

Appendix K: Test Data for E-UTRA Band 13

Product Name: Zettle Terminal

Trade Mark: Zettle Terminal

Test Model: Zettle Terminal

Environmental Conditions

Temperature:	22.3° C
Relative Humidity:	53.6%
ATM Pressure:	100.0 kPa
Test Engineer:	Diamond Lu
Supervised by:	Li Huan

K.1 Conducted Output Power

Conducted Output Power Test Result (Channel Bandwidth: 5 MHz)						
Modulation	Channel	RB Configuration		Average Power [dBm] QPSK	Average Power [dBm] 16QAM	Verdict
		Size	Offset			
QPSK / 16QAM	LCH	1	0	22.45	21.83	PASS
		1	12	22.59	21.90	PASS
		1	24	22.38	21.61	PASS
		12	0	21.42	20.62	PASS
		12	6	21.42	20.55	PASS
		12	13	21.49	20.63	PASS
		25	0	21.60	20.60	PASS
	MCH	1	0	22.58	21.64	PASS
		1	12	22.40	21.58	PASS
		1	24	21.63	20.98	PASS
		12	0	21.59	20.65	PASS
		12	6	21.58	20.66	PASS
		12	13	21.48	20.51	PASS
		25	0	21.65	20.70	PASS
	HCH	1	0	22.55	21.63	PASS
		1	12	21.79	21.04	PASS
		1	24	22.41	21.48	PASS
		12	0	21.57	20.59	PASS
		12	6	21.59	20.59	PASS
		12	13	21.52	20.54	PASS
		25	0	21.59	20.64	PASS

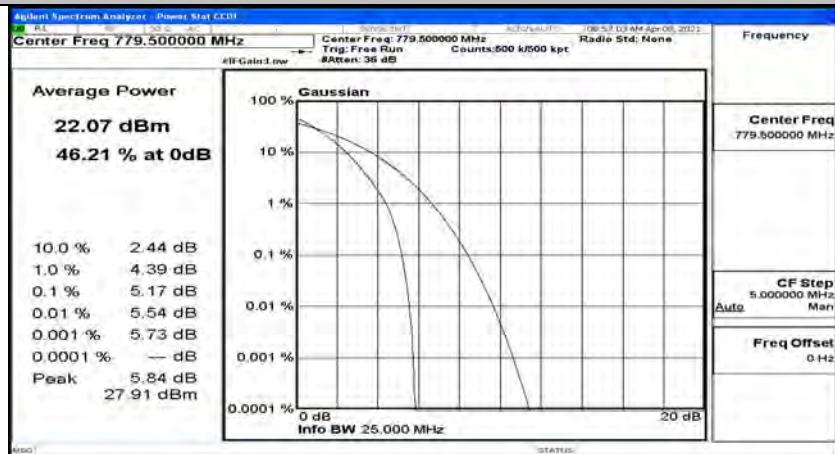
Conducted Output Power Test Result (Channel Bandwidth: 10 MHz)						
Modulation	Channel	RB Configuration		Average Power [dBm] QPSK	Average Power [dBm] 16QAM	Verdict
		Size	Offset			
QPSK / 16QAM	LCH	1	0	22.89	22.22	PASS
		1	24	22.60	22.02	PASS
		1	49	21.79	20.69	PASS
		25	0	21.76	20.86	PASS
		25	12	21.75	20.86	PASS
		25	25	21.54	20.50	PASS
		50	0	22.00	21.01	PASS
	MCH	1	0	22.79	22.25	PASS
		1	24	22.77	22.13	PASS
		1	49	21.73	20.55	PASS
		25	0	21.75	20.84	PASS
		25	12	21.75	20.85	PASS
		25	25	21.53	20.51	PASS
		50	0	21.98	21.00	PASS
	HCH	1	0	22.76	22.27	PASS
		1	24	22.79	22.13	PASS
		1	49	21.80	20.76	PASS
		25	0	21.75	20.84	PASS
		25	12	21.76	20.87	PASS
		25	25	21.55	20.53	PASS
		50	0	22.00	21.00	PASS

K.2 Peak-to-Average Ratio

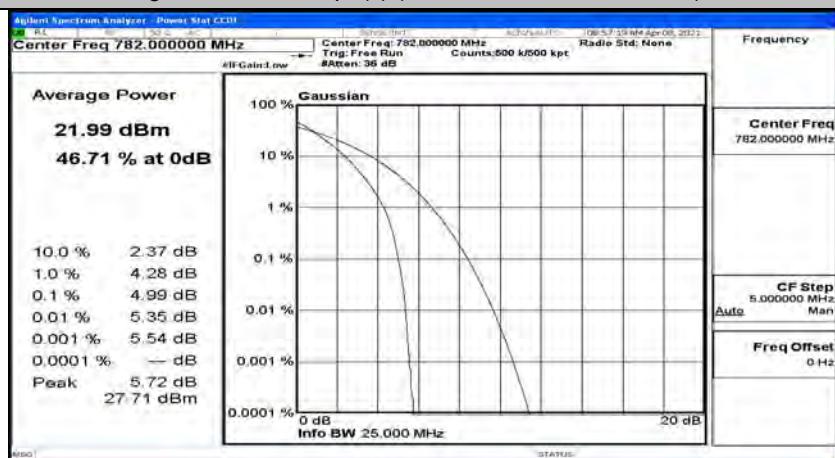
Peak-to Average Ratio Test Result (Channel Bandwidth: 5 MHz)				
Modulation	Channel	Peak-to-Average Ratio [dB]	Limit [dB]	Verdict
QPSK	LCH	5.17	<13	PASS
	MCH	4.99	<13	PASS
	HCH	5.44	<13	PASS
16QAM	LCH	6.08	<13	PASS
	MCH	5.86	<13	PASS
	HCH	6.2	<13	PASS

Peak-to Average Ratio Test Result (Channel Bandwidth: 10 MHz)				
Modulation	Channel	Peak-to-Average Ratio [dB]	Limit [dB]	Verdict
QPSK	LCH	5.27	<13	PASS
	MCH	5.28	<13	PASS
	HCH	5.28	<13	PASS
16QAM	LCH	6.11	<13	PASS
	MCH	6.12	<13	PASS
	HCH	6.09	<13	PASS

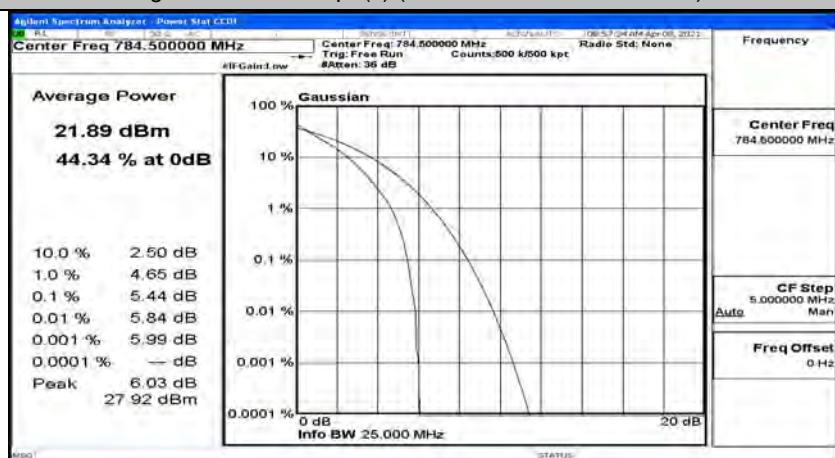
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_QPSK



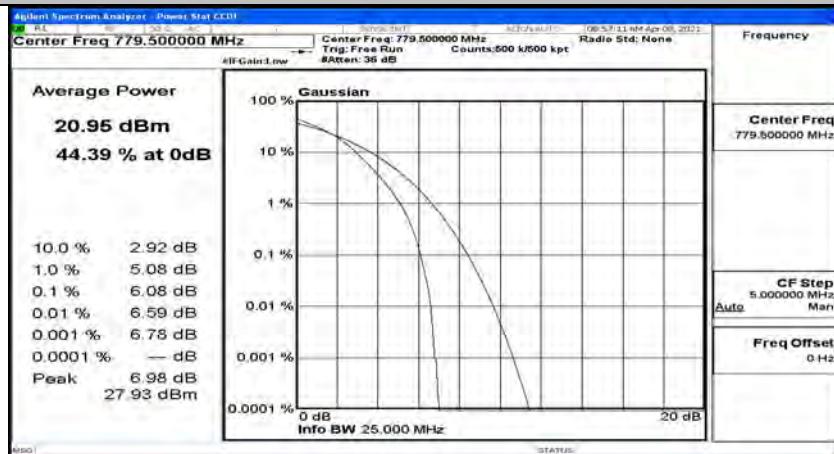
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 5 MHz)_MCH_QPSK



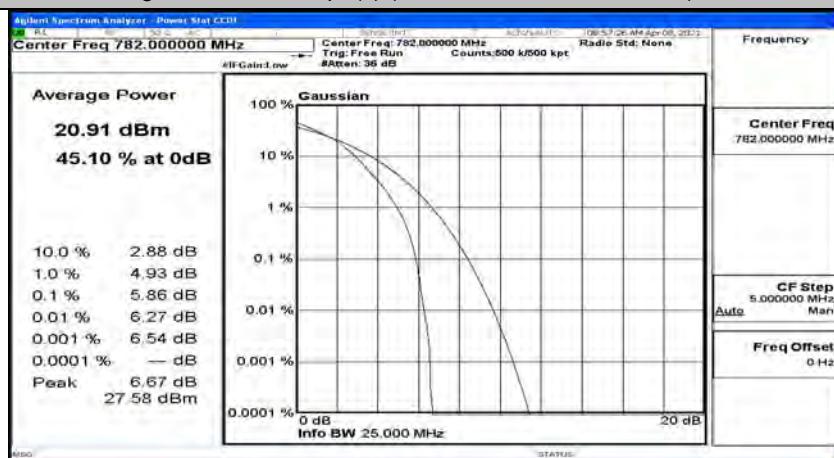
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_QPSK



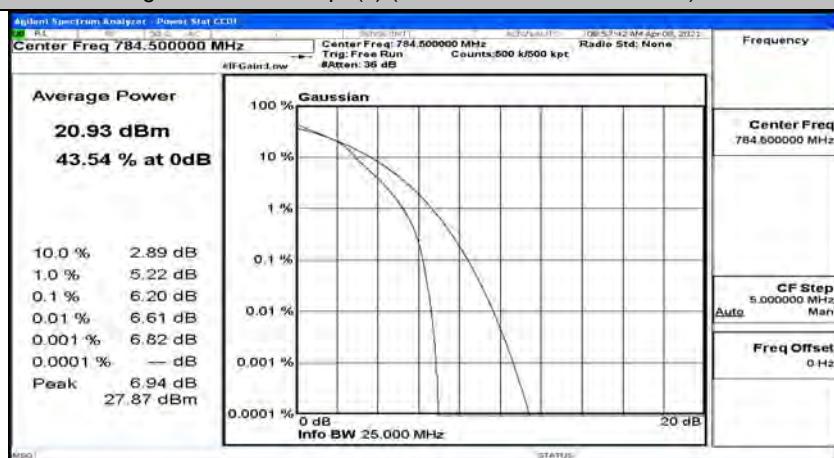
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_16QAM



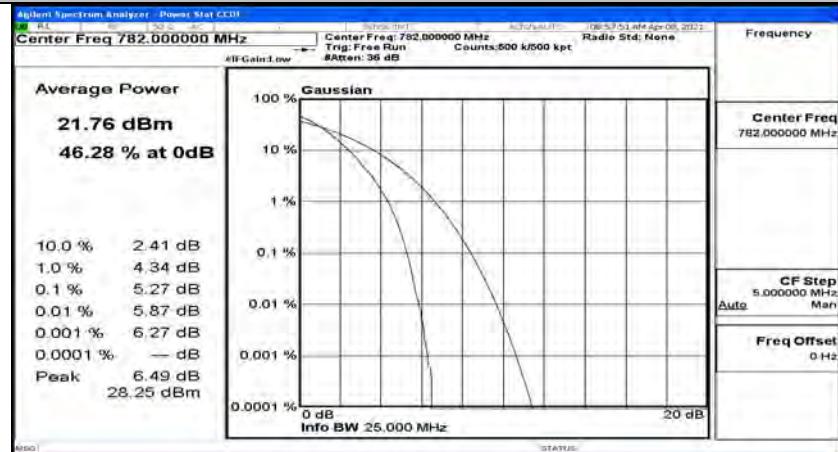
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 5 MHz)_MCH_16QAM



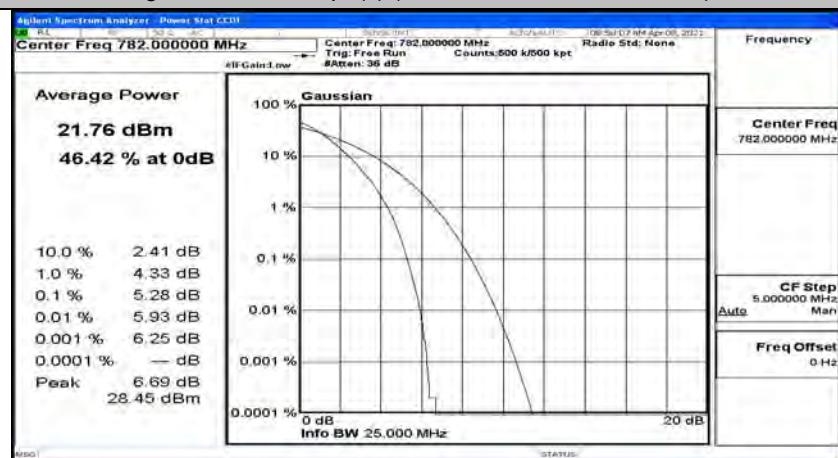
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_16QAM



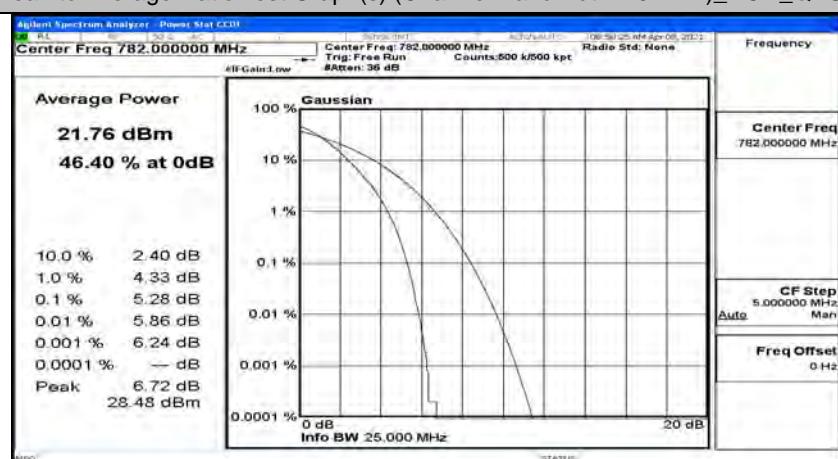
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 10 MHz)_LCH_QPSK



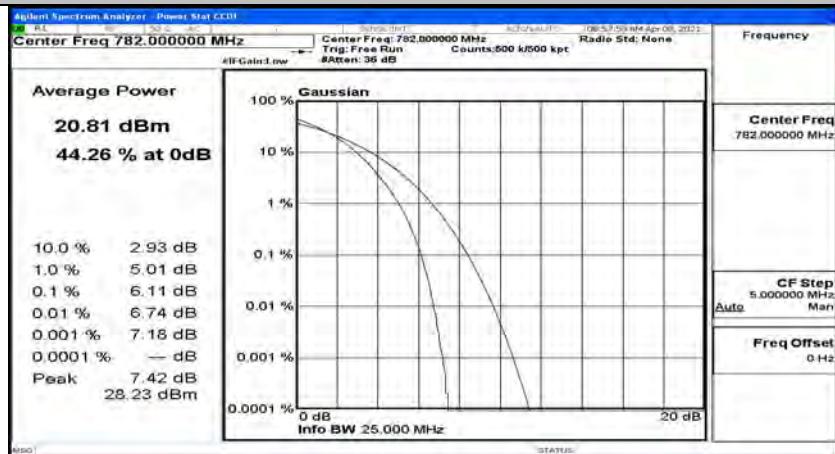
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_QPSK



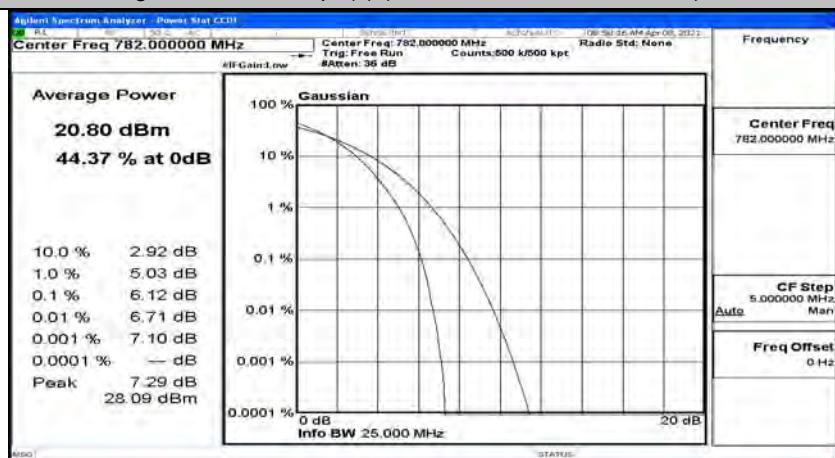
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 10 MHz)_HCH_QPSK



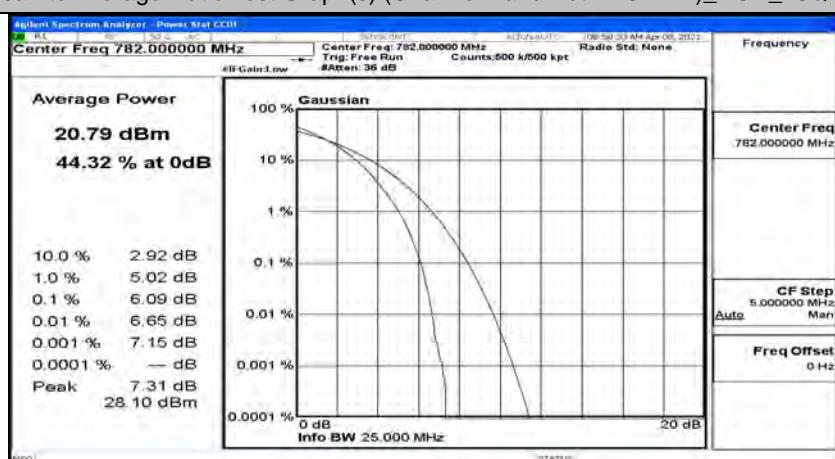
Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 10 MHz)_LCH_16QAM



Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_16QAM



Peak-to Average Ratio Test Graph(s) (Channel Bandwidth: 10 MHz)_HCH_16QAM

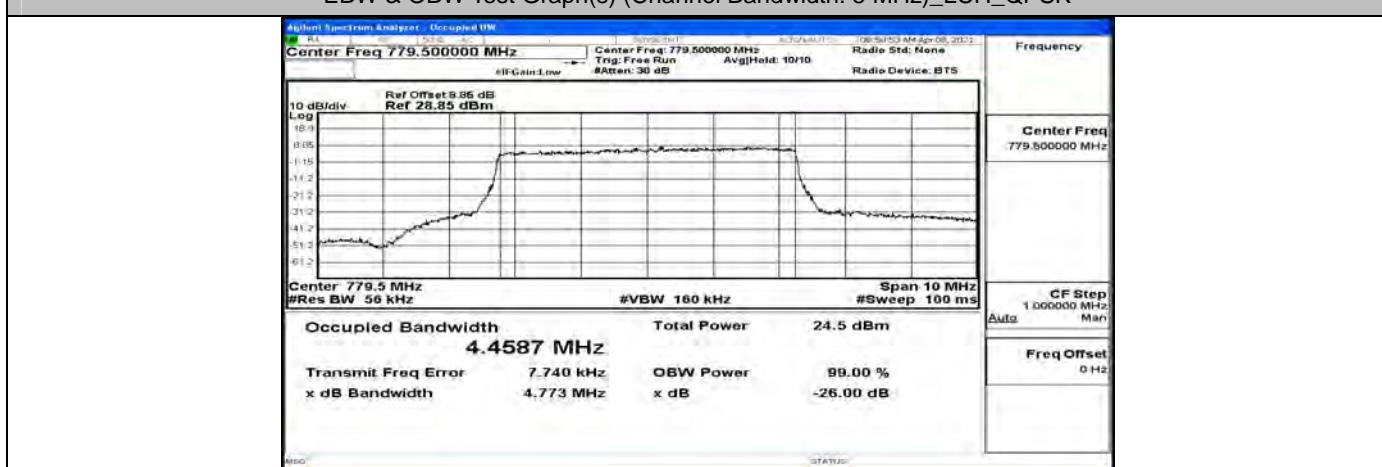


K.3 26dB Bandwidth and Occupied Bandwidth

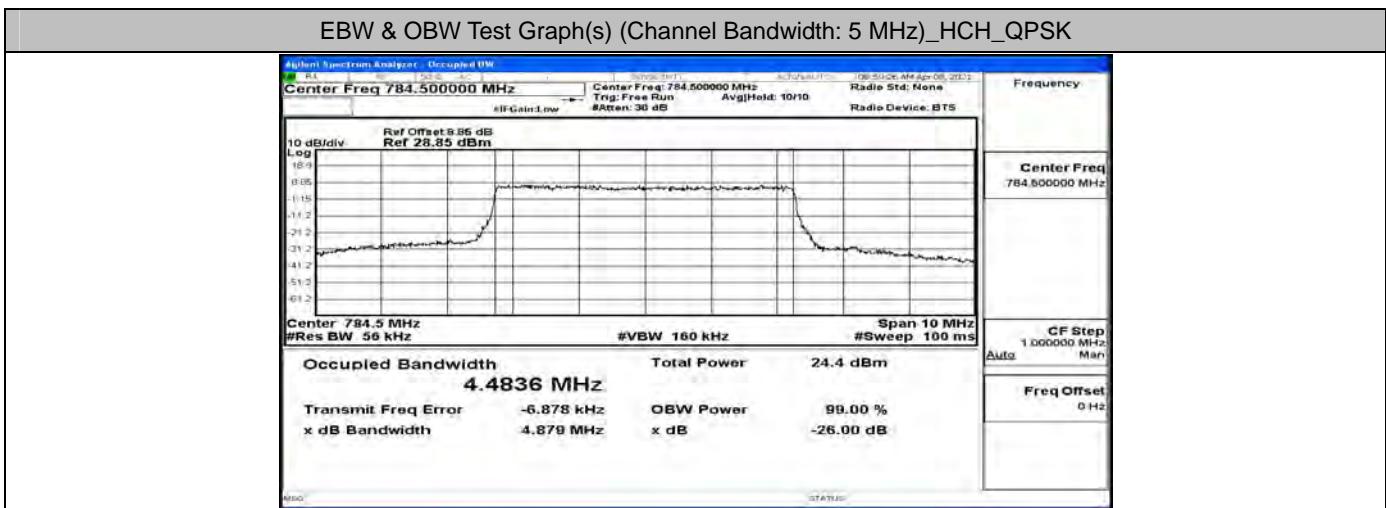
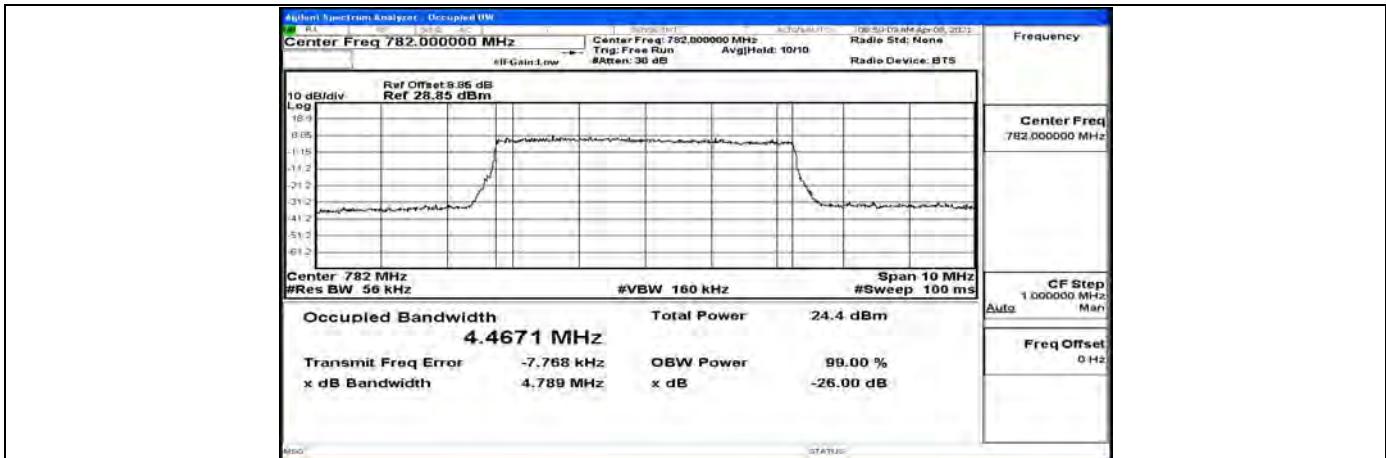
EBW & OBW Test Result (Channel Bandwidth: 5 MHz)				
Modulation	Channel	Occupied Bandwidth (MHz)	26dB Bandwidth (MHz)	Verdict
QPSK	LCH	4.4587	4.773	PASS
	MCH	4.4671	4.789	PASS
	HCH	4.4836	4.879	PASS
16QAM	LCH	4.4604	4.787	PASS
	MCH	4.4630	4.773	PASS
	HCH	4.4891	4.814	PASS

