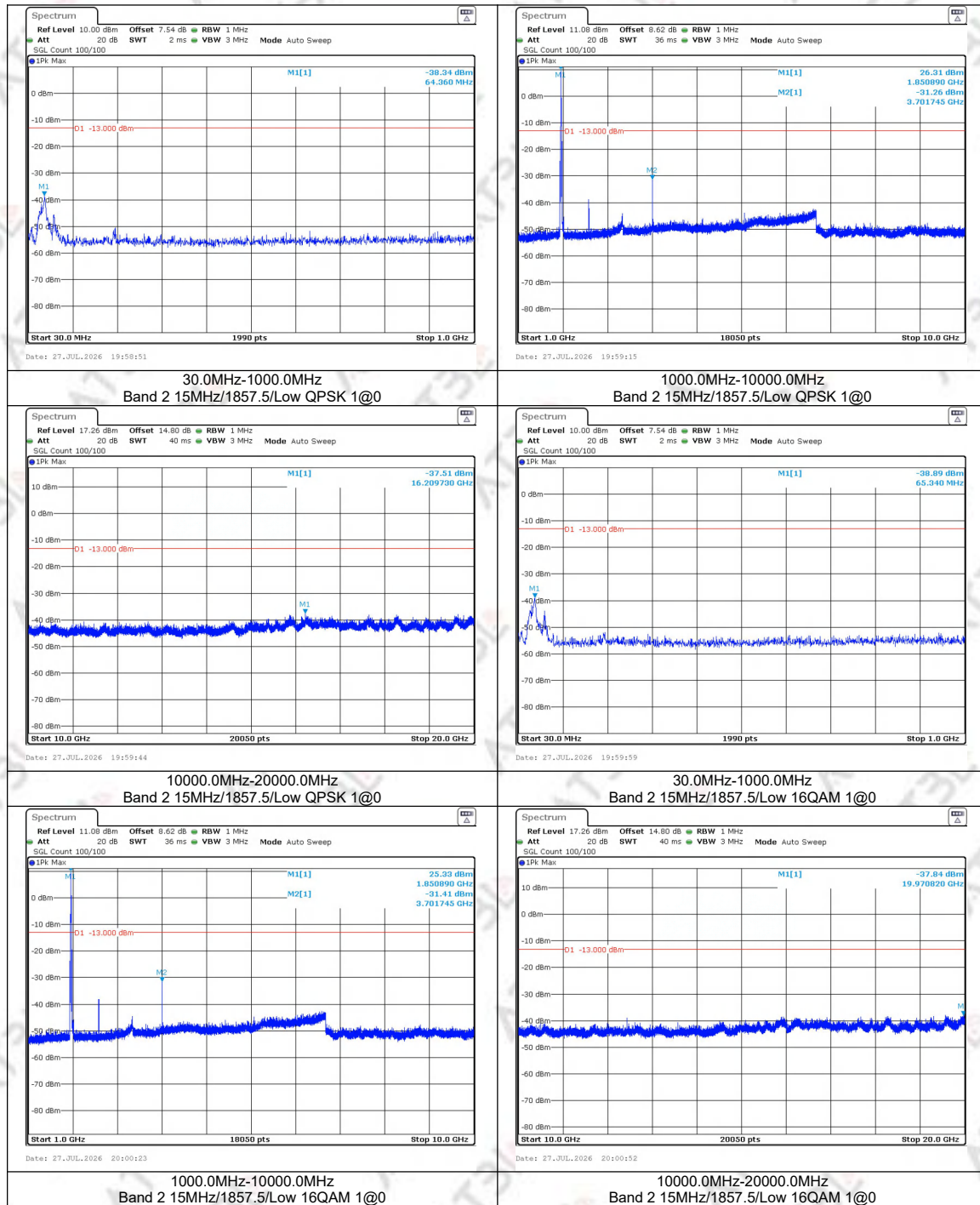
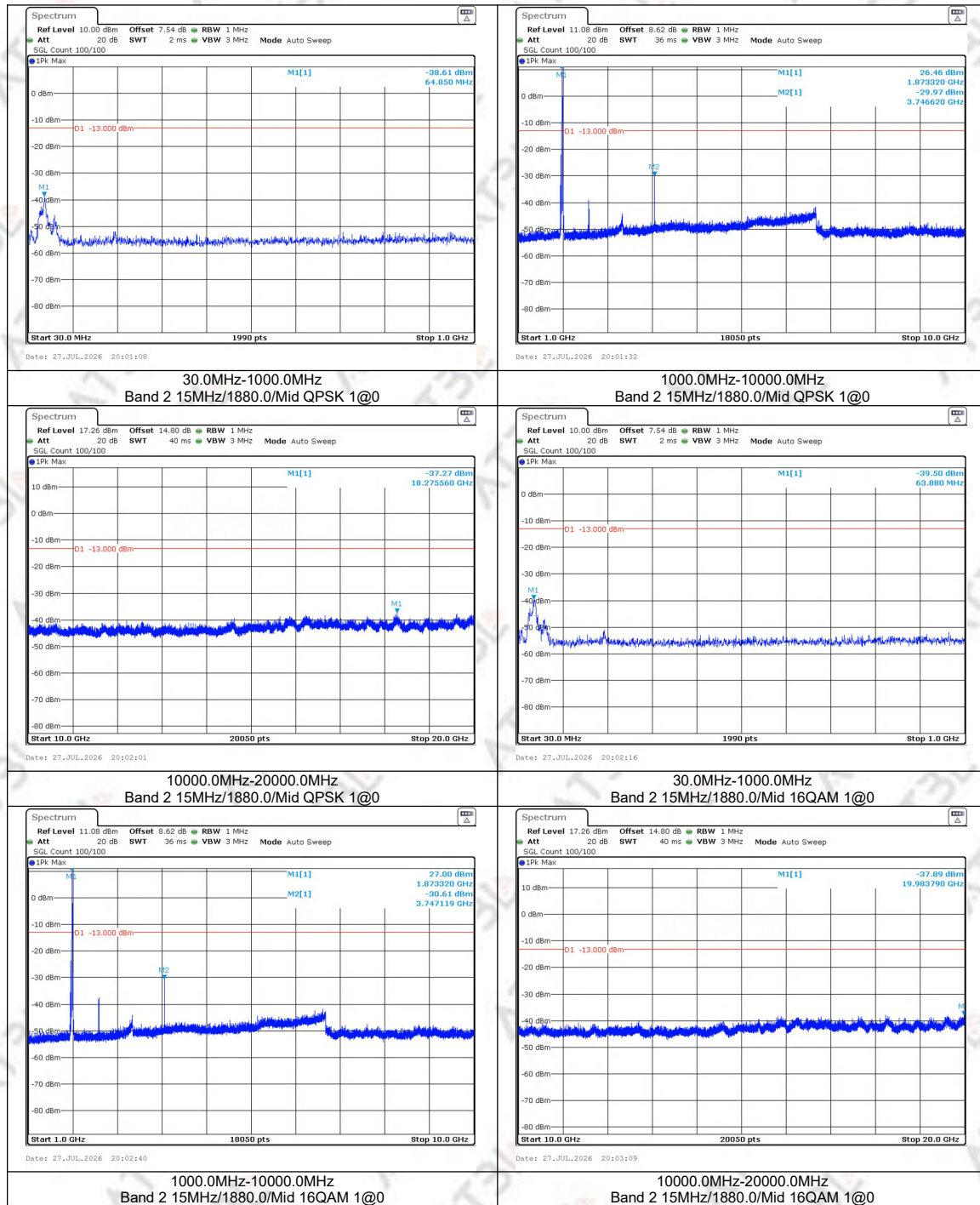
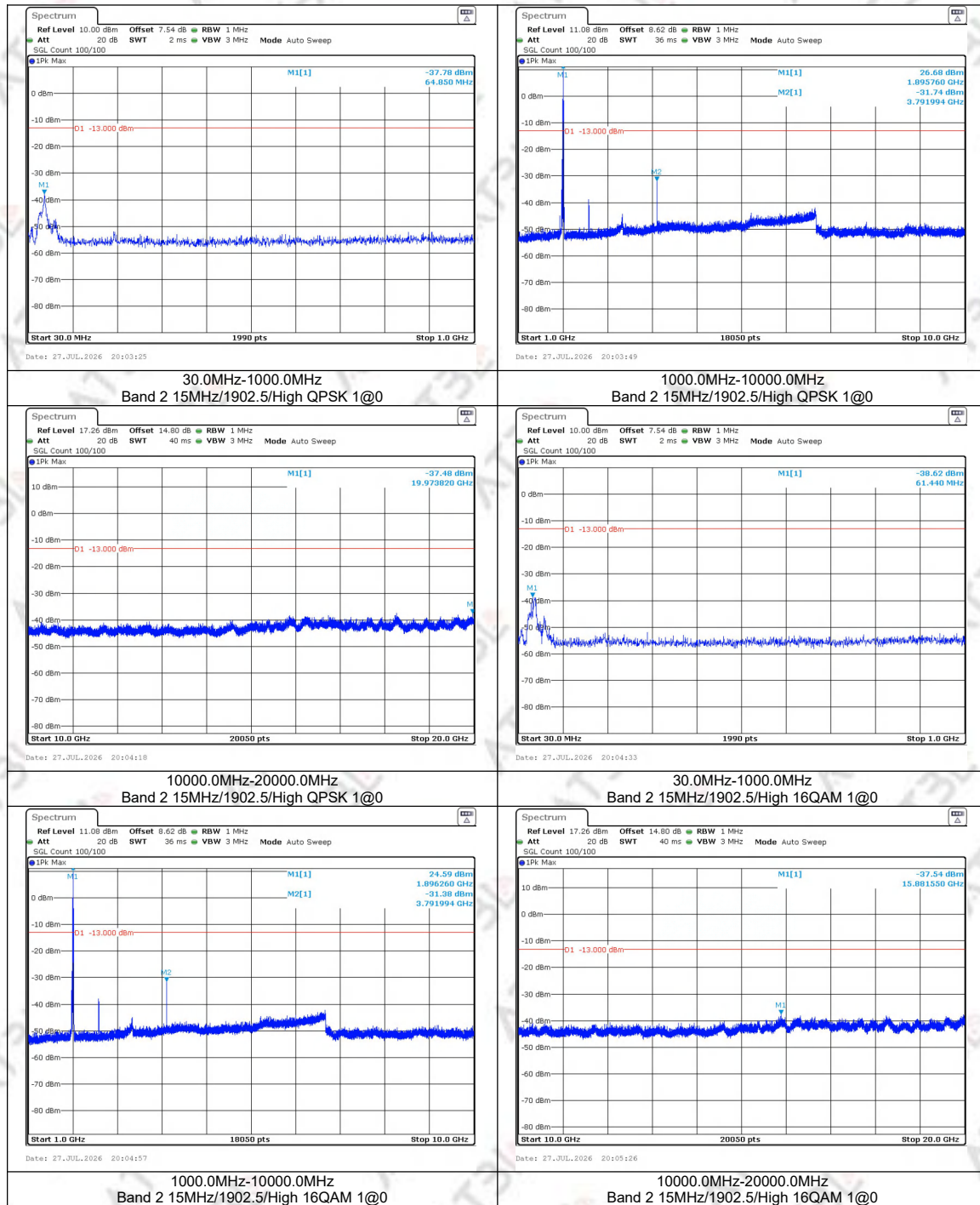
