

Appendix Test Data for LTE_band_38

1. Effective (Isotropic) Radiated Power Output Data

1.1 Test Result

1.1.1 B38_5MHz_EIRP

Band: 38 / Bandwidth: 5MHz / NTNV								
Modulation	Frequency (MHz)	RB Allocation		Conducted Power (dBm)	Gain (dBi)	EIRP (dBm)		Verdict
		Size	Offset			Result	Limit	
QPSK	2572.5	1	0	22.87	1.80	24.67	<=33.01	Pass
			13	22.88	1.80	24.68	<=33.01	Pass
			24	22.89	1.80	24.69	<=33.01	Pass
		12	0	21.85	1.80	23.65	<=33.01	Pass
			6	21.81	1.80	23.61	<=33.01	Pass
			13	21.83	1.80	23.63	<=33.01	Pass
		25	0	21.81	1.80	23.61	<=33.01	Pass
	2595	1	0	22.94	1.80	24.74	<=33.01	Pass
			13	22.97	1.80	24.77	<=33.01	Pass
			24	22.98	1.80	24.78	<=33.01	Pass
		12	0	21.94	1.80	23.74	<=33.01	Pass
			6	21.88	1.80	23.68	<=33.01	Pass
			13	21.88	1.80	23.68	<=33.01	Pass
		25	0	21.86	1.80	23.66	<=33.01	Pass
	2617.5	1	0	23.08	1.80	24.88	<=33.01	Pass
			13	23.10	1.80	24.90	<=33.01	Pass
			24	23.29	1.80	25.09	<=33.01	Pass
		12	0	22.08	1.80	23.88	<=33.01	Pass
			6	22.09	1.80	23.89	<=33.01	Pass
			13	22.09	1.80	23.89	<=33.01	Pass
		25	0	22.10	1.80	23.90	<=33.01	Pass
16QAM	2572.5	1	0	22.09	1.80	23.89	<=33.01	Pass
			13	22.14	1.80	23.94	<=33.01	Pass
			24	21.90	1.80	23.70	<=33.01	Pass
		12	0	20.78	1.80	22.58	<=33.01	Pass
			6	20.70	1.80	22.50	<=33.01	Pass
			13	20.70	1.80	22.50	<=33.01	Pass
		25	0	20.79	1.80	22.59	<=33.01	Pass
	2595	1	0	21.90	1.80	23.70	<=33.01	Pass
			13	21.91	1.80	23.71	<=33.01	Pass
			24	22.14	1.80	23.94	<=33.01	Pass
		12	0	20.92	1.80	22.72	<=33.01	Pass
			6	20.89	1.80	22.69	<=33.01	Pass
			13	20.86	1.80	22.66	<=33.01	Pass
		25	0	20.85	1.80	22.65	<=33.01	Pass
	2617.5	1	0	22.08	1.80	23.88	<=33.01	Pass
			13	22.02	1.80	23.82	<=33.01	Pass
			24	21.85	1.80	23.65	<=33.01	Pass
		12	0	21.00	1.80	22.80	<=33.01	Pass
			6	21.08	1.80	22.88	<=33.01	Pass
			13	21.11	1.80	22.91	<=33.01	Pass
		25	0	21.08	1.80	22.88	<=33.01	Pass

Note1: EIRP=Conducted Power+Antenna Gain

1.1.2 B38_10MHz_EIRP

Band: 38 / Bandwidth: 10MHz / NTNV								
Modulation	Frequency (MHz)	RB Allocation		Conducted Power (dBm)	Gain (dBi)	EIRP (dBm)		Verdict
		Size	Offset			Result	Limit	
QPSK	2575	1	0	22.79	1.80	24.59	<=33.01	Pass
			25	22.88	1.80	24.68	<=33.01	Pass
			49	22.82	1.80	24.62	<=33.01	Pass
		25	0	21.81	1.80	23.61	<=33.01	Pass
			13	21.87	1.80	23.67	<=33.01	Pass
			25	21.85	1.80	23.65	<=33.01	Pass
		50	0	21.86	1.80	23.66	<=33.01	Pass
			0	22.96	1.80	24.76	<=33.01	Pass
			25	22.87	1.80	24.67	<=33.01	Pass
	2595	1	49	22.86	1.80	24.66	<=33.01	Pass
			0	21.90	1.80	23.70	<=33.01	Pass
			13	21.90	1.80	23.70	<=33.01	Pass
		25	25	21.86	1.80	23.66	<=33.01	Pass
			0	21.89	1.80	23.69	<=33.01	Pass
			0	23.05	1.80	24.85	<=33.01	Pass
		25	25	23.17	1.80	24.97	<=33.01	Pass
			49	23.18	1.80	24.98	<=33.01	Pass
			0	22.02	1.80	23.82	<=33.01	Pass
16QAM	2575	1	13	22.05	1.80	23.85	<=33.01	Pass
			25	22.10	1.80	23.90	<=33.01	Pass
			0	22.01	1.80	23.81	<=33.01	Pass
		25	0	21.79	1.80	23.59	<=33.01	Pass
			25	21.82	1.80	23.62	<=33.01	Pass
			49	21.60	1.80	23.40	<=33.01	Pass
		50	0	20.80	1.80	22.60	<=33.01	Pass
			13	20.80	1.80	22.60	<=33.01	Pass
			25	20.91	1.80	22.71	<=33.01	Pass
	2595	1	0	20.87	1.80	22.67	<=33.01	Pass
			0	21.78	1.80	23.58	<=33.01	Pass
			25	21.78	1.80	23.58	<=33.01	Pass
		25	49	21.67	1.80	23.47	<=33.01	Pass
			0	20.95	1.80	22.75	<=33.01	Pass
			13	20.90	1.80	22.70	<=33.01	Pass
		50	25	20.89	1.80	22.69	<=33.01	Pass
			0	20.83	1.80	22.63	<=33.01	Pass
			0	22.10	1.80	23.90	<=33.01	Pass
	2615	1	25	21.93	1.80	23.73	<=33.01	Pass
			49	22.24	1.80	24.04	<=33.01	Pass
			0	21.05	1.80	22.85	<=33.01	Pass
		25	13	21.06	1.80	22.86	<=33.01	Pass
			25	21.14	1.80	22.94	<=33.01	Pass
			0	21.06	1.80	22.86	<=33.01	Pass
		50	0	21.06	1.80	22.86	<=33.01	Pass
			0	21.06	1.80	22.86	<=33.01	Pass
			0	21.06	1.80	22.86	<=33.01	Pass

Note1: EIRP=Conducted Power+Antenna Gain

Band: 38 / Bandwidth: 15MHz / NTVN										
Modulation	Frequency (MHz)	RB Allocation		Conducted Power (dBm)	Gain (dBi)	EIRP (dBm)		Verdict		
		Size	Offset			Result	Limit			
QPSK	2577.5	1	0	22.67	1.80	24.47	<=33.01	Pass		
			38	22.78	1.80	24.58	<=33.01	Pass		
			74	22.83	1.80	24.63	<=33.01	Pass		
		36	0	21.82	1.80	23.62	<=33.01	Pass		
			18	21.84	1.80	23.64	<=33.01	Pass		
			39	21.86	1.80	23.66	<=33.01	Pass		
		75	0	21.88	1.80	23.68	<=33.01	Pass		
		2595	1	0	22.78	1.80	24.58	<=33.01	Pass	
				38	22.98	1.80	24.78	<=33.01	Pass	
	74			22.81	1.80	24.61	<=33.01	Pass		
	36		0	21.88	1.80	23.68	<=33.01	Pass		
			18	21.88	1.80	23.68	<=33.01	Pass		
			39	21.87	1.80	23.67	<=33.01	Pass		
	75		0	21.85	1.80	23.65	<=33.01	Pass		
	2612.5		1	0	22.96	1.80	24.76	<=33.01	Pass	
				38	23.17	1.80	24.97	<=33.01	Pass	
		74		23.22	1.80	25.02	<=33.01	Pass		
		36	0	21.90	1.80	23.70	<=33.01	Pass		
			18	21.96	1.80	23.76	<=33.01	Pass		
			39	22.01	1.80	23.81	<=33.01	Pass		
		75	0	21.98	1.80	23.78	<=33.01	Pass		
		16QAM	2577.5	1	0	21.81	1.80	23.61	<=33.01	Pass
					38	21.64	1.80	23.44	<=33.01	Pass
	74				21.79	1.80	23.59	<=33.01	Pass	
36	0			20.85	1.80	22.65	<=33.01	Pass		
	18			20.91	1.80	22.71	<=33.01	Pass		
	39			20.85	1.80	22.65	<=33.01	Pass		
75	0			20.90	1.80	22.70	<=33.01	Pass		
2595	1			0	21.71	1.80	23.51	<=33.01	Pass	
				38	21.80	1.80	23.60	<=33.01	Pass	
			74	21.75	1.80	23.55	<=33.01	Pass		
	36		0	20.87	1.80	22.67	<=33.01	Pass		
			18	20.88	1.80	22.68	<=33.01	Pass		
			39	20.91	1.80	22.71	<=33.01	Pass		
	75		0	20.84	1.80	22.64	<=33.01	Pass		
	2612.5		1	0	22.02	1.80	23.82	<=33.01	Pass	
				38	22.11	1.80	23.91	<=33.01	Pass	
74				22.21	1.80	24.01	<=33.01	Pass		
36			0	20.92	1.80	22.72	<=33.01	Pass		
			18	21.00	1.80	22.80	<=33.01	Pass		
			39	21.02	1.80	22.82	<=33.01	Pass		
75			0	20.95	1.80	22.75	<=33.01	Pass		
Note1: EIRP=Conducted Power+Antenna Gain										

1.1.4 B38_20MHz_EIRP

Band: 38 / Bandwidth: 20MHz / NTNV								
Modulation	Frequency (MHz)	RB Allocation		Conducted Power (dBm)	Gain (dBi)	EIRP (dBm)		Verdict
		Size	Offset			Result	Limit	
QPSK	2580	1	0	22.63	1.80	24.43	<=33.01	Pass
			50	22.95	1.80	24.75	<=33.01	Pass
			99	22.95	1.80	24.75	<=33.01	Pass
		50	0	21.85	1.80	23.65	<=33.01	Pass
			25	21.92	1.80	23.72	<=33.01	Pass
			50	21.98	1.80	23.78	<=33.01	Pass
		100	0	21.85	1.80	23.65	<=33.01	Pass
	2595	1	0	22.82	1.80	24.62	<=33.01	Pass
			50	22.84	1.80	24.64	<=33.01	Pass
			99	22.94	1.80	24.74	<=33.01	Pass
		50	0	21.88	1.80	23.68	<=33.01	Pass
			25	21.94	1.80	23.74	<=33.01	Pass
			50	21.97	1.80	23.77	<=33.01	Pass
		100	0	21.87	1.80	23.67	<=33.01	Pass
	2610	1	0	22.79	1.80	24.59	<=33.01	Pass
			50	23.03	1.80	24.83	<=33.01	Pass
			99	23.07	1.80	24.87	<=33.01	Pass
		50	0	21.91	1.80	23.71	<=33.01	Pass
			25	21.99	1.80	23.79	<=33.01	Pass
			50	22.07	1.80	23.87	<=33.01	Pass
		100	0	21.97	1.80	23.77	<=33.01	Pass
16QAM	2580	1	0	21.85	1.80	23.65	<=33.01	Pass
			50	22.03	1.80	23.83	<=33.01	Pass
			99	22.06	1.80	23.86	<=33.01	Pass
		50	0	20.86	1.80	22.66	<=33.01	Pass
			25	20.95	1.80	22.75	<=33.01	Pass
			50	20.93	1.80	22.73	<=33.01	Pass
		100	0	20.91	1.80	22.71	<=33.01	Pass
	2595	1	0	21.93	1.80	23.73	<=33.01	Pass
			50	21.65	1.80	23.45	<=33.01	Pass
			99	21.61	1.80	23.41	<=33.01	Pass
		50	0	20.85	1.80	22.65	<=33.01	Pass
			25	20.95	1.80	22.75	<=33.01	Pass
			50	20.89	1.80	22.69	<=33.01	Pass
		100	0	20.91	1.80	22.71	<=33.01	Pass
	2610	1	0	22.03	1.80	23.83	<=33.01	Pass
			50	21.94	1.80	23.74	<=33.01	Pass
			99	21.98	1.80	23.78	<=33.01	Pass
		50	0	20.90	1.80	22.70	<=33.01	Pass
			25	20.99	1.80	22.79	<=33.01	Pass
			50	21.08	1.80	22.88	<=33.01	Pass
		100	0	20.98	1.80	22.78	<=33.01	Pass

Note1: EIRP=Conducted Power+Antenna Gain

2. Frequency Stability

2.1 Test Result

2.1.1 B38_5MHz

Band: 38 / Bandwidth: 5MHz									
Modulation	Frequency (MHz)	RB Allocation		Temp. (°C)	Voltage (VDC)	Freq. Error (Hz)	Freq. vs. Rated (ppm)		Verdict
		Size	Offset				Result	Limit	
QPSK	2572.5	25	0	20	3.23	-9.642	-0.0037	-2.5 to 2.5	Pass
					3.80	-19.369	-0.0075	-2.5 to 2.5	Pass
					4.37	-5.364	-0.0021	-2.5 to 2.5	Pass
				-30	3.80	-23.060	-0.0090	-2.5 to 2.5	Pass
				-20	3.80	-20.571	-0.0080	-2.5 to 2.5	Pass
				-10	3.80	-26.751	-0.0104	-2.5 to 2.5	Pass
				0	3.80	-25.806	-0.0100	-2.5 to 2.5	Pass
				10	3.80	-4.449	-0.0017	-2.5 to 2.5	Pass
				30	3.80	-14.820	-0.0058	-2.5 to 2.5	Pass
				40	3.80	-4.635	-0.0018	-2.5 to 2.5	Pass
				50	3.80	-9.599	-0.0037	-2.5 to 2.5	Pass
	2595	25	0	20	3.23	-9.284	-0.0036	-2.5 to 2.5	Pass
					3.80	5.236	0.0020	-2.5 to 2.5	Pass
					4.37	14.091	0.0054	-2.5 to 2.5	Pass
				-30	3.80	-0.086	0.0000	-2.5 to 2.5	Pass
				-20	3.80	7.567	0.0029	-2.5 to 2.5	Pass
				-10	3.80	8.984	0.0035	-2.5 to 2.5	Pass
				0	3.80	11.144	0.0043	-2.5 to 2.5	Pass
				10	3.80	7.095	0.0027	-2.5 to 2.5	Pass
				30	3.80	11.201	0.0043	-2.5 to 2.5	Pass
				40	3.80	11.945	0.0046	-2.5 to 2.5	Pass
				50	3.80	-1.159	-0.0004	-2.5 to 2.5	Pass
	2617.5	25	0	20	3.23	11.358	0.0043	-2.5 to 2.5	Pass
					3.80	-1.359	-0.0005	-2.5 to 2.5	Pass
					4.37	1.588	0.0006	-2.5 to 2.5	Pass
				-30	3.80	1.774	0.0007	-2.5 to 2.5	Pass
				-20	3.80	1.559	0.0006	-2.5 to 2.5	Pass
				-10	3.80	-2.031	-0.0008	-2.5 to 2.5	Pass
				0	3.80	11.816	0.0045	-2.5 to 2.5	Pass
				10	3.80	1.273	0.0005	-2.5 to 2.5	Pass
				30	3.80	1.760	0.0007	-2.5 to 2.5	Pass
				40	3.80	-2.789	-0.0011	-2.5 to 2.5	Pass
				50	3.80	1.502	0.0006	-2.5 to 2.5	Pass
16QAM	2572.5	25	0	20	3.23	-3.591	-0.0014	-2.5 to 2.5	Pass
					3.80	11.859	0.0046	-2.5 to 2.5	Pass
					4.37	8.554	0.0033	-2.5 to 2.5	Pass
				-30	3.80	17.996	0.0070	-2.5 to 2.5	Pass
				-20	3.80	-0.386	-0.0002	-2.5 to 2.5	Pass
				-10	3.80	14.777	0.0057	-2.5 to 2.5	Pass
				0	3.80	5.107	0.0020	-2.5 to 2.5	Pass
				10	3.80	21.257	0.0083	-2.5 to 2.5	Pass
				30	3.80	29.325	0.0114	-2.5 to 2.5	Pass
				40	3.80	16.623	0.0065	-2.5 to 2.5	Pass
				50	3.80	18.253	0.0071	-2.5 to 2.5	Pass
	2595	25	0	20	3.23	5.493	0.0021	-2.5 to 2.5	Pass
					3.80	1.130	0.0004	-2.5 to 2.5	Pass
					4.37	-3.462	-0.0013	-2.5 to 2.5	Pass
				-30	3.80	14.305	0.0055	-2.5 to 2.5	Pass
				-20	3.80	2.246	0.0009	-2.5 to 2.5	Pass
				-10	3.80	-5.779	-0.0022	-2.5 to 2.5	Pass

				0	3.80	13.890	0.0054	-2.5 to 2.5	Pass
				10	3.80	12.403	0.0048	-2.5 to 2.5	Pass
				30	3.80	10.085	0.0039	-2.5 to 2.5	Pass
				40	3.80	-3.018	-0.0012	-2.5 to 2.5	Pass
				50	3.80	9.756	0.0038	-2.5 to 2.5	Pass
	2617.5	25	0	20	3.23	14.777	0.0056	-2.5 to 2.5	Pass
					3.80	-6.008	-0.0023	-2.5 to 2.5	Pass
					4.37	-2.747	-0.0010	-2.5 to 2.5	Pass
				-30	3.80	2.275	0.0009	-2.5 to 2.5	Pass
				-20	3.80	0.758	0.0003	-2.5 to 2.5	Pass
				-10	3.80	-0.343	-0.0001	-2.5 to 2.5	Pass
				0	3.80	1.402	0.0005	-2.5 to 2.5	Pass
				10	3.80	-0.687	-0.0003	-2.5 to 2.5	Pass
				30	3.80	2.847	0.0011	-2.5 to 2.5	Pass
				40	3.80	3.390	0.0013	-2.5 to 2.5	Pass
				50	3.80	-6.523	-0.0025	-2.5 to 2.5	Pass