EBW & OBW Test Result (Channel Bandwidth: 10 MHz)				
Modulation	Channel	Occupied Bandwidth (MHz)	26dB Bandwidth (MHz)	Verdict
QPSK	LCH	8.9186	9.403	PASS
	MCH	8.9206	9.376	PASS
	HCH	8.9225	9.402	PASS
16QAM	LCH	8.8967	9.414	PASS
	MCH	8.8966	9.327	PASS
	HCH	8.9029	9.364	PASS

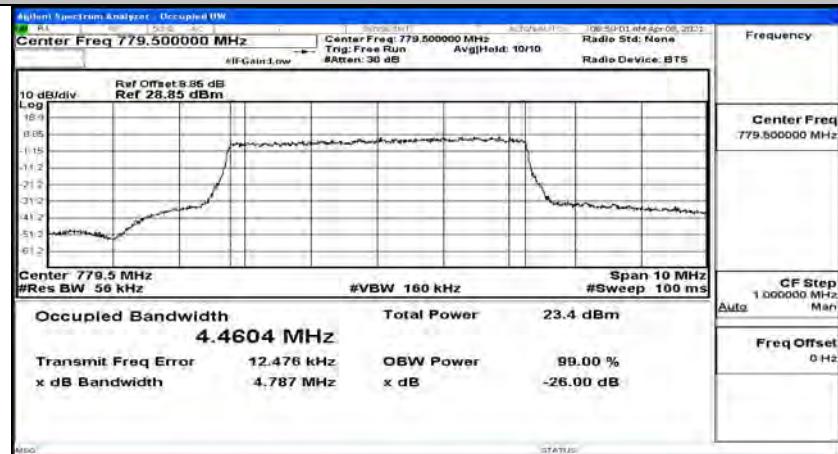
EBW & OBW Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_QPSK



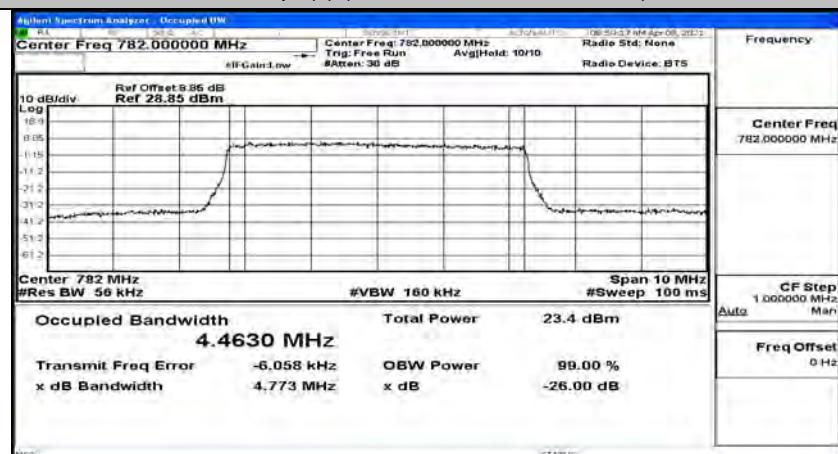
EBW & OBW Test Graph(s) (Channel Bandwidth: 5 MHz)_MCH_QPSK



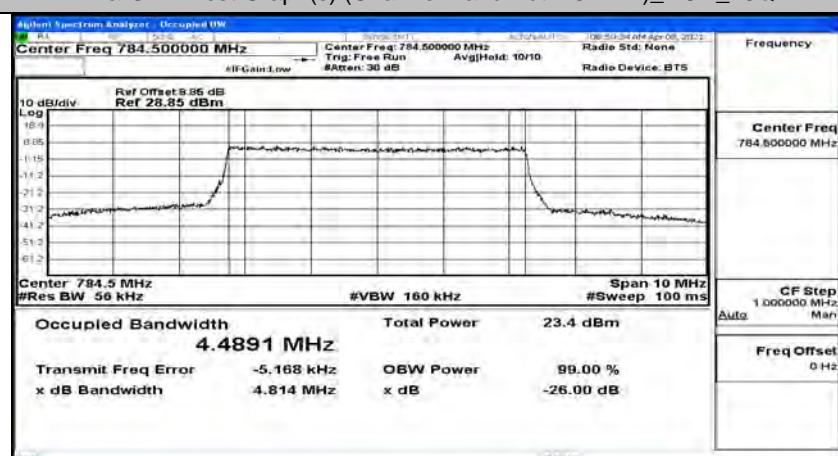
EBW & OBW Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_16QAM



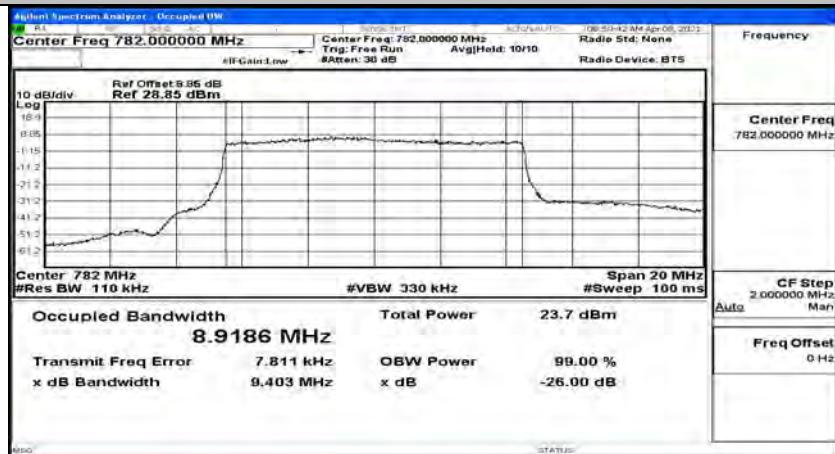
EBW & OBW Test Graph(s) (Channel Bandwidth: 5 MHz)_MCH_16QAM



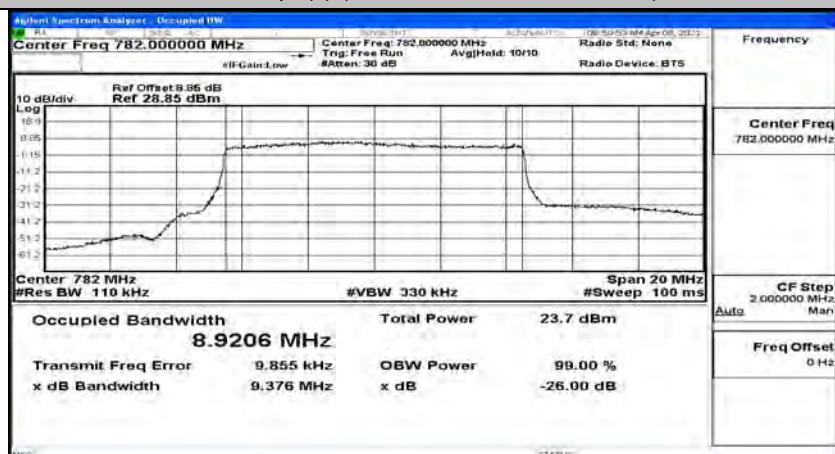
EBW & OBW Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_16QAM



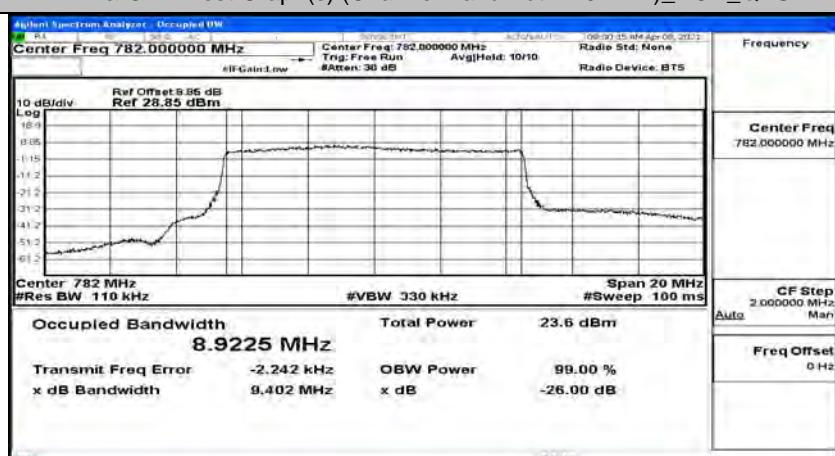
EBW & OBW Test Graph(s) (Channel Bandwidth: 10 MHz)_LCH_QPSK



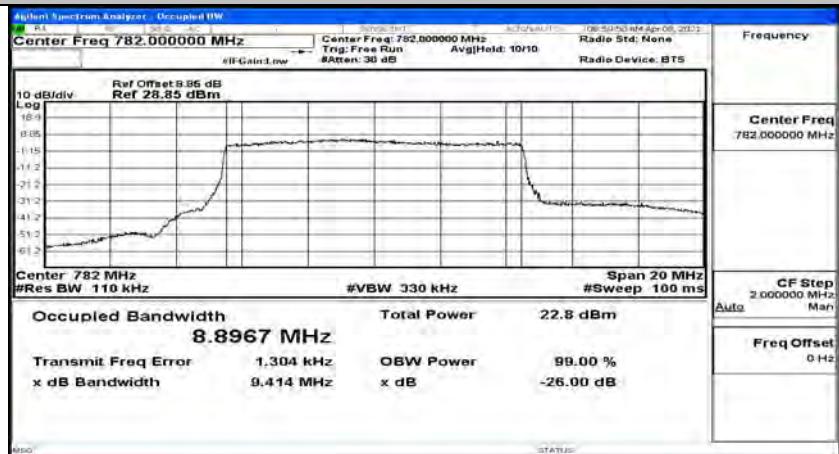
EBW & OBW Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_QPSK



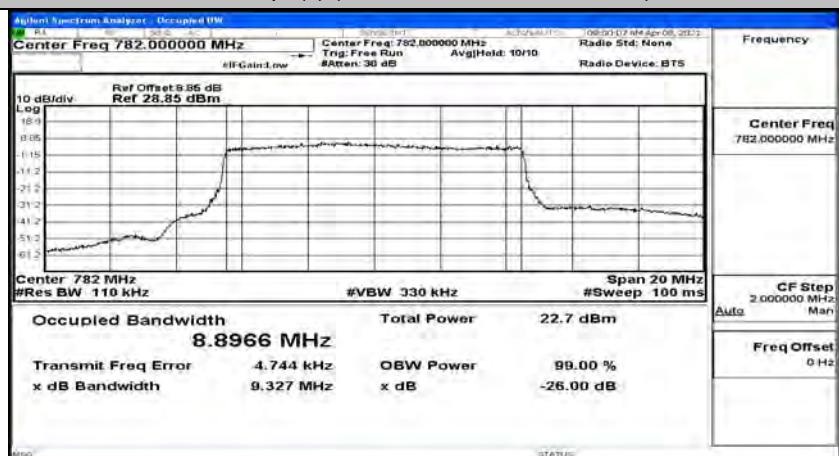
EBW & OBW Test Graph(s) (Channel Bandwidth: 10 MHz)_HCH_QPSK



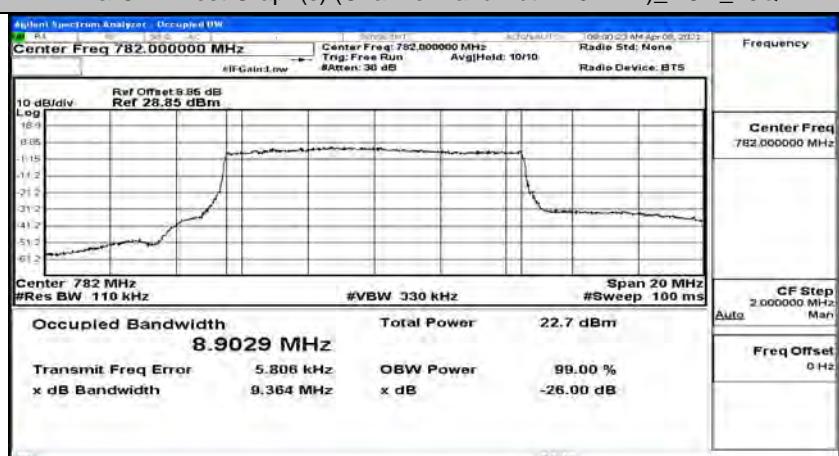
EBW & OBW Test Graph(s) (Channel Bandwidth: 10 MHz)_LCH_16QAM



EBW & OBW Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_16QAM

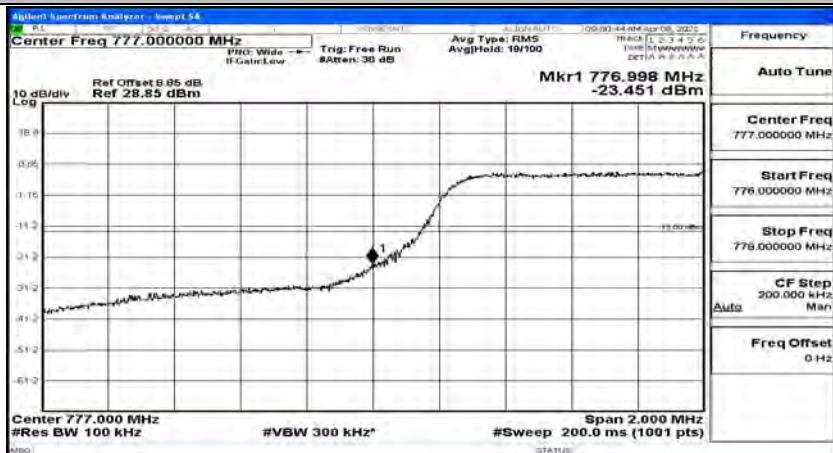


EBW & OBW Test Graph(s) (Channel Bandwidth: 10 MHz)_HCH_16QAM

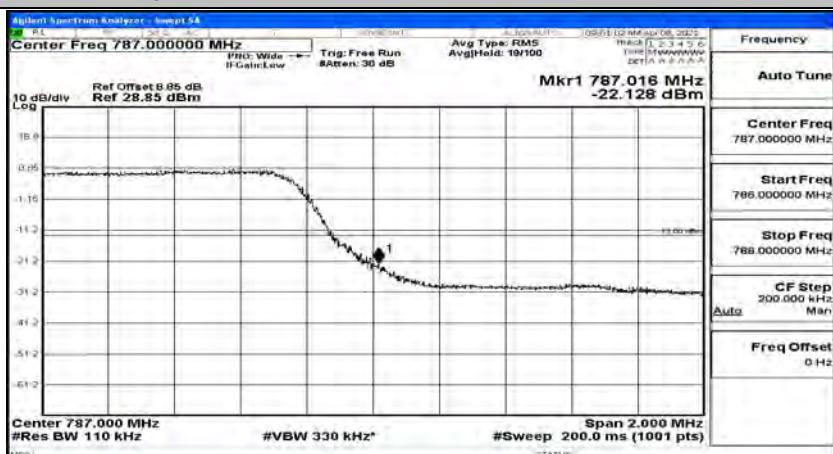


K.4 Band Edge

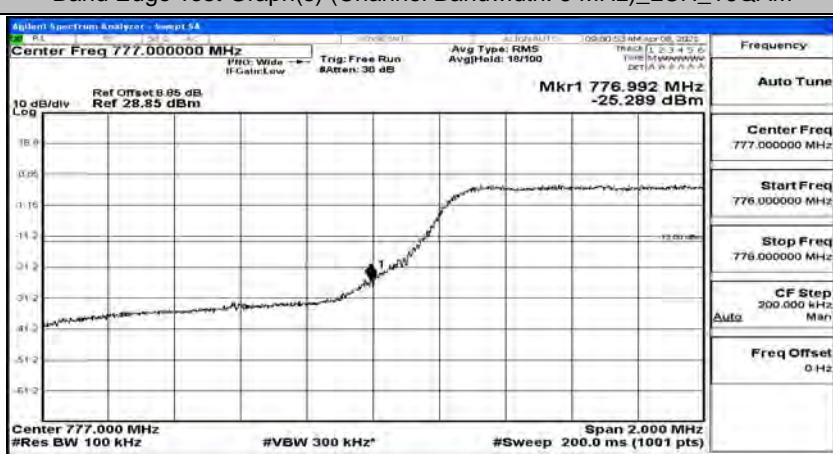
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_QPSK



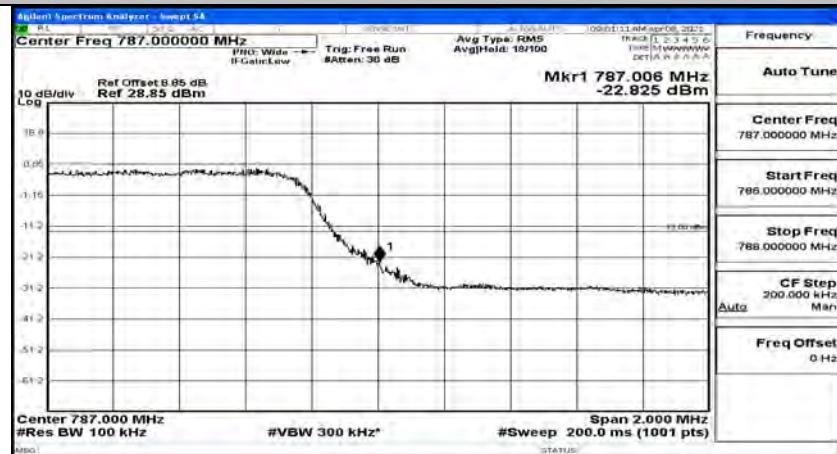
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_QPSK



Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_16QAM



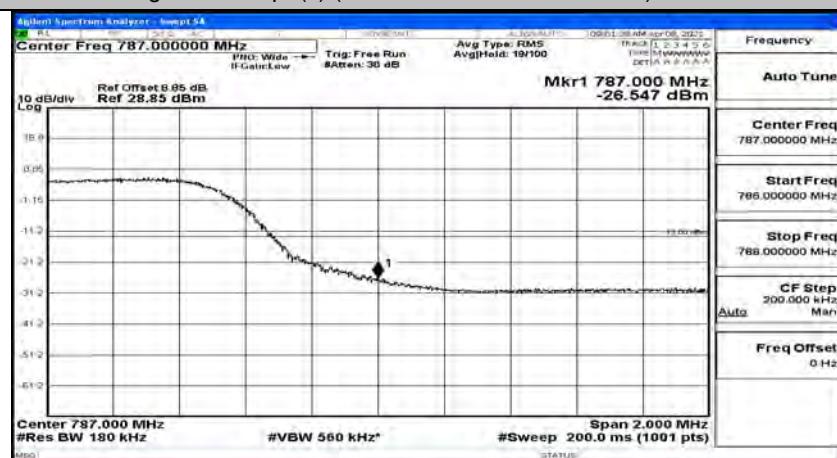
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_16QAM



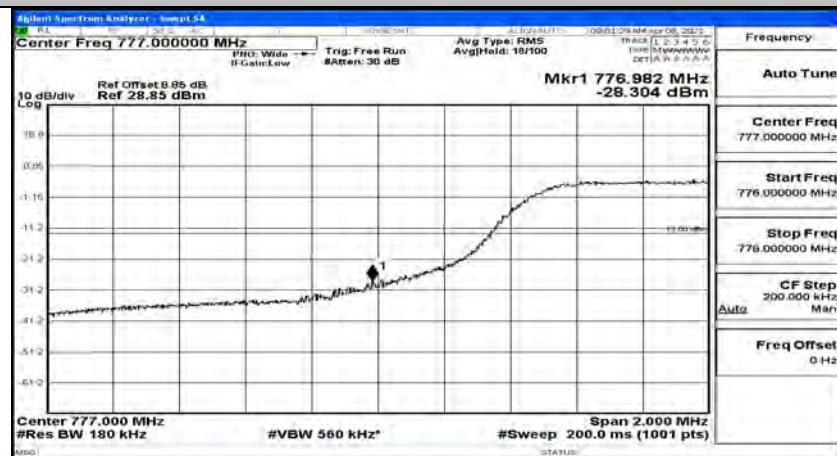
Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_LCH_QPSK



Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_HCH_QPSK



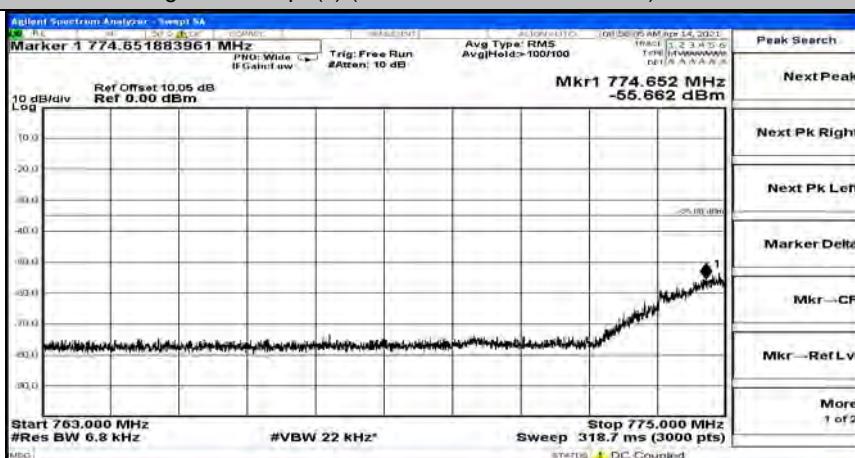
Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_LCH_16QAM