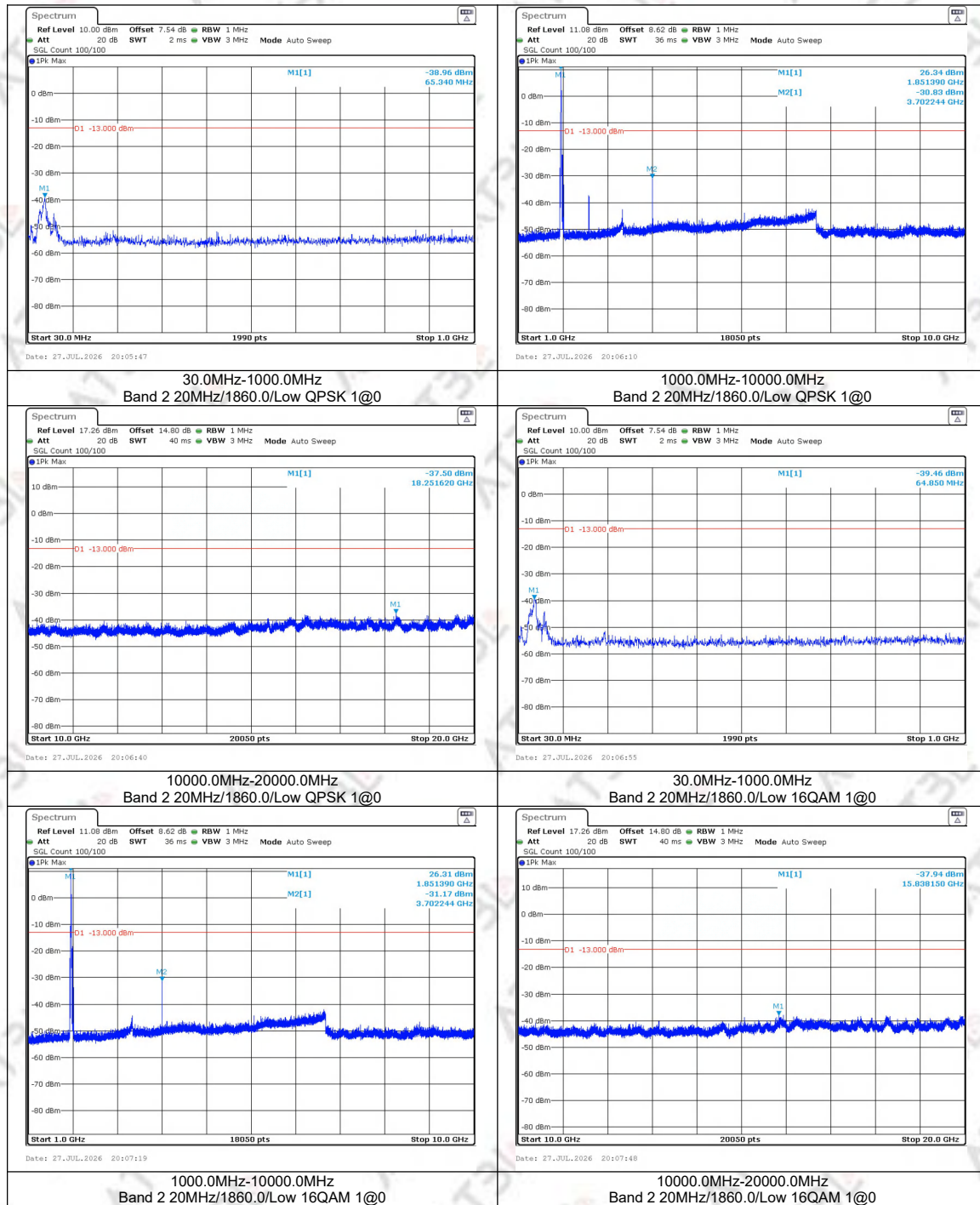
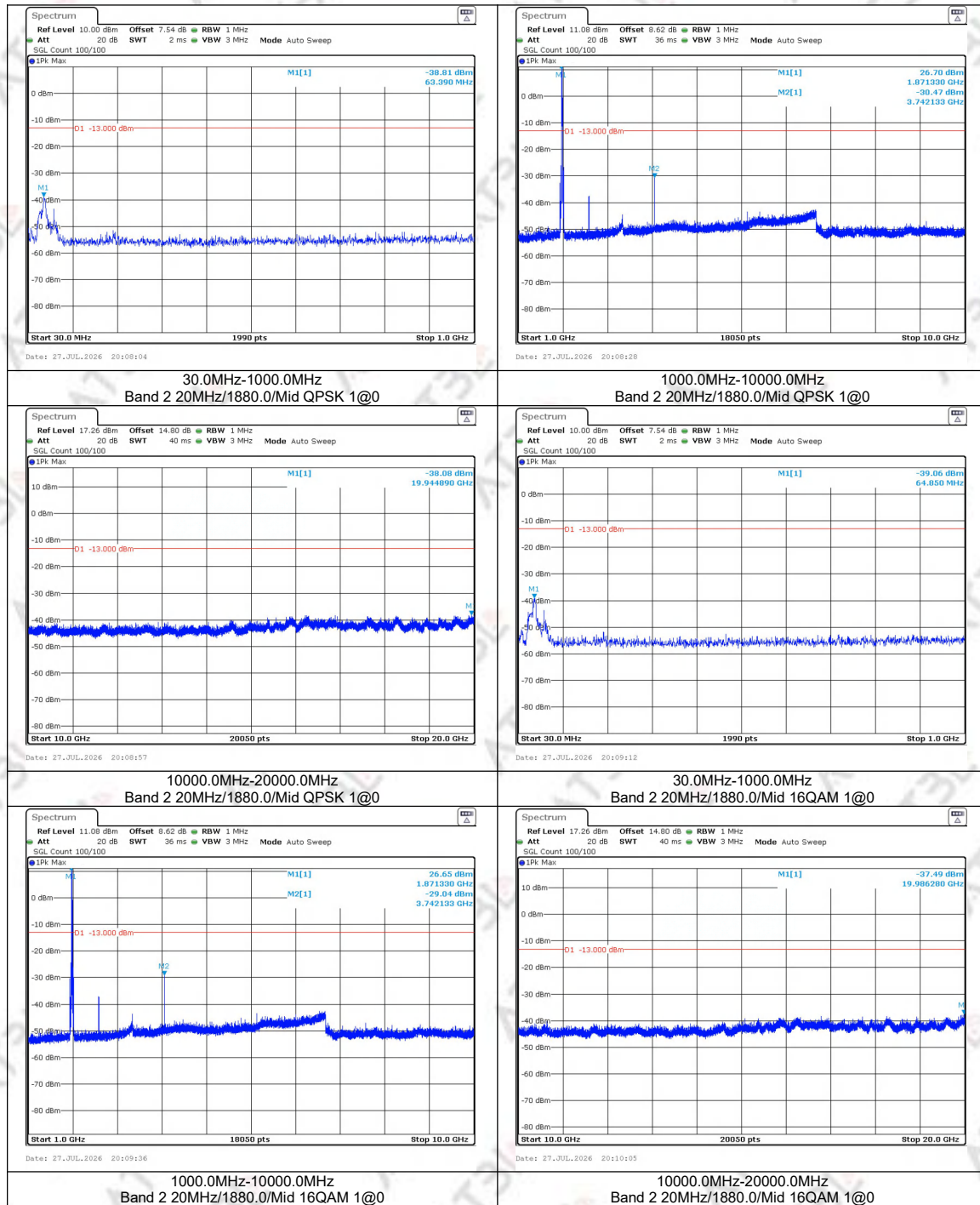


