

Appendix for SHCR2307001408AT

1. Input/output power and amplifier/booster gain

1.1 Band41_EIRP

1.1.1 Test Result

For LTE Band 41

Band: 41 / NTNV										
Signal			TX Type	ANT	Conducted Power (dBm)		EIRP (dBm)		Booster Gain (dB)	Verdict
Type	Level (dBm)	Frequency (MHz)			Output	Input	Result	Limit		
AWGN	-0.5	2541.59	SISO	1	24.42	-0.69	27.42	<=92.27	25.11	Pass
	2.5	2541.59	SISO	1	24.54	2.76	27.54	<=92.27	/	Pass
GMSK	-0.5	2541.59	SISO	1	24.60	-0.57	27.60	<=92.27	25.17	Pass
	2.5	2541.59	SISO	1	24.61	3.91	27.61	<=92.27	/	Pass

Band: 41 / NTNV										
Signal			Conducted Power (dBm)			EIRP (dBm)			Limit (dBm)	Verdict
Type	Level (dBm)	Frequency (MHz)	SISO	2*2	4*4	SISO	2*2	4*4		
AWGN	-0.5	2541.59	24.42	27.43	30.44	27.42	30.43	33.44	/	Pass
	2.5	2541.59	24.54	27.55	30.56	27.54	30.55	33.56	/	Pass
GMSK	-0.5	2541.59	24.60	27.61	30.62	27.6	30.61	33.62	/	Pass
	2.5	2541.59	24.61	27.62	30.63	27.61	30.62	33.63	/	Pass

For 5GNR N41

N41 / NTNV										
Signal			TX Type	ANT	Conducted Power (dBm)		EIRP (dBm)		Booster Gain (dB)	Verdict
Type	Level (dBm)	Frequency (MHz)			Output	Input	Result	Limit		
AWGN	-0.5	2593	SISO	1	24.43	-0.67	27.43	<=92.27	25.10	Pass
	2.5	2593	SISO	1	24.41	2.73	27.41	<=92.27	/	Pass

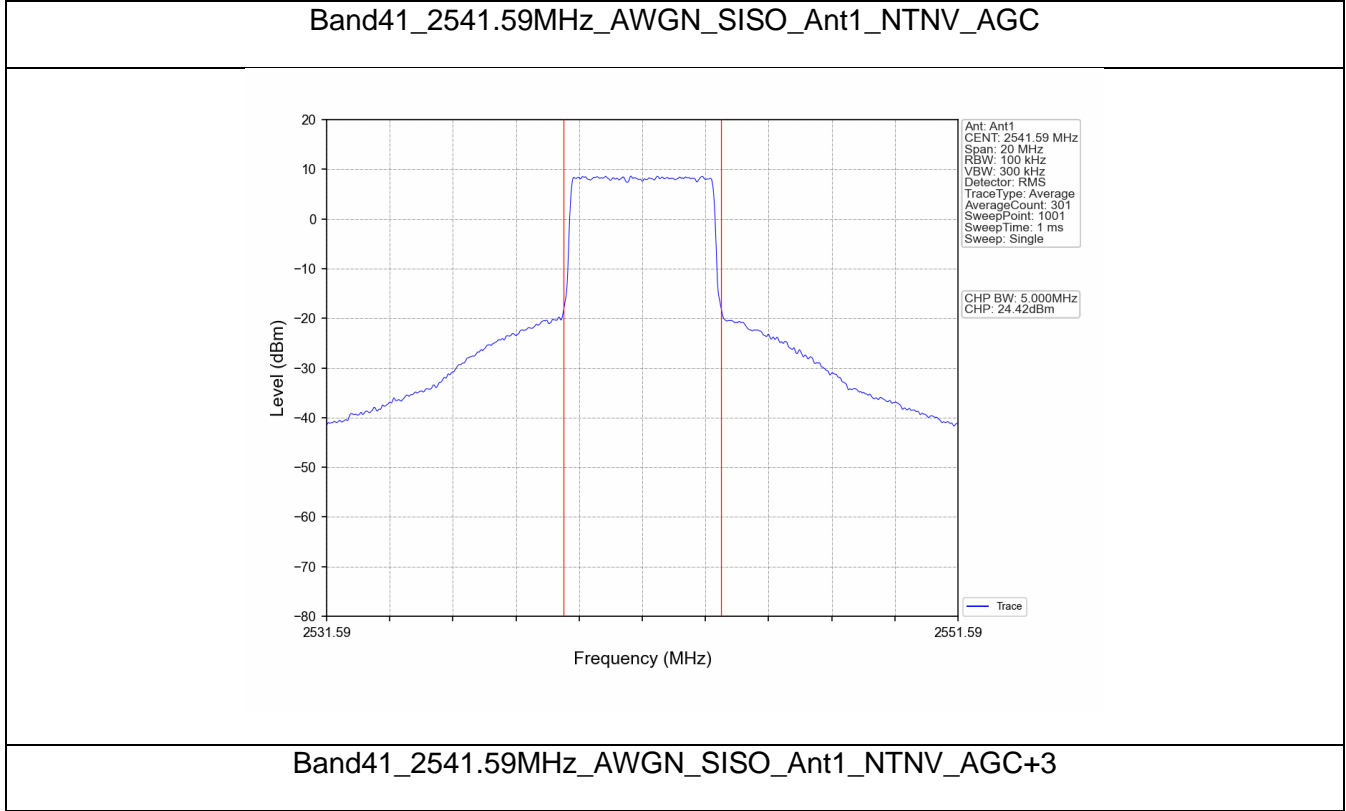
Band: 41 / NTNV										
Signal			Conducted Power (dBm)			EIRP (dBm)			Limit (dBm)	Verdict
Type	Level (dBm)	Frequency (MHz)	SISO	2*2	4*4	SISO	2*2	4*4		
AWGN	-0.5	2593	24.43	27.44	30.45	27.43	30.44	33.45	/	Pass
	2.5	2593	24.41	27.42	30.43	27.41	30.42	33.43	/	Pass