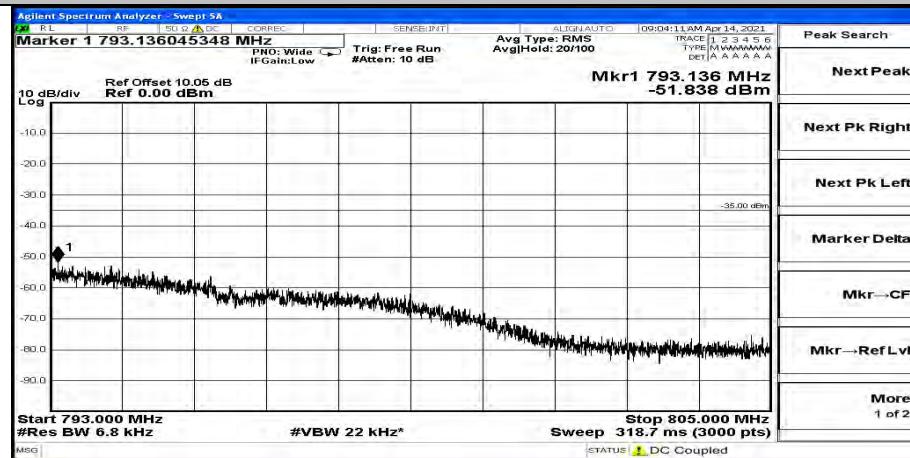
Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_HCH_16QAM



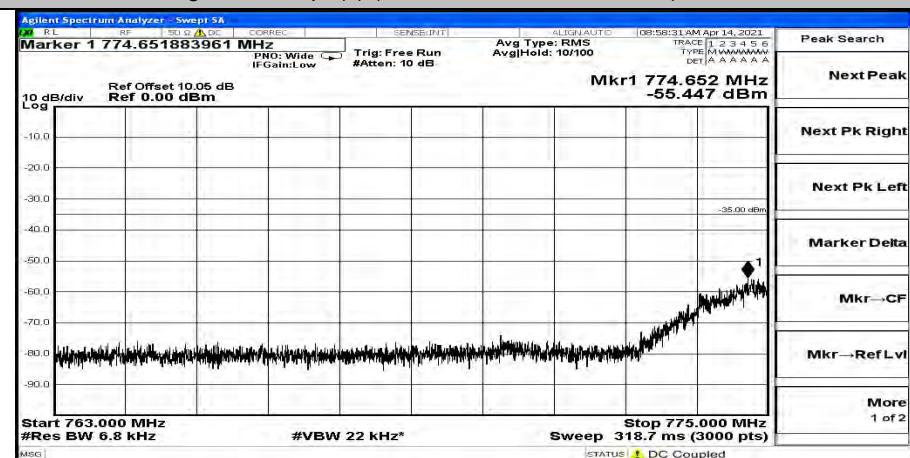
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_QPSK



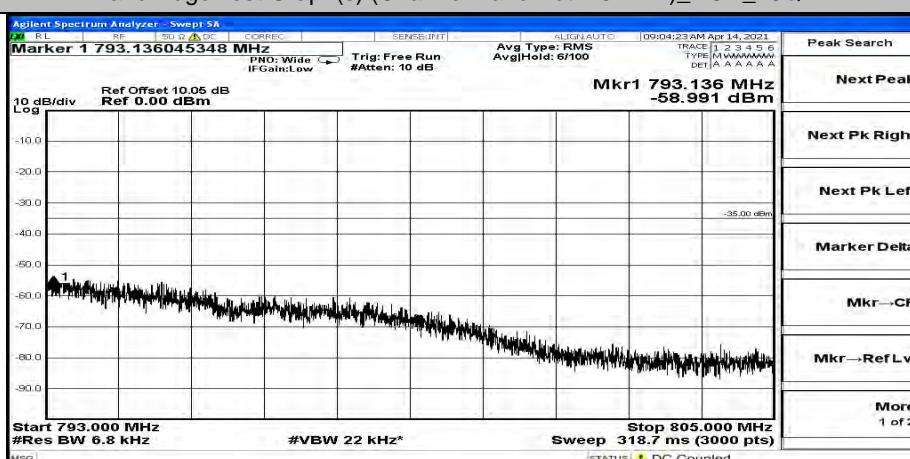
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_QPSK



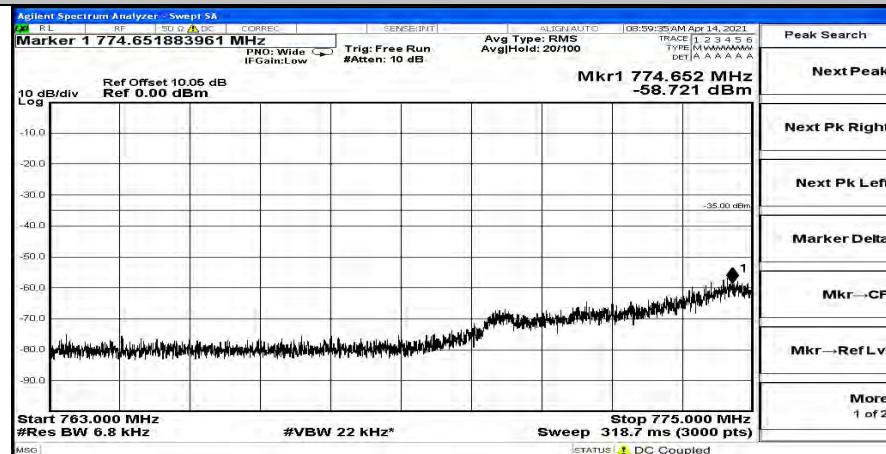
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_LCH_16QAM



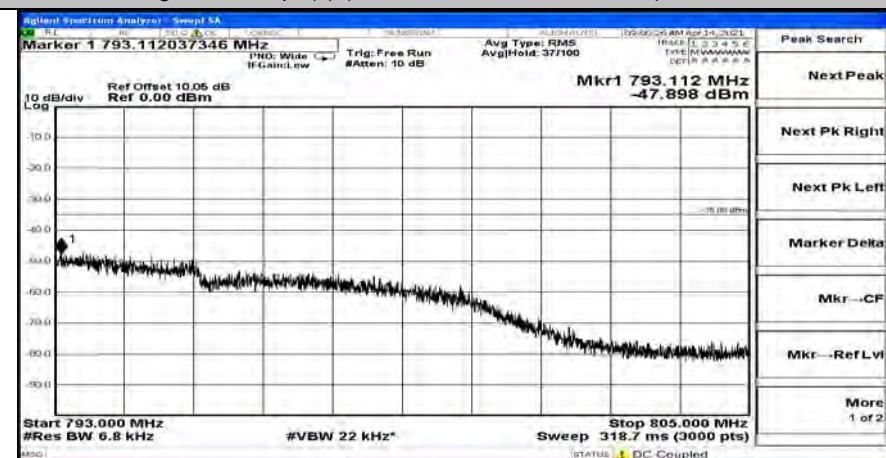
Band Edge Test Graph(s) (Channel Bandwidth: 5 MHz)_HCH_16QAM



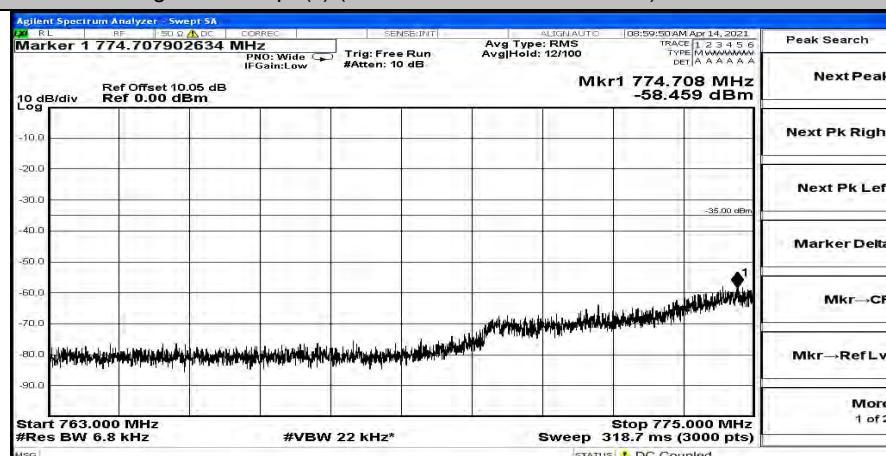
Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_L_QPSK

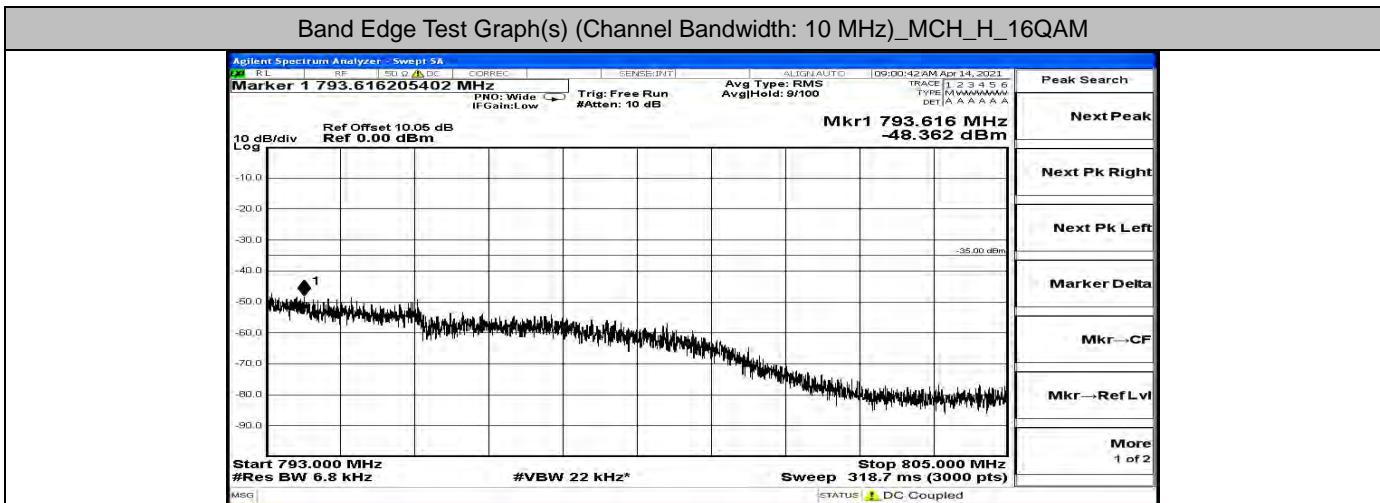


Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_H_QPSK



Band Edge Test Graph(s) (Channel Bandwidth: 10 MHz)_MCH_L_16QAM

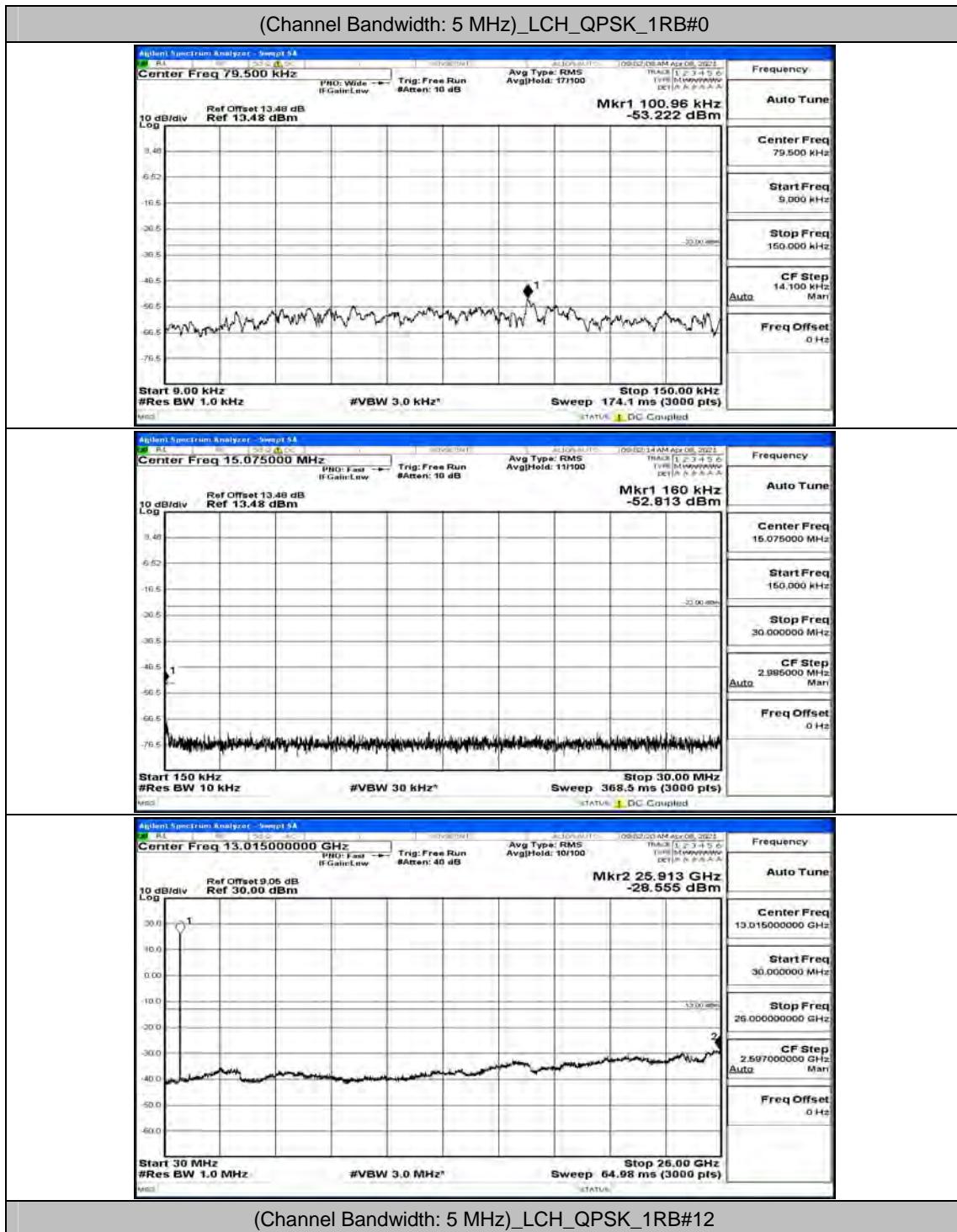


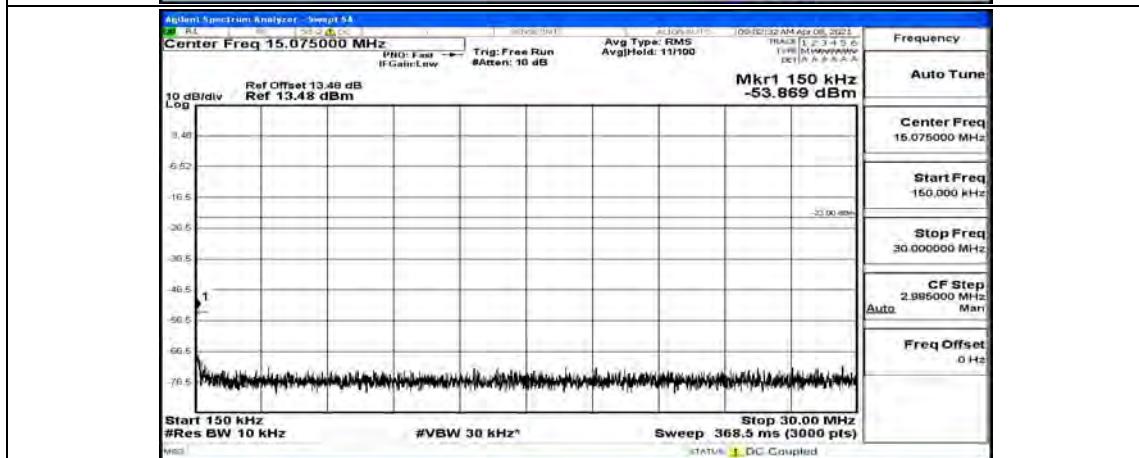
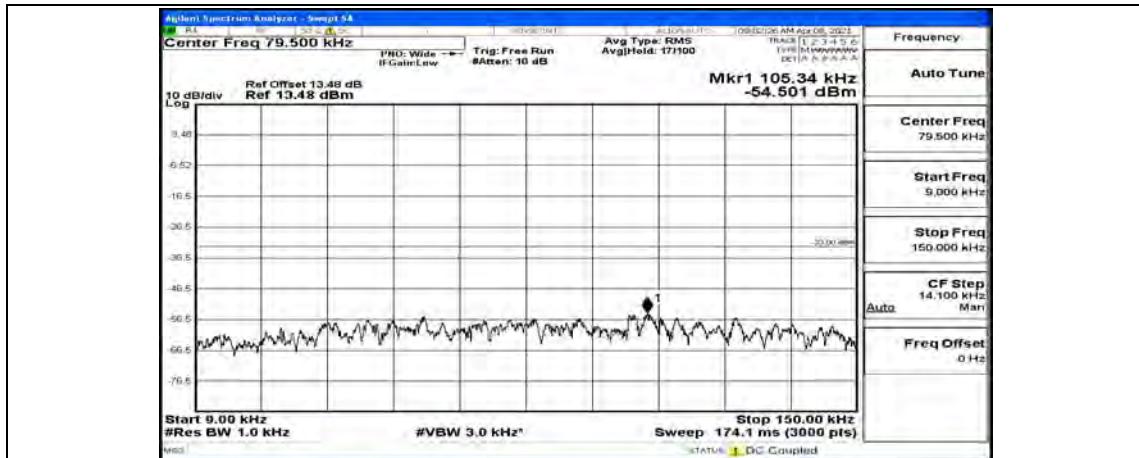