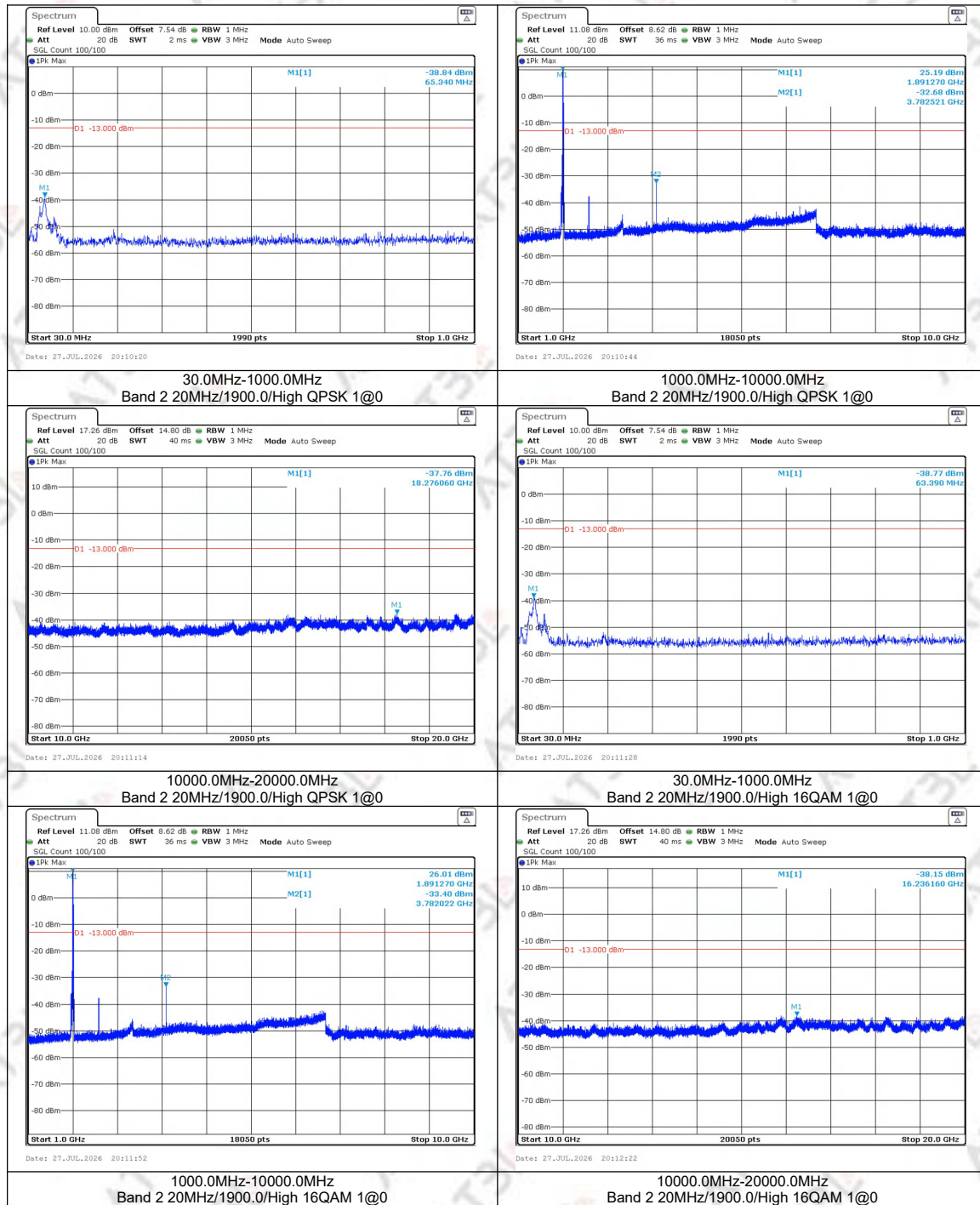












6.Frequency Stability-TN/VN

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-15.95	-0.00862	±2.5	PASS	TN/VN
2	1.4	18607	1850.7	16QAM	6@0	-51.96	-0.02807	±2.5	PASS	TN/VN
2	1.4	18900	1880.0	QPSK	6@0	-22.47	-0.01195	±2.5	PASS	TN/VN
2	1.4	18900	1880.0	16QAM	6@0	-1.92	-0.00102	±2.5	PASS	TN/VN
2	1.4	19193	1909.3	QPSK	6@0	-8.5	-0.00445	±2.5	PASS	TN/VN
2	1.4	19193	1909.3	16QAM	6@0	-8.83	-0.00462	±2.5	PASS	TN/VN
2	3.0	18615	1851.5	QPSK	15@0	5.12	0.00277	±2.5	PASS	TN/VN
2	3.0	18615	1851.5	16QAM	15@0	-10.4	-0.00562	±2.5	PASS	TN/VN
2	3.0	18900	1880.0	QPSK	15@0	-22.99	-0.01223	±2.5	PASS	TN/VN
2	3.0	18900	1880.0	16QAM	15@0	-8.85	-0.00471	±2.5	PASS	TN/VN
2	3.0	19185	1908.5	QPSK	15@0	-12.72	-0.00666	±2.5	PASS	TN/VN
2	3.0	19185	1908.5	16QAM	15@0	-12.86	-0.00674	±2.5	PASS	TN/VN
2	5.0	18625	1852.5	QPSK	25@0	-6.51	-0.00351	±2.5	PASS	TN/VN
2	5.0	18625	1852.5	16QAM	25@0	-37.04	-0.01999	±2.5	PASS	TN/VN
2	5.0	18900	1880.0	QPSK	25@0	-10.3	-0.00548	±2.5	PASS	TN/VN
2	5.0	18900	1880.0	16QAM	25@0	-28.55	-0.01519	±2.5	PASS	TN/VN
2	5.0	19175	1907.5	QPSK	25@0	-15.71	-0.00823	±2.5	PASS	TN/VN
2	5.0	19175	1907.5	16QAM	25@0	-16.64	-0.00872	±2.5	PASS	TN/VN
2	10.0	18650	1855.0	QPSK	50@0	3.18	0.00171	±2.5	PASS	TN/VN
2	10.0	18650	1855.0	16QAM	50@0	-26.98	-0.01454	±2.5	PASS	TN/VN
2	10.0	18900	1880.0	QPSK	50@0	-22.02	-0.01171	±2.5	PASS	TN/VN
2	10.0	18900	1880.0	16QAM	50@0	-32.06	-0.01705	±2.5	PASS	TN/VN
2	10.0	19150	1905.0	QPSK	50@0	-3.35	-0.00176	±2.5	PASS	TN/VN
2	10.0	19150	1905.0	16QAM	50@0	0.32	0.00017	±2.5	PASS	TN/VN
2	15.0	18675	1857.5	QPSK	75@0	-3.63	-0.00196	±2.5	PASS	TN/VN
2	15.0	18675	1857.5	16QAM	75@0	-36.26	-0.01952	±2.5	PASS	TN/VN
2	15.0	18900	1880.0	QPSK	75@0	-16.77	-0.00892	±2.5	PASS	TN/VN
2	15.0	18900	1880.0	16QAM	75@0	-13.82	-0.00735	±2.5	PASS	TN/VN
2	15.0	19125	1902.5	QPSK	75@0	-13.1	-0.00689	±2.5	PASS	TN/VN
2	15.0	19125	1902.5	16QAM	75@0	-35.52	-0.01867	±2.5	PASS	TN/VN
2	20.0	18700	1860.0	QPSK	100@0	6.75	0.00363	±2.5	PASS	TN/VN
2	20.0	18700	1860.0	16QAM	100@0	-20.26	-0.01089	±2.5	PASS	TN/VN
2	20.0	18900	1880.0	QPSK	100@0	-9.31	-0.00495	±2.5	PASS	TN/VN
2	20.0	18900	1880.0	16QAM	100@0	-26.68	-0.01419	±2.5	PASS	TN/VN
2	20.0	19100	1900.0	QPSK	100@0	2.45	0.00129	±2.5	PASS	TN/VN
2	20.0	19100	1900.0	16QAM	100@0	2.17	0.00114	±2.5	PASS	TN/VN