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1.1.2 Test Graph
For LTE Band 41

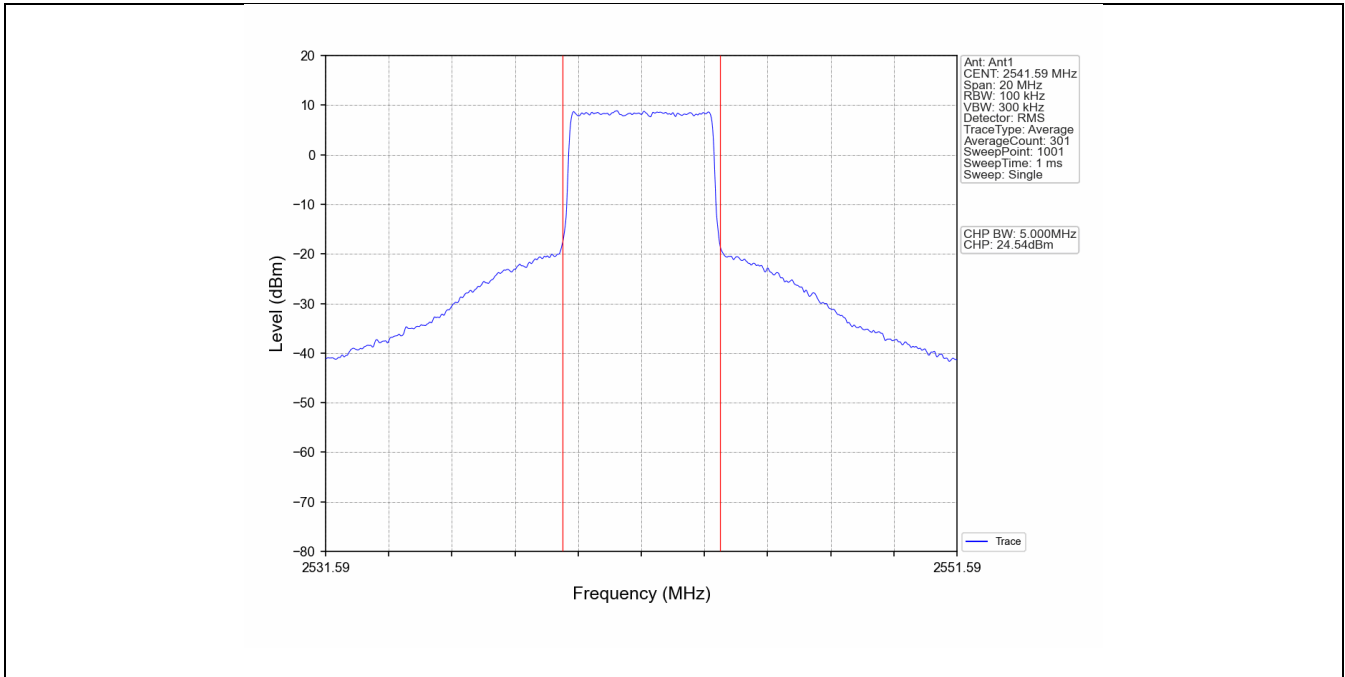


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