K.5 Conducted Spurious Emission

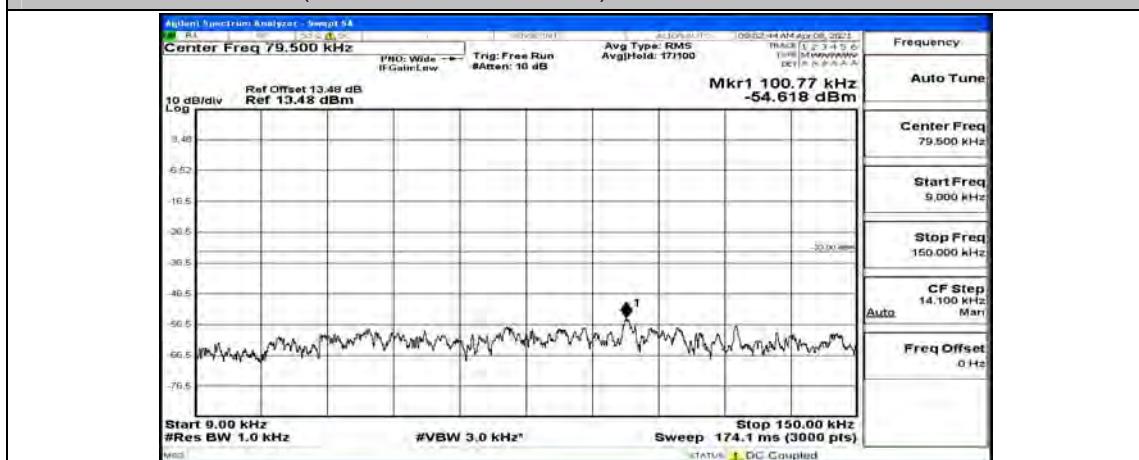
Test Graphs

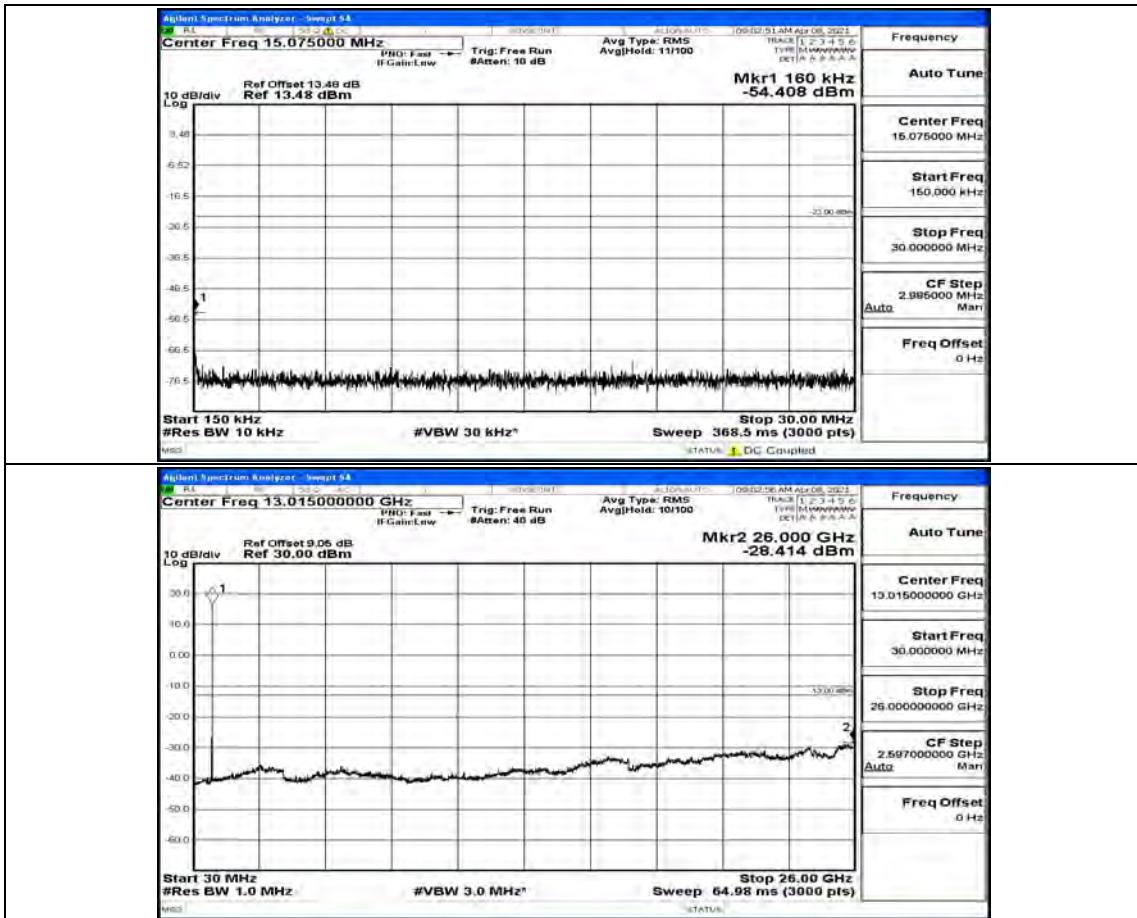
Channel Bandwidth: 5 MHz



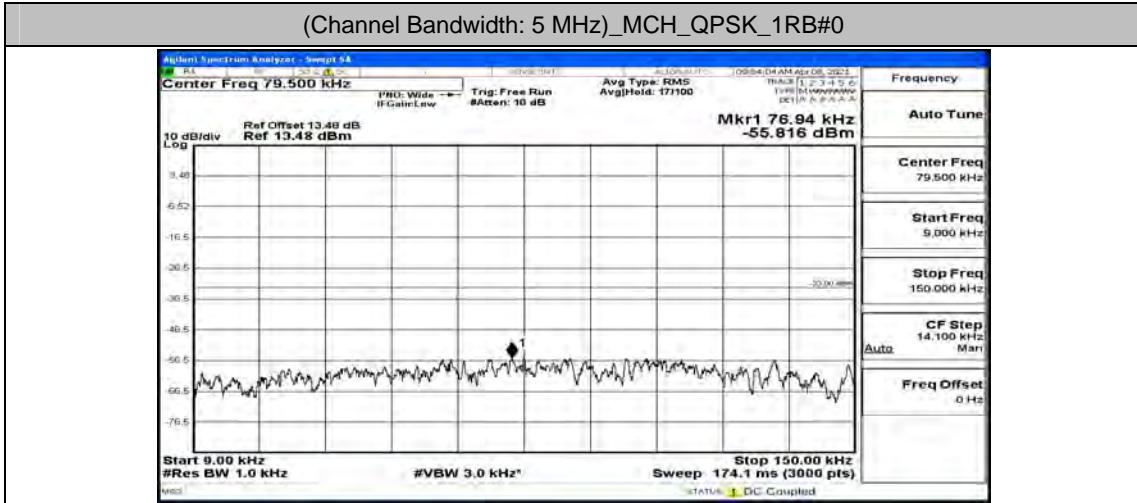


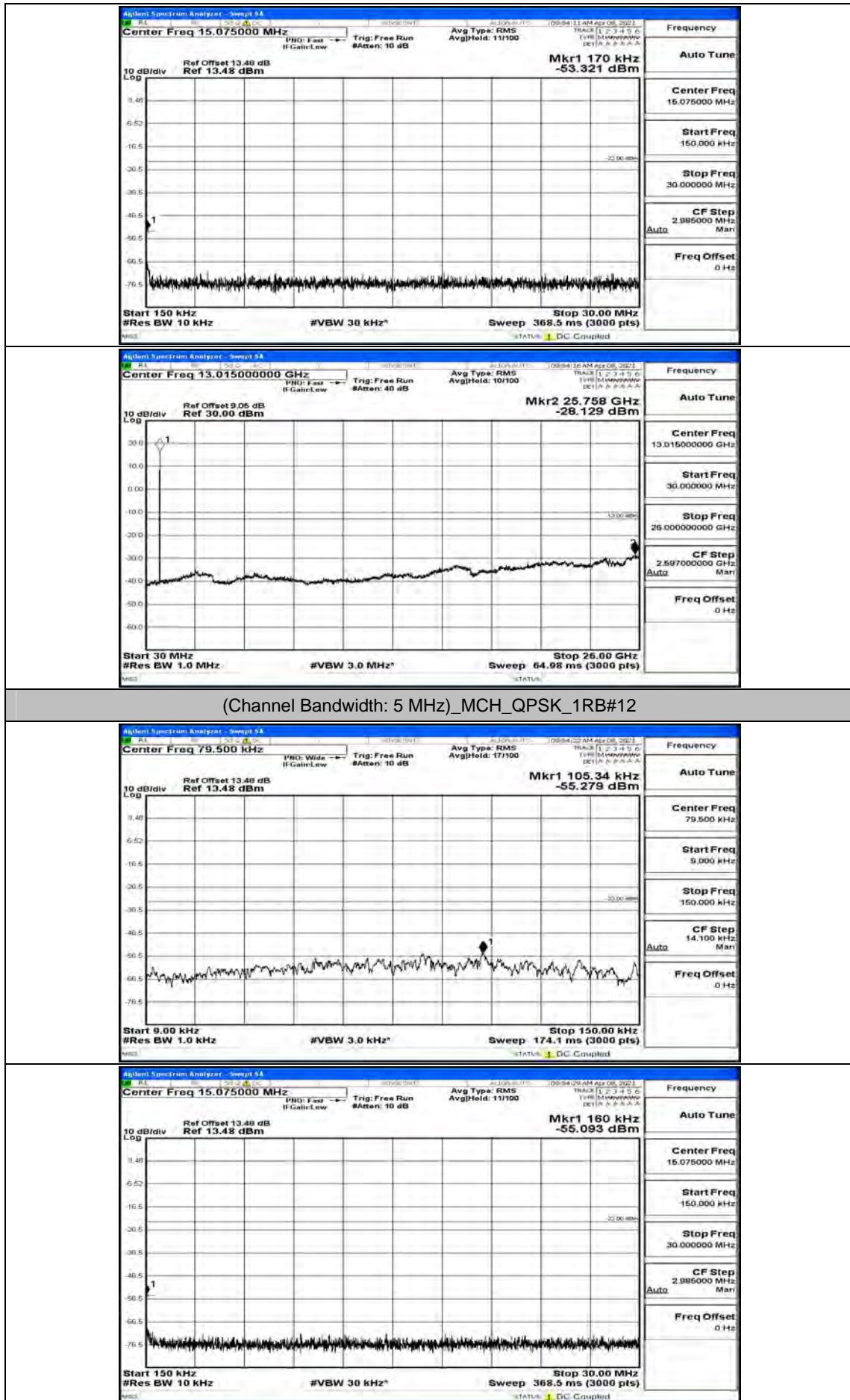
(Channel Bandwidth: 5 MHz)_LCH_QPSK_1RB#24

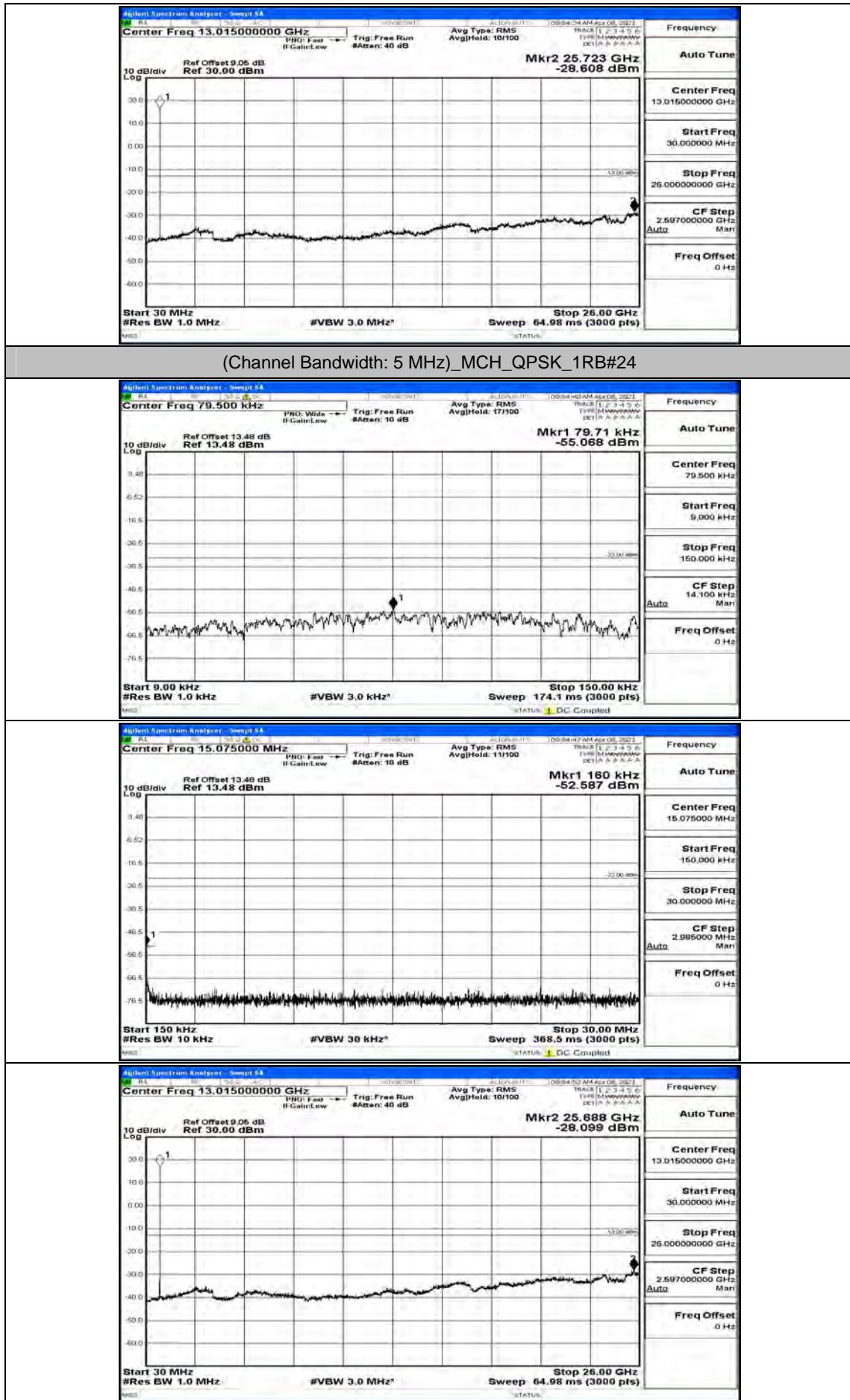




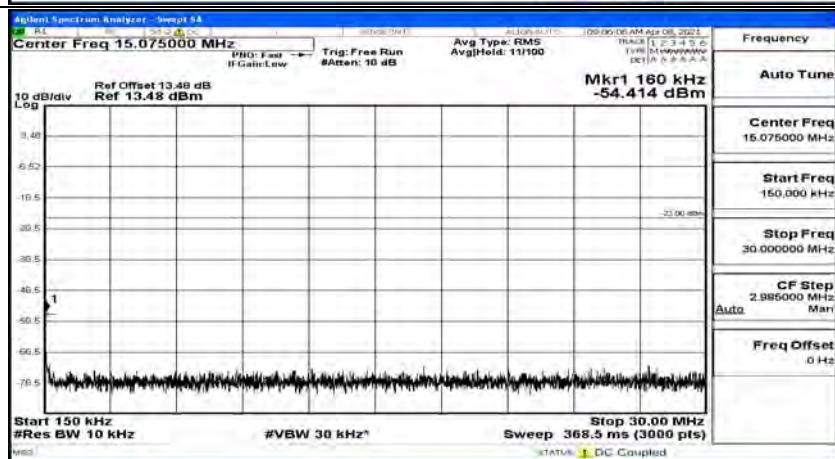
(Channel Bandwidth: 5 MHz)_MCH_QPSK_1RB#0



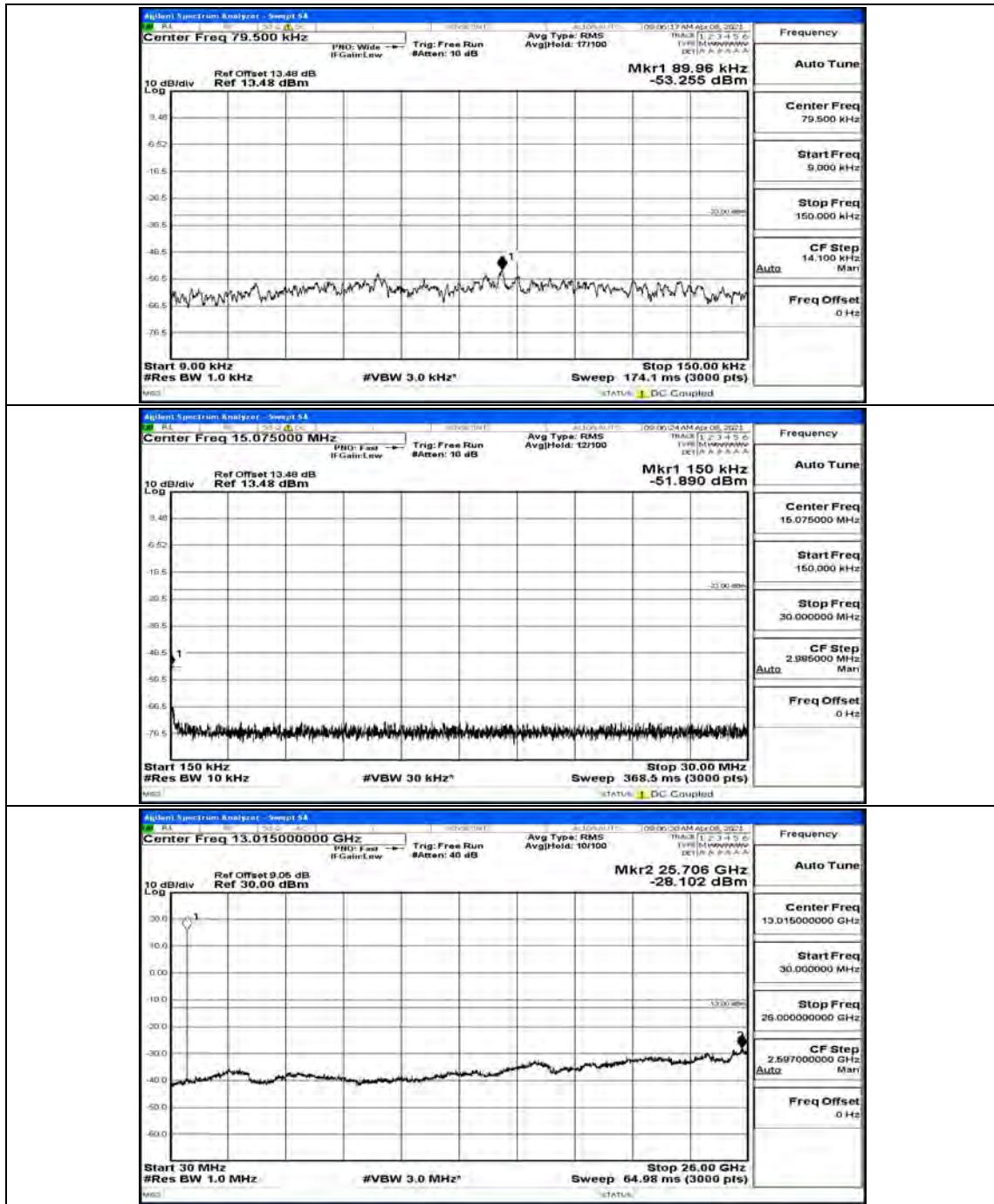




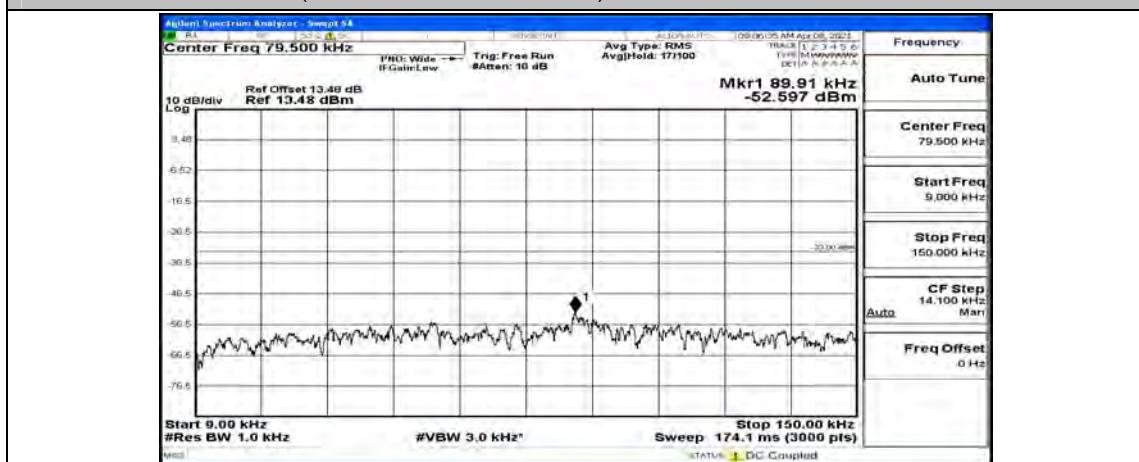
(Channel Bandwidth: 5 MHz)_HCH_QPSK_1RB#0

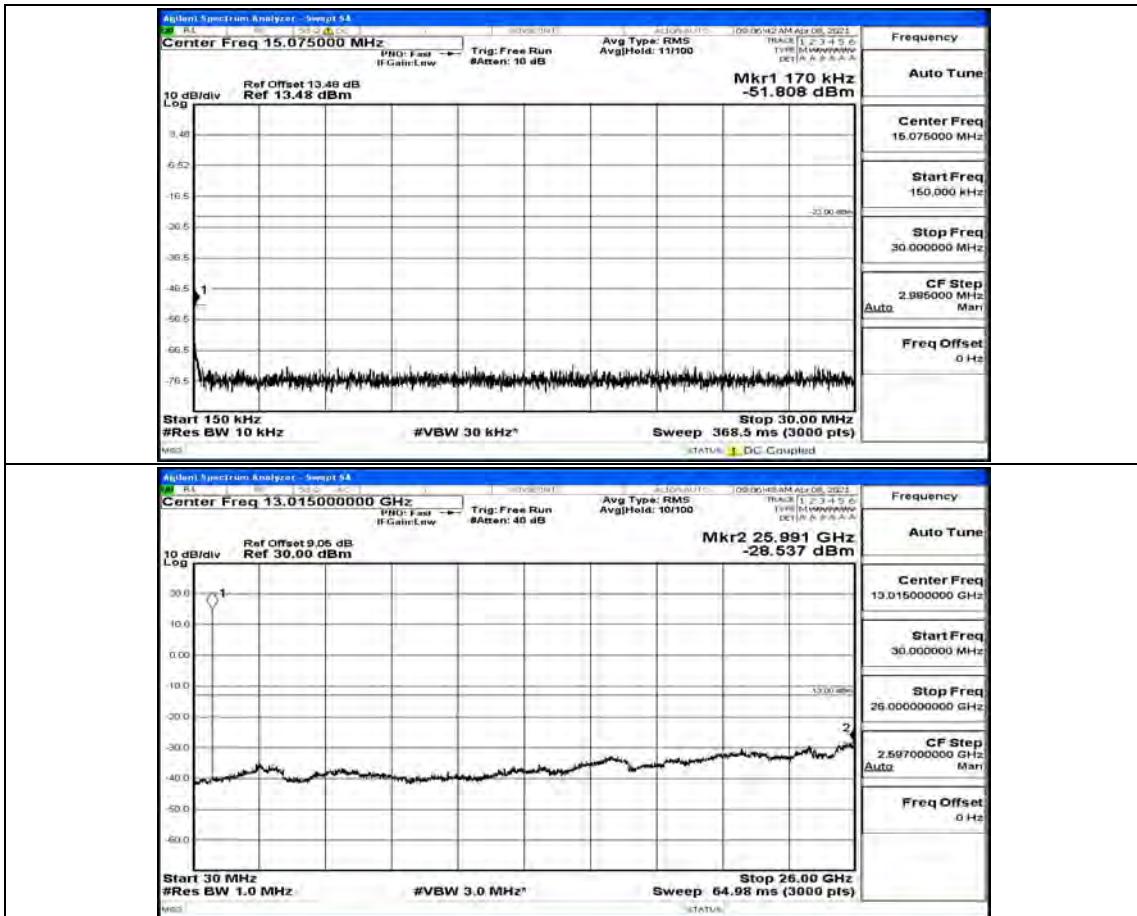


(Channel Bandwidth: 5 MHz)_HCH_QPSK_1RB#12

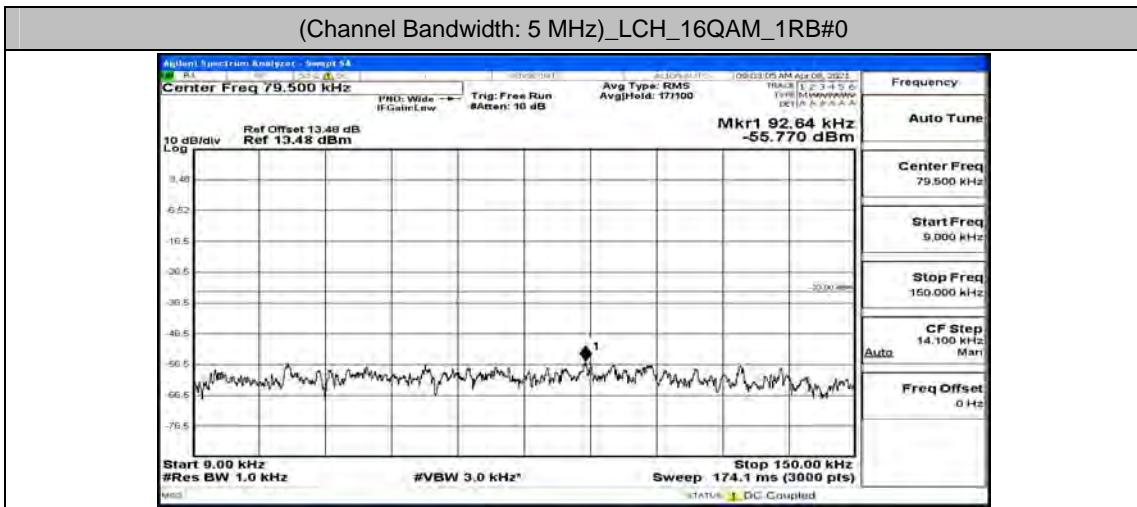


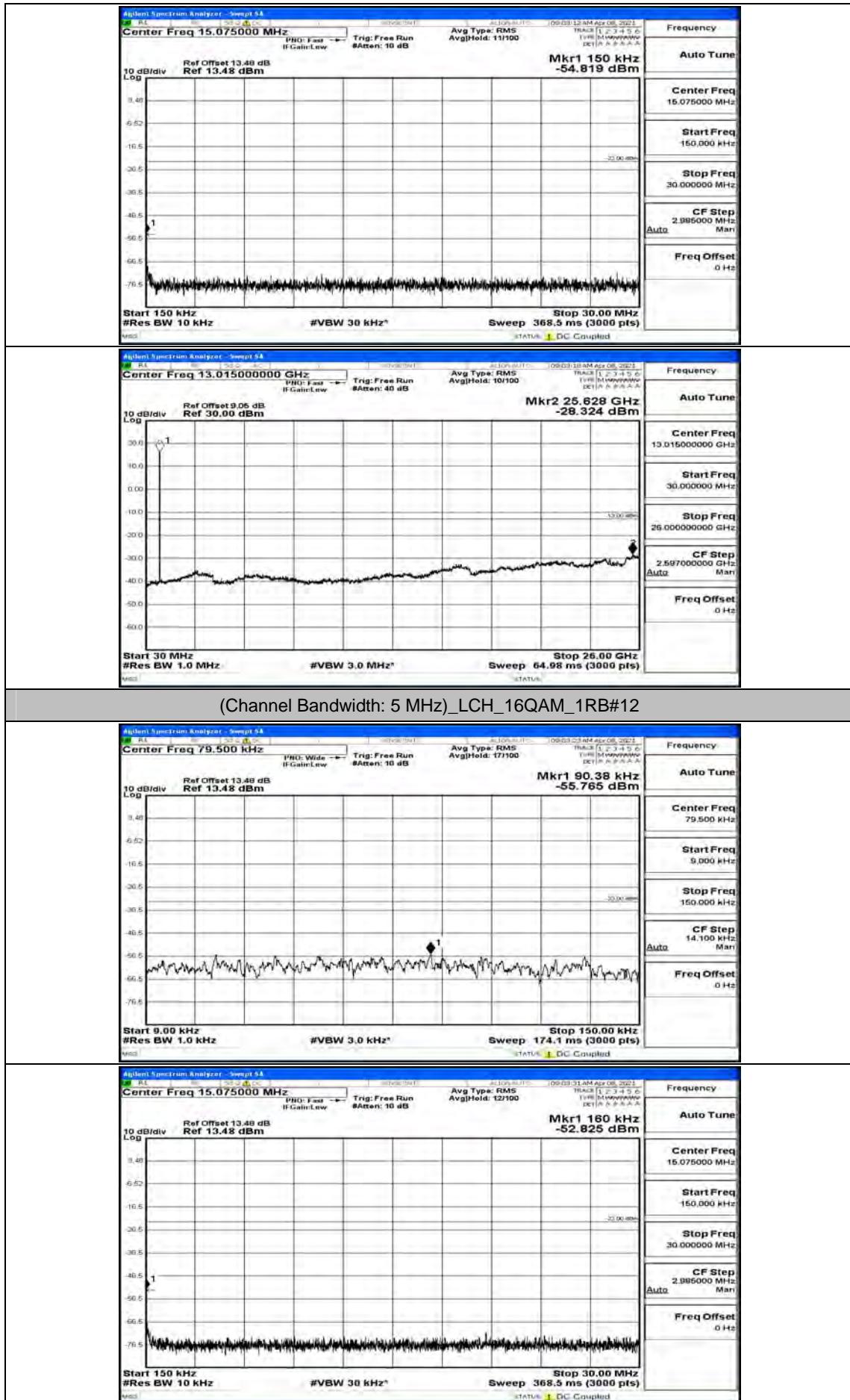
(Channel Bandwidth: 5 MHz)_HCH_QPSK_1RB#24