Frequency Stability-TL/VN

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-44.67	-0.02414	±2.5	PASS	TL/VN
2	1.4	18607	1850.7	16QAM	6@0	-6.39	-0.00346	±2.5	PASS	TL/VN
2	1.4	18900	1880.0	QPSK	6@0	-25.26	-0.01344	±2.5	PASS	TL/VN
2	1.4	18900	1880.0	16QAM	6@0	-35.45	-0.01886	±2.5	PASS	TL/VN
2	1.4	19193	1909.3	QPSK	6@0	-6.64	-0.00348	±2.5	PASS	TL/VN
2	1.4	19193	1909.3	16QAM	6@0	-12.89	-0.00675	±2.5	PASS	TL/VN
2	3.0	18615	1851.5	QPSK	15@0	13.25	0.00715	±2.5	PASS	TL/VN
2	3.0	18615	1851.5	16QAM	15@0	-33.72	-0.01821	±2.5	PASS	TL/VN
2	3.0	18900	1880.0	QPSK	15@0	-20.79	-0.01106	±2.5	PASS	TL/VN
2	3.0	18900	1880.0	16QAM	15@0	-9.3	-0.00495	±2.5	PASS	TL/VN
2	3.0	19185	1908.5	QPSK	15@0	-7.31	-0.00383	±2.5	PASS	TL/VN
2	3.0	19185	1908.5	16QAM	15@0	-8.84	-0.00463	±2.5	PASS	TL/VN
2	5.0	18625	1852.5	QPSK	25@0	-5.69	-0.00307	±2.5	PASS	TL/VN
2	5.0	18625	1852.5	16QAM	25@0	-47.69	-0.02575	±2.5	PASS	TL/VN
2	5.0	18900	1880.0	QPSK	25@0	-8.5	-0.00452	±2.5	PASS	TL/VN
2	5.0	18900	1880.0	16QAM	25@0	-39.4	-0.02096	±2.5	PASS	TL/VN
2	5.0	19175	1907.5	QPSK	25@0	-39.54	-0.02073	±2.5	PASS	TL/VN
2	5.0	19175	1907.5	16QAM	25@0	-46.61	-0.02443	±2.5	PASS	TL/VN
2	10.0	18650	1855.0	QPSK	50@0	20.96	0.0113	±2.5	PASS	TL/VN
2	10.0	18650	1855.0	16QAM	50@0	-34.6	-0.01865	±2.5	PASS	TL/VN
2	10.0	18900	1880.0	QPSK	50@0	-33.0	-0.01755	±2.5	PASS	TL/VN
2	10.0	18900	1880.0	16QAM	50@0	-34.39	-0.01829	±2.5	PASS	TL/VN
2	10.0	19150	1905.0	QPSK	50@0	-4.09	-0.00215	±2.5	PASS	TL/VN
2	10.0	19150	1905.0	16QAM	50@0	-24.65	-0.01294	±2.5	PASS	TL/VN
2	15.0	18675	1857.5	QPSK	75@0	16.74	0.00901	±2.5	PASS	TL/VN
2	15.0	18675	1857.5	16QAM	75@0	13.09	0.00705	±2.5	PASS	TL/VN
2	15.0	18900	1880.0	QPSK	75@0	-17.27	-0.00918	±2.5	PASS	TL/VN
2	15.0	18900	1880.0	16QAM	75@0	-34.72	-0.01847	±2.5	PASS	TL/VN
2	15.0	19125	1902.5	QPSK	75@0	-31.01	-0.0163	±2.5	PASS	TL/VN
2	15.0	19125	1902.5	16QAM	75@0	-41.38	-0.02175	±2.5	PASS	TL/VN
2	20.0	18700	1860.0	QPSK	100@0	17.7	0.00951	±2.5	PASS	TL/VN
2	20.0	18700	1860.0	16QAM	100@0	-5.18	-0.00278	±2.5	PASS	TL/VN
2	20.0	18900	1880.0	QPSK	100@0	-37.61	-0.02	±2.5	PASS	TL/VN
2	20.0	18900	1880.0	16QAM	100@0	6.64	0.00353	±2.5	PASS	TL/VN
2	20.0	19100	1900.0	QPSK	100@0	-31.67	-0.01667	±2.5	PASS	TL/VN
2	20.0	19100	1900.0	16QAM	100@0	-10.13	-0.00533	±2.5	PASS	TL/VN