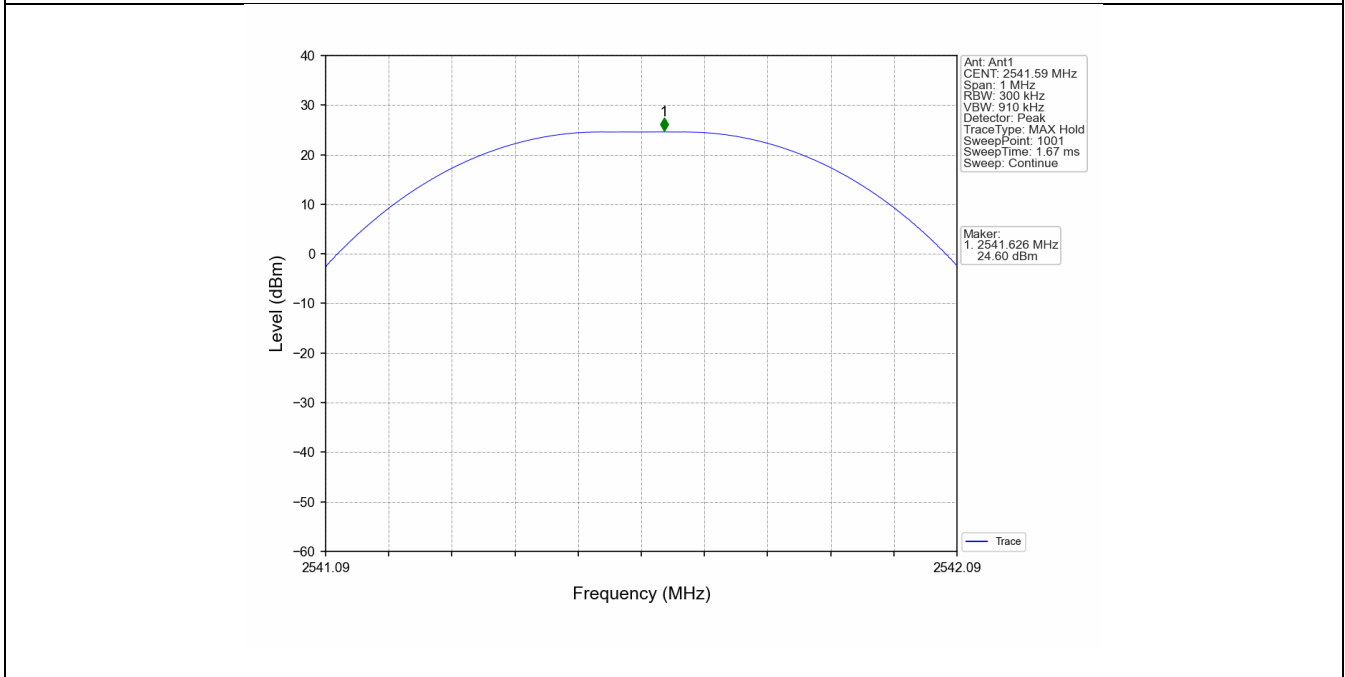
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Band41_2541.59MHz_GMSK_SISO_Ant1_NTNV_AGC