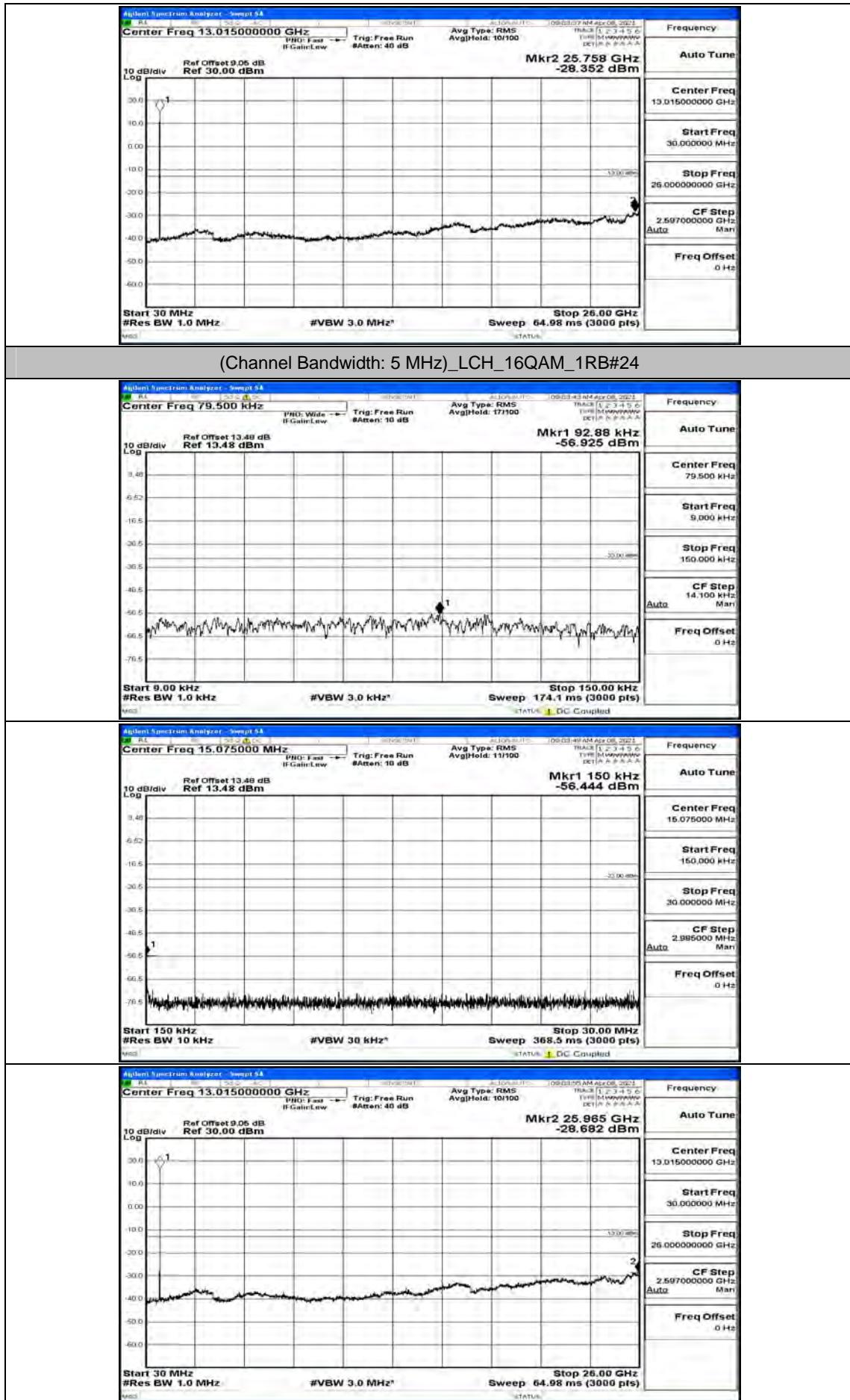




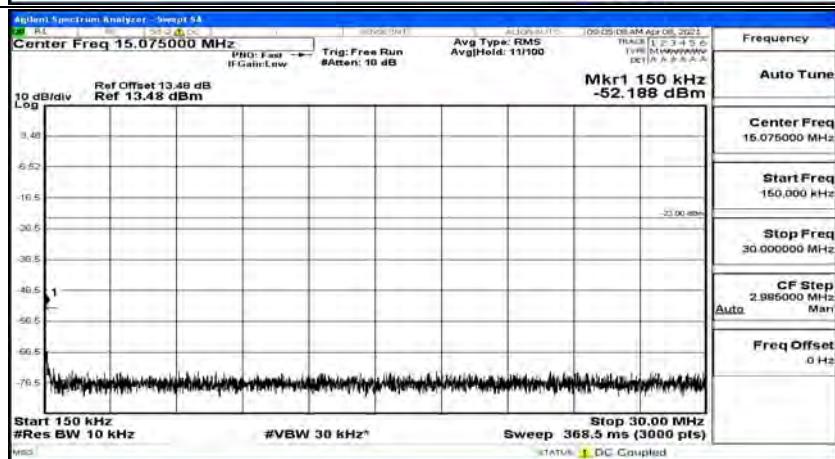
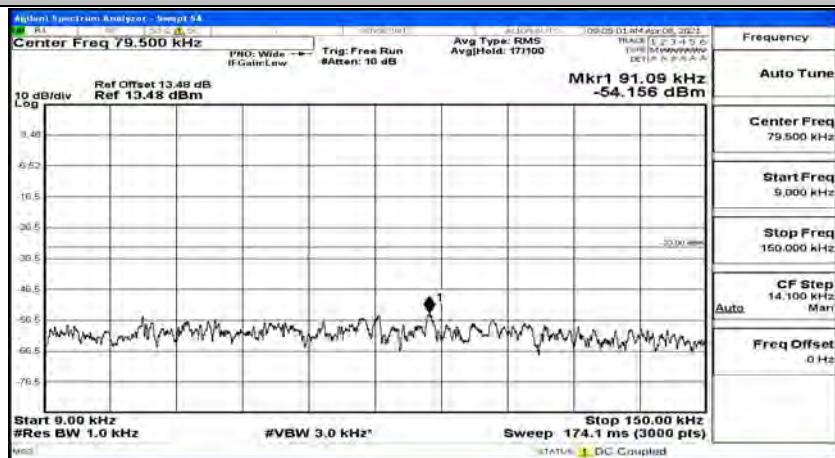
(Channel Bandwidth: 5 MHz)_LCH_16QAM_1RB#0



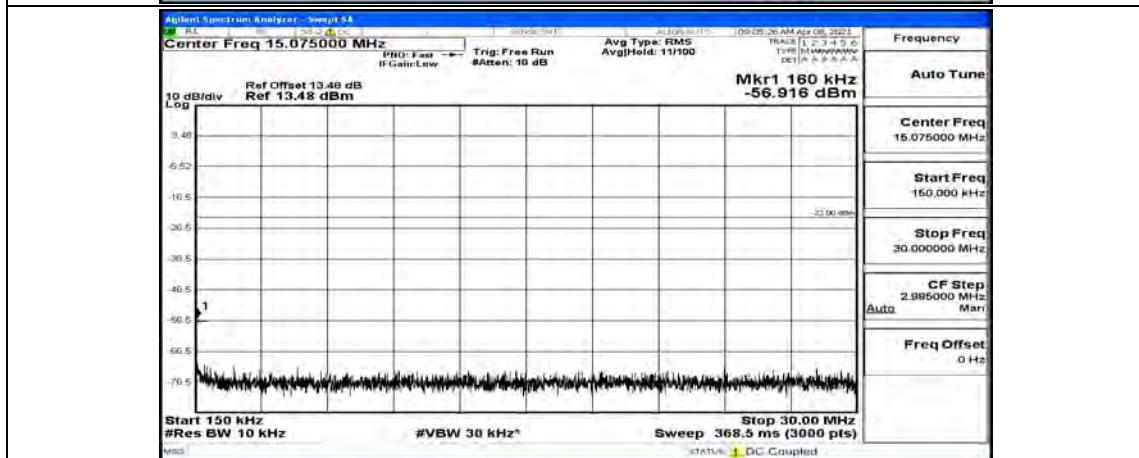
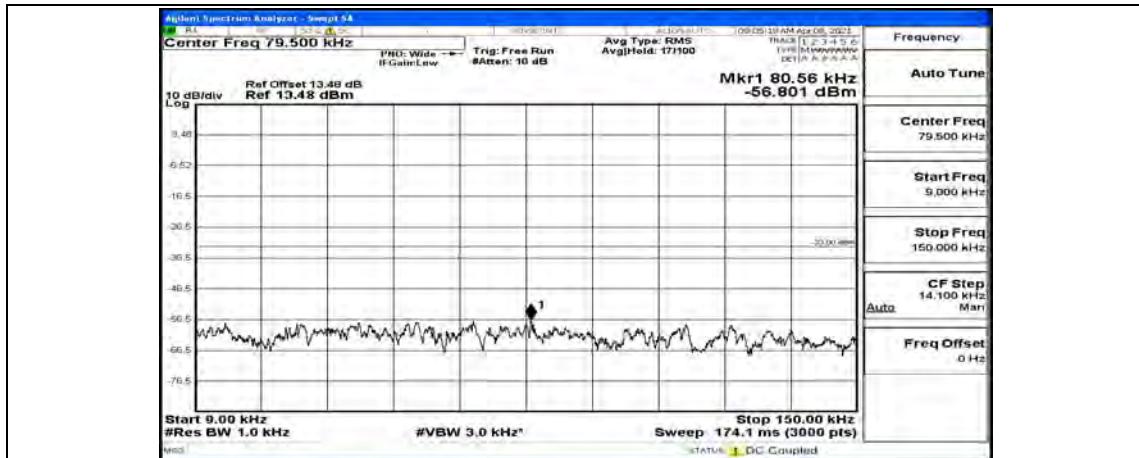




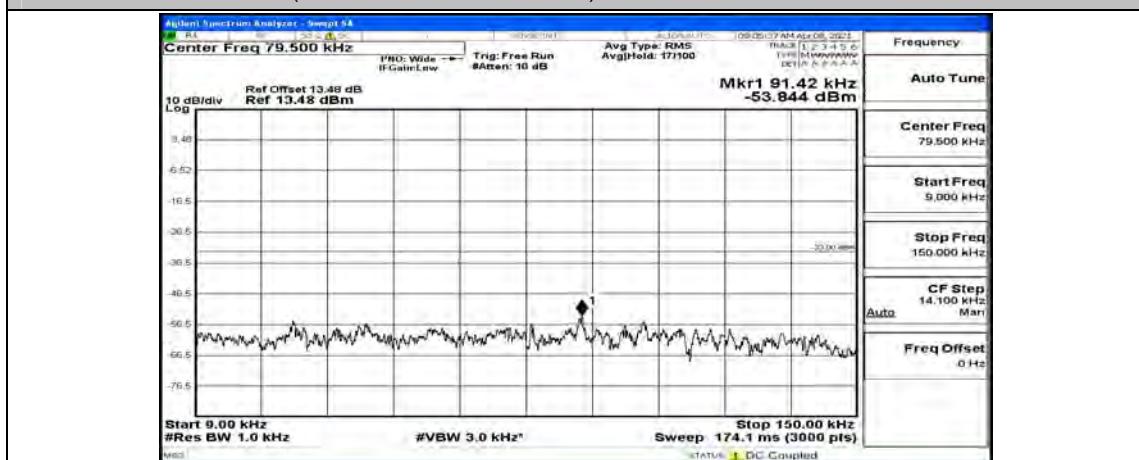
(Channel Bandwidth: 5 MHz)_MCH_16QAM_1RB#0

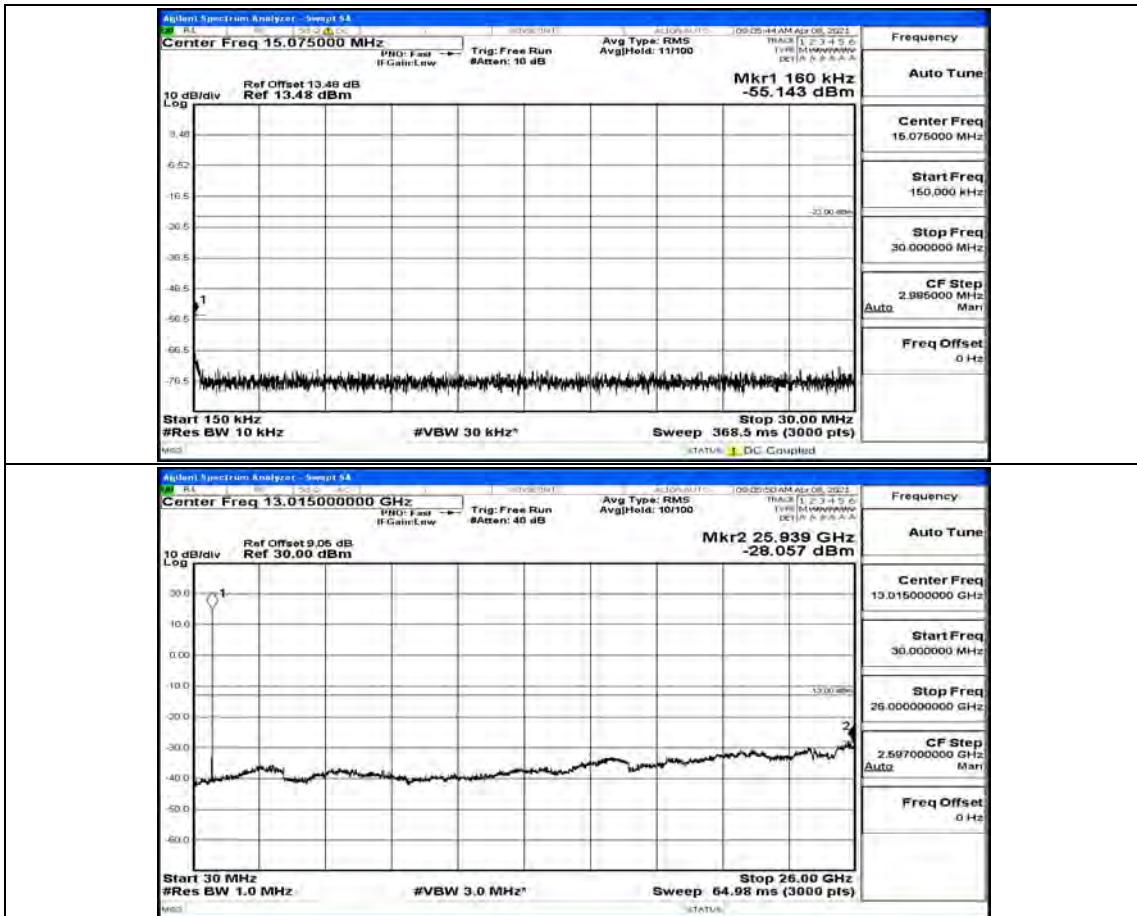


(Channel Bandwidth: 5 MHz)_MCH_16QAM_1RB#12

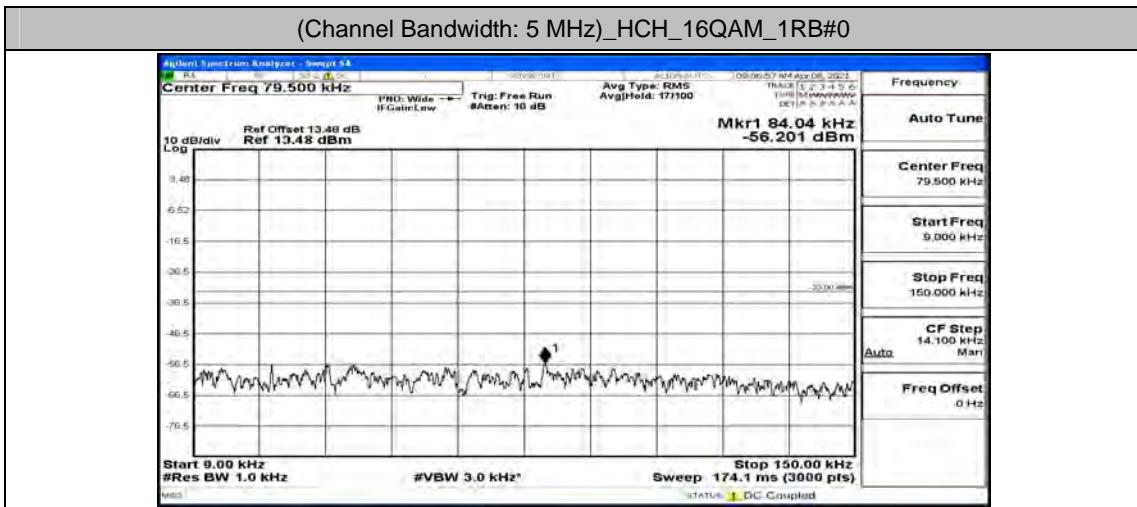


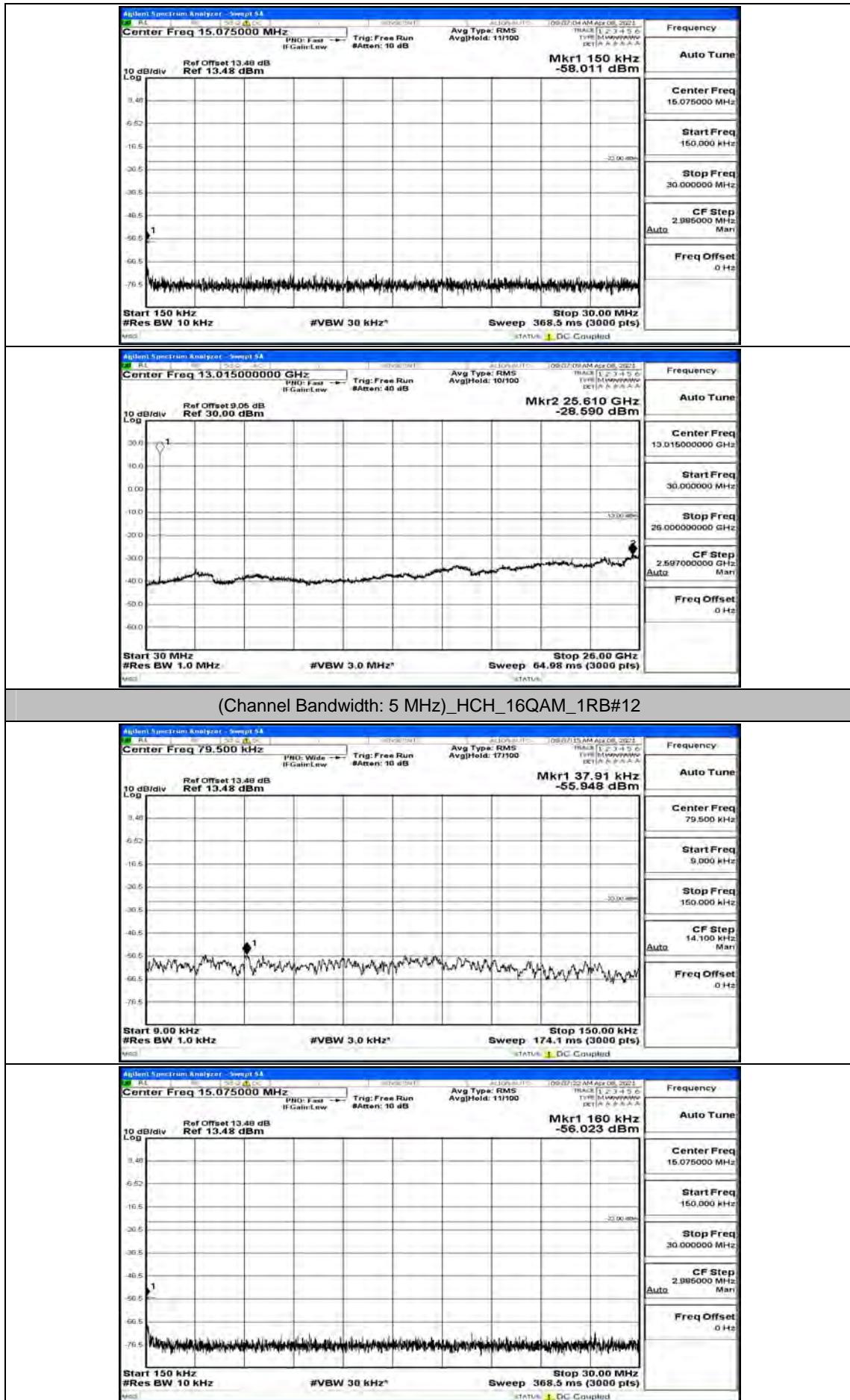
(Channel Bandwidth: 5 MHz)_MCH_16QAM_1RB#24