Frequency Stability-TH/VH

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	13.66	0.00738	±2.5	PASS	TH/VH
2	1.4	18607	1850.7	16QAM	6@0	-16.99	-0.00918	±2.5	PASS	TH/VH
2	1.4	18900	1880.0	QPSK	6@0	-15.95	-0.00848	±2.5	PASS	TH/VH
2	1.4	18900	1880.0	16QAM	6@0	-29.08	-0.01547	±2.5	PASS	TH/VH
2	1.4	19193	1909.3	QPSK	6@0	1.37	0.00072	±2.5	PASS	TH/VH
2	1.4	19193	1909.3	16QAM	6@0	3.53	0.00185	±2.5	PASS	TH/VH
2	3.0	18615	1851.5	QPSK	15@0	28.7	0.0155	±2.5	PASS	TH/VH
2	3.0	18615	1851.5	16QAM	15@0	-10.26	-0.00554	±2.5	PASS	TH/VH
2	3.0	18900	1880.0	QPSK	15@0	-21.92	-0.01166	±2.5	PASS	TH/VH
2	3.0	18900	1880.0	16QAM	15@0	-40.44	-0.02151	±2.5	PASS	TH/VH
2	3.0	19185	1908.5	QPSK	15@0	-13.73	-0.0072	±2.5	PASS	TH/VH
2	3.0	19185	1908.5	16QAM	15@0	-17.75	-0.0093	±2.5	PASS	TH/VH
2	5.0	18625	1852.5	QPSK	25@0	29.85	0.01612	±2.5	PASS	TH/VH
2	5.0	18625	1852.5	16QAM	25@0	-3.78	-0.00204	±2.5	PASS	TH/VH
2	5.0	18900	1880.0	QPSK	25@0	-9.48	-0.00504	±2.5	PASS	TH/VH
2	5.0	18900	1880.0	16QAM	25@0	-28.35	-0.01508	±2.5	PASS	TH/VH
2	5.0	19175	1907.5	QPSK	25@0	-16.49	-0.00865	±2.5	PASS	TH/VH
2	5.0	19175	1907.5	16QAM	25@0	-36.18	-0.01897	±2.5	PASS	TH/VH
2	10.0	18650	1855.0	QPSK	50@0	20.21	0.0109	±2.5	PASS	TH/VH
2	10.0	18650	1855.0	16QAM	50@0	-27.54	-0.01484	±2.5	PASS	TH/VH
2	10.0	18900	1880.0	QPSK	50@0	-25.35	-0.01348	±2.5	PASS	TH/VH
2	10.0	18900	1880.0	16QAM	50@0	13.49	0.00718	±2.5	PASS	TH/VH
2	10.0	19150	1905.0	QPSK	50@0	0.6	0.00032	±2.5	PASS	TH/VH
2	10.0	19150	1905.0	16QAM	50@0	-17.45	-0.00916	±2.5	PASS	TH/VH
2	15.0	18675	1857.5	QPSK	75@0	20.17	0.01086	±2.5	PASS	TH/VH
2	15.0	18675	1857.5	16QAM	75@0	-18.48	-0.00995	±2.5	PASS	TH/VH
2	15.0	18900	1880.0	QPSK	75@0	-18.01	-0.00958	±2.5	PASS	TH/VH
2	15.0	18900	1880.0	16QAM	75@0	-40.15	-0.02136	±2.5	PASS	TH/VH
2	15.0	19125	1902.5	QPSK	75@0	-10.5	-0.00552	±2.5	PASS	TH/VH
2	15.0	19125	1902.5	16QAM	75@0	-25.62	-0.01347	±2.5	PASS	TH/VH
2	20.0	18700	1860.0	QPSK	100@0	28.41	0.01527	±2.5	PASS	TH/VH
2	20.0	18700	1860.0	16QAM	100@0	-12.35	-0.00664	±2.5	PASS	TH/VH
2	20.0	18900	1880.0	QPSK	100@0	-3.06	-0.00163	±2.5	PASS	TH/VH
2	20.0	18900	1880.0	16QAM	100@0	-31.04	-0.01651	±2.5	PASS	TH/VH
2	20.0	19100	1900.0	QPSK	100@0	-0.86	-0.00045	±2.5	PASS	TH/VH
2	20.0	19100	1900.0	16QAM	100@0	-5.32	-0.0028	±2.5	PASS	TH/VH

Frequency Stability-TH/VL

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-35.19	-0.01901	±2.5	PASS	TH/VL
2	1.4	18607	1850.7	16QAM	6@0	-29.81	-0.01611	±2.5	PASS	TH/VL
2	1.4	18900	1880.0	QPSK	6@0	-5.39	-0.00287	±2.5	PASS	TH/VL
2	1.4	18900	1880.0	16QAM	6@0	-25.28	-0.01345	±2.5	PASS	TH/VL
2	1.4	19193	1909.3	QPSK	6@0	-14.28	-0.00748	±2.5	PASS	TH/VL
2	1.4	19193	1909.3	16QAM	6@0	-42.03	-0.02201	±2.5	PASS	TH/VL
2	3.0	18615	1851.5	QPSK	15@0	0.32	0.00017	±2.5	PASS	TH/VL
2	3.0	18615	1851.5	16QAM	15@0	-46.91	-0.02533	±2.5	PASS	TH/VL
2	3.0	18900	1880.0	QPSK	15@0	-9.06	-0.00482	±2.5	PASS	TH/VL
2	3.0	18900	1880.0	16QAM	15@0	-6.74	-0.00358	±2.5	PASS	TH/VL
2	3.0	19185	1908.5	QPSK	15@0	-19.63	-0.01028	±2.5	PASS	TH/VL
2	3.0	19185	1908.5	16QAM	15@0	-44.35	-0.02324	±2.5	PASS	TH/VL
2	5.0	18625	1852.5	QPSK	25@0	34.23	0.01848	±2.5	PASS	TH/VL
2	5.0	18625	1852.5	16QAM	25@0	-48.29	-0.02607	±2.5	PASS	TH/VL
2	5.0	18900	1880.0	QPSK	25@0	-1.02	-0.00054	±2.5	PASS	TH/VL
2	5.0	18900	1880.0	16QAM	25@0	15.34	0.00816	±2.5	PASS	TH/VL
2	5.0	19175	1907.5	QPSK	25@0	-27.24	-0.01428	±2.5	PASS	TH/VL
2	5.0	19175	1907.5	16QAM	25@0	-53.59	-0.02809	±2.5	PASS	TH/VL
2	10.0	18650	1855.0	QPSK	50@0	8.97	0.00484	±2.5	PASS	TH/VL
2	10.0	18650	1855.0	16QAM	50@0	-22.0	-0.01186	±2.5	PASS	TH/VL
2	10.0	18900	1880.0	QPSK	50@0	-30.47	-0.01621	±2.5	PASS	TH/VL
2	10.0	18900	1880.0	16QAM	50@0	-16.38	-0.00871	±2.5	PASS	TH/VL
2	10.0	19150	1905.0	QPSK	50@0	-21.5	-0.01129	±2.5	PASS	TH/VL
2	10.0	19150	1905.0	16QAM	50@0	-41.58	-0.02183	±2.5	PASS	TH/VL
2	15.0	18675	1857.5	QPSK	75@0	26.51	0.01427	±2.5	PASS	TH/VL
2	15.0	18675	1857.5	16QAM	75@0	-22.39	-0.01205	±2.5	PASS	TH/VL
2	15.0	18900	1880.0	QPSK	75@0	-35.31	-0.01878	±2.5	PASS	TH/VL
2	15.0	18900	1880.0	16QAM	75@0	-45.66	-0.02429	±2.5	PASS	TH/VL
2	15.0	19125	1902.5	QPSK	75@0	-31.43	-0.01652	±2.5	PASS	TH/VL
2	15.0	19125	1902.5	16QAM	75@0	-7.37	-0.00387	±2.5	PASS	TH/VL
2	20.0	18700	1860.0	QPSK	100@0	25.94	0.01394	±2.5	PASS	TH/VL
2	20.0	18700	1860.0	16QAM	100@0	-24.6	-0.01323	±2.5	PASS	TH/VL
2	20.0	18900	1880.0	QPSK	100@0	-36.75	-0.01955	±2.5	PASS	TH/VL
2	20.0	18900	1880.0	16QAM	100@0	-10.56	-0.00562	±2.5	PASS	TH/VL
2	20.0	19100	1900.0	QPSK	100@0	-29.15	-0.01534	±2.5	PASS	TH/VL
2	20.0	19100	1900.0	16QAM	100@0	-6.17	-0.00325	±2.5	PASS	TH/VL