2.1.2 B38_10MHz

Band: 38 / Bandwidth: 10MHz									
Modulation	Frequency (MHz)	RB Allocation		Temp. (°C)	Voltage (VDC)	Freq. Error (Hz)	Freq. vs. Rated (ppm)		Verdict
		Size	Offset				Result	Limit	
QPSK	2575	50	0	20	3.23	-0.944	-0.0004	-2.5 to 2.5	Pass
					3.80	-2.203	-0.0009	-2.5 to 2.5	Pass
					4.37	0.443	0.0002	-2.5 to 2.5	Pass
				-30	3.80	-2.775	-0.0011	-2.5 to 2.5	Pass
				-20	3.80	17.996	0.0070	-2.5 to 2.5	Pass
				-10	3.80	9.155	0.0036	-2.5 to 2.5	Pass
				0	3.80	5.937	0.0023	-2.5 to 2.5	Pass
				10	3.80	4.821	0.0019	-2.5 to 2.5	Pass
				30	3.80	4.377	0.0017	-2.5 to 2.5	Pass
				40	3.80	8.011	0.0031	-2.5 to 2.5	Pass
	2595	50	0	20	3.23	1.659	0.0006	-2.5 to 2.5	Pass
					3.80	5.021	0.0019	-2.5 to 2.5	Pass
					4.37	2.732	0.0011	-2.5 to 2.5	Pass
				-30	3.80	1.516	0.0006	-2.5 to 2.5	Pass
				-20	3.80	-0.973	-0.0004	-2.5 to 2.5	Pass
				-10	3.80	6.137	0.0024	-2.5 to 2.5	Pass
				0	3.80	2.303	0.0009	-2.5 to 2.5	Pass
				10	3.80	7.396	0.0029	-2.5 to 2.5	Pass
				30	3.80	7.424	0.0029	-2.5 to 2.5	Pass
				40	3.80	2.003	0.0008	-2.5 to 2.5	Pass
	2615	50	0	20	3.23	-5.450	-0.0021	-2.5 to 2.5	Pass
					3.80	3.290	0.0013	-2.5 to 2.5	Pass
					4.37	2.832	0.0011	-2.5 to 2.5	Pass
				-30	3.80	-4.935	-0.0019	-2.5 to 2.5	Pass
				-20	3.80	-4.148	-0.0016	-2.5 to 2.5	Pass
				-10	3.80	4.478	0.0017	-2.5 to 2.5	Pass
				0	3.80	9.499	0.0036	-2.5 to 2.5	Pass
				10	3.80	8.540	0.0033	-2.5 to 2.5	Pass
				30	3.80	7.210	0.0028	-2.5 to 2.5	Pass
				40	3.80	9.384	0.0036	-2.5 to 2.5	Pass
16QAM	2575	50	0	20	3.23	4.377	0.0017	-2.5 to 2.5	Pass
					3.80	-3.161	-0.0012	-2.5 to 2.5	Pass
					4.37	8.340	0.0032	-2.5 to 2.5	Pass

				-30	3.80	2.375	0.0009	-2.5 to 2.5	Pass
				-20	3.80	-1.216	-0.0005	-2.5 to 2.5	Pass
				-10	3.80	0.372	0.0001	-2.5 to 2.5	Pass
				0	3.80	-1.330	-0.0005	-2.5 to 2.5	Pass
				10	3.80	0.715	0.0003	-2.5 to 2.5	Pass
				30	3.80	13.819	0.0054	-2.5 to 2.5	Pass
				40	3.80	8.211	0.0032	-2.5 to 2.5	Pass
				50	3.80	-1.287	-0.0005	-2.5 to 2.5	Pass
	2595	50	0	20	3.23	8.612	0.0033	-2.5 to 2.5	Pass
					3.80	5.722	0.0022	-2.5 to 2.5	Pass
					4.37	5.236	0.0020	-2.5 to 2.5	Pass
				-30	3.80	4.377	0.0017	-2.5 to 2.5	Pass
				-20	3.80	12.031	0.0046	-2.5 to 2.5	Pass
				-10	3.80	10.514	0.0041	-2.5 to 2.5	Pass
				0	3.80	1.259	0.0005	-2.5 to 2.5	Pass
				10	3.80	6.881	0.0027	-2.5 to 2.5	Pass
				30	3.80	7.153	0.0028	-2.5 to 2.5	Pass
				40	3.80	7.339	0.0028	-2.5 to 2.5	Pass
				50	3.80	-4.292	-0.0017	-2.5 to 2.5	Pass
	2615	50	0	20	3.23	1.531	0.0006	-2.5 to 2.5	Pass
					3.80	5.522	0.0021	-2.5 to 2.5	Pass
					4.37	6.108	0.0023	-2.5 to 2.5	Pass
				-30	3.80	3.204	0.0012	-2.5 to 2.5	Pass
				-20	3.80	4.749	0.0018	-2.5 to 2.5	Pass
				-10	3.80	1.287	0.0005	-2.5 to 2.5	Pass
				0	3.80	-2.103	-0.0008	-2.5 to 2.5	Pass
				10	3.80	6.824	0.0026	-2.5 to 2.5	Pass
				30	3.80	5.164	0.0020	-2.5 to 2.5	Pass
				40	3.80	-5.965	-0.0023	-2.5 to 2.5	Pass
				50	3.80	7.796	0.0030	-2.5 to 2.5	Pass

2.1.3 B38_15MHz

Band: 38 / Bandwidth: 15MHz									
Modulation	Frequency (MHz)	RB Allocation		Temp. (°C)	Voltage (VDC)	Freq. Error (Hz)	Freq. vs. Rated (ppm)		Verdict
		Size	Offset				Result	Limit	
QPSK	2577.5	75	0	20	3.23	-1.059	-0.0004	-2.5 to 2.5	Pass
					3.80	-0.358	-0.0001	-2.5 to 2.5	Pass
					4.37	5.422	0.0021	-2.5 to 2.5	Pass
				-30	3.80	3.633	0.0014	-2.5 to 2.5	Pass
				-20	3.80	2.804	0.0011	-2.5 to 2.5	Pass
				-10	3.80	1.717	0.0007	-2.5 to 2.5	Pass
				0	3.80	20.313	0.0079	-2.5 to 2.5	Pass
				10	3.80	6.423	0.0025	-2.5 to 2.5	Pass
				30	3.80	0.057	0.0000	-2.5 to 2.5	Pass
				40	3.80	-0.901	-0.0003	-2.5 to 2.5	Pass
				50	3.80	-1.674	-0.0006	-2.5 to 2.5	Pass
	2595	75	0	20	3.23	11.072	0.0043	-2.5 to 2.5	Pass
					3.80	8.969	0.0035	-2.5 to 2.5	Pass
					4.37	2.532	0.0010	-2.5 to 2.5	Pass
				-30	3.80	1.588	0.0006	-2.5 to 2.5	Pass
				-20	3.80	3.047	0.0012	-2.5 to 2.5	Pass
				-10	3.80	4.520	0.0017	-2.5 to 2.5	Pass
				0	3.80	8.383	0.0032	-2.5 to 2.5	Pass
				10	3.80	5.922	0.0023	-2.5 to 2.5	Pass
				30	3.80	5.579	0.0021	-2.5 to 2.5	Pass
				40	3.80	2.918	0.0011	-2.5 to 2.5	Pass
				50	3.80	4.892	0.0019	-2.5 to 2.5	Pass

	2612.5	75	0	20	3.23	5.980	0.0023	-2.5 to 2.5	Pass
					3.80	5.665	0.0022	-2.5 to 2.5	Pass
					4.37	-2.475	-0.0009	-2.5 to 2.5	Pass
				-30	3.80	4.778	0.0018	-2.5 to 2.5	Pass
				-20	3.80	7.553	0.0029	-2.5 to 2.5	Pass
				-10	3.80	3.476	0.0013	-2.5 to 2.5	Pass
				0	3.80	-2.761	-0.0011	-2.5 to 2.5	Pass
				10	3.80	-2.031	-0.0008	-2.5 to 2.5	Pass
				30	3.80	3.648	0.0014	-2.5 to 2.5	Pass
				40	3.80	4.992	0.0019	-2.5 to 2.5	Pass
				50	3.80	9.284	0.0036	-2.5 to 2.5	Pass
16QAM	2577.5	75	0	20	3.23	4.706	0.0018	-2.5 to 2.5	Pass
					3.80	8.941	0.0035	-2.5 to 2.5	Pass
					4.37	5.107	0.0020	-2.5 to 2.5	Pass
				-30	3.80	4.334	0.0017	-2.5 to 2.5	Pass
				-20	3.80	4.292	0.0017	-2.5 to 2.5	Pass
				-10	3.80	-0.701	-0.0003	-2.5 to 2.5	Pass
				0	3.80	0.229	0.0001	-2.5 to 2.5	Pass
				10	3.80	6.008	0.0023	-2.5 to 2.5	Pass
				30	3.80	5.050	0.0020	-2.5 to 2.5	Pass
				40	3.80	4.935	0.0019	-2.5 to 2.5	Pass
				50	3.80	6.166	0.0024	-2.5 to 2.5	Pass
	2595	75	0	20	3.23	0.958	0.0004	-2.5 to 2.5	Pass
					3.80	6.738	0.0026	-2.5 to 2.5	Pass
					4.37	8.984	0.0035	-2.5 to 2.5	Pass
				-30	3.80	1.431	0.0006	-2.5 to 2.5	Pass
				-20	3.80	6.781	0.0026	-2.5 to 2.5	Pass
				-10	3.80	4.921	0.0019	-2.5 to 2.5	Pass
				0	3.80	1.502	0.0006	-2.5 to 2.5	Pass
				10	3.80	4.206	0.0016	-2.5 to 2.5	Pass
				30	3.80	4.821	0.0019	-2.5 to 2.5	Pass
				40	3.80	5.722	0.0022	-2.5 to 2.5	Pass
				50	3.80	4.392	0.0017	-2.5 to 2.5	Pass
	2612.5	75	0	20	3.23	6.251	0.0024	-2.5 to 2.5	Pass
					3.80	3.119	0.0012	-2.5 to 2.5	Pass
					4.37	4.764	0.0018	-2.5 to 2.5	Pass
				-30	3.80	1.931	0.0007	-2.5 to 2.5	Pass
				-20	3.80	4.349	0.0017	-2.5 to 2.5	Pass
				-10	3.80	4.020	0.0015	-2.5 to 2.5	Pass
				0	3.80	2.418	0.0009	-2.5 to 2.5	Pass
				10	3.80	-3.576	-0.0014	-2.5 to 2.5	Pass
				30	3.80	4.821	0.0018	-2.5 to 2.5	Pass
				40	3.80	6.437	0.0025	-2.5 to 2.5	Pass
				50	3.80	1.416	0.0005	-2.5 to 2.5	Pass

2.1.4 B38_20MHz

Band: 38 / Bandwidth: 20MHz									
Modulation	Frequency (MHz)	RB Allocation		Temp. (°C)	Voltage (VDC)	Freq. Error (Hz)	Freq. vs. Rated (ppm)		Verdict
		Size	Offset				Result	Limit	
QPSK	2580	100	0	20	3.23	3.161	0.0012	-2.5 to 2.5	Pass
					3.80	-1.602	-0.0006	-2.5 to 2.5	Pass
					4.37	4.549	0.0018	-2.5 to 2.5	Pass
				-30	3.80	2.418	0.0009	-2.5 to 2.5	Pass
				-20	3.80	4.277	0.0017	-2.5 to 2.5	Pass
				-10	3.80	5.636	0.0022	-2.5 to 2.5	Pass
				0	3.80	5.908	0.0023	-2.5 to 2.5	Pass
				10	3.80	1.888	0.0007	-2.5 to 2.5	Pass

				30	3.80	4.606	0.0018	-2.5 to 2.5	Pass
				40	3.80	3.405	0.0013	-2.5 to 2.5	Pass
				50	3.80	1.745	0.0007	-2.5 to 2.5	Pass
	2595	100	0	20	3.23	3.247	0.0013	-2.5 to 2.5	Pass
					3.80	3.977	0.0015	-2.5 to 2.5	Pass
					4.37	1.903	0.0007	-2.5 to 2.5	Pass
				-30	3.80	7.339	0.0028	-2.5 to 2.5	Pass
				-20	3.80	3.304	0.0013	-2.5 to 2.5	Pass
				-10	3.80	7.610	0.0029	-2.5 to 2.5	Pass
				0	3.80	-1.087	-0.0004	-2.5 to 2.5	Pass
				10	3.80	2.832	0.0011	-2.5 to 2.5	Pass
				30	3.80	8.526	0.0033	-2.5 to 2.5	Pass
				40	3.80	11.802	0.0045	-2.5 to 2.5	Pass
				50	3.80	2.174	0.0008	-2.5 to 2.5	Pass
	2610	100	0	20	3.23	3.705	0.0014	-2.5 to 2.5	Pass
					3.80	0.658	0.0003	-2.5 to 2.5	Pass
					4.37	3.104	0.0012	-2.5 to 2.5	Pass
				-30	3.80	8.955	0.0034	-2.5 to 2.5	Pass
				-20	3.80	6.580	0.0025	-2.5 to 2.5	Pass
				-10	3.80	7.181	0.0028	-2.5 to 2.5	Pass
				0	3.80	2.089	0.0008	-2.5 to 2.5	Pass
				10	3.80	1.130	0.0004	-2.5 to 2.5	Pass
				30	3.80	2.947	0.0011	-2.5 to 2.5	Pass
				40	3.80	0.100	0.0000	-2.5 to 2.5	Pass
				50	3.80	3.533	0.0014	-2.5 to 2.5	Pass
16QAM	2580	100	0	20	3.23	-0.100	0.0000	-2.5 to 2.5	Pass
					3.80	4.649	0.0018	-2.5 to 2.5	Pass
					4.37	-0.172	-0.0001	-2.5 to 2.5	Pass
				-30	3.80	0.257	0.0001	-2.5 to 2.5	Pass
				-20	3.80	5.708	0.0022	-2.5 to 2.5	Pass
				-10	3.80	-5.078	-0.0020	-2.5 to 2.5	Pass
				0	3.80	1.731	0.0007	-2.5 to 2.5	Pass
				10	3.80	0.243	0.0001	-2.5 to 2.5	Pass
				30	3.80	-0.200	-0.0001	-2.5 to 2.5	Pass
				40	3.80	-0.801	-0.0003	-2.5 to 2.5	Pass
				50	3.80	0.572	0.0002	-2.5 to 2.5	Pass
	2595	100	0	20	3.23	6.094	0.0023	-2.5 to 2.5	Pass
					3.80	7.567	0.0029	-2.5 to 2.5	Pass
					4.37	2.489	0.0010	-2.5 to 2.5	Pass
				-30	3.80	2.146	0.0008	-2.5 to 2.5	Pass
				-20	3.80	0.672	0.0003	-2.5 to 2.5	Pass
				-10	3.80	4.206	0.0016	-2.5 to 2.5	Pass
				0	3.80	4.091	0.0016	-2.5 to 2.5	Pass
				10	3.80	5.493	0.0021	-2.5 to 2.5	Pass
				30	3.80	1.273	0.0005	-2.5 to 2.5	Pass
				40	3.80	4.449	0.0017	-2.5 to 2.5	Pass
				50	3.80	2.317	0.0009	-2.5 to 2.5	Pass
	2610	100	0	20	3.23	3.090	0.0012	-2.5 to 2.5	Pass
					3.80	3.862	0.0015	-2.5 to 2.5	Pass
					4.37	4.034	0.0015	-2.5 to 2.5	Pass
				-30	3.80	11.745	0.0045	-2.5 to 2.5	Pass
				-20	3.80	1.388	0.0005	-2.5 to 2.5	Pass
				-10	3.80	1.917	0.0007	-2.5 to 2.5	Pass
				0	3.80	2.189	0.0008	-2.5 to 2.5	Pass
				10	3.80	4.578	0.0018	-2.5 to 2.5	Pass
				30	3.80	6.895	0.0026	-2.5 to 2.5	Pass
				40	3.80	-1.631	-0.0006	-2.5 to 2.5	Pass
				50	3.80	4.134	0.0016	-2.5 to 2.5	Pass

3. Modulation Characteristics

3.1 Test Result

3.1.1 B38_5MHz

Band: 38 / Bandwidth: 5MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Modulation Characteristics		Verdict
		Size	Offset	Result	Limit	
QPSK	2595	25	0	Refer To Test Graph		Pass
16QAM	2595	25	0	Refer To Test Graph		Pass

3.1.2 B38_10MHz

Band: 38 / Bandwidth: 10MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Modulation Characteristics		Verdict
		Size	Offset	Result	Limit	
QPSK	2595	50	0	Refer To Test Graph		Pass
16QAM	2595	50	0	Refer To Test Graph		Pass