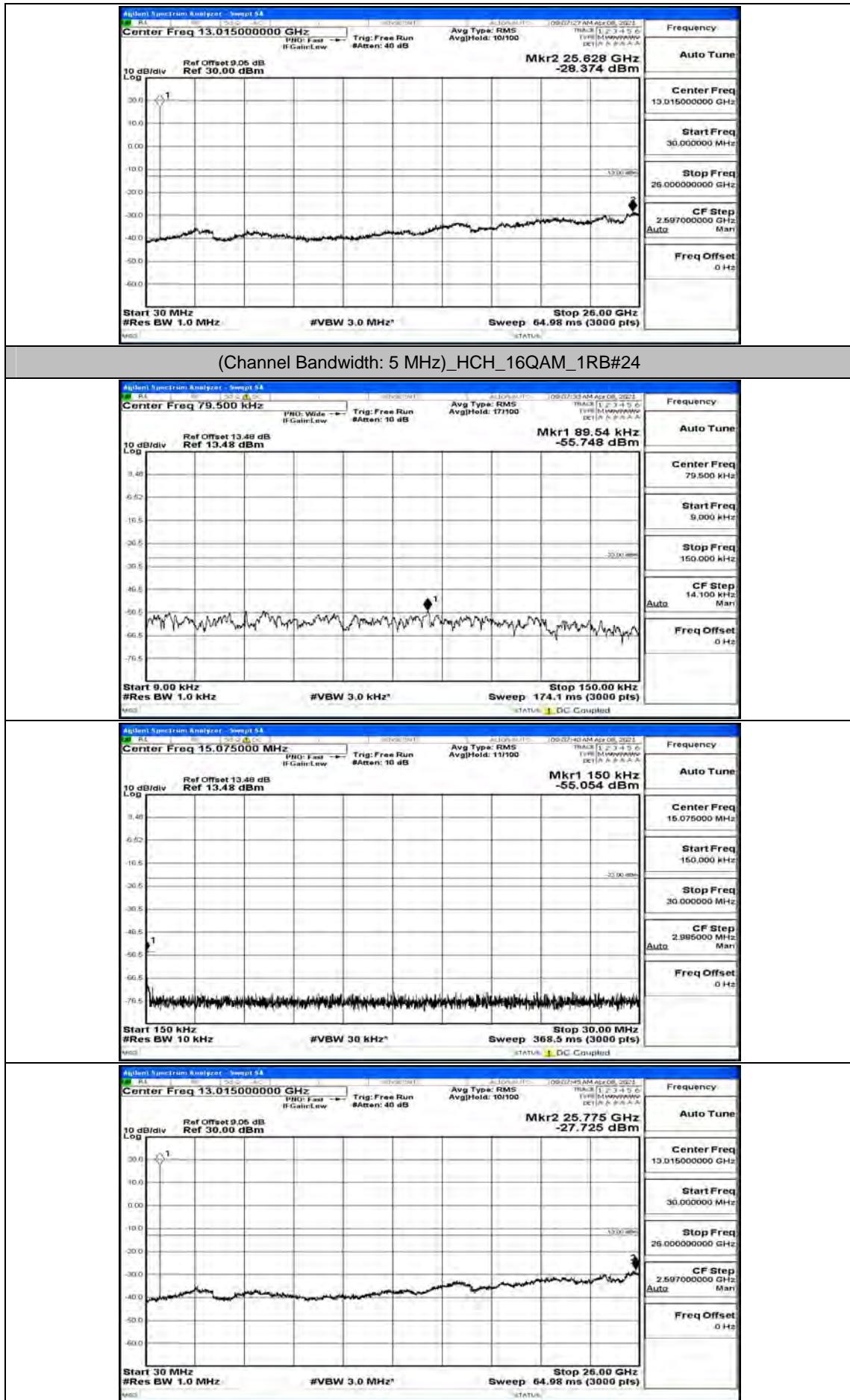




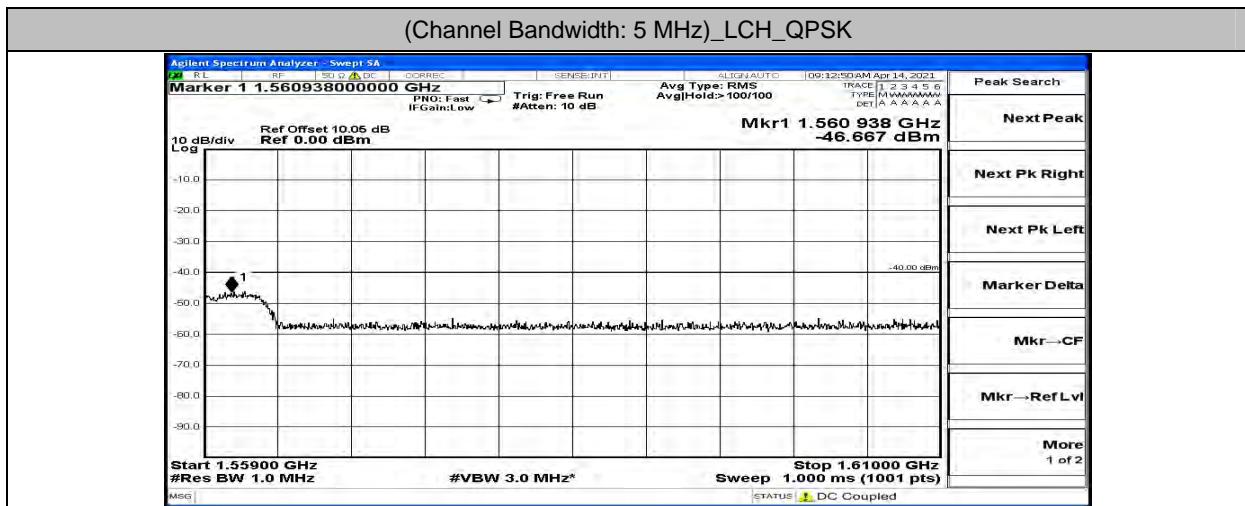
(Channel Bandwidth: 5 MHz)_HCH_16QAM_1RB#0



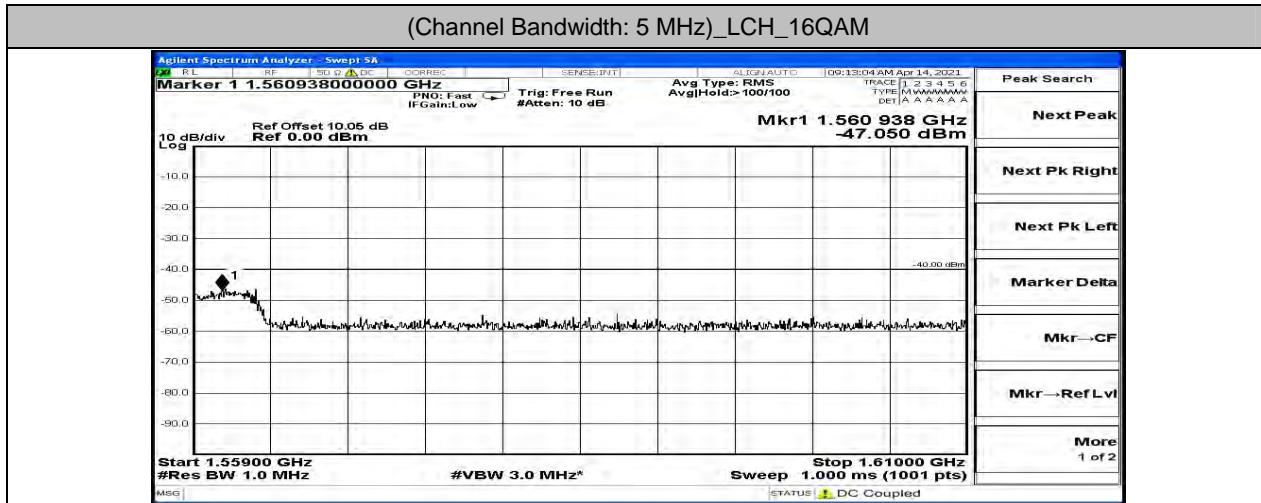




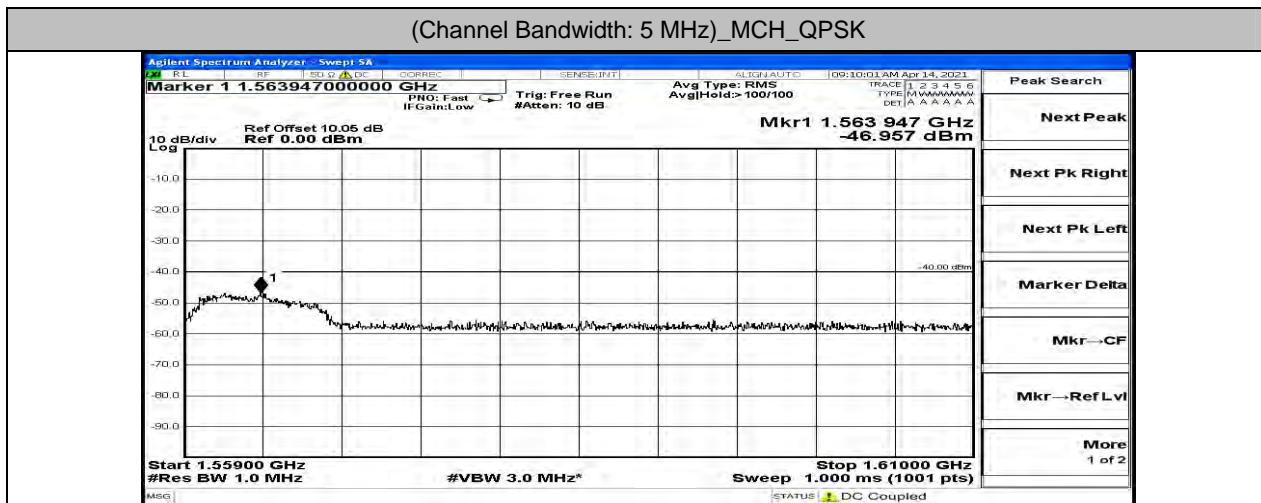
(Channel Bandwidth: 5 MHz)_LCH_QPSK

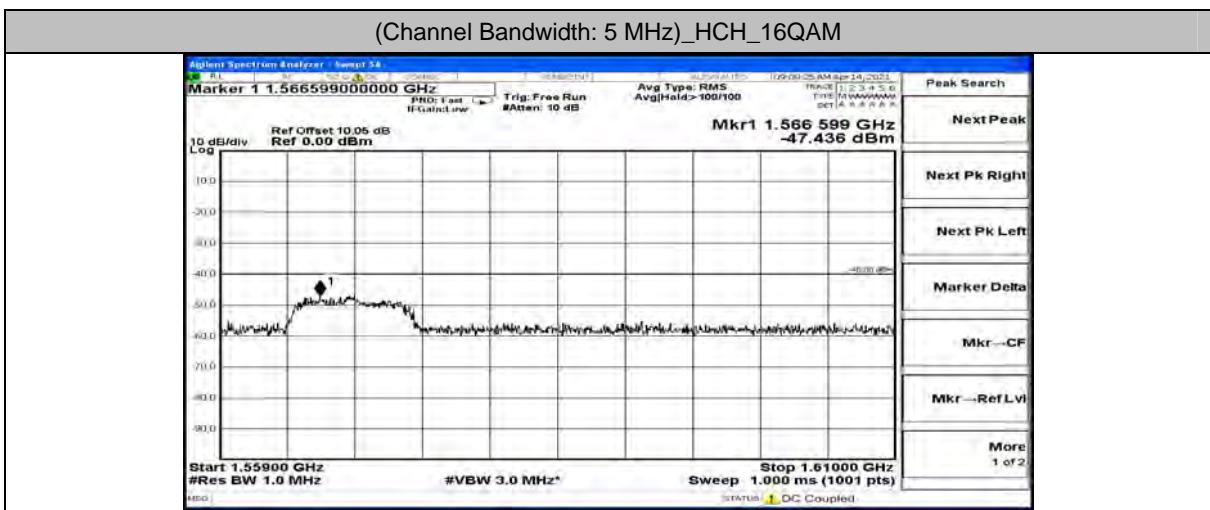
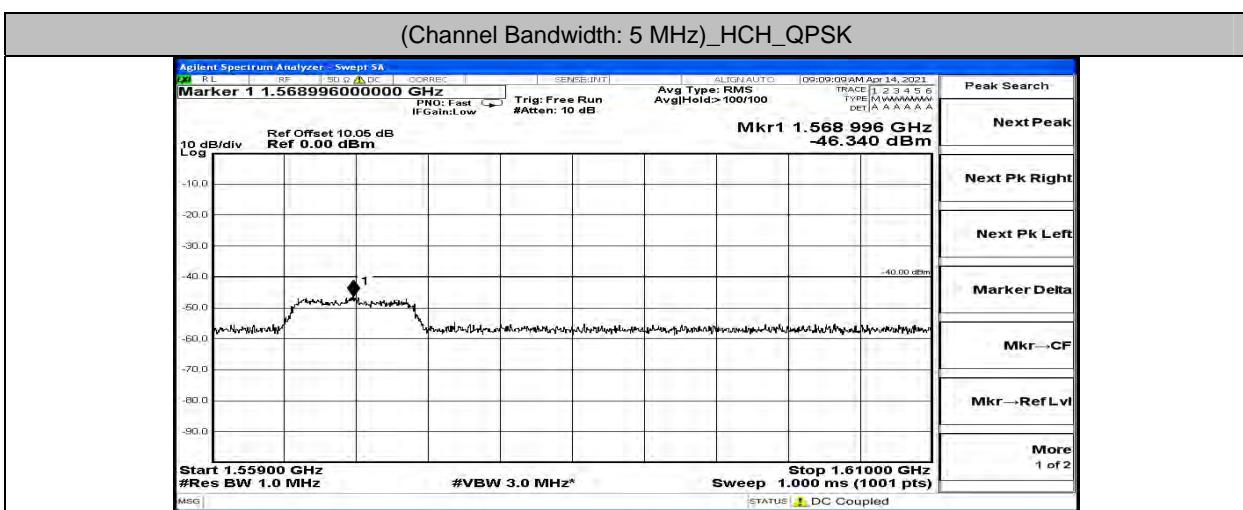
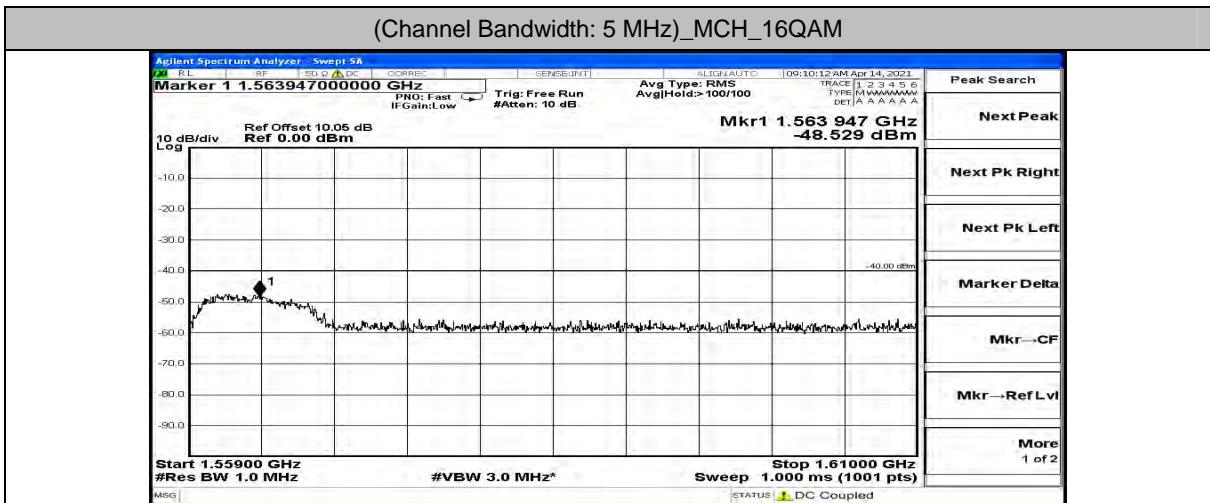


(Channel Bandwidth: 5 MHz)_LCH_16QAM

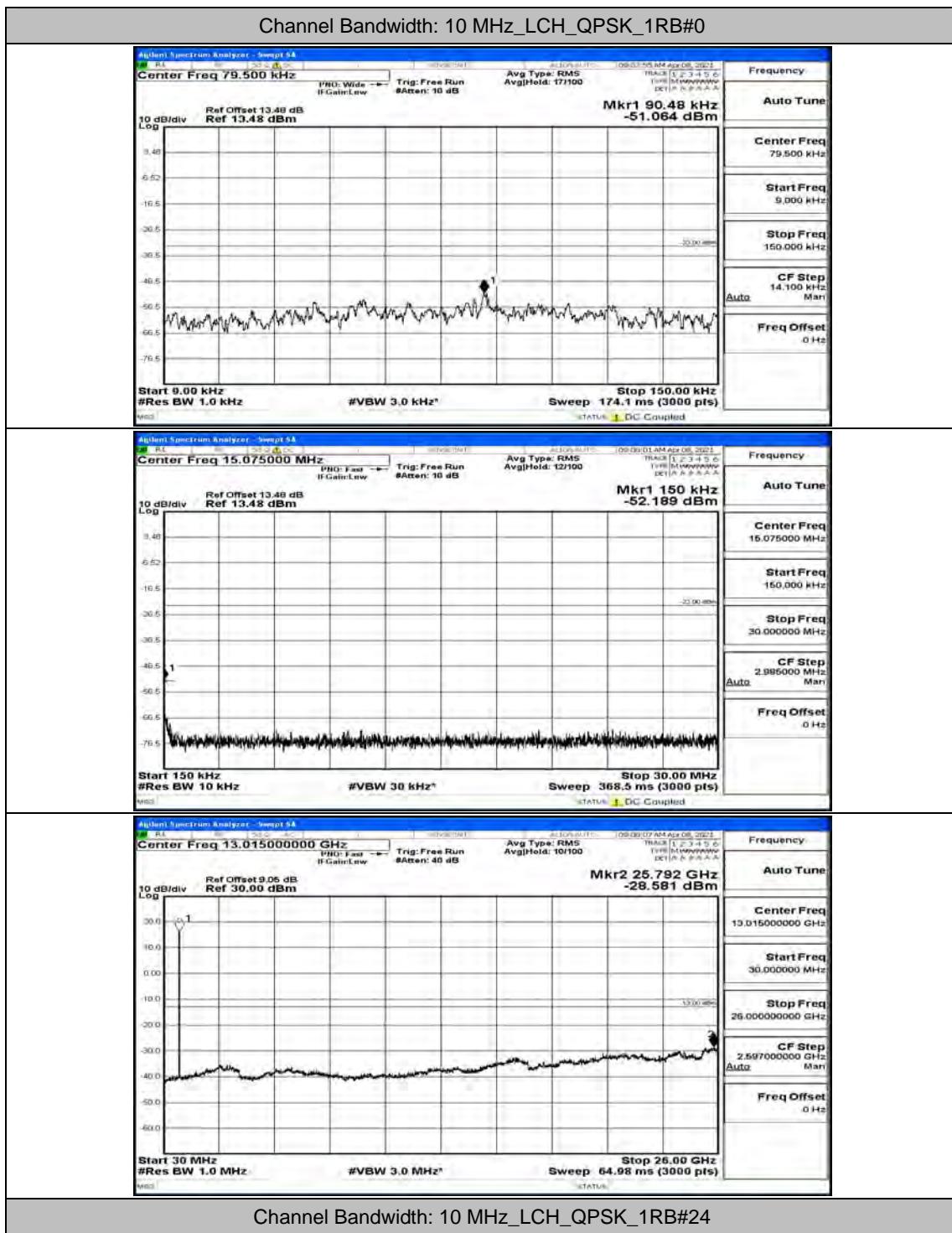


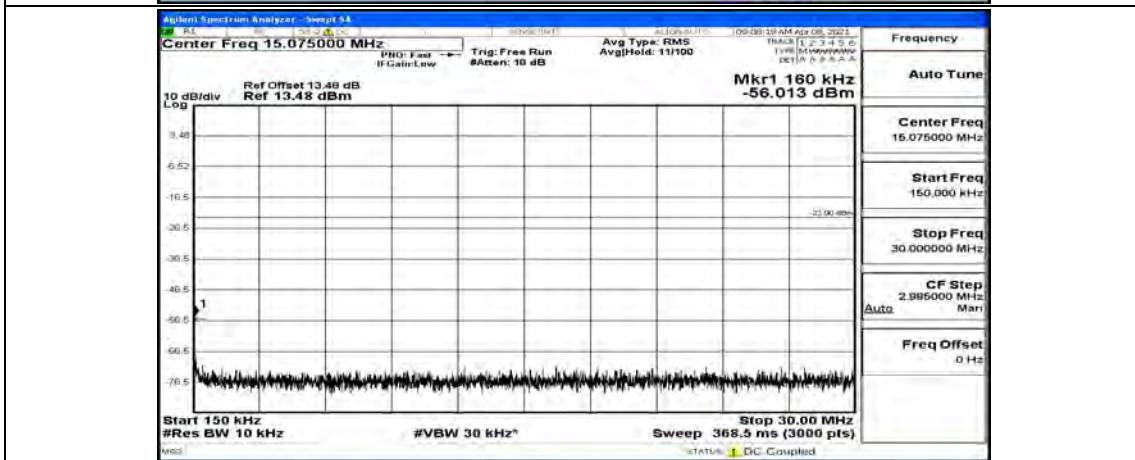
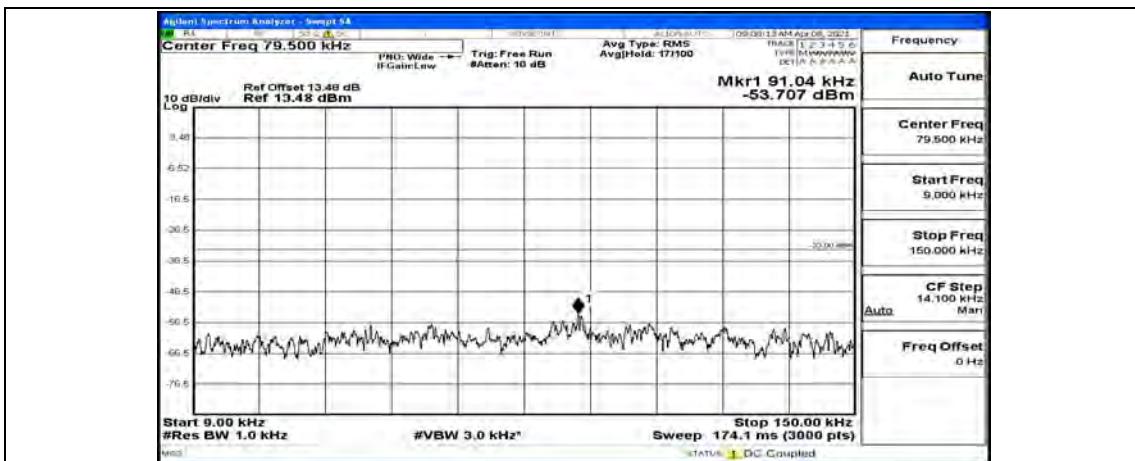
(Channel Bandwidth: 5 MHz)_MCH_QPSK