Frequency Stability-TH/VN

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	6.29	0.0034	±2.5	PASS	TH/VN
2	1.4	18607	1850.7	16QAM	6@0	-42.77	-0.02311	±2.5	PASS	TH/VN
2	1.4	18900	1880.0	QPSK	6@0	-39.07	-0.02078	±2.5	PASS	TH/VN
2	1.4	18900	1880.0	16QAM	6@0	-20.26	-0.01077	±2.5	PASS	TH/VN
2	1.4	19193	1909.3	QPSK	6@0	-41.71	-0.02185	±2.5	PASS	TH/VN
2	1.4	19193	1909.3	16QAM	6@0	-50.53	-0.02646	±2.5	PASS	TH/VN
2	3.0	18615	1851.5	QPSK	15@0	-20.44	-0.01104	±2.5	PASS	TH/VN
2	3.0	18615	1851.5	16QAM	15@0	-34.5	-0.01864	±2.5	PASS	TH/VN
2	3.0	18900	1880.0	QPSK	15@0	-11.96	-0.00636	±2.5	PASS	TH/VN
2	3.0	18900	1880.0	16QAM	15@0	-32.9	-0.0175	±2.5	PASS	TH/VN
2	3.0	19185	1908.5	QPSK	15@0	-34.26	-0.01795	±2.5	PASS	TH/VN
2	3.0	19185	1908.5	16QAM	15@0	-9.1	-0.00477	±2.5	PASS	TH/VN
2	5.0	18625	1852.5	QPSK	25@0	33.09	0.01786	±2.5	PASS	TH/VN
2	5.0	18625	1852.5	16QAM	25@0	-2.25	-0.00121	±2.5	PASS	TH/VN
2	5.0	18900	1880.0	QPSK	25@0	-27.44	-0.01459	±2.5	PASS	TH/VN
2	5.0	18900	1880.0	16QAM	25@0	1.34	0.00072	±2.5	PASS	TH/VN
2	5.0	19175	1907.5	QPSK	25@0	-28.05	-0.01471	±2.5	PASS	TH/VN
2	5.0	19175	1907.5	16QAM	25@0	-20.56	-0.01078	±2.5	PASS	TH/VN
2	10.0	18650	1855.0	QPSK	50@0	-46.62	-0.02513	±2.5	PASS	TH/VN
2	10.0	18650	1855.0	16QAM	50@0	-31.84	-0.01717	±2.5	PASS	TH/VN
2	10.0	18900	1880.0	QPSK	50@0	-4.59	-0.00244	±2.5	PASS	TH/VN
2	10.0	18900	1880.0	16QAM	50@0	-30.23	-0.01608	±2.5	PASS	TH/VN
2	10.0	19150	1905.0	QPSK	50@0	-37.99	-0.01994	±2.5	PASS	TH/VN
2	10.0	19150	1905.0	16QAM	50@0	-18.34	-0.00963	±2.5	PASS	TH/VN
2	15.0	18675	1857.5	QPSK	75@0	-23.88	-0.01285	±2.5	PASS	TH/VN
2	15.0	18675	1857.5	16QAM	75@0	-53.6	-0.02886	±2.5	PASS	TH/VN
2	15.0	18900	1880.0	QPSK	75@0	-31.3	-0.01665	±2.5	PASS	TH/VN
2	15.0	18900	1880.0	16QAM	75@0	-25.62	-0.01363	±2.5	PASS	TH/VN
2	15.0	19125	1902.5	QPSK	75@0	-43.56	-0.0229	±2.5	PASS	TH/VN
2	15.0	19125	1902.5	16QAM	75@0	-6.74	-0.00354	±2.5	PASS	TH/VN
2	20.0	18700	1860.0	QPSK	100@0	8.23	0.00442	±2.5	PASS	TH/VN
2	20.0	18700	1860.0	16QAM	100@0	-60.42	-0.03249	±2.5	PASS	TH/VN
2	20.0	18900	1880.0	QPSK	100@0	-38.95	-0.02072	±2.5	PASS	TH/VN
2	20.0	18900	1880.0	16QAM	100@0	-21.34	-0.01135	±2.5	PASS	TH/VN
2	20.0	19100	1900.0	QPSK	100@0	13.8	0.00727	±2.5	PASS	TH/VN
2	20.0	19100	1900.0	16QAM	100@0	-32.43	-0.01707	±2.5	PASS	TH/VN

Frequency Stability-TL/VH

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-26.26	-0.01419	±2.5	PASS	TLVH
2	1.4	18607	1850.7	16QAM	6@0	0.8	0.00043	±2.5	PASS	TLVH
2	1.4	18900	1880.0	QPSK	6@0	-21.97	-0.01169	±2.5	PASS	TLVH
2	1.4	18900	1880.0	16QAM	6@0	-43.82	-0.02331	±2.5	PASS	TLVH
2	1.4	19193	1909.3	QPSK	6@0	-19.37	-0.01014	±2.5	PASS	TLVH
2	1.4	19193	1909.3	16QAM	6@0	-18.42	-0.00965	±2.5	PASS	TLVH
2	3.0	18615	1851.5	QPSK	15@0	-5.32	-0.00287	±2.5	PASS	TLVH
2	3.0	18615	1851.5	16QAM	15@0	5.15	0.00278	±2.5	PASS	TLVH
2	3.0	18900	1880.0	QPSK	15@0	-12.93	-0.00688	±2.5	PASS	TLVH
2	3.0	18900	1880.0	16QAM	15@0	-13.35	-0.0071	±2.5	PASS	TLVH
2	3.0	19185	1908.5	QPSK	15@0	-21.86	-0.01145	±2.5	PASS	TLVH
2	3.0	19185	1908.5	16QAM	15@0	-49.21	-0.02578	±2.5	PASS	TLVH
2	5.0	18625	1852.5	QPSK	25@0	20.3	0.01096	±2.5	PASS	TLVH
2	5.0	18625	1852.5	16QAM	25@0	-49.17	-0.02654	±2.5	PASS	TLVH
2	5.0	18900	1880.0	QPSK	25@0	-39.53	-0.02102	±2.5	PASS	TLVH
2	5.0	18900	1880.0	16QAM	25@0	-22.47	-0.01195	±2.5	PASS	TLVH
2	5.0	19175	1907.5	QPSK	25@0	-25.36	-0.0133	±2.5	PASS	TLVH
2	5.0	19175	1907.5	16QAM	25@0	-28.37	-0.01487	±2.5	PASS	TLVH
2	10.0	18650	1855.0	QPSK	50@0	30.93	0.01667	±2.5	PASS	TLVH
2	10.0	18650	1855.0	16QAM	50@0	-44.39	-0.02393	±2.5	PASS	TLVH
2	10.0	18900	1880.0	QPSK	50@0	-37.99	-0.02021	±2.5	PASS	TLVH
2	10.0	18900	1880.0	16QAM	50@0	-29.84	-0.01587	±2.5	PASS	TLVH
2	10.0	19150	1905.0	QPSK	50@0	-12.06	-0.00633	±2.5	PASS	TLVH
2	10.0	19150	1905.0	16QAM	50@0	-23.09	-0.01212	±2.5	PASS	TLVH
2	15.0	18675	1857.5	QPSK	75@0	19.05	0.01026	±2.5	PASS	TLVH
2	15.0	18675	1857.5	16QAM	75@0	-28.11	-0.01513	±2.5	PASS	TLVH
2	15.0	18900	1880.0	QPSK	75@0	-24.45	-0.013	±2.5	PASS	TLVH
2	15.0	18900	1880.0	16QAM	75@0	-12.52	-0.00666	±2.5	PASS	TLVH
2	15.0	19125	1902.5	QPSK	75@0	-15.66	-0.00823	±2.5	PASS	TLVH
2	15.0	19125	1902.5	16QAM	75@0	-24.52	-0.01289	±2.5	PASS	TLVH
2	20.0	18700	1860.0	QPSK	100@0	43.14	0.0232	±2.5	PASS	TLVH
2	20.0	18700	1860.0	16QAM	100@0	-10.6	-0.0057	±2.5	PASS	TLVH
2	20.0	18900	1880.0	QPSK	100@0	-43.93	-0.02337	±2.5	PASS	TLVH
2	20.0	18900	1880.0	16QAM	100@0	-7.55	-0.00402	±2.5	PASS	TLVH
2	20.0	19100	1900.0	QPSK	100@0	3.65	0.00192	±2.5	PASS	TLVH
2	20.0	19100	1900.0	16QAM	100@0	-6.65	-0.0035	±2.5	PASS	TLVH