3.1.3 B38_15MHz

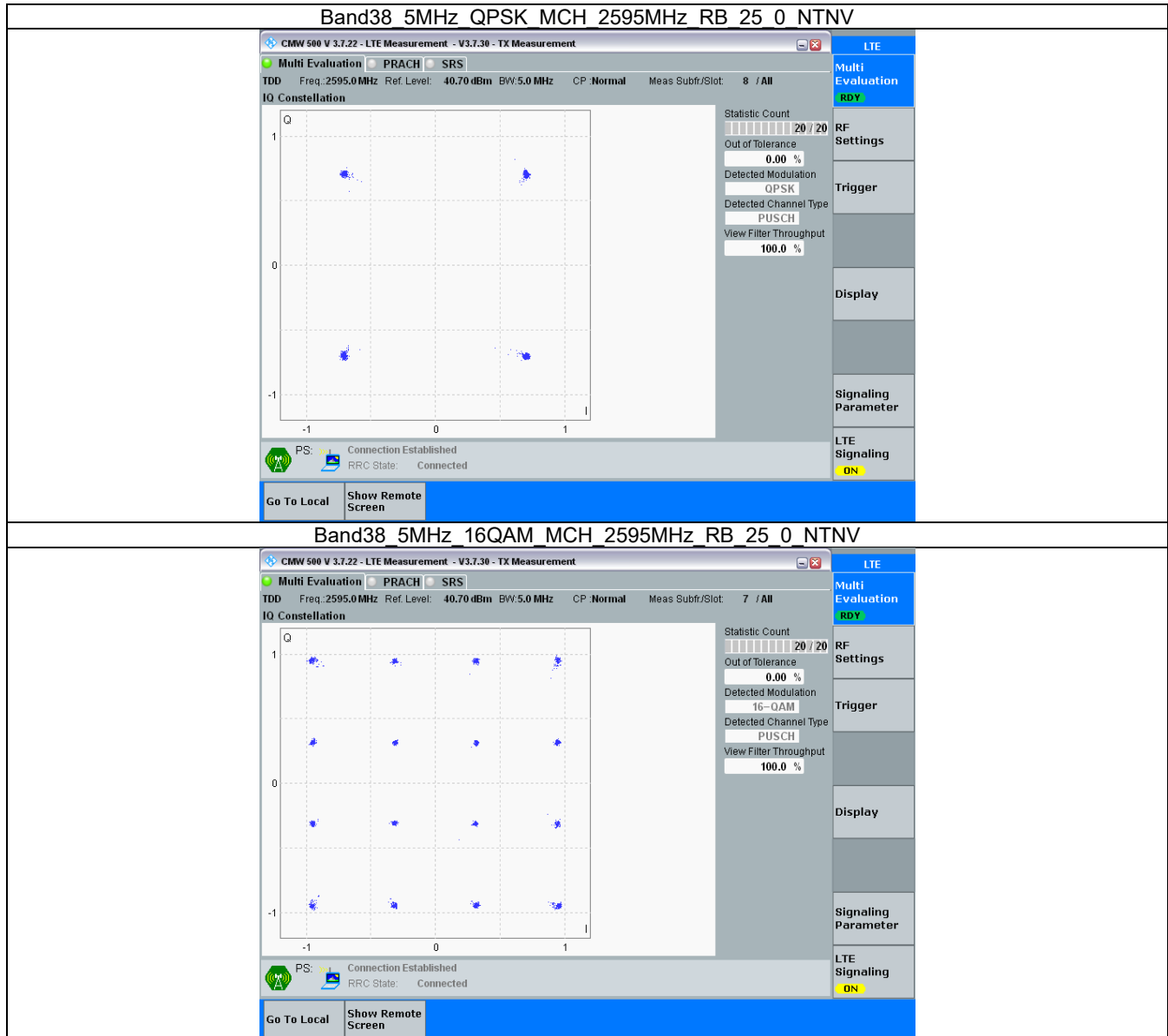
Band: 38 / Bandwidth: 15MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Modulation Characteristics		Verdict
		Size	Offset	Result	Limit	
QPSK	2595	75	0	Refer To Test Graph		Pass
16QAM	2595	75	0	Refer To Test Graph		Pass

3.1.4 B38_20MHz

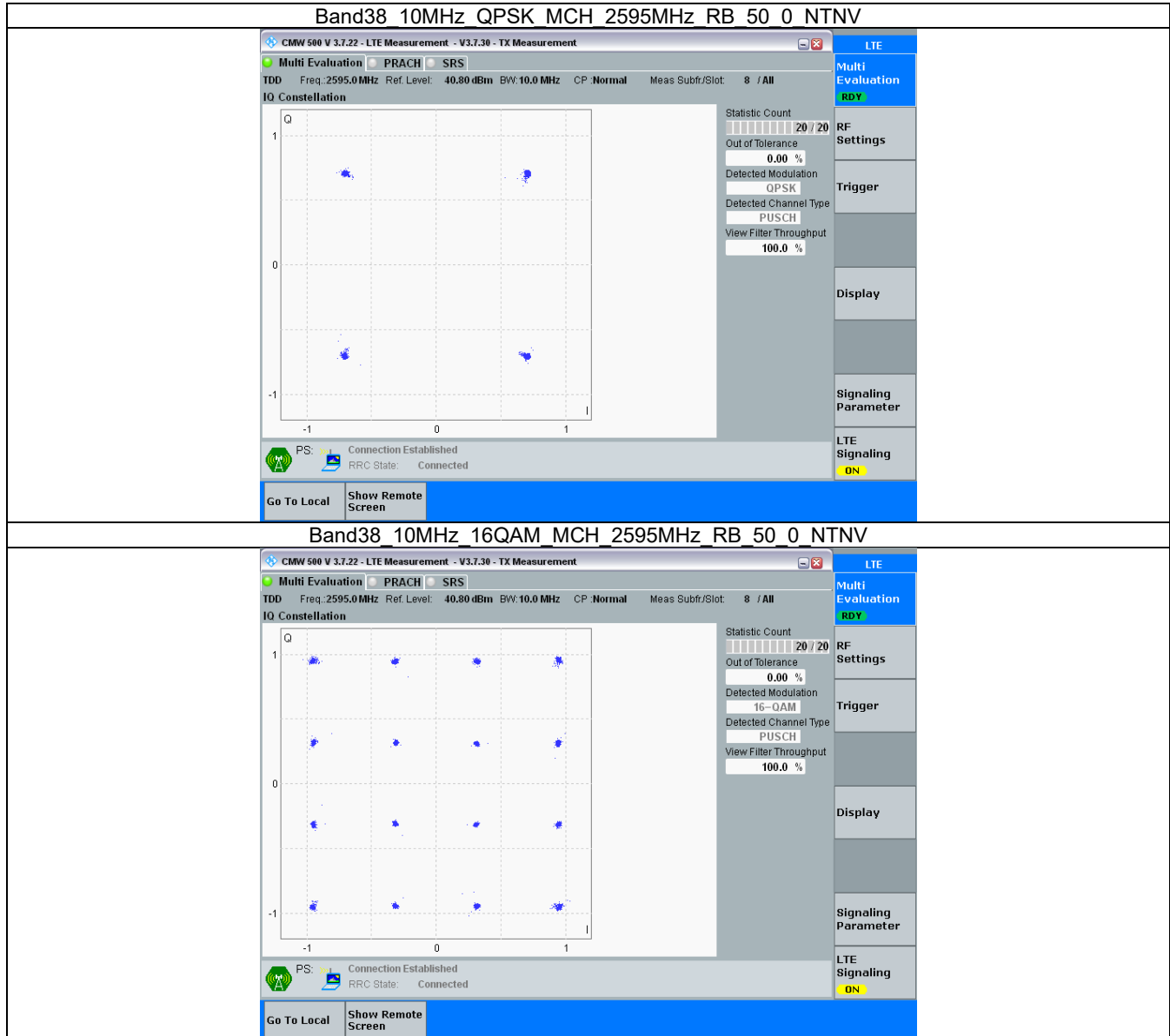
Band: 38 / Bandwidth: 20MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Modulation Characteristics		Verdict
		Size	Offset	Result	Limit	
QPSK	2595	100	0	Refer To Test Graph		Pass
16QAM	2595	100	0	Refer To Test Graph		Pass

3.2 Test Graph

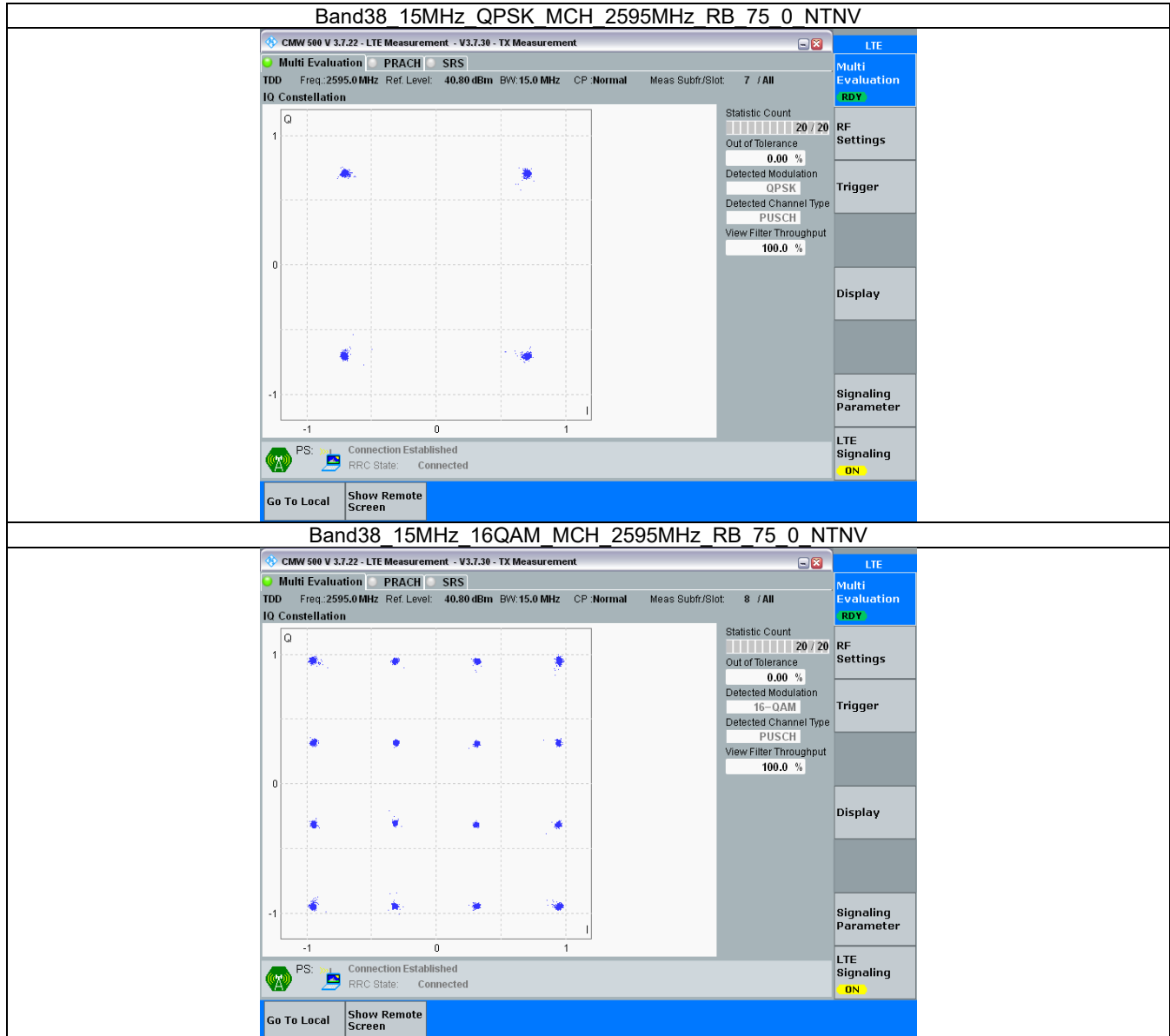
3.2.1 B38_5MHz



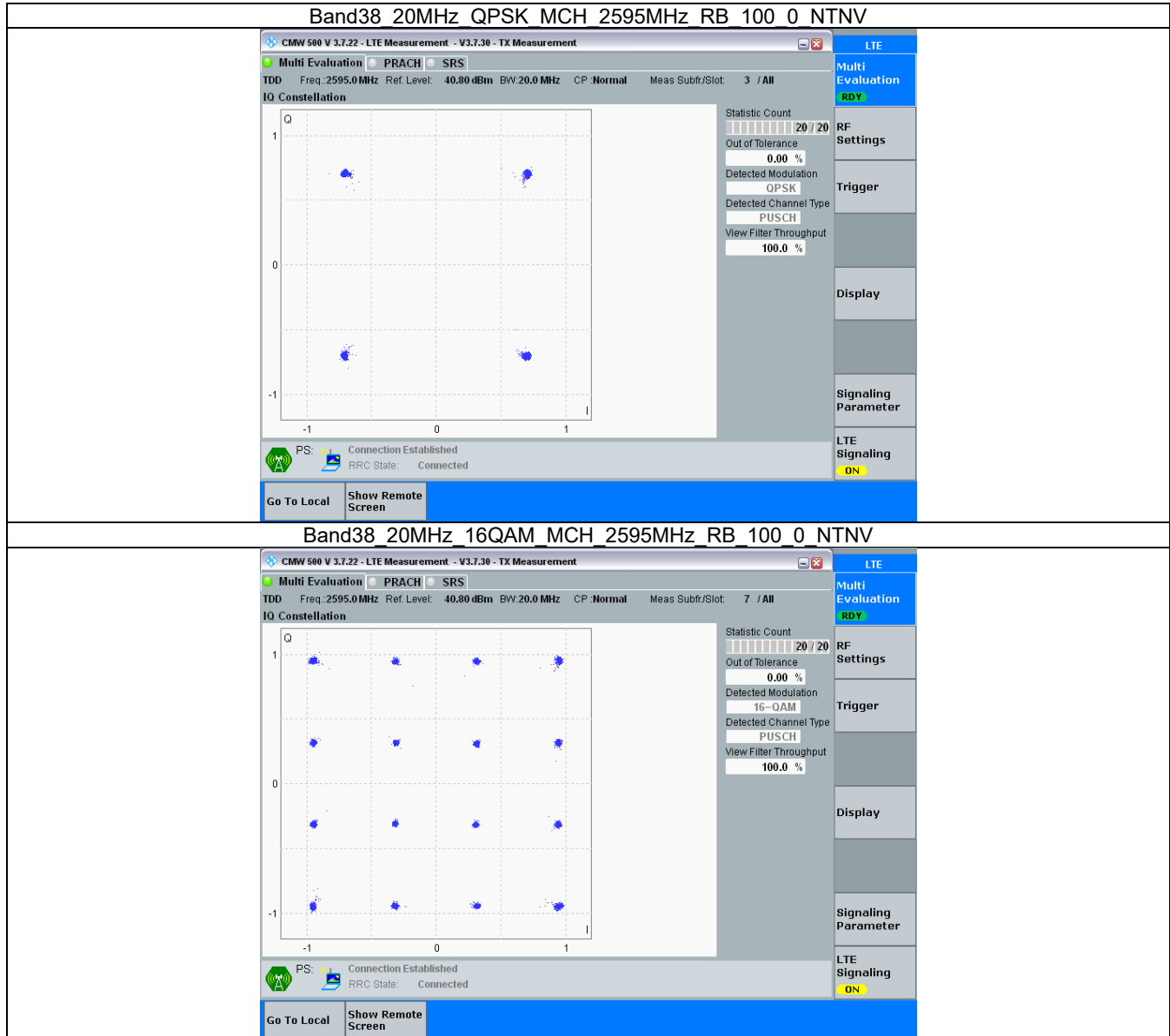
3.2.2 B38_10MHz



3.2.3 B38_15MHz



3.2.4 B38_20MHz



4. 99% & 26dB Bandwidth

4.1 Test Result

4.1.1 Band38_OBW

Band: 38 / NTNV							
Bandwidth (MHz)	Modulation	Frequency (MHz)	RB Allocation		99% Occupied Bandwidth (MHz)		Verdict
			Size	Offset	Result	Limit	
5	QPSK	2572.5	25	0	4.559	/	Pass
		2595	25	0	4.558	/	Pass
		2617.5	25	0	4.549	/	Pass
	16QAM	2572.5	25	0	4.540	/	Pass
		2595	25	0	4.563	/	Pass
		2617.5	25	0	4.551	/	Pass
10	QPSK	2575	50	0	9.066	/	Pass
		2595	50	0	9.064	/	Pass
		2615	50	0	9.068	/	Pass
	16QAM	2575	50	0	9.097	/	Pass
		2595	50	0	9.067	/	Pass
		2615	50	0	9.091	/	Pass
15	QPSK	2577.5	75	0	13.564	/	Pass
		2595	75	0	13.572	/	Pass
		2612.5	75	0	13.620	/	Pass
	16QAM	2577.5	75	0	13.632	/	Pass
		2595	75	0	13.570	/	Pass
		2612.5	75	0	13.666	/	Pass
20	QPSK	2580	100	0	18.112	/	Pass
		2595	100	0	18.092	/	Pass
		2610	100	0	18.070	/	Pass
	16QAM	2580	100	0	18.132	/	Pass
		2595	100	0	18.120	/	Pass
		2610	100	0	18.111	/	Pass