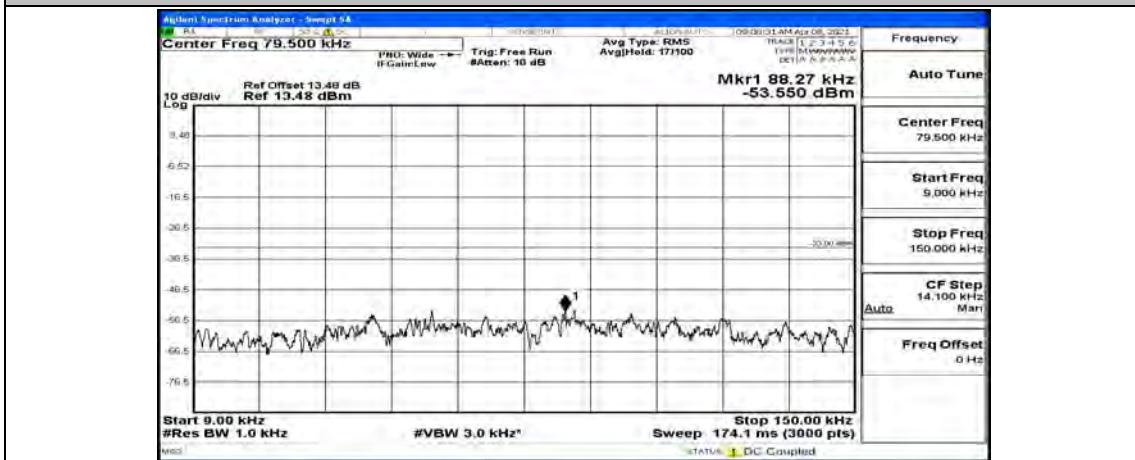


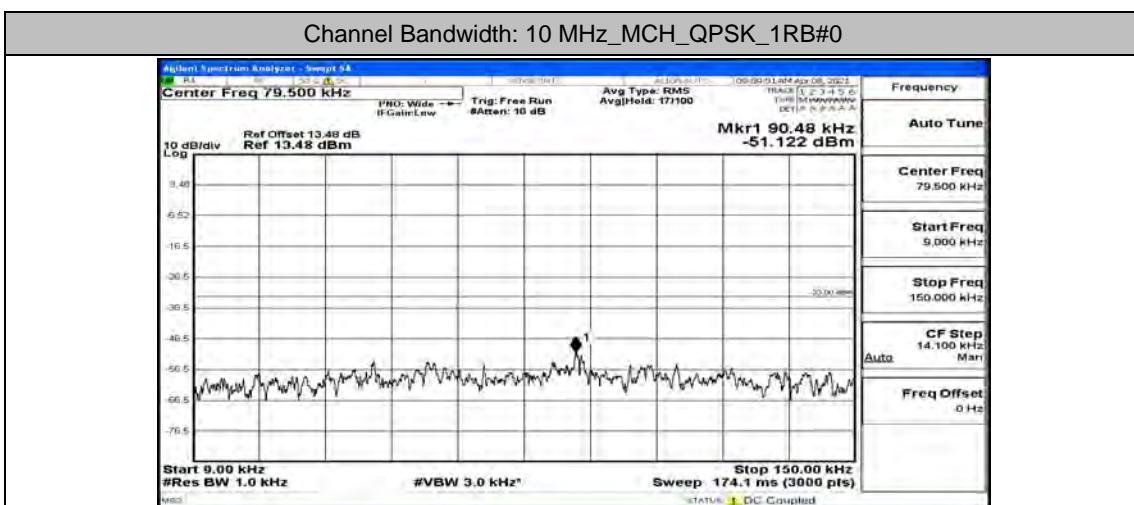
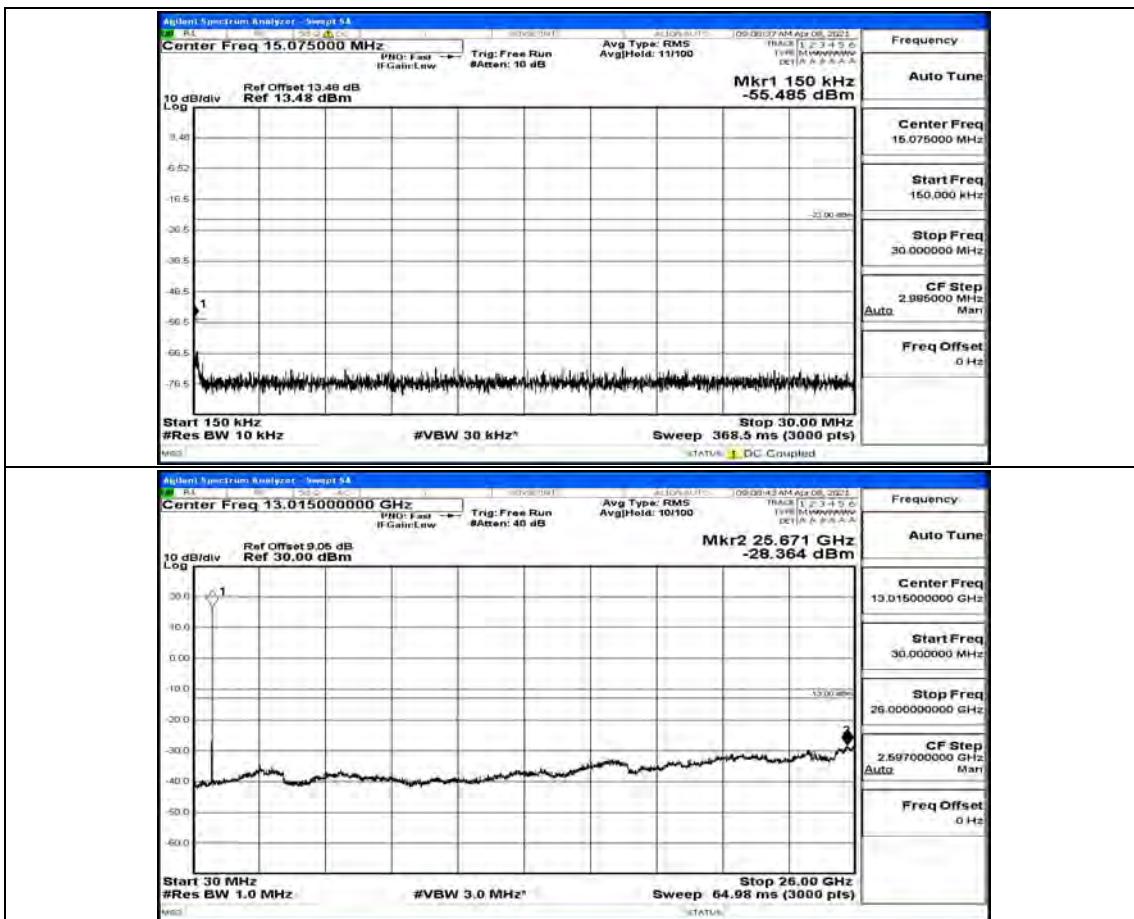
Channel Bandwidth: 10 MHz

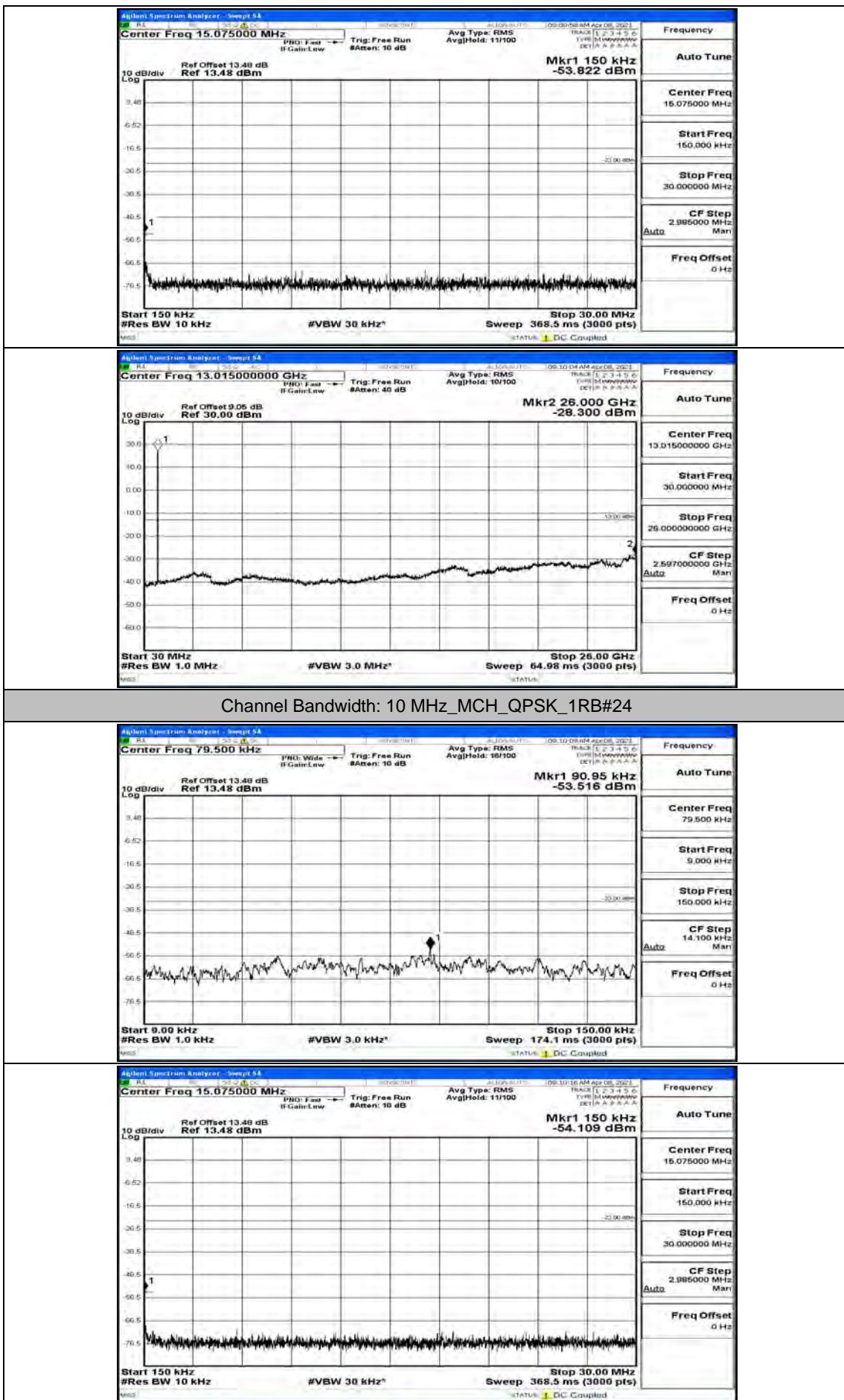




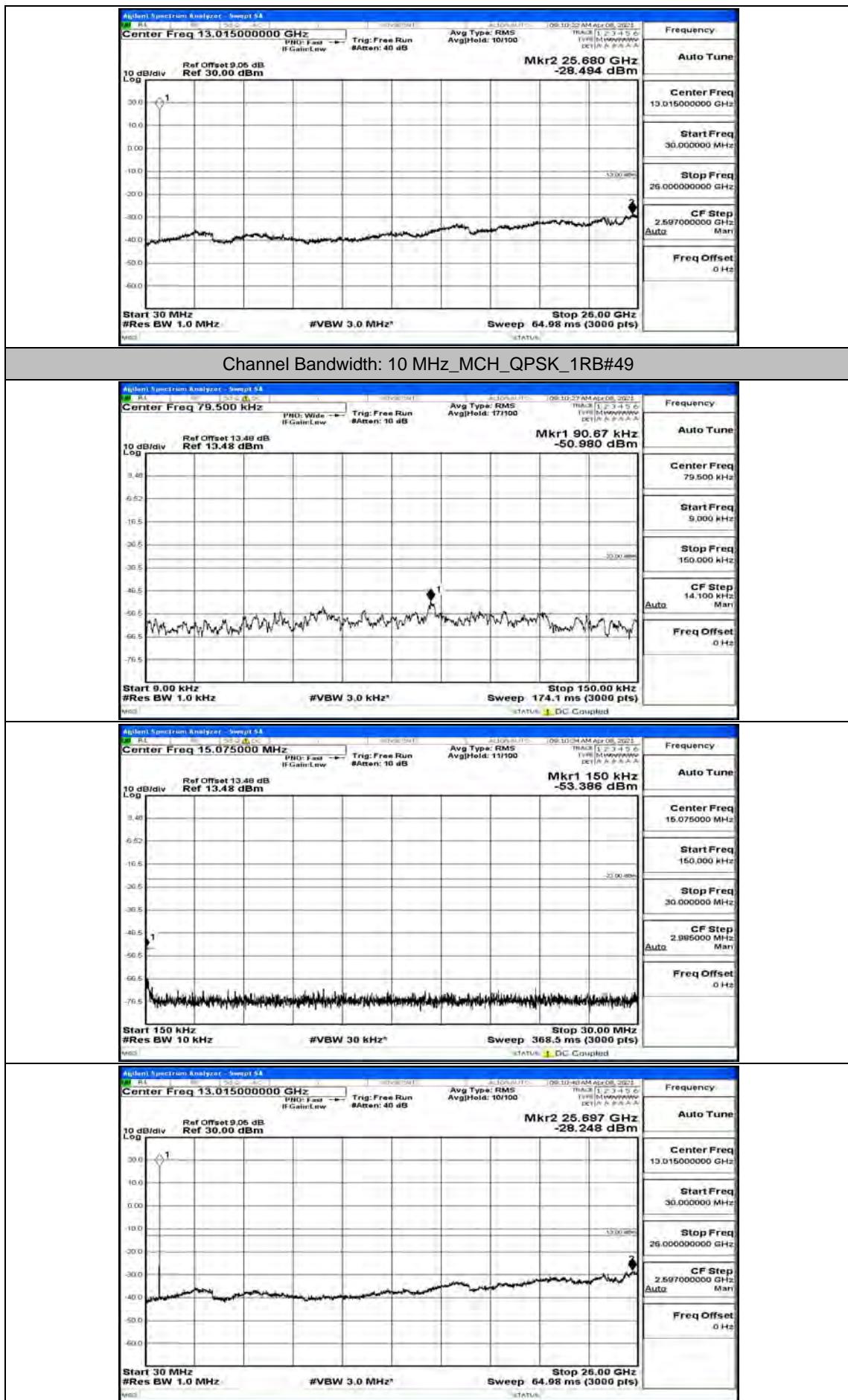
Channel Bandwidth: 10 MHz_LCH_QPSK_1RB#49

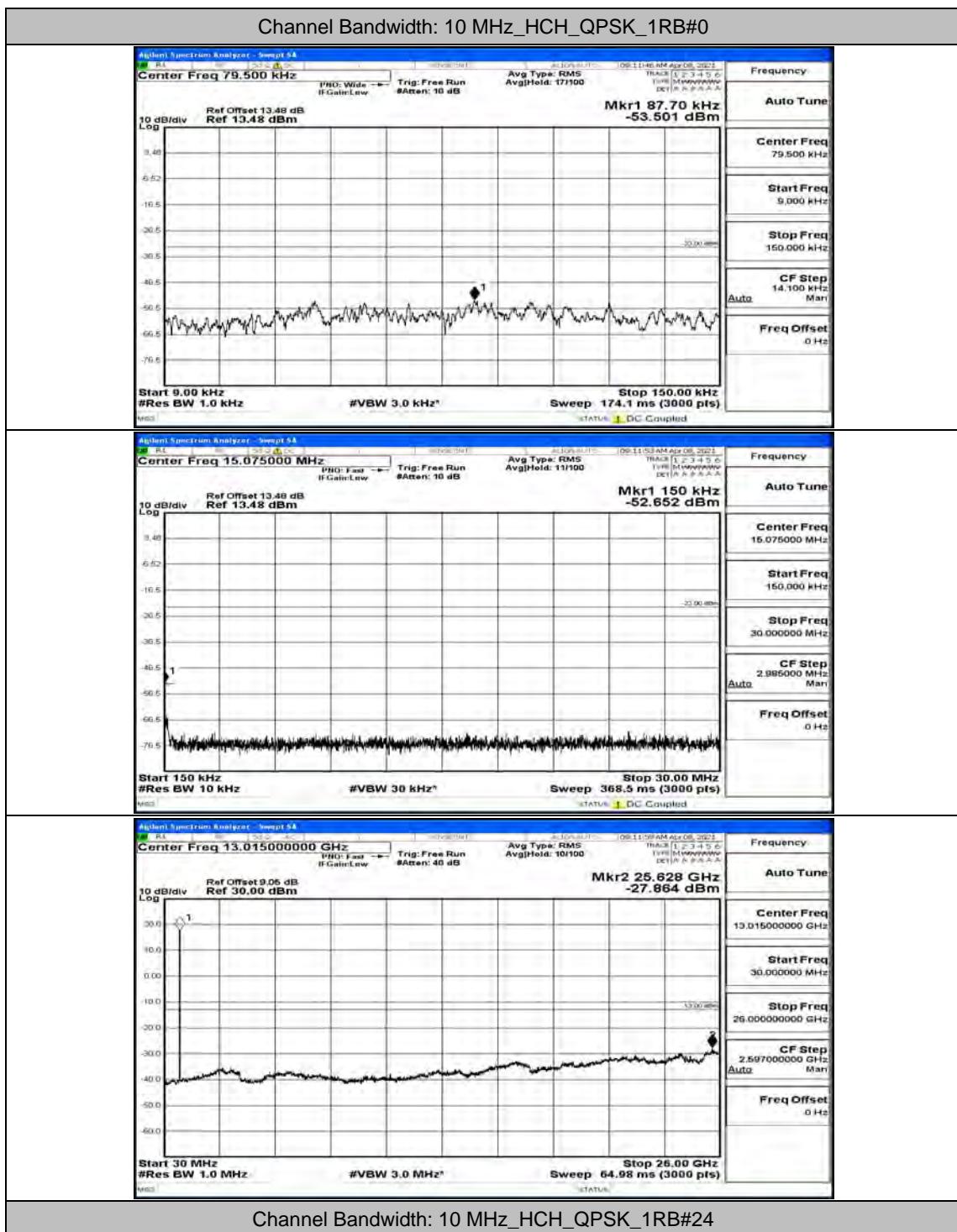


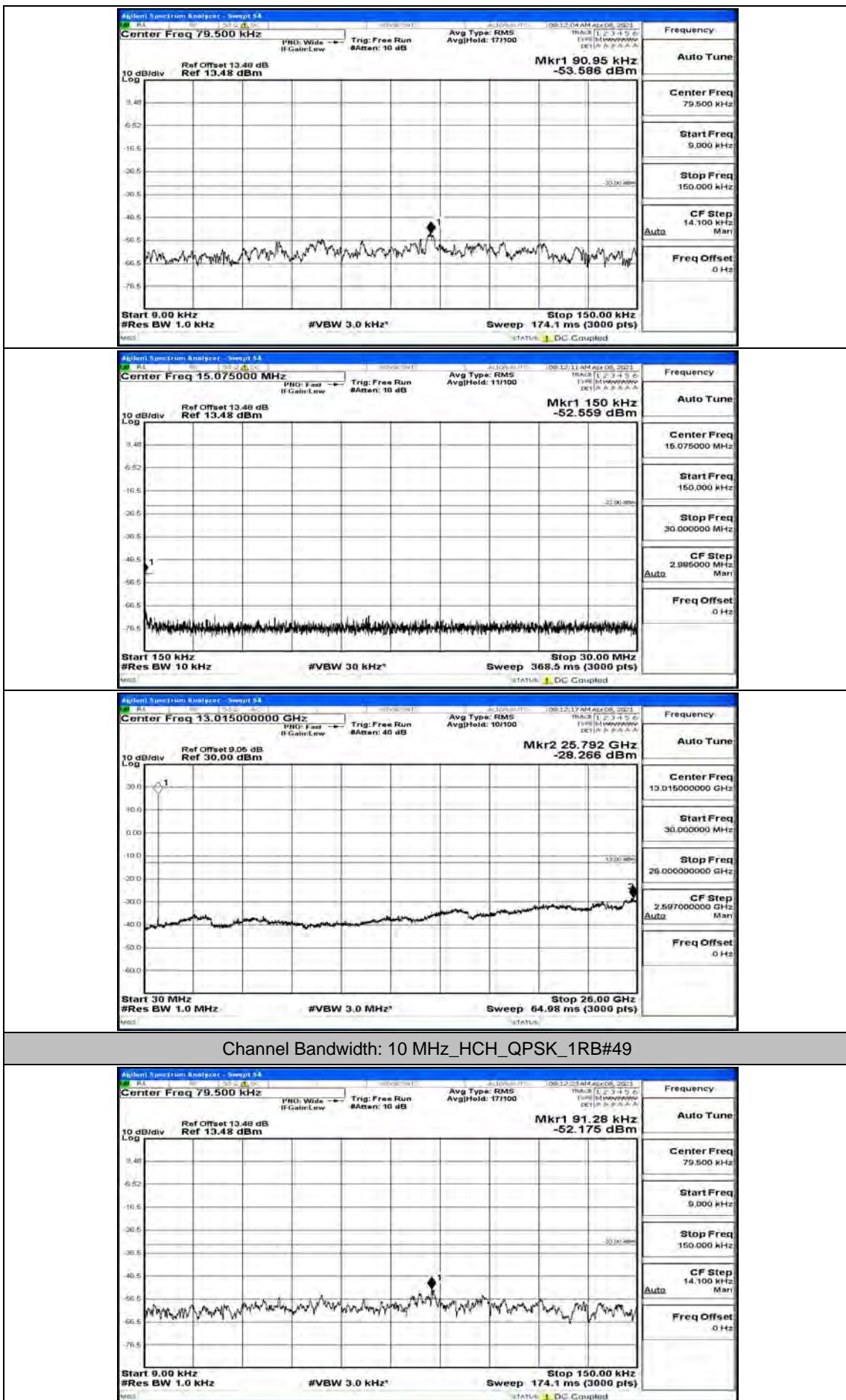


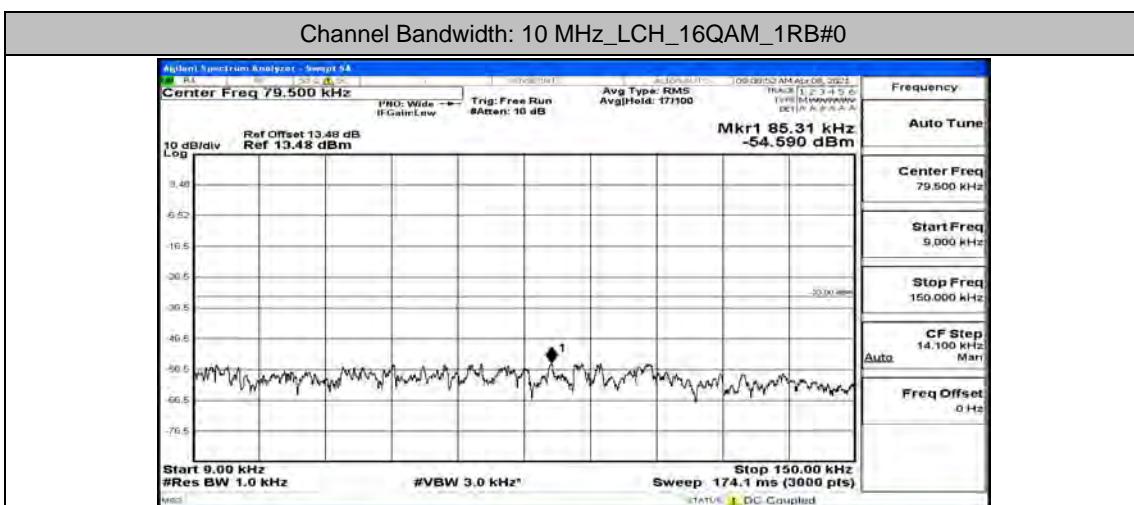
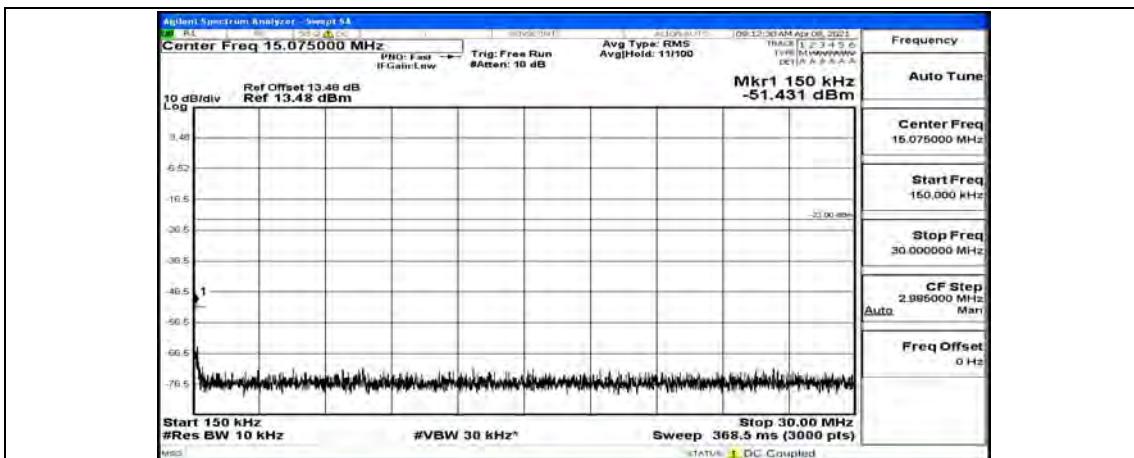