Frequency Stability-TL/VL

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-25.22	-0.01363	±2.5	PASS	TL/VL
2	1.4	18607	1850.7	16QAM	6@0	-4.06	-0.0022	±2.5	PASS	TL/VL
2	1.4	18900	1880.0	QPSK	6@0	-33.99	-0.01808	±2.5	PASS	TL/VL
2	1.4	18900	1880.0	16QAM	6@0	-0.44	-0.00024	±2.5	PASS	TL/VL
2	1.4	19193	1909.3	QPSK	6@0	-37.54	-0.01966	±2.5	PASS	TL/VL
2	1.4	19193	1909.3	16QAM	6@0	15.54	0.00814	±2.5	PASS	TL/VL
2	3.0	18615	1851.5	QPSK	15@0	-9.9	-0.00535	±2.5	PASS	TL/VL
2	3.0	18615	1851.5	16QAM	15@0	-54.04	-0.02919	±2.5	PASS	TL/VL
2	3.0	18900	1880.0	QPSK	15@0	-35.81	-0.01905	±2.5	PASS	TL/VL
2	3.0	18900	1880.0	16QAM	15@0	-23.66	-0.01259	±2.5	PASS	TL/VL
2	3.0	19185	1908.5	QPSK	15@0	-38.58	-0.02022	±2.5	PASS	TL/VL
2	3.0	19185	1908.5	16QAM	15@0	-24.99	-0.01309	±2.5	PASS	TL/VL
2	5.0	18625	1852.5	QPSK	25@0	34.32	0.01853	±2.5	PASS	TL/VL
2	5.0	18625	1852.5	16QAM	25@0	-51.74	-0.02793	±2.5	PASS	TL/VL
2	5.0	18900	1880.0	QPSK	25@0	-21.62	-0.0115	±2.5	PASS	TL/VL
2	5.0	18900	1880.0	16QAM	25@0	-41.64	-0.02215	±2.5	PASS	TL/VL
2	5.0	19175	1907.5	QPSK	25@0	-37.52	-0.01967	±2.5	PASS	TL/VL
2	5.0	19175	1907.5	16QAM	25@0	-14.33	-0.00751	±2.5	PASS	TL/VL
2	10.0	18650	1855.0	QPSK	50@0	16.24	0.00875	±2.5	PASS	TL/VL
2	10.0	18650	1855.0	16QAM	50@0	-57.39	-0.03094	±2.5	PASS	TL/VL
2	10.0	18900	1880.0	QPSK	50@0	-37.49	-0.01994	±2.5	PASS	TL/VL
2	10.0	18900	1880.0	16QAM	50@0	-43.16	-0.02296	±2.5	PASS	TL/VL
2	10.0	19150	1905.0	QPSK	50@0	-25.66	-0.01347	±2.5	PASS	TL/VL
2	10.0	19150	1905.0	16QAM	50@0	-45.66	-0.02397	±2.5	PASS	TL/VL
2	15.0	18675	1857.5	QPSK	75@0	35.43	0.01908	±2.5	PASS	TL/VL
2	15.0	18675	1857.5	16QAM	75@0	-48.02	-0.02585	±2.5	PASS	TL/VL
2	15.0	18900	1880.0	QPSK	75@0	-9.91	-0.00527	±2.5	PASS	TL/VL
2	15.0	18900	1880.0	16QAM	75@0	-18.12	-0.00964	±2.5	PASS	TL/VL
2	15.0	19125	1902.5	QPSK	75@0	-28.41	-0.01493	±2.5	PASS	TL/VL
2	15.0	19125	1902.5	16QAM	75@0	-13.05	-0.00686	±2.5	PASS	TL/VL
2	20.0	18700	1860.0	QPSK	100@0	17.01	0.00914	±2.5	PASS	TL/VL
2	20.0	18700	1860.0	16QAM	100@0	-38.85	-0.02089	±2.5	PASS	TL/VL
2	20.0	18900	1880.0	QPSK	100@0	-53.76	-0.0286	±2.5	PASS	TL/VL
2	20.0	18900	1880.0	16QAM	100@0	-21.54	-0.01146	±2.5	PASS	TL/VL
2	20.0	19100	1900.0	QPSK	100@0	-31.4	-0.01653	±2.5	PASS	TL/VL
2	20.0	19100	1900.0	16QAM	100@0	-5.75	-0.00303	±2.5	PASS	TL/VL

Frequency Stability-TN/VH

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-45.83	-0.02477	±2.5	PASS	TN/VH
2	1.4	18607	1850.7	16QAM	6@0	-31.86	-0.01721	±2.5	PASS	TN/VH
2	1.4	18900	1880.0	QPSK	6@0	-11.72	-0.00623	±2.5	PASS	TN/VH
2	1.4	18900	1880.0	16QAM	6@0	-6.75	-0.00359	±2.5	PASS	TN/VH
2	1.4	19193	1909.3	QPSK	6@0	-10.43	-0.00546	±2.5	PASS	TN/VH
2	1.4	19193	1909.3	16QAM	6@0	-22.9	-0.012	±2.5	PASS	TN/VH
2	3.0	18615	1851.5	QPSK	15@0	35.02	0.01891	±2.5	PASS	TN/VH
2	3.0	18615	1851.5	16QAM	15@0	-35.68	-0.01927	±2.5	PASS	TN/VH
2	3.0	18900	1880.0	QPSK	15@0	-43.49	-0.02313	±2.5	PASS	TN/VH
2	3.0	18900	1880.0	16QAM	15@0	-38.52	-0.02049	±2.5	PASS	TN/VH
2	3.0	19185	1908.5	QPSK	15@0	-5.16	-0.00271	±2.5	PASS	TN/VH
2	3.0	19185	1908.5	16QAM	15@0	-13.25	-0.00694	±2.5	PASS	TN/VH
2	5.0	18625	1852.5	QPSK	25@0	31.46	0.01698	±2.5	PASS	TN/VH
2	5.0	18625	1852.5	16QAM	25@0	-31.64	-0.01708	±2.5	PASS	TN/VH
2	5.0	18900	1880.0	QPSK	25@0	-23.37	-0.01243	±2.5	PASS	TN/VH
2	5.0	18900	1880.0	16QAM	25@0	-23.79	-0.01265	±2.5	PASS	TN/VH
2	5.0	19175	1907.5	QPSK	25@0	-36.62	-0.0192	±2.5	PASS	TN/VH
2	5.0	19175	1907.5	16QAM	25@0	3.02	0.00158	±2.5	PASS	TN/VH
2	10.0	18650	1855.0	QPSK	50@0	43.66	0.02354	±2.5	PASS	TN/VH
2	10.0	18650	1855.0	16QAM	50@0	-12.73	-0.00686	±2.5	PASS	TN/VH
2	10.0	18900	1880.0	QPSK	50@0	-15.79	-0.0084	±2.5	PASS	TN/VH
2	10.0	18900	1880.0	16QAM	50@0	-44.32	-0.02357	±2.5	PASS	TN/VH
2	10.0	19150	1905.0	QPSK	50@0	-34.65	-0.01819	±2.5	PASS	TN/VH
2	10.0	19150	1905.0	16QAM	50@0	-4.29	-0.00225	±2.5	PASS	TN/VH
2	15.0	18675	1857.5	QPSK	75@0	40.35	0.02173	±2.5	PASS	TN/VH
2	15.0	18675	1857.5	16QAM	75@0	-11.23	-0.00605	±2.5	PASS	TN/VH
2	15.0	18900	1880.0	QPSK	75@0	-7.68	-0.00409	±2.5	PASS	TN/VH
2	15.0	18900	1880.0	16QAM	75@0	-49.22	-0.02618	±2.5	PASS	TN/VH
2	15.0	19125	1902.5	QPSK	75@0	-22.83	-0.012	±2.5	PASS	TN/VH
2	15.0	19125	1902.5	16QAM	75@0	-21.5	-0.0113	±2.5	PASS	TN/VH
2	20.0	18700	1860.0	QPSK	100@0	0.8	0.00043	±2.5	PASS	TN/VH
2	20.0	18700	1860.0	16QAM	100@0	-29.93	-0.01609	±2.5	PASS	TN/VH
2	20.0	18900	1880.0	QPSK	100@0	-10.66	-0.00567	±2.5	PASS	TN/VH
2	20.0	18900	1880.0	16QAM	100@0	-52.03	-0.02767	±2.5	PASS	TN/VH
2	20.0	19100	1900.0	QPSK	100@0	-47.01	-0.02474	±2.5	PASS	TN/VH
2	20.0	19100	1900.0	16QAM	100@0	-15.95	-0.00839	±2.5	PASS	TN/VH