Band41_2541.59MHz_GMSK_SISO_Ant1_NTNV_AGC+3



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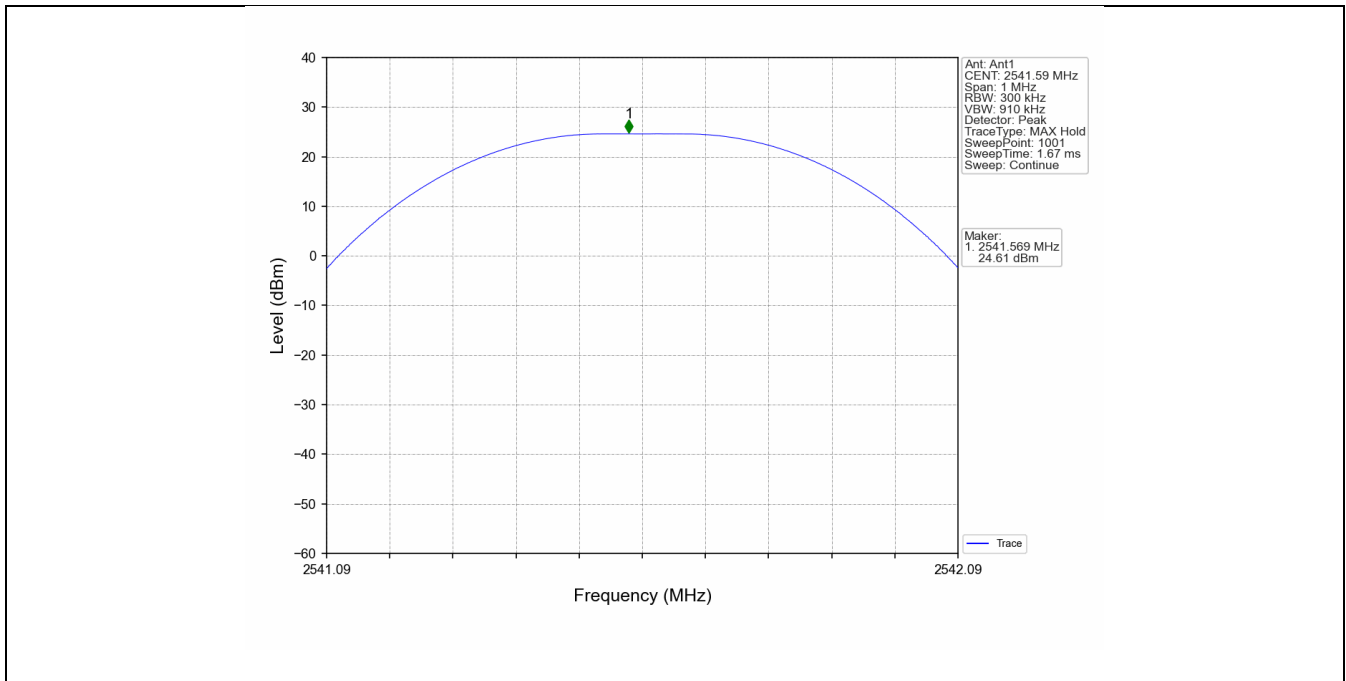
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