4.1.2 Band38_XDB

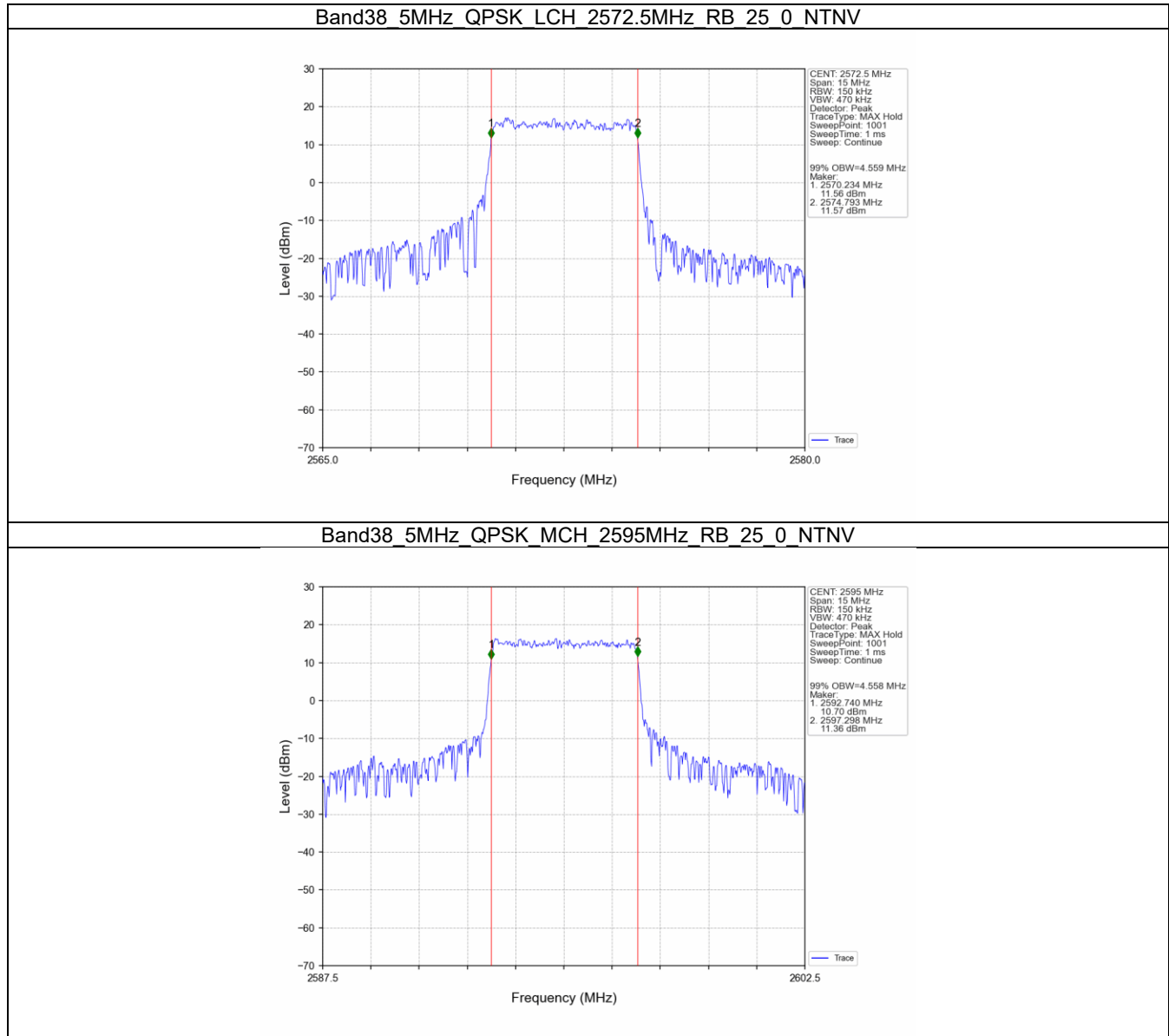
Band: 38 / NTNV							
Bandwidth (MHz)	Modulation	Frequency (MHz)	RB Allocation		26dB Bandwidth (MHz)		Verdict
			Size	Offset	Result	Limit	
5	QPSK	2572.5	25	0	5.469	/	Pass
		2595	25	0	5.942	/	Pass
		2617.5	25	0	5.175	/	Pass
	16QAM	2572.5	25	0	5.204	/	Pass
		2595	25	0	5.113	/	Pass
		2617.5	25	0	5.175	/	Pass
10	QPSK	2575	50	0	10.466	/	Pass
		2595	50	0	11.568	/	Pass
		2615	50	0	10.507	/	Pass
	16QAM	2575	50	0	11.615	/	Pass
		2595	50	0	11.354	/	Pass
		2615	50	0	10.190	/	Pass
15	QPSK	2577.5	75	0	15.998	/	Pass
		2595	75	0	15.365	/	Pass
		2612.5	75	0	15.207	/	Pass
	16QAM	2577.5	75	0	16.002	/	Pass
		2595	75	0	15.308	/	Pass
		2612.5	75	0	15.777	/	Pass
20	QPSK	2580	100	0	21.596	/	Pass



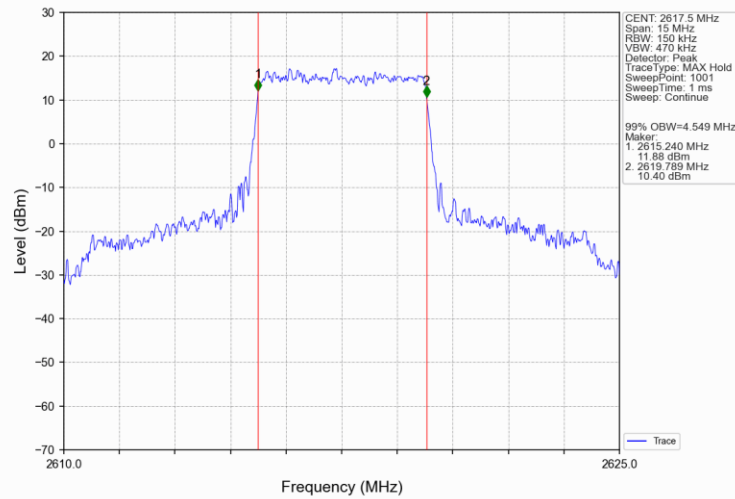
		2595	100	0	20.723	/	Pass
		2610	100	0	19.904	/	Pass
	16QAM	2580	100	0	21.344	/	Pass
		2595	100	0	22.782	/	Pass
		2610	100	0	20.174	/	Pass

4.2 Test Graph

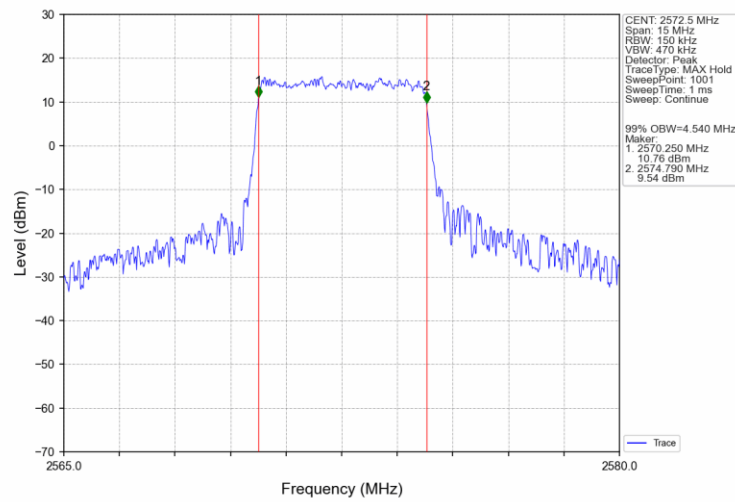
4.2.1 Band38_OBW



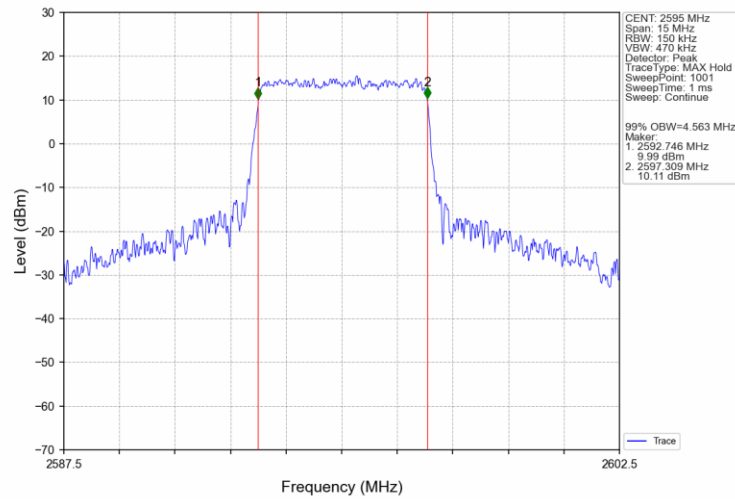
Band38 5MHz QPSK HCH 2617.5MHz RB 25 0 NTNV



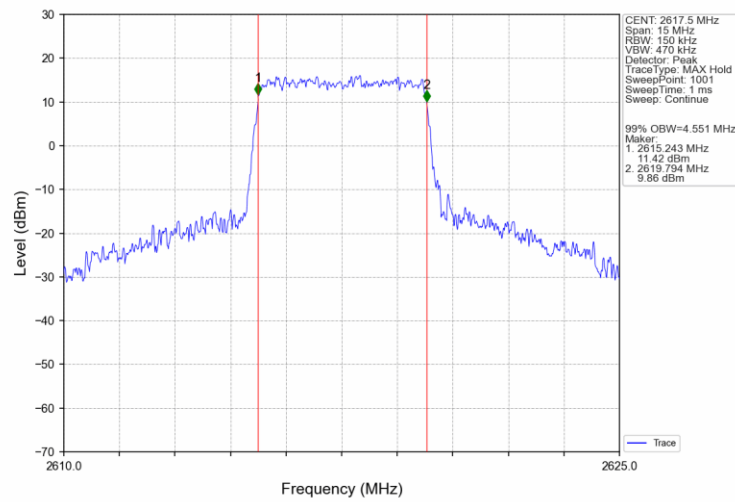
Band38 5MHz 16QAM LCH 2572.5MHz RB 25 0 NTNV



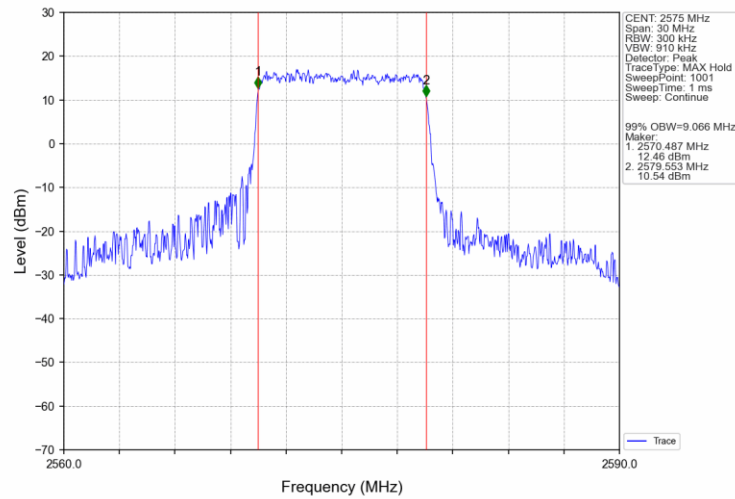
Band38 5MHz 16QAM MCH 2595MHz RB 25 0 NTNV



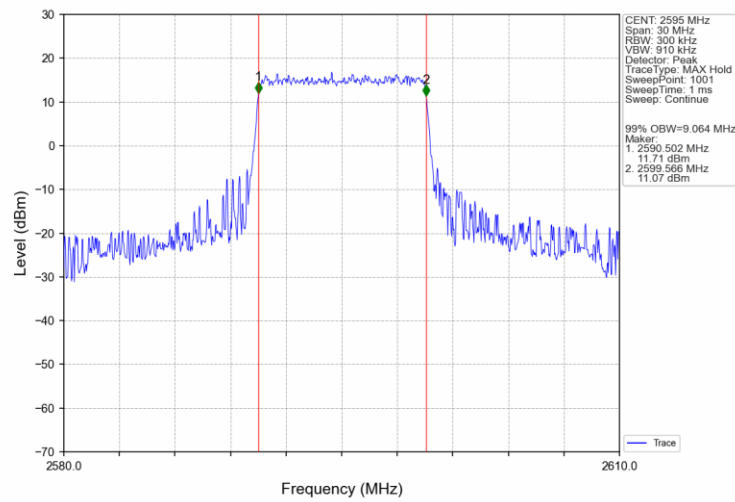
Band38 5MHz 16QAM HCH 2617.5MHz RB 25 0 NTNV



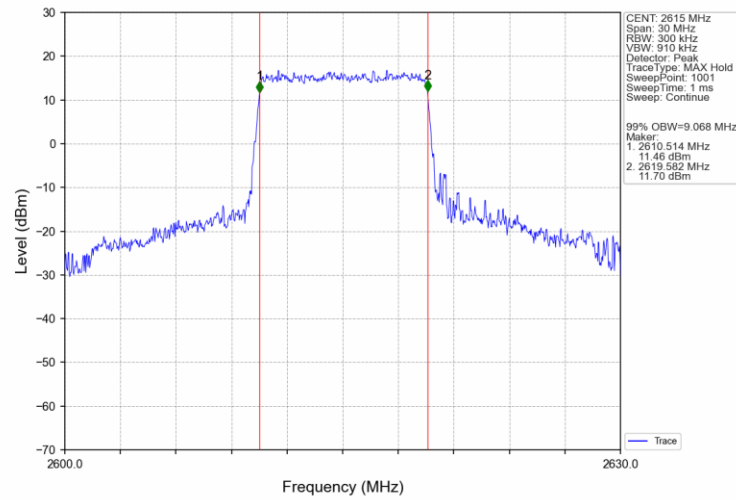
Band38 10MHz QPSK LCH 2575MHz RB 50 0 NTV



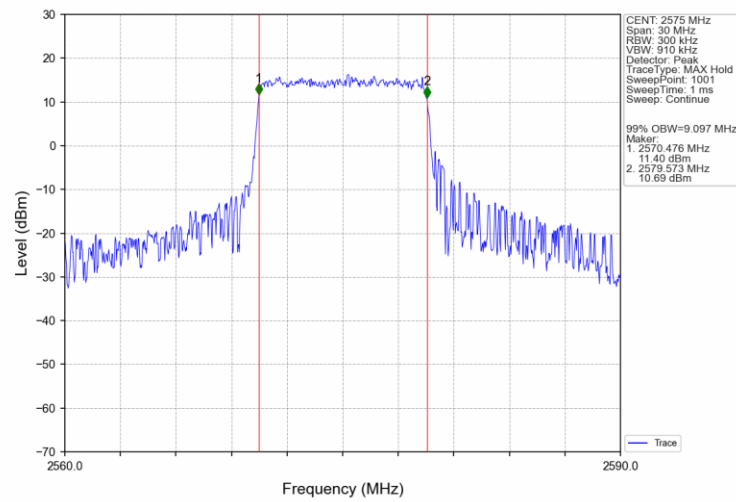
Band38 10MHz QPSK MCH 2595MHz RB 50 0 NTV



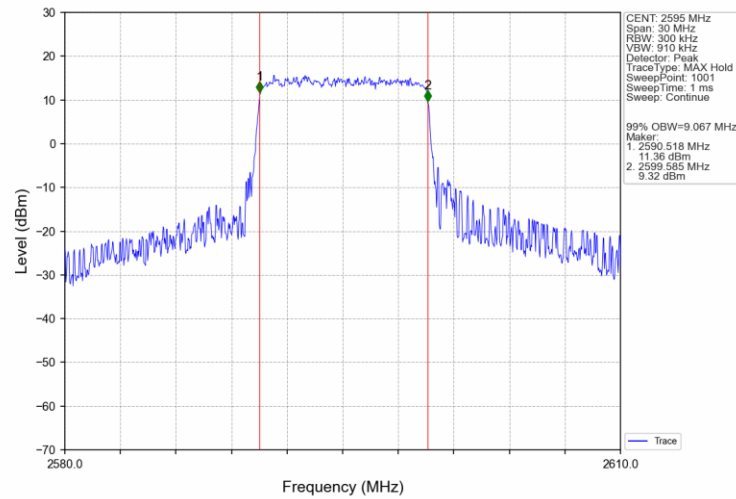
Band38 10MHz QPSK HCH 2615MHz RB 50 0 NTV



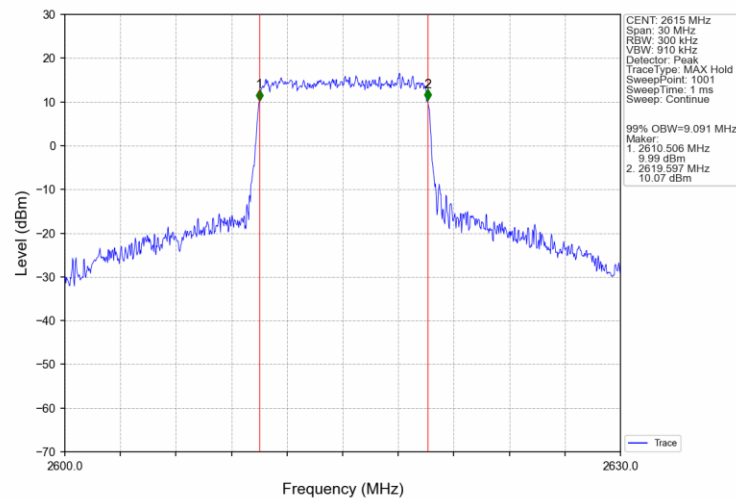
Band38 10MHz 16QAM LCH 2575MHz RB 50 0 NTV



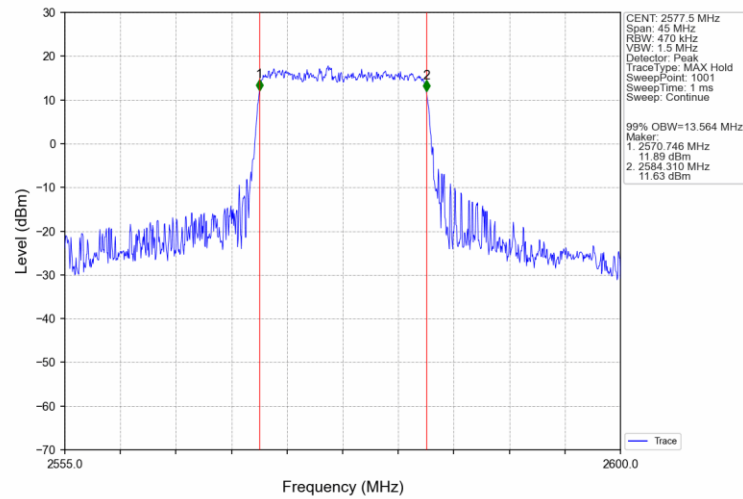
Band38 10MHz 16QAM MCH 2595MHz RB 50 0 NTN



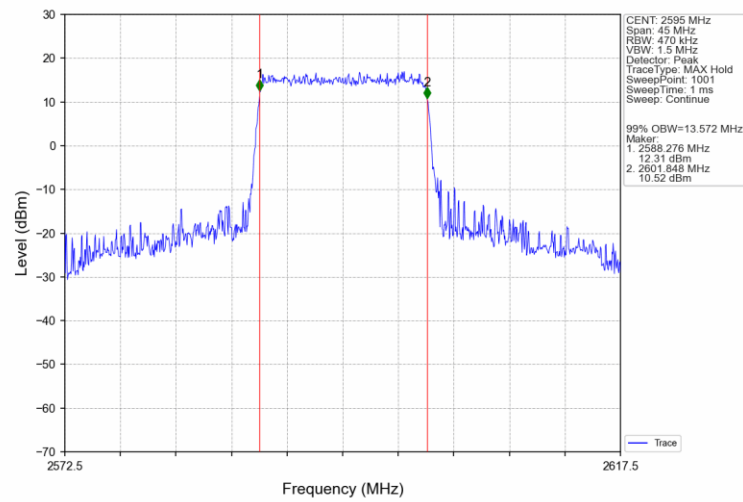
Band38 10MHz 16QAM HCH 2615MHz RB 50 0 NTN