Frequency Stability-TN/VL

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Deviation (Hz)	Deviation (ppm)	Limit(ppm)	Verdict	Environment
2	1.4	18607	1850.7	QPSK	6@0	-30.67	-0.01657	±2.5	PASS	TN/VL
2	1.4	18607	1850.7	16QAM	6@0	-28.9	-0.01561	±2.5	PASS	TN/VL
2	1.4	18900	1880.0	QPSK	6@0	-11.01	-0.00586	±2.5	PASS	TN/VL
2	1.4	18900	1880.0	16QAM	6@0	-46.21	-0.02458	±2.5	PASS	TN/VL
2	1.4	19193	1909.3	QPSK	6@0	-5.19	-0.00272	±2.5	PASS	TN/VL
2	1.4	19193	1909.3	16QAM	6@0	-6.98	-0.00366	±2.5	PASS	TN/VL
2	3.0	18615	1851.5	QPSK	15@0	25.55	0.0138	±2.5	PASS	TN/VL
2	3.0	18615	1851.5	16QAM	15@0	-49.54	-0.02676	±2.5	PASS	TN/VL
2	3.0	18900	1880.0	QPSK	15@0	-26.38	-0.01403	±2.5	PASS	TN/VL
2	3.0	18900	1880.0	16QAM	15@0	-6.18	-0.00329	±2.5	PASS	TN/VL
2	3.0	19185	1908.5	QPSK	15@0	-26.85	-0.01407	±2.5	PASS	TN/VL
2	3.0	19185	1908.5	16QAM	15@0	-42.67	-0.02236	±2.5	PASS	TN/VL
2	5.0	18625	1852.5	QPSK	25@0	37.24	0.0201	±2.5	PASS	TN/VL
2	5.0	18625	1852.5	16QAM	25@0	-46.29	-0.02499	±2.5	PASS	TN/VL
2	5.0	18900	1880.0	QPSK	25@0	-10.4	-0.00553	±2.5	PASS	TN/VL
2	5.0	18900	1880.0	16QAM	25@0	-1.22	-0.00065	±2.5	PASS	TN/VL
2	5.0	19175	1907.5	QPSK	25@0	-24.59	-0.01289	±2.5	PASS	TN/VL
2	5.0	19175	1907.5	16QAM	25@0	-36.66	-0.01922	±2.5	PASS	TN/VL
2	10.0	18650	1855.0	QPSK	50@0	30.1	0.01623	±2.5	PASS	TN/VL
2	10.0	18650	1855.0	16QAM	50@0	-48.18	-0.02597	±2.5	PASS	TN/VL
2	10.0	18900	1880.0	QPSK	50@0	-11.19	-0.00595	±2.5	PASS	TN/VL
2	10.0	18900	1880.0	16QAM	50@0	-27.85	-0.01481	±2.5	PASS	TN/VL
2	10.0	19150	1905.0	QPSK	50@0	-20.73	-0.01088	±2.5	PASS	TN/VL
2	10.0	19150	1905.0	16QAM	50@0	9.01	0.00473	±2.5	PASS	TN/VL
2	15.0	18675	1857.5	QPSK	75@0	4.51	0.00243	±2.5	PASS	TN/VL
2	15.0	18675	1857.5	16QAM	75@0	-48.19	-0.02595	±2.5	PASS	TN/VL
2	15.0	18900	1880.0	QPSK	75@0	-17.18	-0.00914	±2.5	PASS	TN/VL
2	15.0	18900	1880.0	16QAM	75@0	-40.68	-0.02164	±2.5	PASS	TN/VL
2	15.0	19125	1902.5	QPSK	75@0	-37.92	-0.01993	±2.5	PASS	TN/VL
2	15.0	19125	1902.5	16QAM	75@0	-5.34	-0.0028	±2.5	PASS	TN/VL
2	20.0	18700	1860.0	QPSK	100@0	45.4	0.02441	±2.5	PASS	TN/VL
2	20.0	18700	1860.0	16QAM	100@0	-23.37	-0.01257	±2.5	PASS	TN/VL
2	20.0	18900	1880.0	QPSK	100@0	-51.44	-0.02736	±2.5	PASS	TN/VL
2	20.0	18900	1880.0	16QAM	100@0	-3.3	-0.00176	±2.5	PASS	TN/VL
2	20.0	19100	1900.0	QPSK	100@0	-32.42	-0.01706	±2.5	PASS	TN/VL
2	20.0	19100	1900.0	16QAM	100@0	-44.15	-0.02323	±2.5	PASS	TN/VL

7.Modulation Characteristics

Test Result

Band	Bandwidth (MHz)	Channel	Freq (MHz)	Modulation	RB	Verdict
2	1.4	18607	1850.7	QPSK	6@0	PASS
2	1.4	18607	1850.7	16QAM	6@0	PASS
2	1.4	18900	1880.0	QPSK	6@0	PASS
2	1.4	18900	1880.0	16QAM	6@0	PASS
2	1.4	19193	1909.3	QPSK	6@0	PASS
2	1.4	19193	1909.3	16QAM	6@0	PASS
2	3.0	18615	1851.5	QPSK	15@0	PASS
2	3.0	18615	1851.5	16QAM	15@0	PASS
2	3.0	18900	1880.0	QPSK	15@0	PASS
2	3.0	18900	1880.0	16QAM	15@0	PASS
2	3.0	19185	1908.5	QPSK	15@0	PASS
2	3.0	19185	1908.5	16QAM	15@0	PASS
2	5.0	18625	1852.5	QPSK	25@0	PASS
2	5.0	18625	1852.5	16QAM	25@0	PASS
2	5.0	18900	1880.0	QPSK	25@0	PASS
2	5.0	18900	1880.0	16QAM	25@0	PASS
2	5.0	19175	1907.5	QPSK	25@0	PASS
2	5.0	19175	1907.5	16QAM	25@0	PASS
2	10.0	18650	1855.0	QPSK	50@0	PASS
2	10.0	18650	1855.0	16QAM	50@0	PASS
2	10.0	18900	1880.0	QPSK	50@0	PASS
2	10.0	18900	1880.0	16QAM	50@0	PASS
2	10.0	19150	1905.0	QPSK	50@0	PASS
2	10.0	19150	1905.0	16QAM	50@0	PASS
2	15.0	18675	1857.5	QPSK	75@0	PASS
2	15.0	18675	1857.5	16QAM	75@0	PASS
2	15.0	18900	1880.0	QPSK	75@0	PASS
2	15.0	18900	1880.0	16QAM	75@0	PASS
2	15.0	19125	1902.5	QPSK	75@0	PASS
2	15.0	19125	1902.5	16QAM	75@0	PASS
2	20.0	18700	1860.0	QPSK	100@0	PASS
2	20.0	18700	1860.0	16QAM	100@0	PASS
2	20.0	18900	1880.0	QPSK	100@0	PASS
2	20.0	18900	1880.0	16QAM	100@0	PASS
2	20.0	19100	1900.0	QPSK	100@0	PASS
2	20.0	19100	1900.0	16QAM	100@0	PASS

Test Graphs