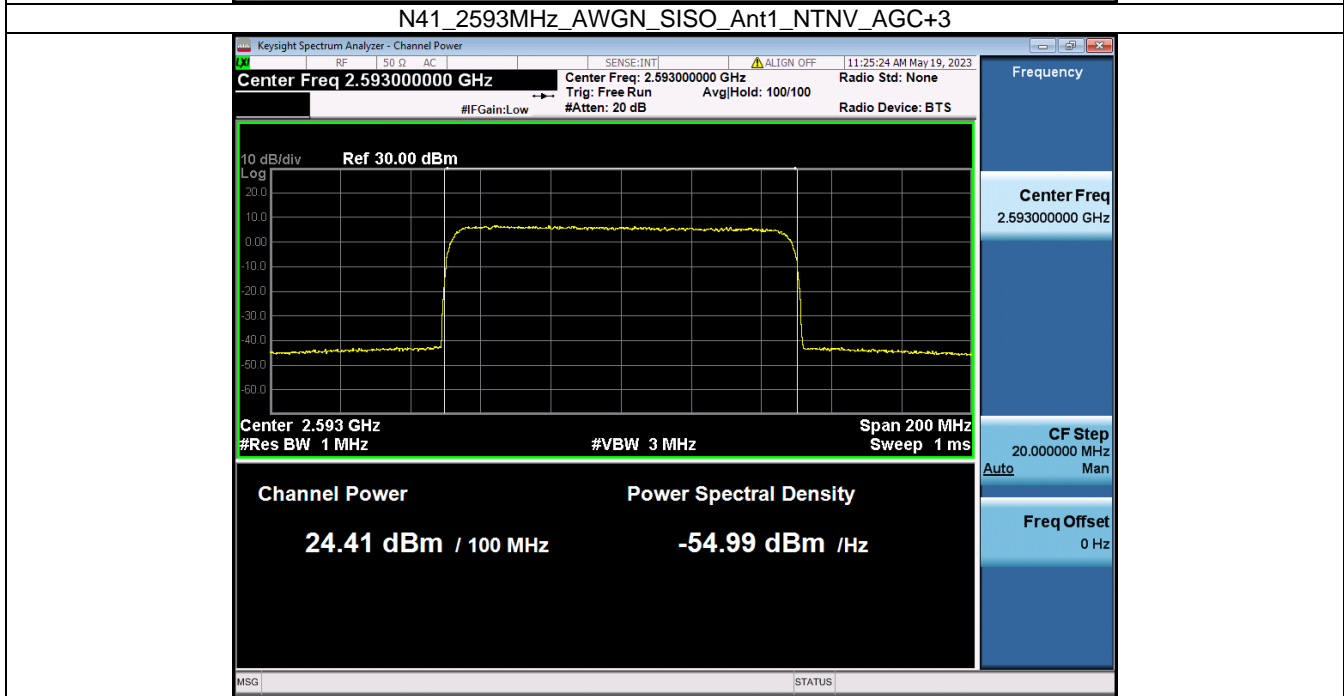
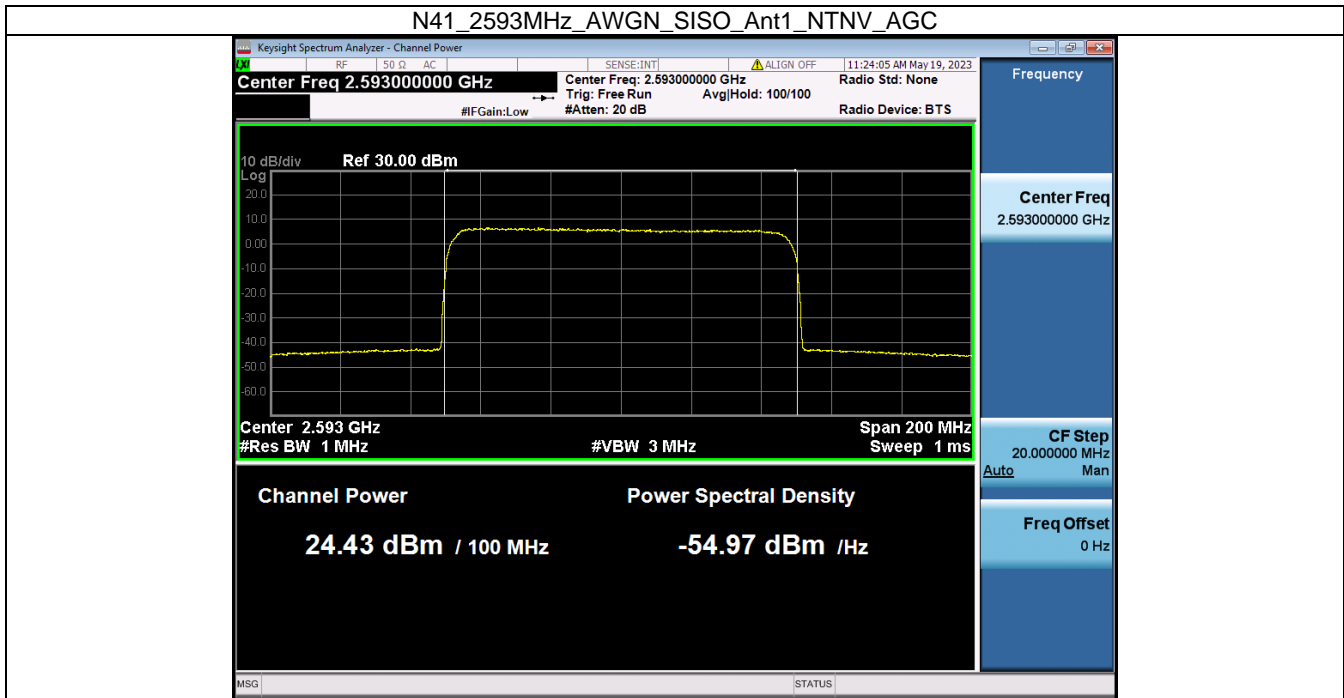
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2. Radiated Spurious Emissions