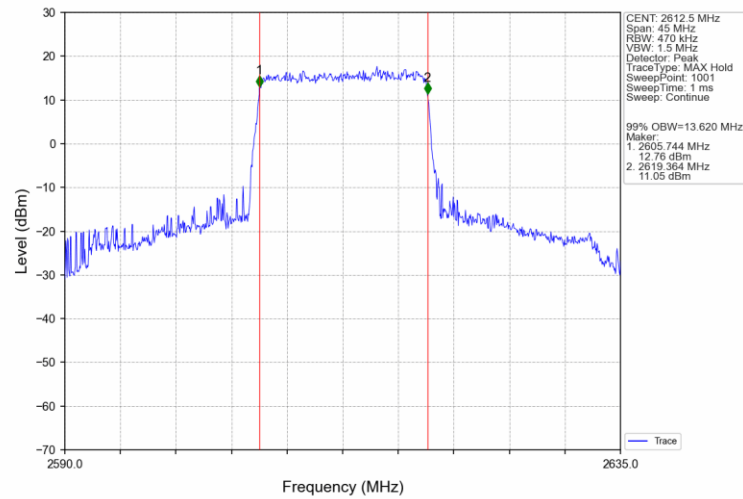
Band38 15MHz QPSK LCH 2577.5MHz RB 75 0 NTN



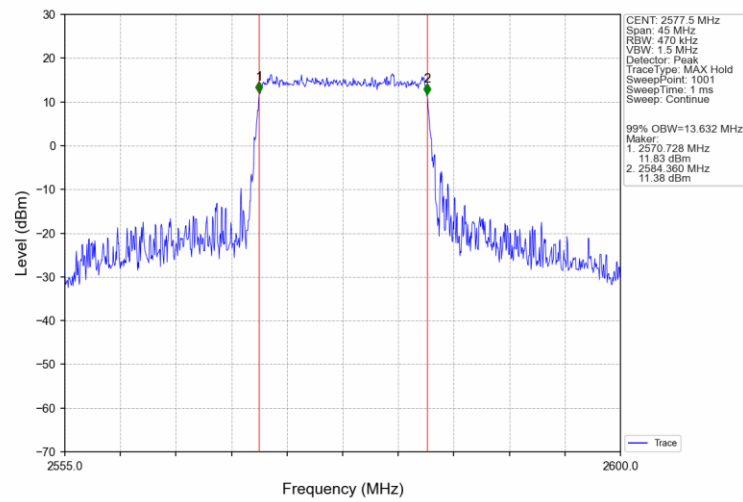
Band38 15MHz QPSK MCH 2595MHz RB 75 0 NTN



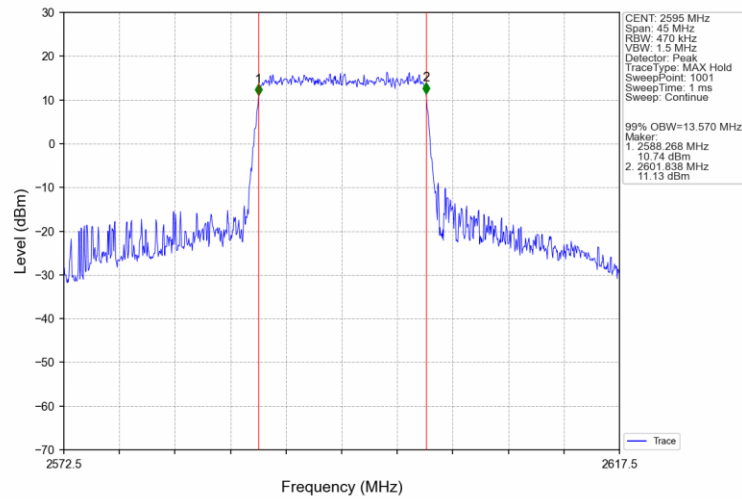
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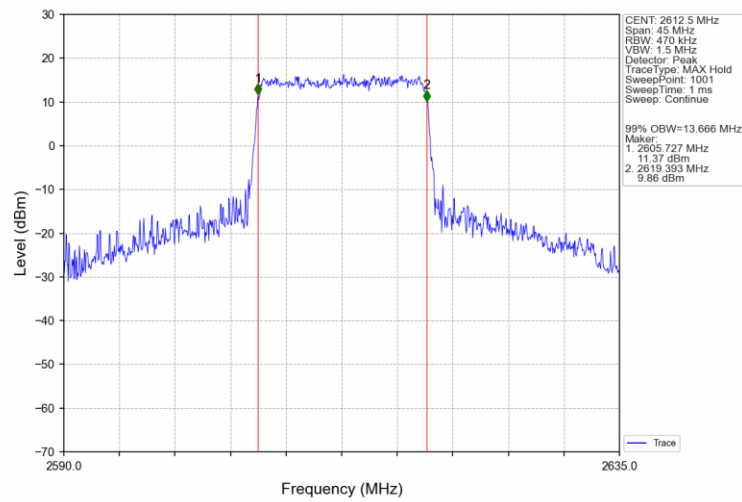
Band38 15MHz 16QAM LCH 2577.5MHz RB 75 0 NTN



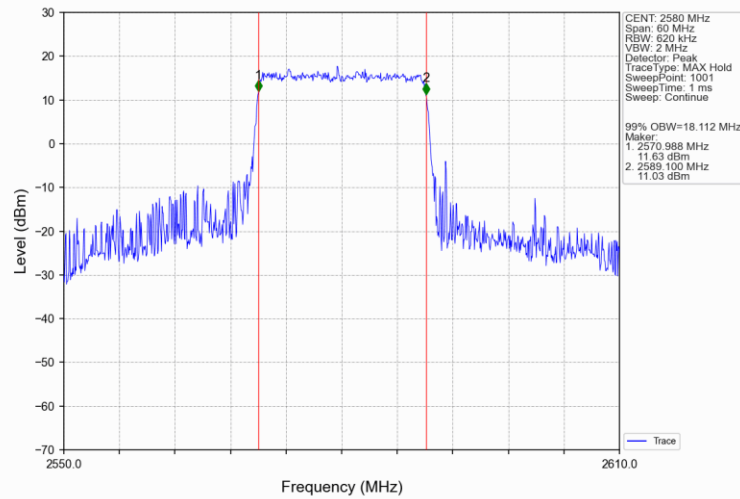
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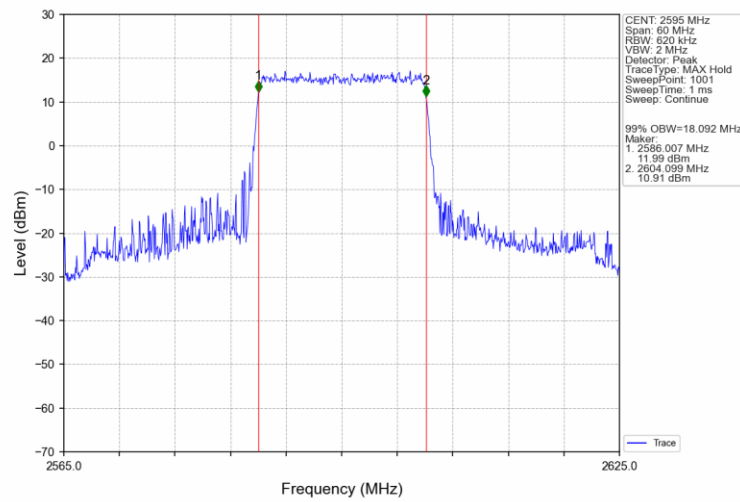
Band38 15MHz 16QAM HCH 2612.5MHz RB 75 0 NTN



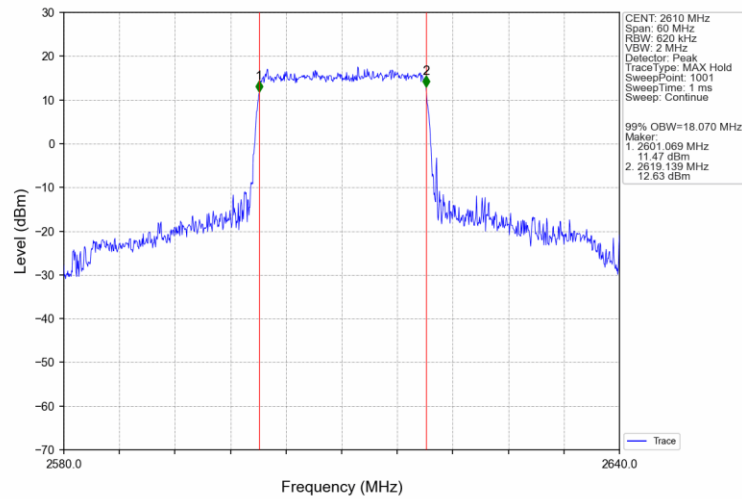
Band38 20MHz QPSK LCH 2580MHz RB 100 0 NTNV



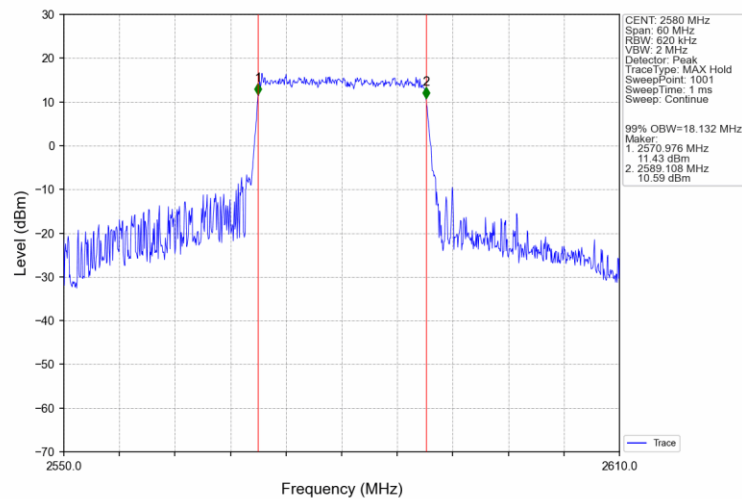
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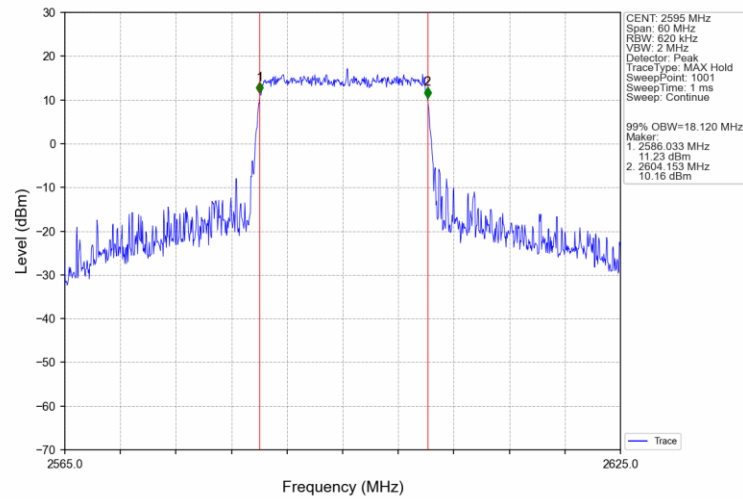
Band38 20MHz QPSK HCH 2610MHz RB 100 0 NTN



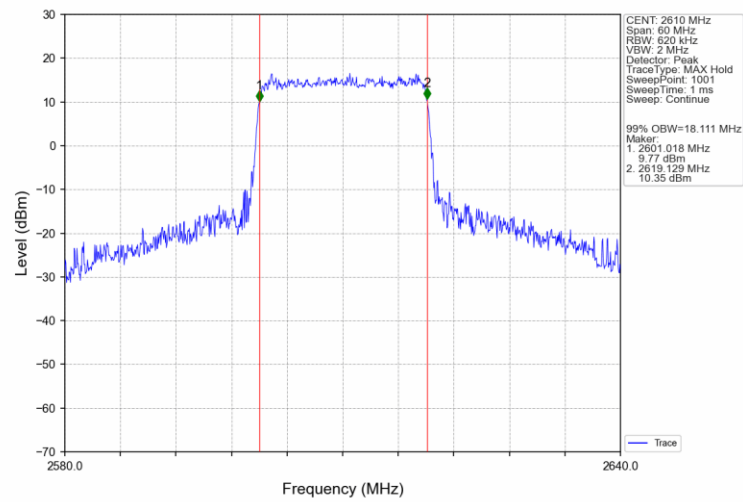
Band38 20MHz 16QAM LCH 2580MHz RB 100 0 NTN



Band38_20MHz_16QAM_MCH_2595MHz_RB_100_0_NTNV

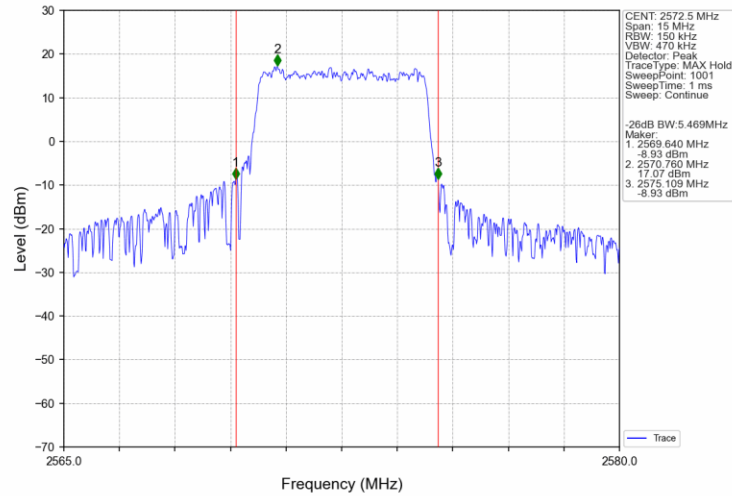


Band38_20MHz_16QAM_HCH_2610MHz_RB_100_0_NTNV

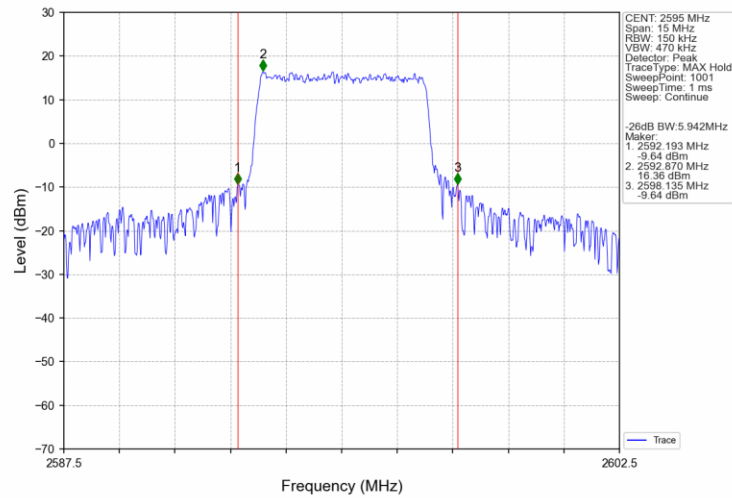


4.2.2 Band38_XDB

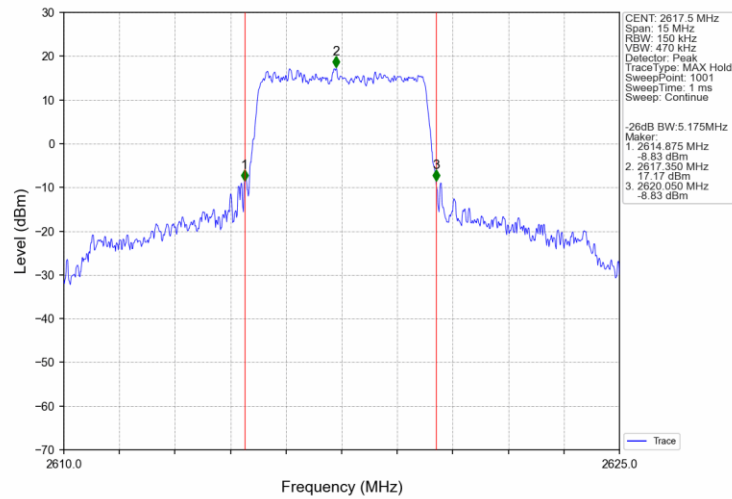
Band38 5MHz QPSK LCH 2572.5MHz RB 25 0 NTV



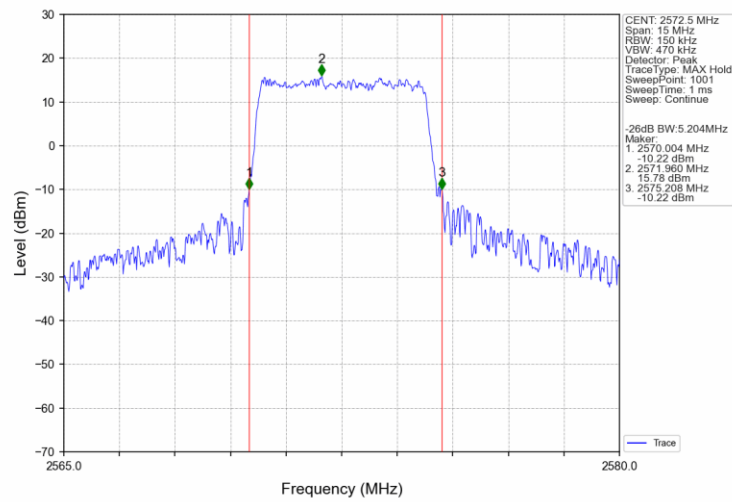
Band38 5MHz QPSK MCH 2595MHz RB 25 0 NTV