2.1 Band41_Ant1

2.1.1 Test Result

For LTE Band 41

AWGN_Low channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
196.368	Horizontal	-67.21	-13	-54.21	pass
386.402	Horizontal	-60.13	-13	-47.13	pass
885.099	Horizontal	-56.12	-13	-43.12	pass
3611.420	Horizontal	-43.63	-13	-30.63	pass
8583.490	Horizontal	-50.23	-13	-37.23	pass
12375.050	Horizontal	-48.98	-13	-35.98	pass
176.385	Vertical	-72.72	-13	-59.72	pass
260.859	Vertical	-64.48	-13	-51.48	pass
801.096	Vertical	-62.01	-13	-49.01	pass
2981.380	Vertical	-46.19	-13	-33.19	pass
9018.450	Vertical	-40.88	-13	-27.88	pass
13012.120	Vertical	-48.54	-13	-35.54	pass

AWGN_Middle channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
376.082	Horizontal	-69.00	-13	-56.00	pass
600.389	Horizontal	-63.54	-13	-50.54	pass
790.655	Horizontal	-57.38	-13	-44.38	pass
3618.690	Horizontal	-42.44	-13	-29.44	pass
8580.970	Horizontal	-51.40	-13	-38.40	pass
12392.750	Horizontal	-52.11	-13	-39.11	pass
519.986	Vertical	-63.80	-13	-50.80	pass
717.322	Vertical	-62.05	-13	-49.05	pass
944.186	Vertical	-54.58	-13	-41.58	pass
2975.130	Vertical	-49.64	-13	-36.64	pass
8924.330	Vertical	-45.91	-13	-32.91	pass
12003.150	Vertical	-46.40	-13	-33.40	pass



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AWGN_High channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
131.539	Horizontal	-66.91	-13	-53.91	pass
497.926	Horizontal	-61.95	-13	-48.95	pass
888.432	Horizontal	-63.03	-13	-50.03	pass
3617.060	Horizontal	-48.33	-13	-35.33	pass
8558.140	Horizontal	-43.75	-13	-30.75	pass
12370.930	Horizontal	-45.18	-13	-32.18	pass
106.438	Vertical	-68.89	-13	-55.89	pass
386.862	Vertical	-72.05	-13	-59.05	pass
795.049	Vertical	-69.74	-13	-56.74	pass
2898.000	Vertical	-49.26	-13	-36.26	pass
9053.680	Vertical	-47.91	-13	-34.91	pass
12850.550	Vertical	-43.66	-13	-30.66	pass

GMSK_Low channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
145.086	Horizontal	-71.76	-13	-58.76	pass
312.215	Horizontal	-65.68	-13	-52.68	pass
492.499	Horizontal	-66.45	-13	-53.45	pass
3084.210	Horizontal	-47.27	-13	-34.27	pass
8988.720	Horizontal	-41.35	-13	-28.35	pass
13013.270	Horizontal	-53.46	-13	-40.46	pass
412.548	Vertical	-74.86	-13	-61.86	pass
568.055	Vertical	-63.99	-13	-50.99	pass
781.980	Vertical	-61.38	-13	-48.38	pass
2287.110	Vertical	-46.41	-13	-33.41	pass
9091.630	Vertical	-48.12	-13	-35.12	pass
12737.860	Vertical	-53.41	-13	-40.41	pass