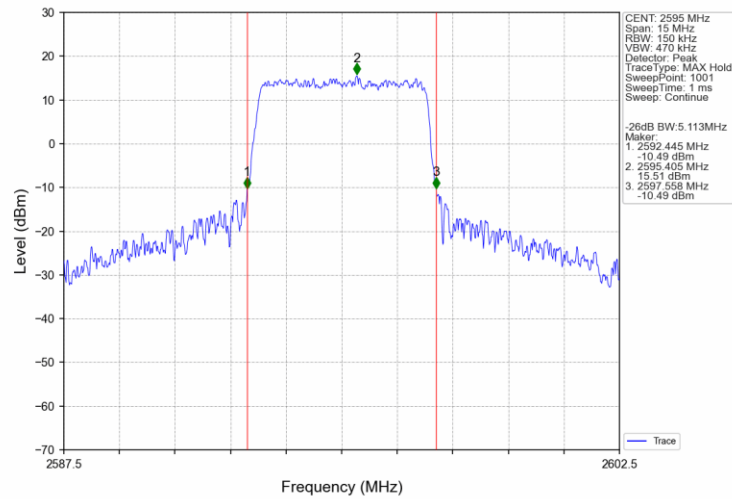
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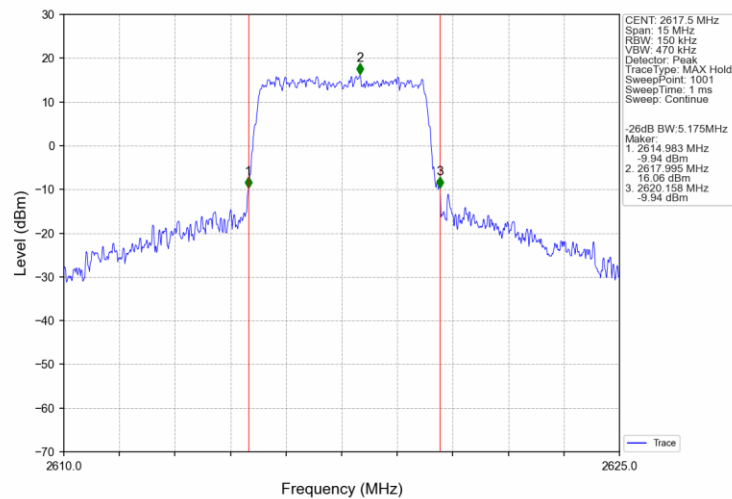
Band38 5MHz 16QAM LCH 2572.5MHz RB 25 0 NTNV



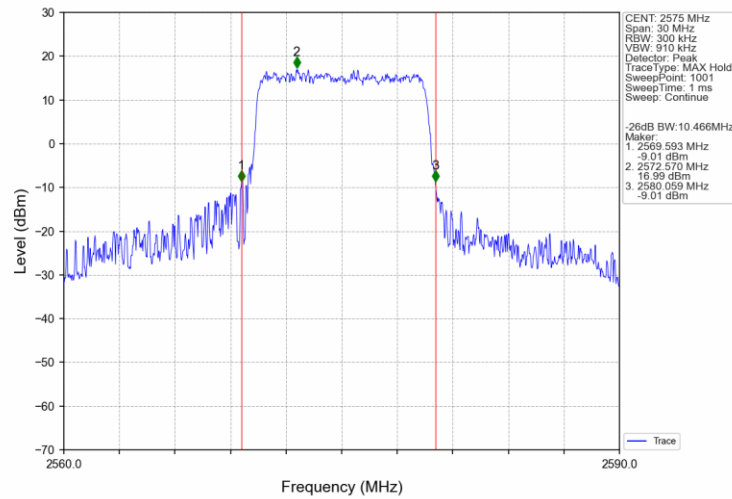
Band38 5MHz 16QAM MCH 2595MHz RB 25 0 NTNV



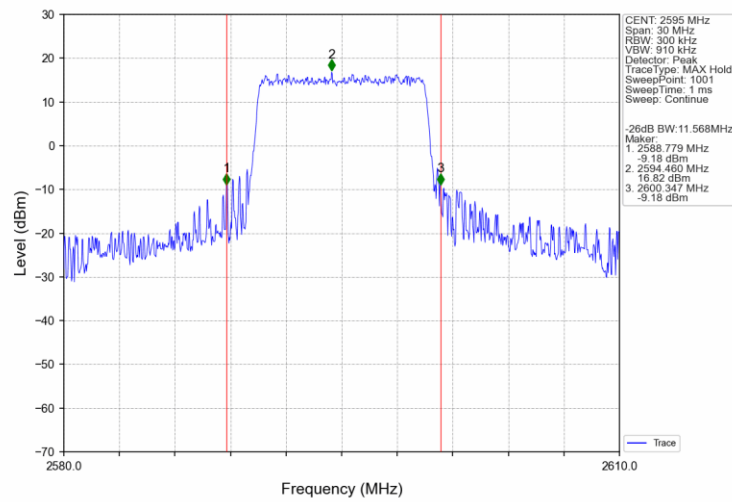
Band38 5MHz 16QAM HCH 2617.5MHz RB 25 0 NTNV



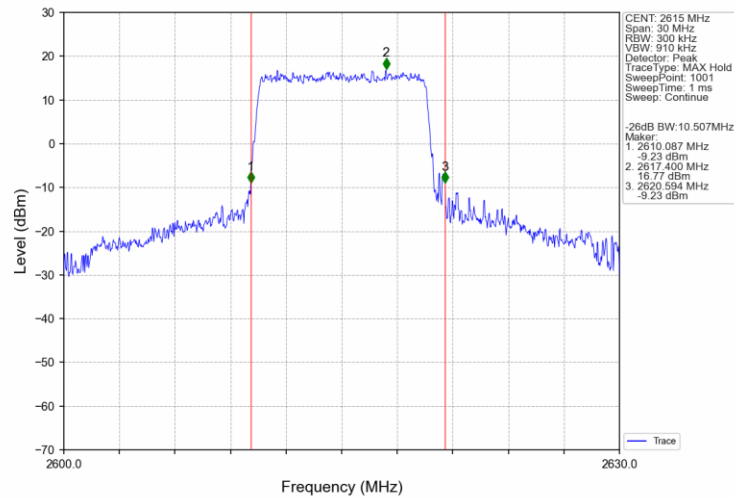
Band38 10MHz QPSK LCH 2575MHz RB 50 0 NTNV



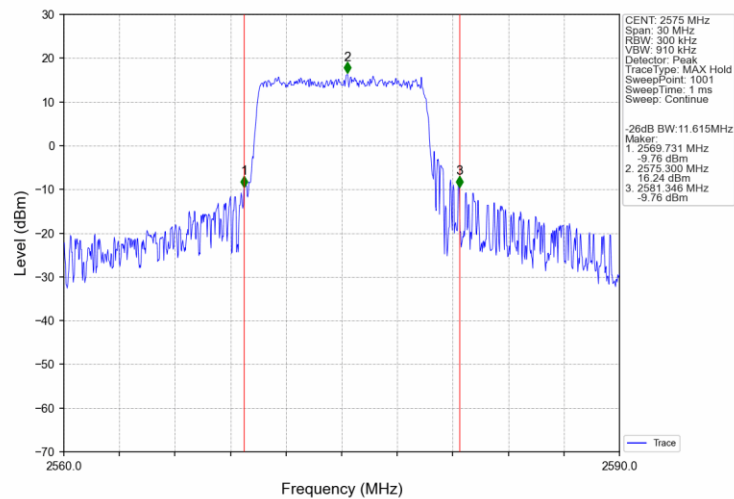
Band38 10MHz QPSK MCH 2595MHz RB 50 0 NTNV



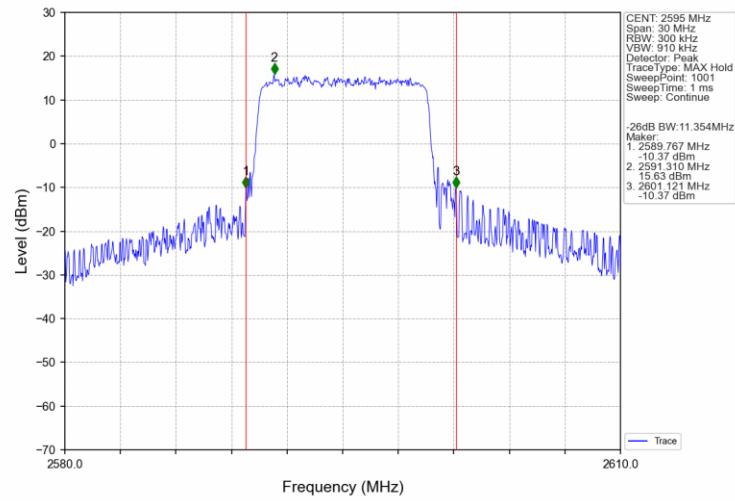
Band38 10MHz QPSK HCH 2615MHz RB 50 0 NTV



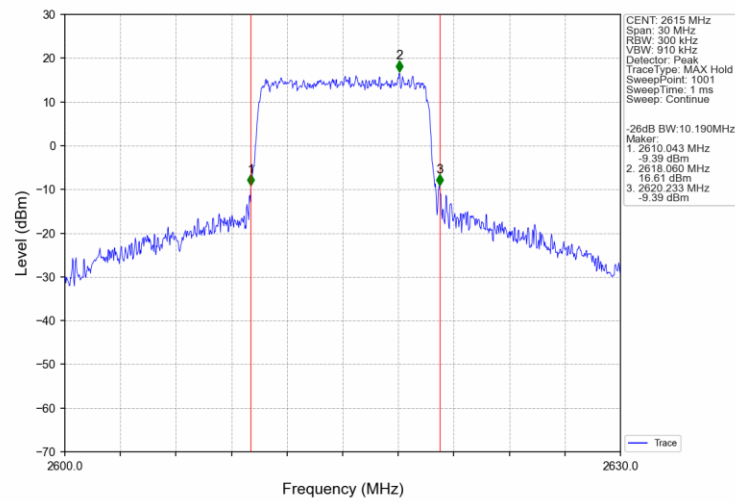
Band38 10MHz 16QAM LCH 2575MHz RB 50 0 NTV



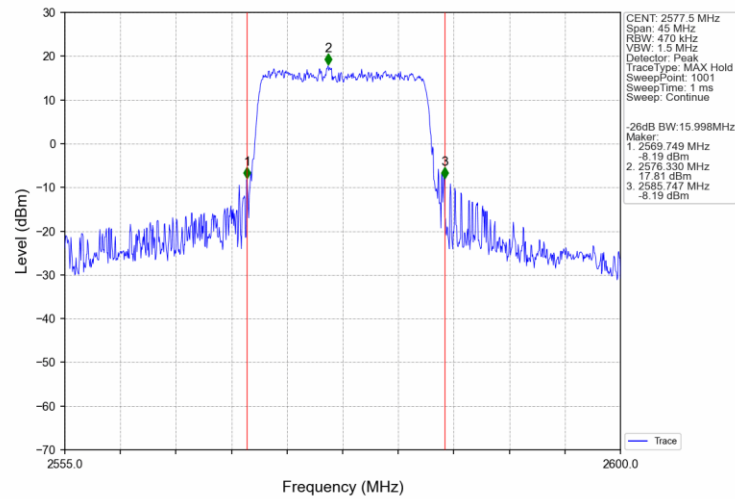
Band38 10MHz 16QAM MCH 2595MHz RB 50 0 NTN



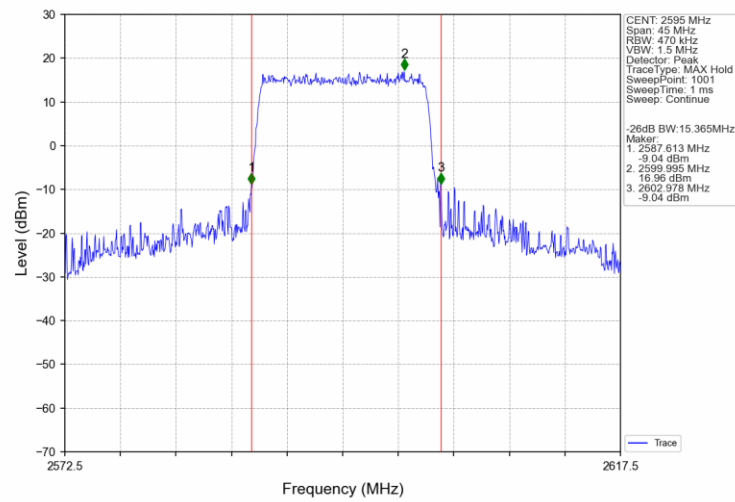
Band38 10MHz 16QAM HCH 2615MHz RB 50 0 NTN



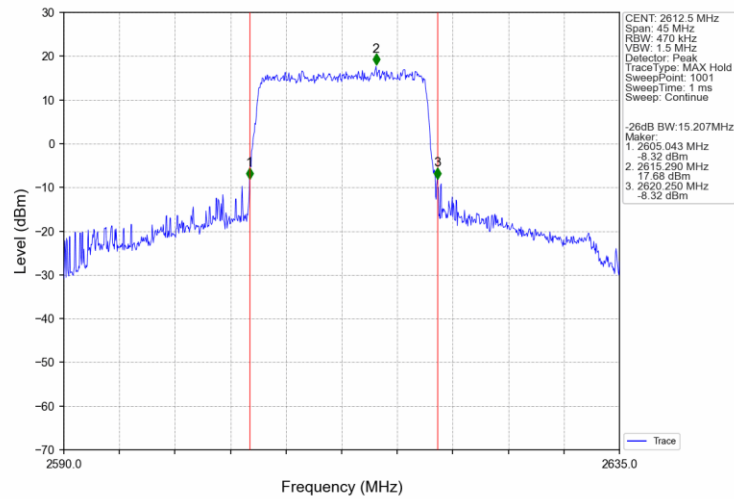
Band38 15MHz QPSK LCH 2577.5MHz RB 75 0 NTN



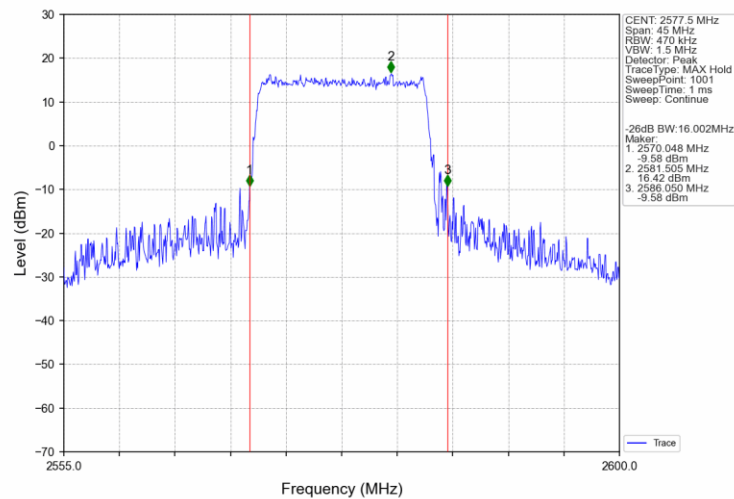
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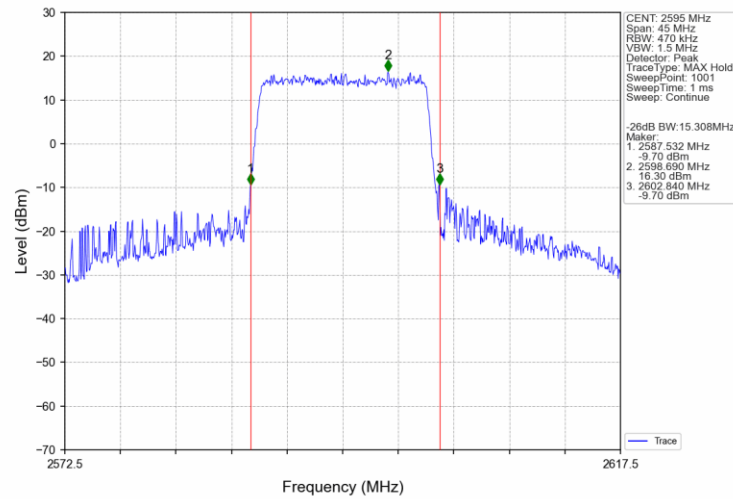
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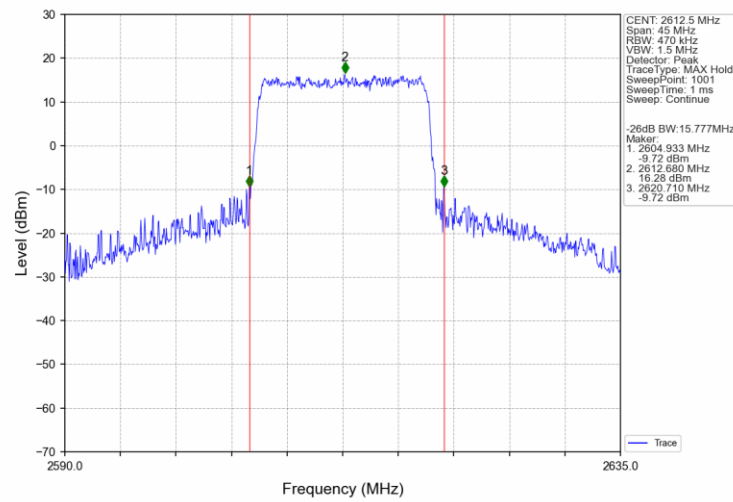
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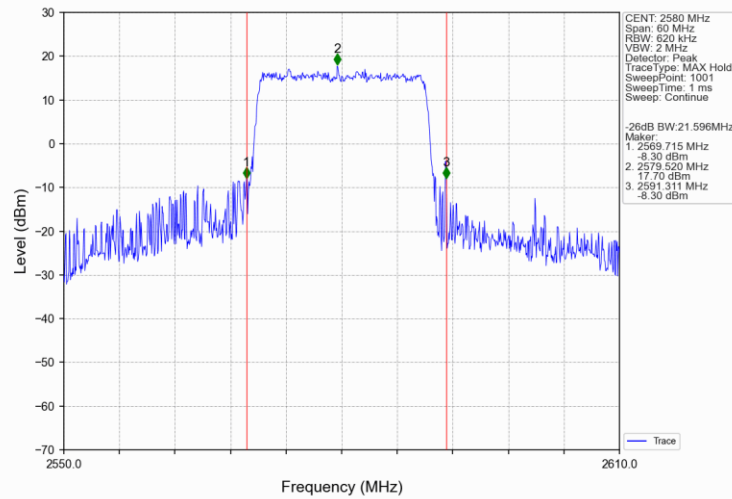
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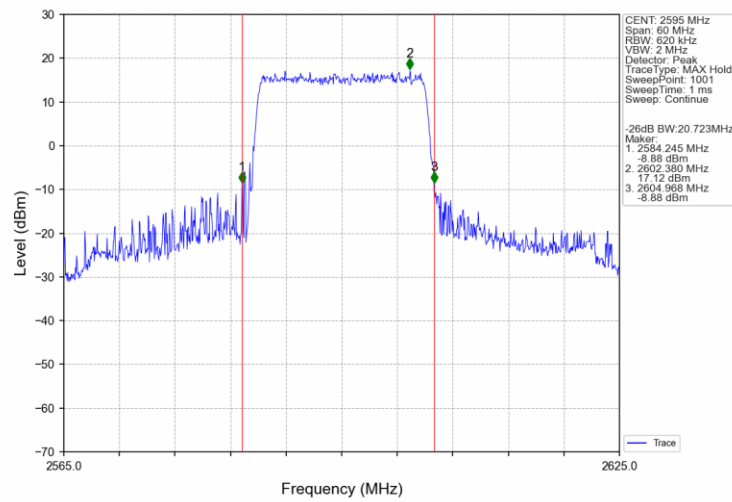
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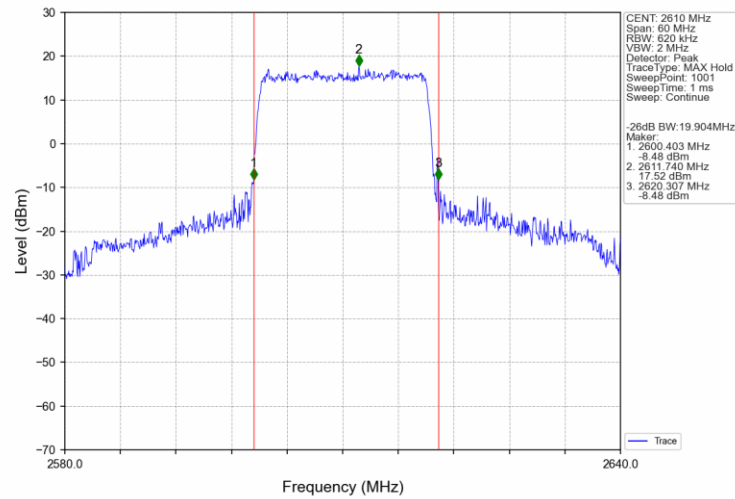
Band38 20MHz QPSK LCH 2580MHz RB 100 0 NTNV



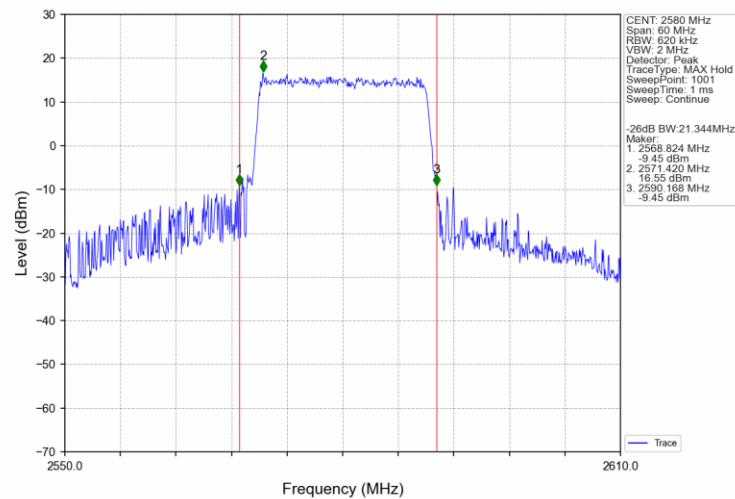
Band38 20MHz QPSK MCH 2595MHz RB 100 0 NTNV



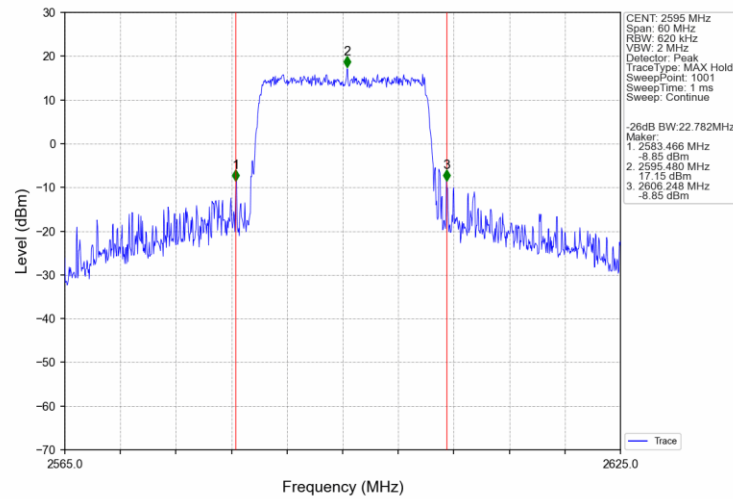
Band38 20MHz QPSK HCH 2610MHz RB 100 0 NTN



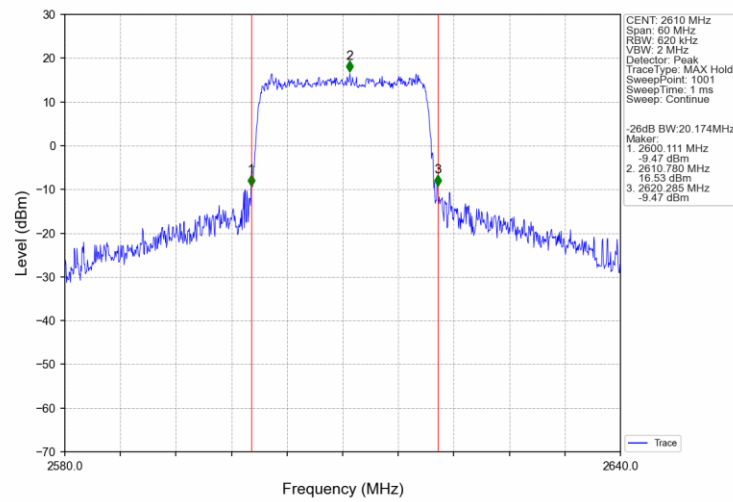
Band38 20MHz 16QAM LCH 2580MHz RB 100 0 NTN



Band38_20MHz_16QAM_MCH_2595MHz_RB_100_0_NTNV



Band38_20MHz_16QAM_HCH_2610MHz_RB_100_0_NTNV



5. Peak-Average Ratio

5.1 Test Result

5.1.1 B38_5MHz

Band: 38 / Bandwidth: 5MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Peak-Average Ratio (dB)		Verdict
		Size	Offset	Result	Limit	
QPSK	2572.5	25	0	7.50	<=13	Pass
	2595	25	0	7.36	<=13	Pass
	2617.5	25	0	7.06	<=13	Pass
16QAM	2572.5	25	0	8.23	<=13	Pass
	2595	25	0	7.99	<=13	Pass
	2617.5	25	0	7.76	<=13	Pass

5.1.2 B38_10MHz

Band: 38 / Bandwidth: 10MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Peak-Average Ratio (dB)		Verdict
		Size	Offset	Result	Limit	
QPSK	2575	50	0	7.69	<=13	Pass
	2595	50	0	7.36	<=13	Pass
	2615	50	0	7.12	<=13	Pass
16QAM	2575	50	0	8.35	<=13	Pass
	2595	50	0	8.02	<=13	Pass
	2615	50	0	7.79	<=13	Pass

5.1.3 B38_15MHz

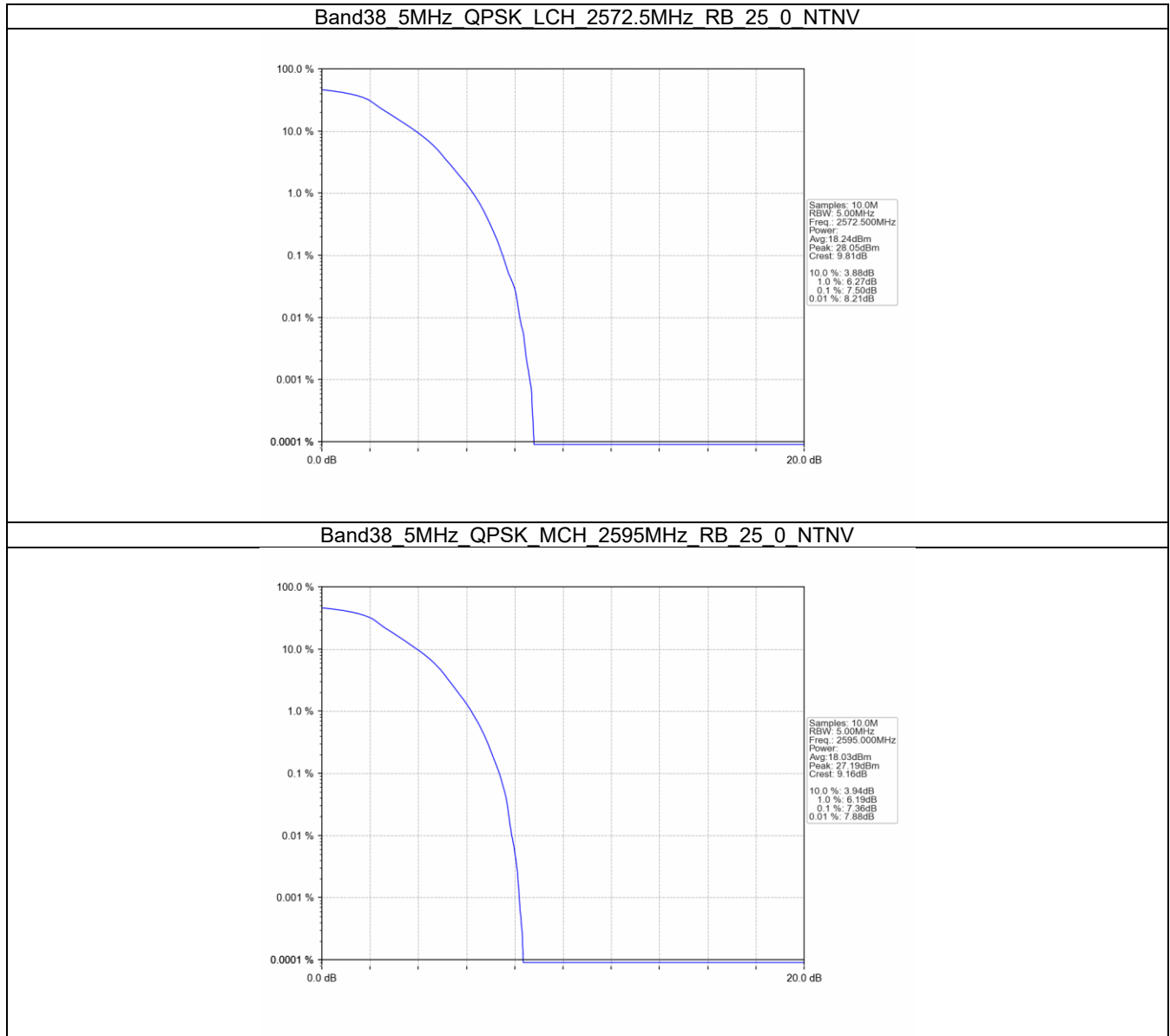
Band: 38 / Bandwidth: 15MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Peak-Average Ratio (dB)		Verdict
		Size	Offset	Result	Limit	
QPSK	2577.5	75	0	7.27	<=13	Pass
	2595	75	0	7.24	<=13	Pass
	2612.5	75	0	7.08	<=13	Pass
16QAM	2577.5	75	0	8.17	<=13	Pass
	2595	75	0	8.13	<=13	Pass
	2612.5	75	0	8.02	<=13	Pass

5.1.4 B38_20MHz

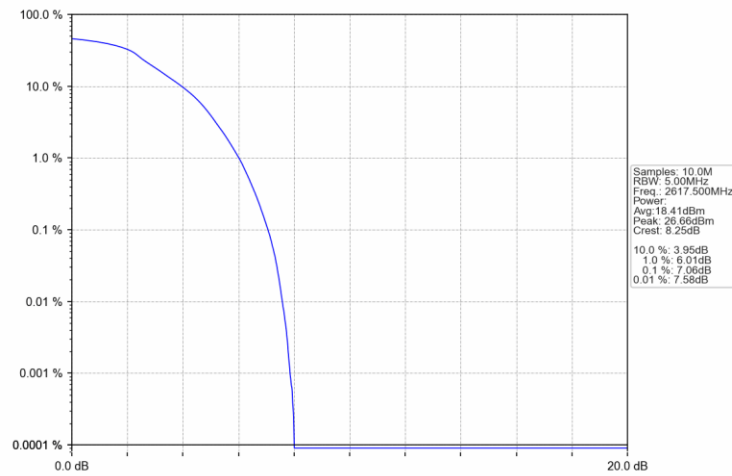
Band: 38 / Bandwidth: 20MHz / NTNV						
Modulation	Frequency (MHz)	RB Allocation		Peak-Average Ratio (dB)		Verdict
		Size	Offset	Result	Limit	
QPSK	2580	100	0	7.74	<=13	Pass
	2595	100	0	7.72	<=13	Pass
	2610	100	0	7.65	<=13	Pass
16QAM	2580	100	0	8.68	<=13	Pass
	2595	100	0	8.50	<=13	Pass
	2610	100	0	8.62	<=13	Pass

5.2 Test Graph

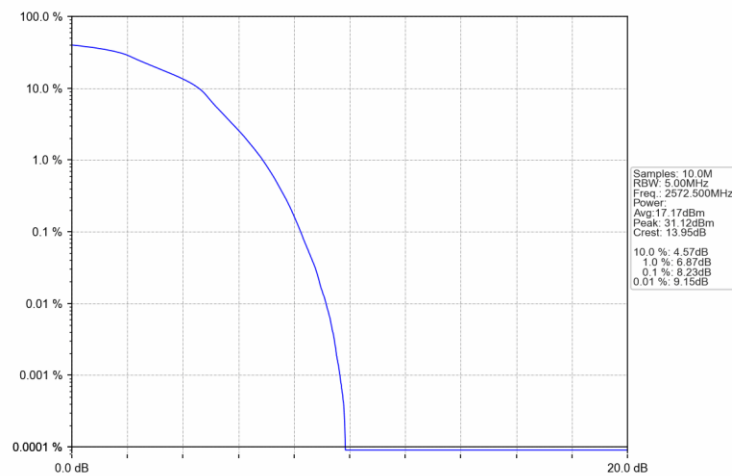
5.2.1 B38_5MHz



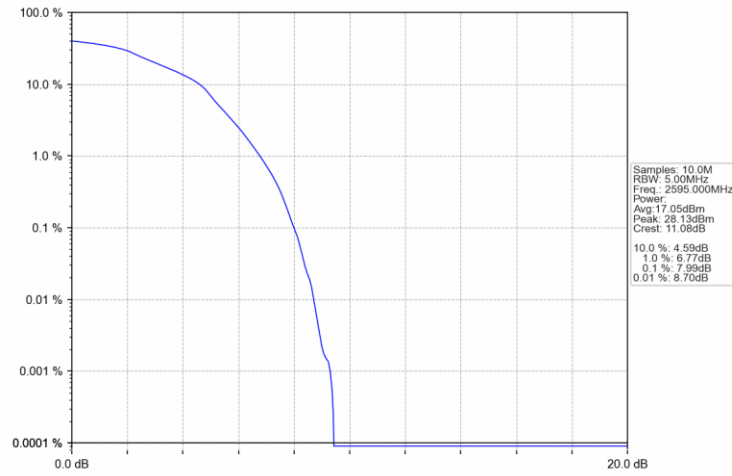
Band38 5MHz QPSK HCH 2617.5MHz RB 25 0 NTNV



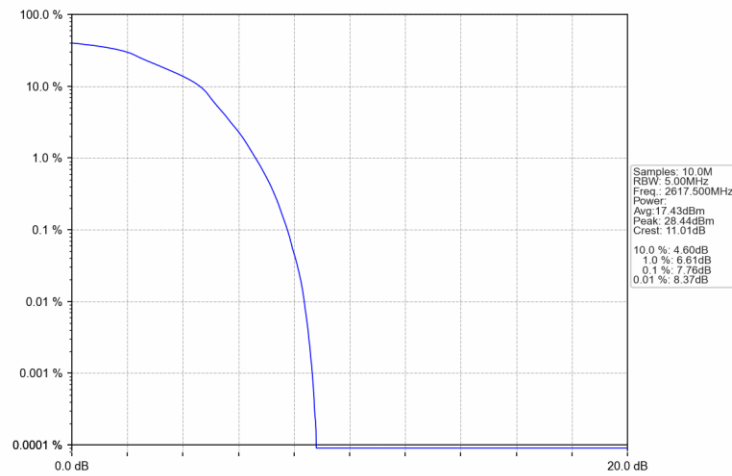
Band38 5MHz 16QAM LCH 2572.5MHz RB 25 0 NTNV