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GMSK_Middle channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
78.194	Horizontal	-65.08	-13	-52.08	pass
194.448	Horizontal	-59.90	-13	-46.90	pass
780.932	Horizontal	-53.69	-13	-40.69	pass
3595.330	Horizontal	-52.46	-13	-39.46	pass
8538.580	Horizontal	-50.68	-13	-37.68	pass
12352.900	Horizontal	-40.35	-13	-27.35	pass
60.920	Vertical	-66.57	-13	-53.57	pass
154.465	Vertical	-66.34	-13	-53.34	pass
857.149	Vertical	-65.67	-13	-52.67	pass
3199.760	Vertical	-45.63	-13	-32.63	pass
8468.530	Vertical	-49.10	-13	-36.10	pass
12647.150	Vertical	-52.57	-13	-39.57	pass

GMSK_High channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
148.946	Horizontal	-63.62	-13	-50.62	pass
485.605	Horizontal	-67.13	-13	-54.13	pass
859.319	Horizontal	-58.40	-13	-45.40	pass
3059.370	Horizontal	-45.69	-13	-32.69	pass
9001.700	Horizontal	-47.63	-13	-34.63	pass
13031.220	Horizontal	-48.99	-13	-35.99	pass
120.916	Vertical	-62.11	-13	-49.11	pass
305.865	Vertical	-67.98	-13	-54.98	pass
807.519	Vertical	-59.94	-13	-46.94	pass
2971.860	Vertical	-49.41	-13	-36.41	pass
9000.040	Vertical	-47.34	-13	-34.34	pass
13531.190	Vertical	-39.94	-13	-26.94	pass

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AWGN_Low channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
168.045	Horizontal	-60.79	-13	-47.79	pass
269.729	Horizontal	-63.24	-13	-50.24	pass
799.416	Horizontal	-58.41	-13	-45.41	pass
2692.880	Horizontal	-53.21	-13	-40.21	pass
8952.670	Horizontal	-55.17	-13	-42.17	pass
12953.450	Horizontal	-38.39	-13	-25.39	pass
103.778	Vertical	-62.55	-13	-49.55	pass
365.672	Vertical	-65.14	-13	-52.14	pass
885.219	Vertical	-58.80	-13	-45.80	pass
2419.970	Vertical	-51.76	-13	-38.76	pass
7643.350	Vertical	-52.87	-13	-39.87	pass
12378.270	Vertical	-42.27	-13	-29.27	pass

AWGN_Middle channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
386.158	Horizontal	-59.13	-13	-46.13	pass
586.255	Horizontal	-62.18	-13	-49.18	pass
798.410	Horizontal	-57.41	-13	-44.41	pass
3049.800	Horizontal	-53.37	-13	-40.37	pass
8689.290	Horizontal	-54.38	-13	-41.38	pass
13103.170	Horizontal	-41.43	-13	-28.43	pass
132.866	Vertical	-67.33	-13	-54.33	pass
263.435	Vertical	-61.72	-13	-48.72	pass
881.569	Vertical	-54.39	-13	-41.39	pass
3050.380	Vertical	-52.33	-13	-39.33	pass
7704.950	Vertical	-48.42	-13	-35.42	pass
12649.120	Vertical	-38.79	-13	-25.79	pass



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AWGN_High channel					
Frequency	Spurious Emission		Limit	Over limit	Result
	Polarization and Level				
MHz	polarization	dBm	dBm	dB	
136.705	Horizontal	-68.46	-13	-55.46	pass
253.099	Horizontal	-54.25	-13	-41.25	pass
798.816	Horizontal	-55.51	-13	-42.51	pass
2728.250	Horizontal	-52.06	-13	-39.06	pass
8970.450	Horizontal	-53.14	-13	-40.14	pass
12981.350	Horizontal	-43.92	-13	-30.92	pass
194.388	Vertical	-63.57	-13	-50.57	pass
373.592	Vertical	-54.06	-13	-41.06	pass
883.249	Vertical	-59.21	-13	-46.21	pass
2708.940	Vertical	-49.00	-13	-36.00	pass
7960.990	Vertical	-50.80	-13	-37.80	pass
11978.830	Vertical	-41.64	-13	-28.64	pass

Note: 1. We evaluated and tested all antenna and Carrier aggregation modes, and only the worst mode is shown in the report.



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