Band38 5MHz 16QAM MCH 2595MHz RB 25 0 NTNV

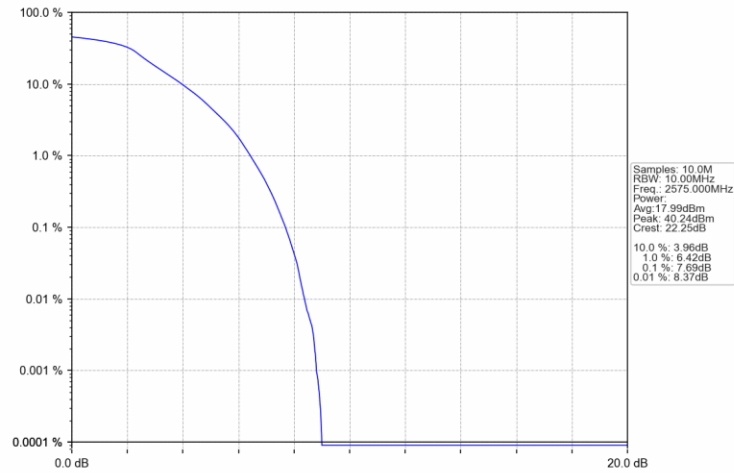


Band38 5MHz 16QAM HCH 2617.5MHz RB 25 0 NTNV

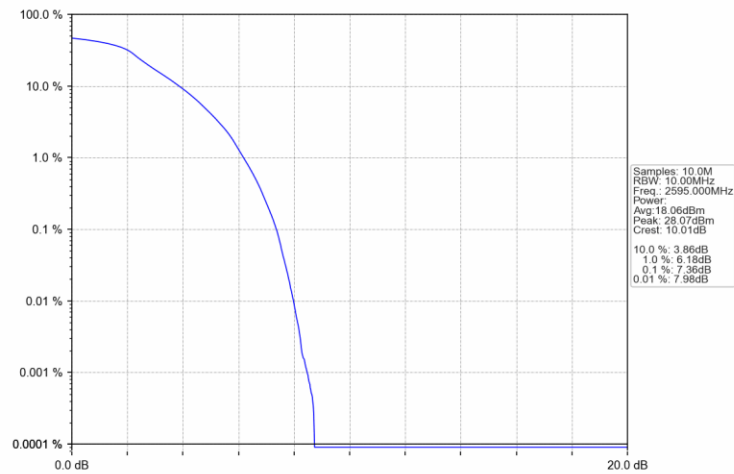


5.2.2 B38_10MHz

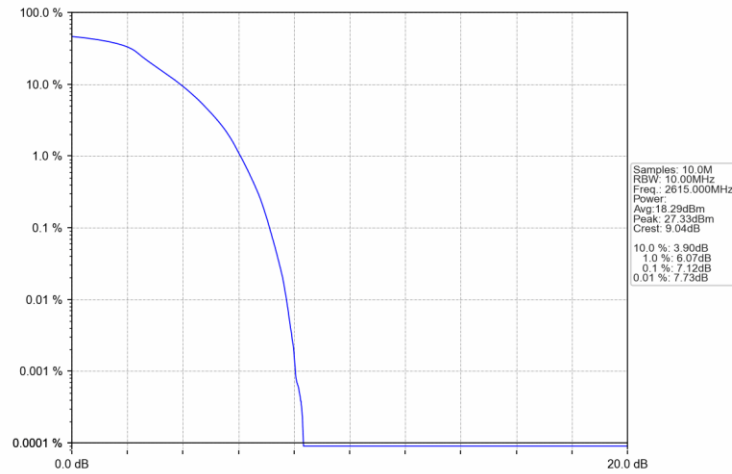
Band38_10MHz_QPSK_LCH_2575MHz_RB_50_0_NTNV



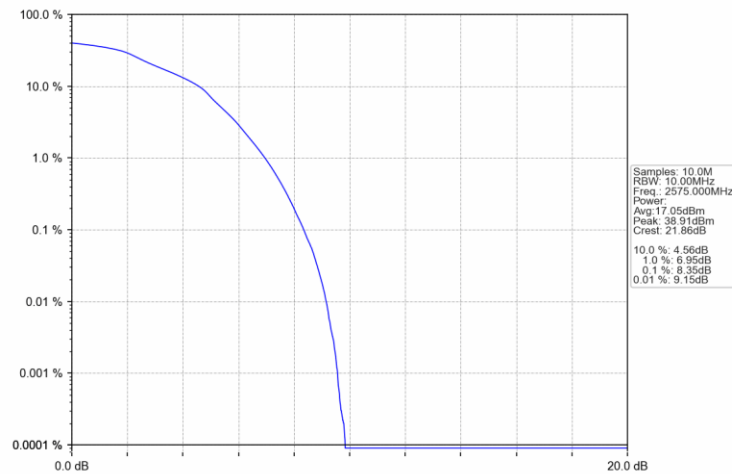
Band38_10MHz_QPSK_MCH_2595MHz_RB_50_0_NTNV



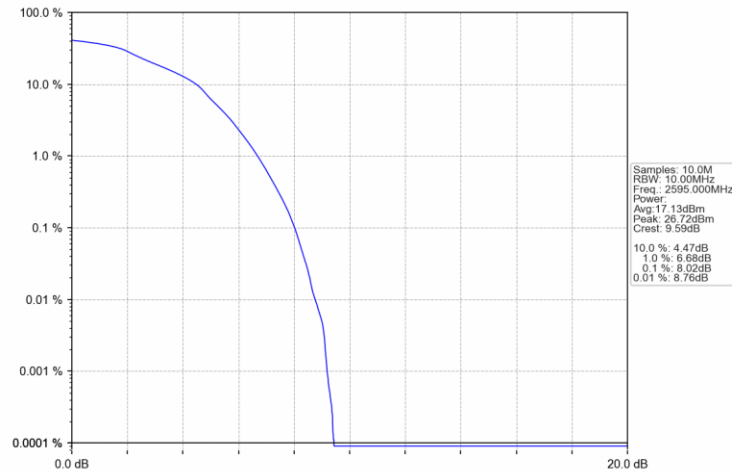
Band38 10MHz QPSK HCH 2615MHz RB 50 0 NTNV



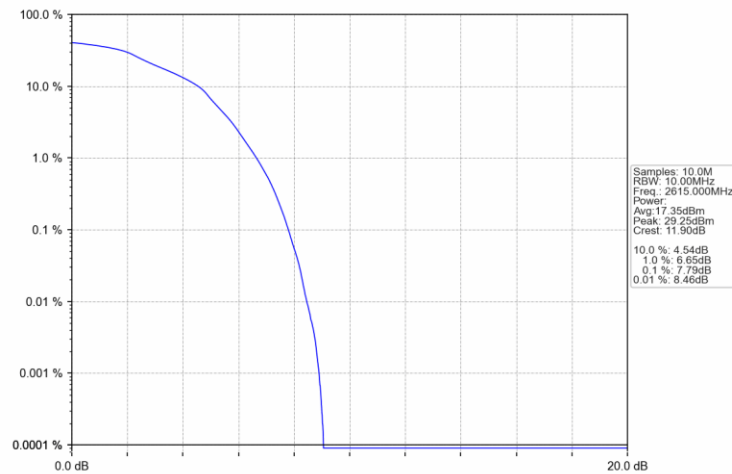
Band38 10MHz 16QAM LCH 2575MHz RB 50 0 NTNV



Band38 10MHz 16QAM MCH 2595MHz RB 50 0 NTNV

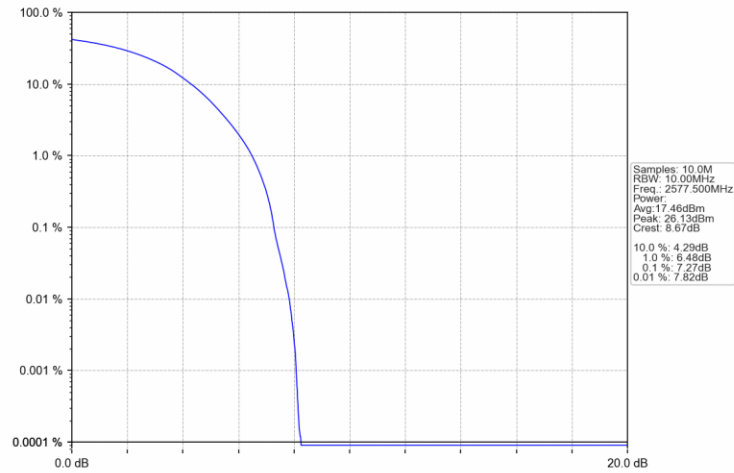


Band38 10MHz 16QAM HCH 2615MHz RB 50 0 NTNV

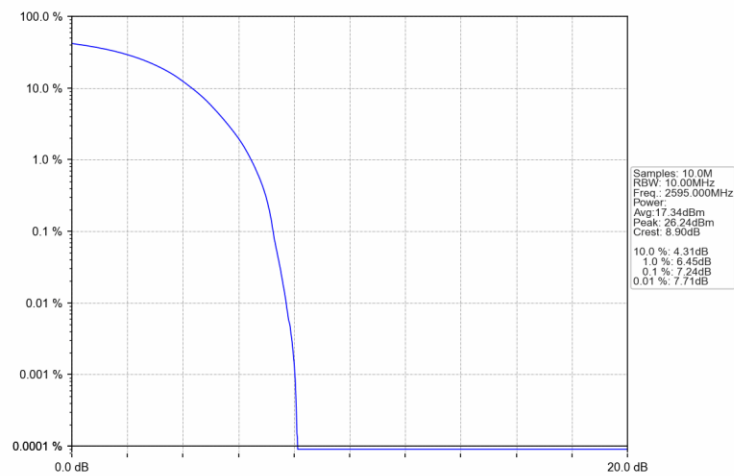


5.2.3 B38_15MHz

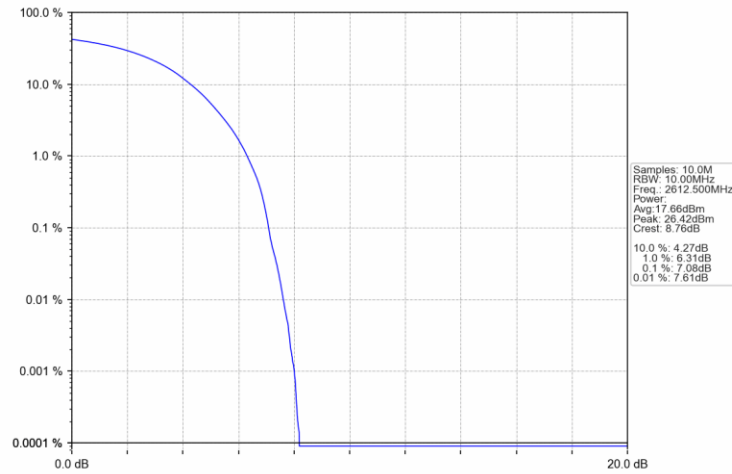
Band38 15MHz QPSK LCH 2577.5MHz RB 75 0 NTN



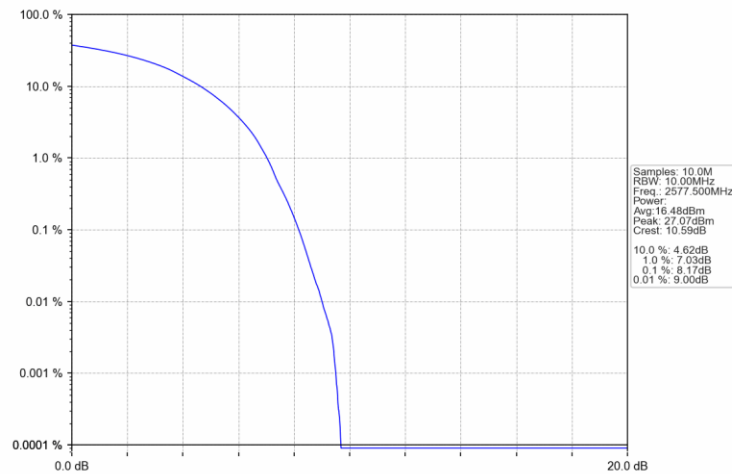
Band38 15MHz QPSK MCH 2595MHz RB 75 0 NTN



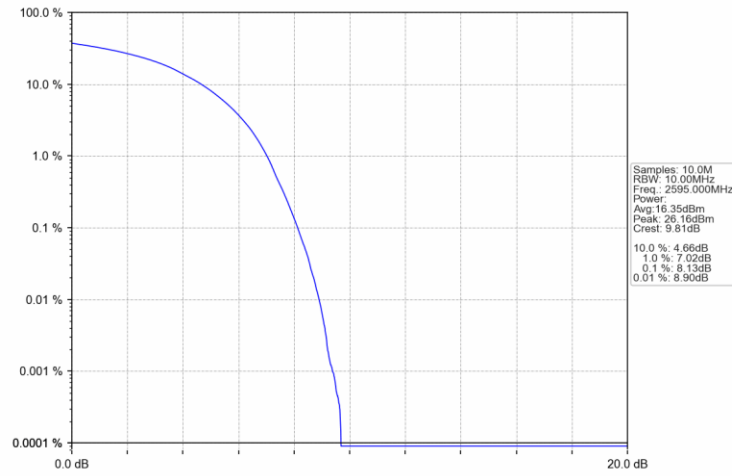
Band38 15MHz QPSK HCH 2612.5MHz RB 75 0 NTN



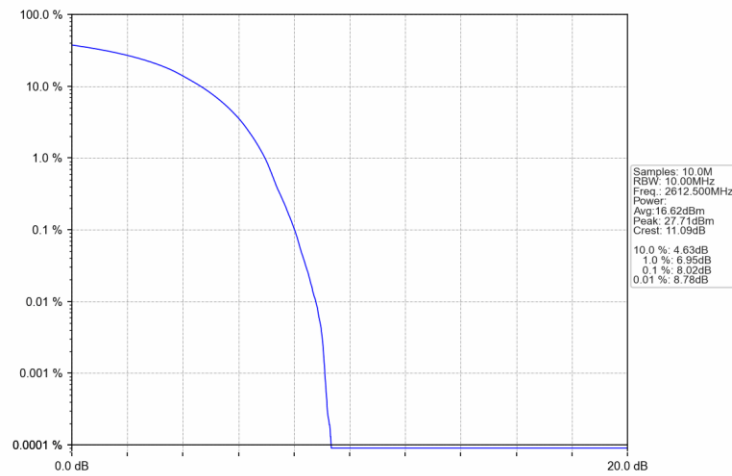
Band38 15MHz 16QAM LCH 2577.5MHz RB 75 0 NTN



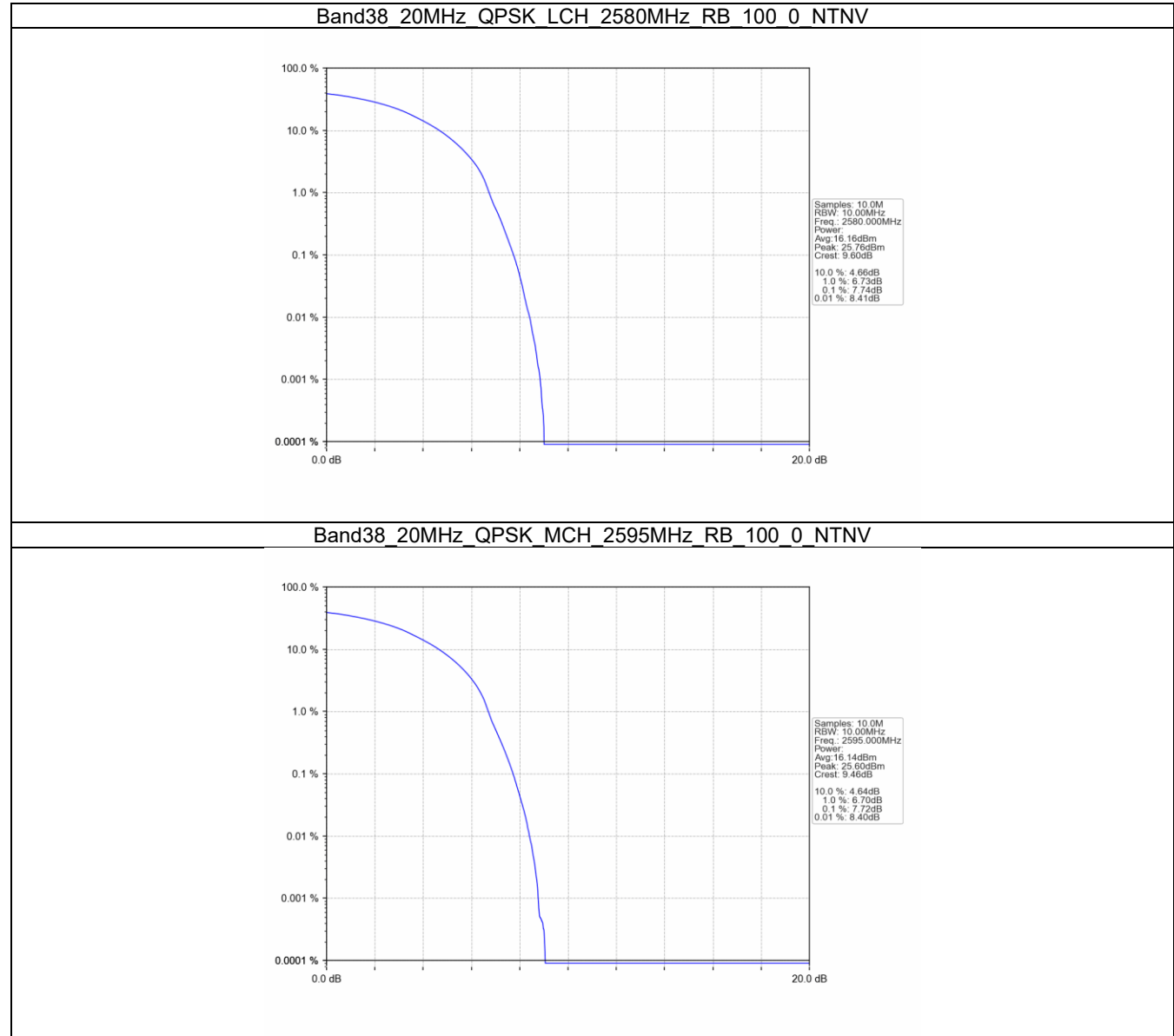
Band38 15MHz 16QAM MCH 2595MHz RB 75 0 NTN



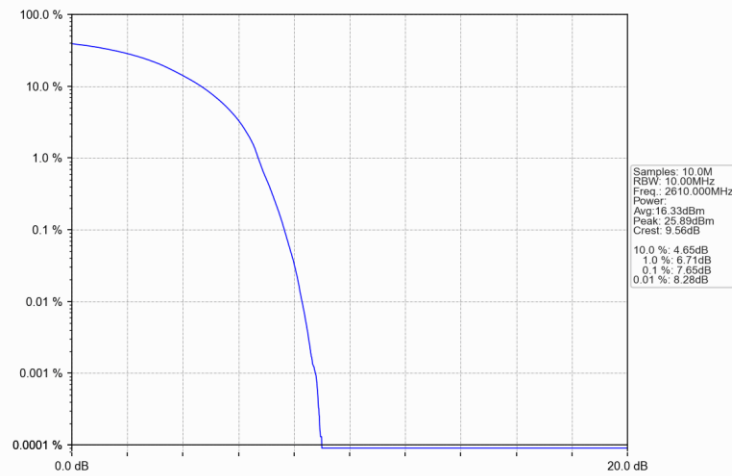
Band38 15MHz 16QAM HCH 2612.5MHz RB 75 0 NTN



5.2.4 B38_20MHz



Band38 20MHz QPSK HCH 2610MHz RB 100 0 NTN



Band38 20MHz 16QAM LCH 2580MHz RB 100 0 NTN