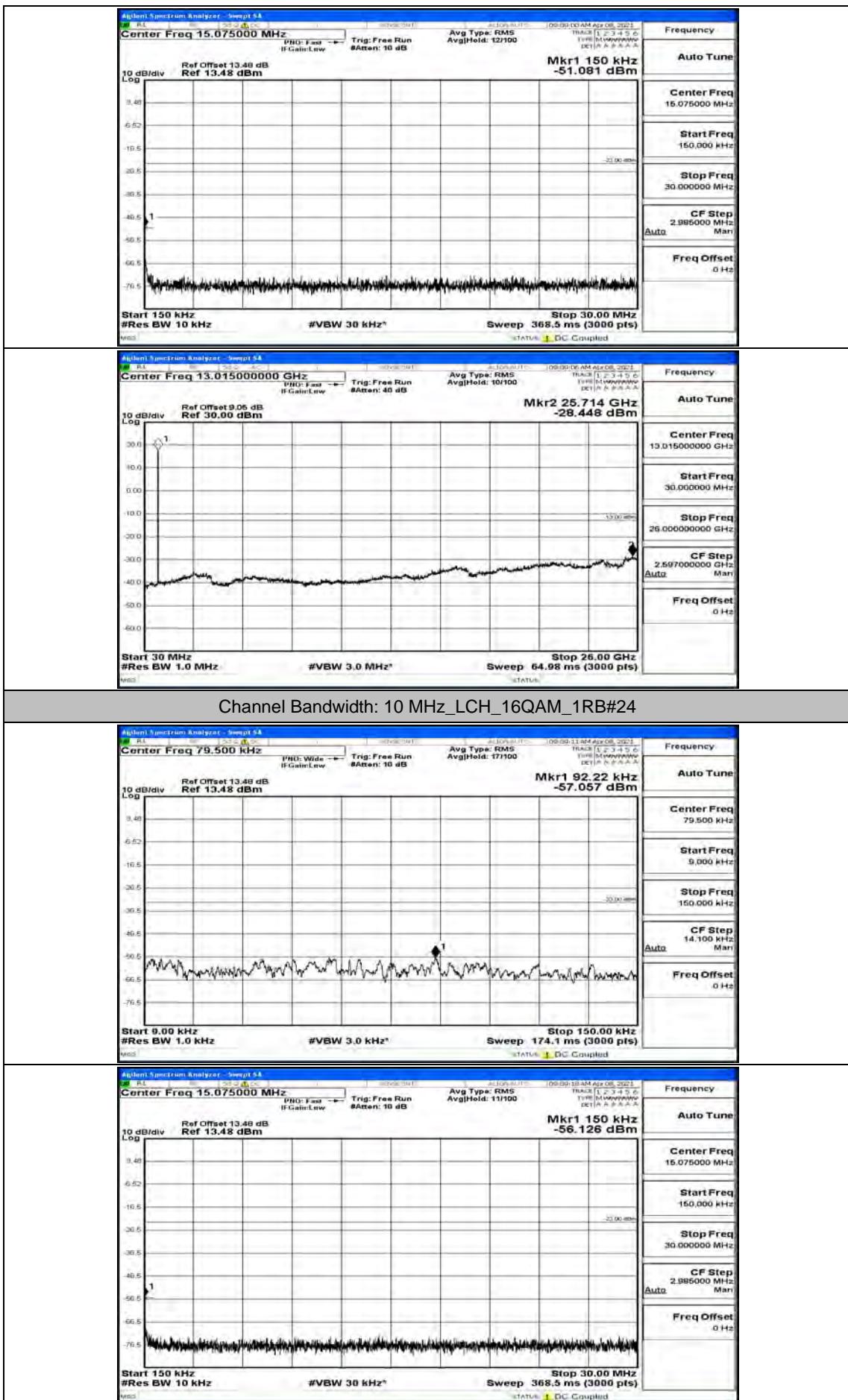
Channel Bandwidth: 10 MHz_MCH_QPSK_1RB#24

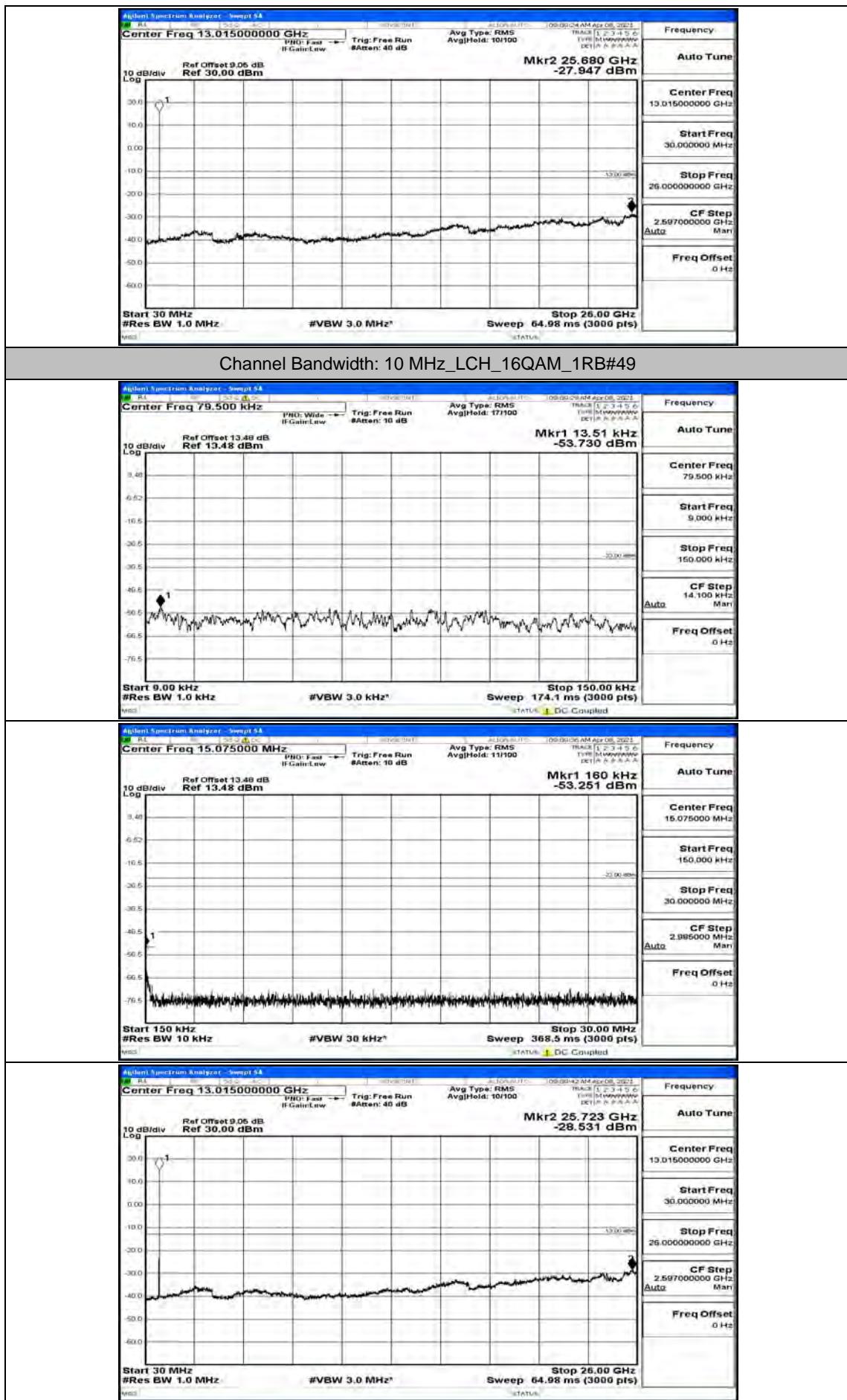




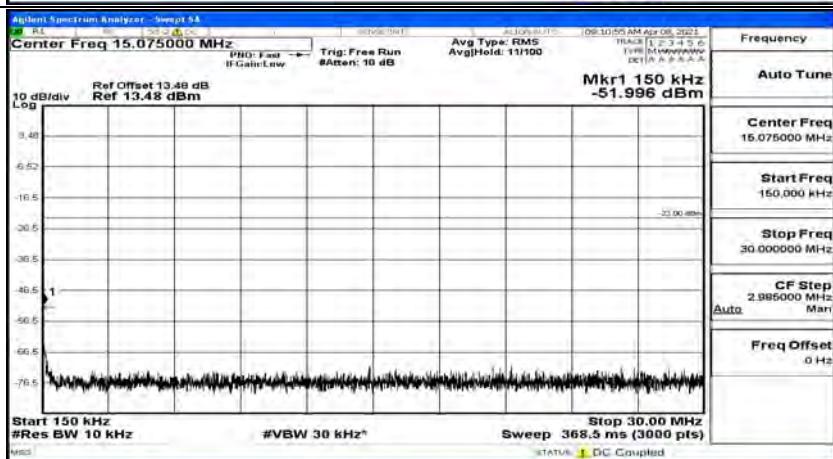
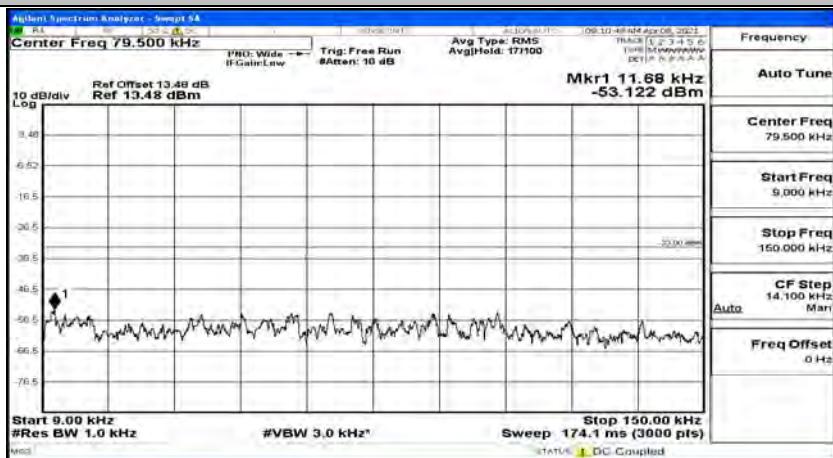




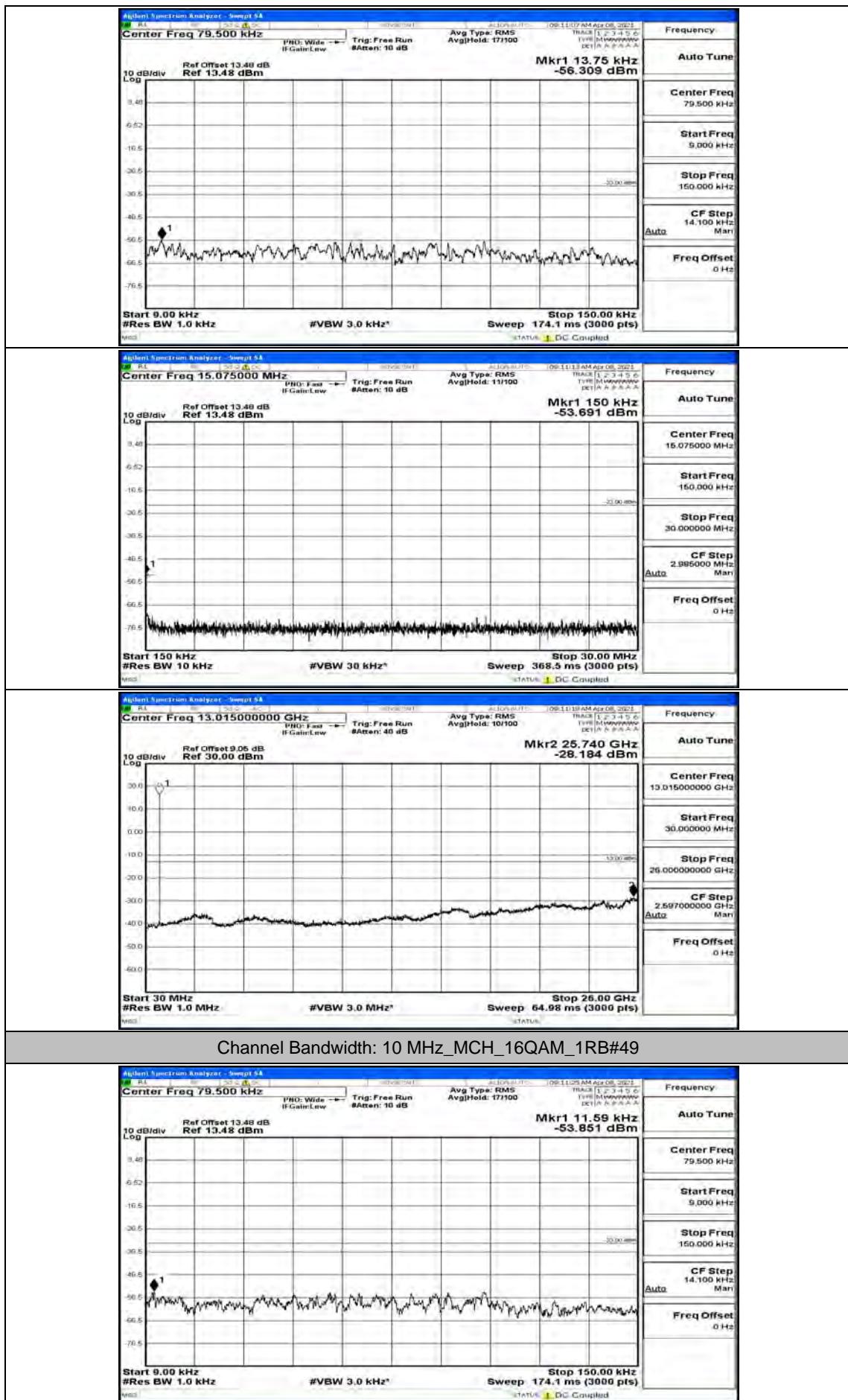


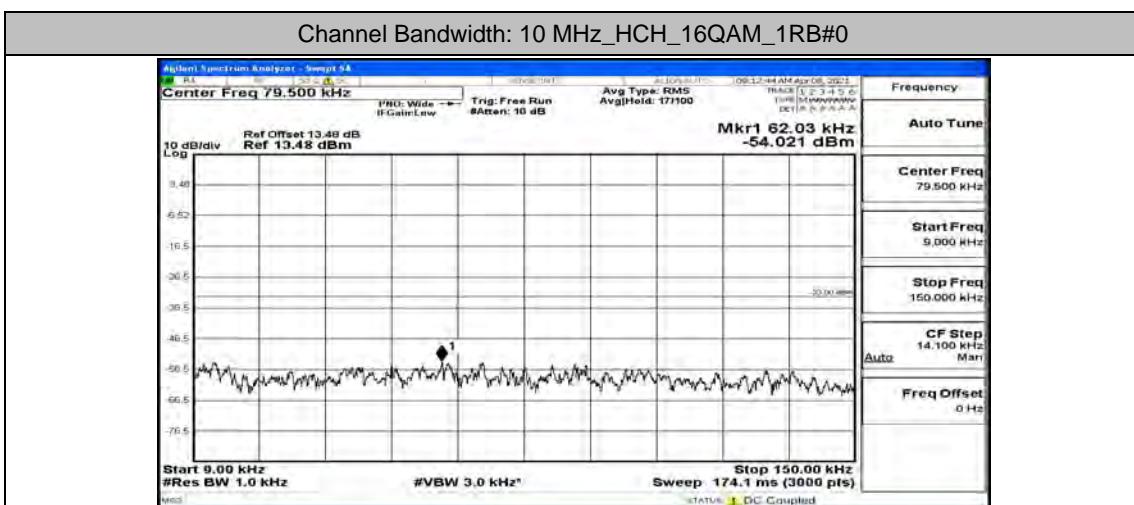
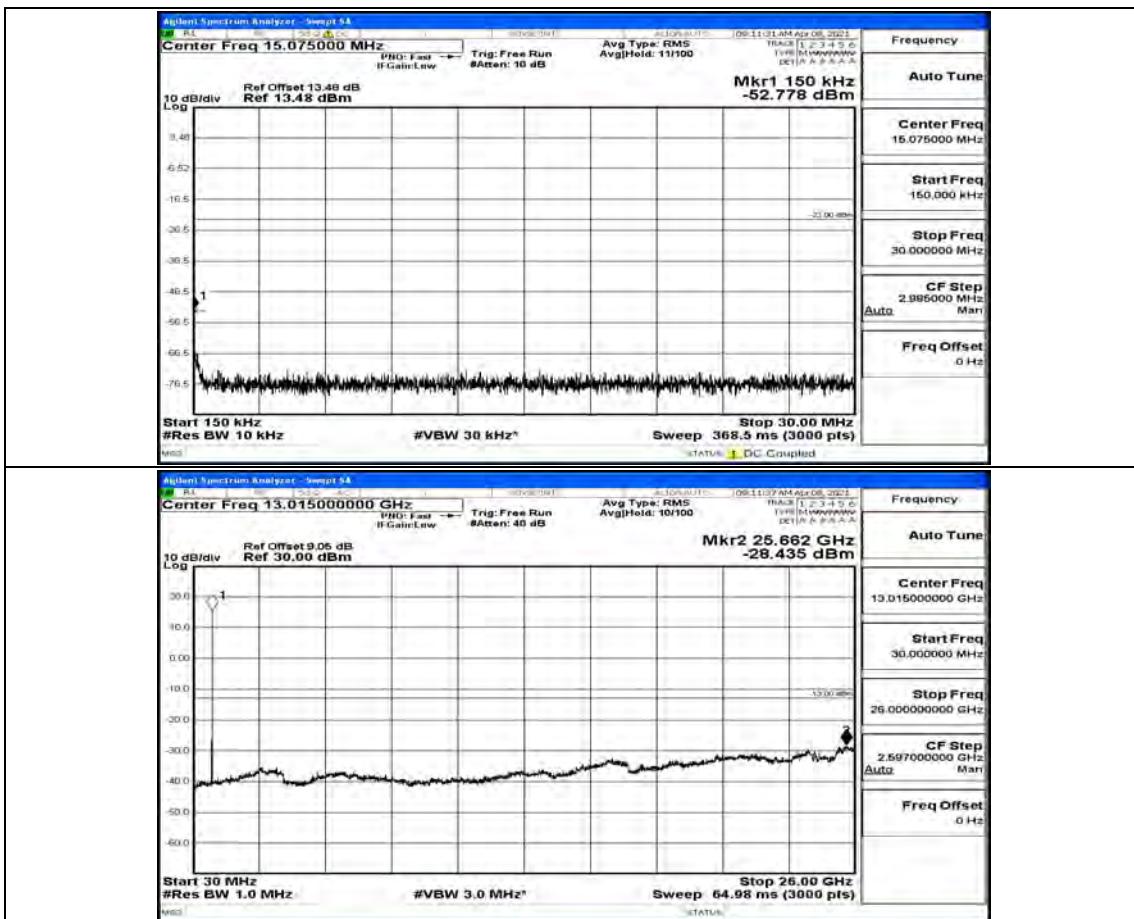


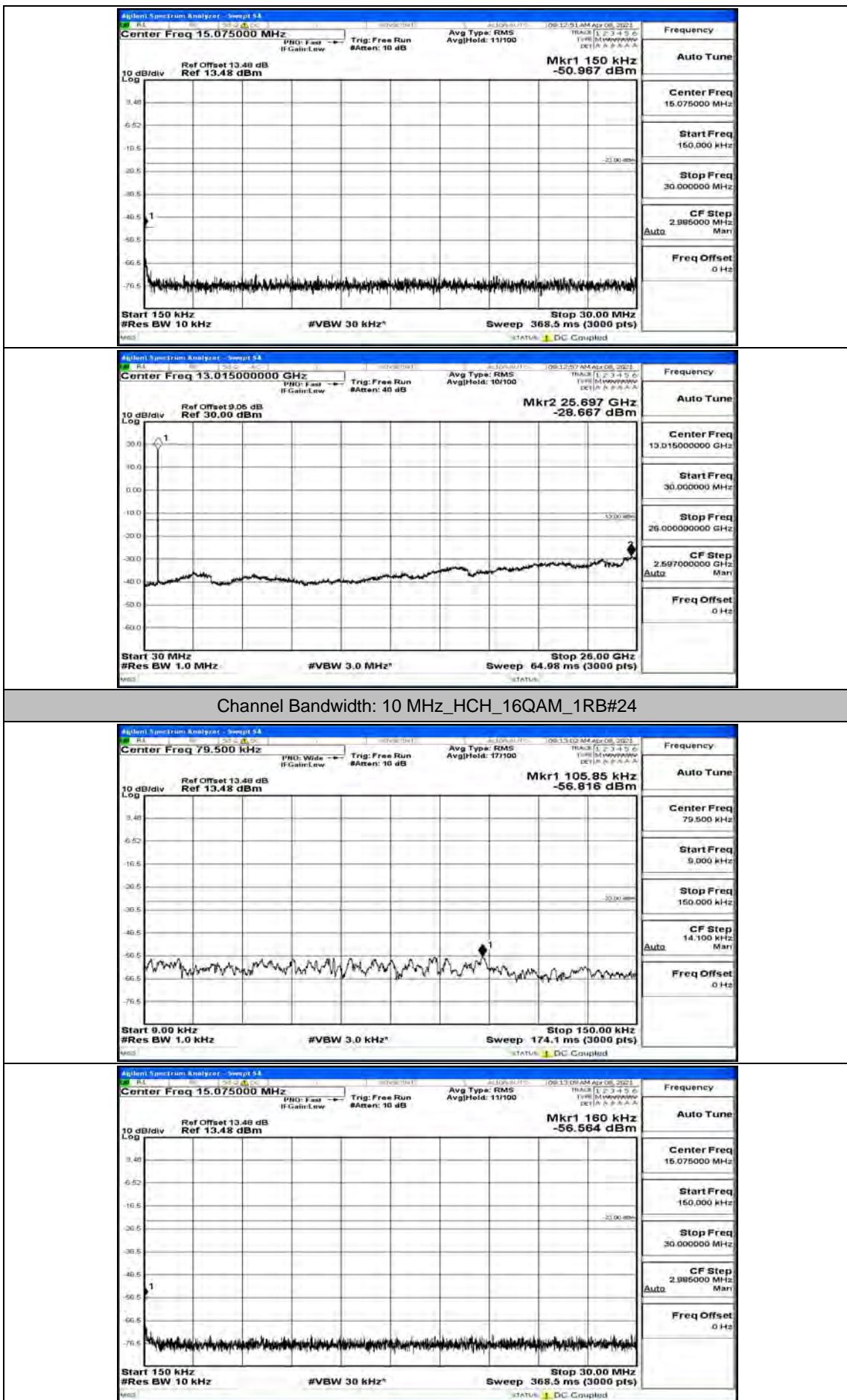
Channel Bandwidth: 10 MHz_MCH_16QAM_1RB#0



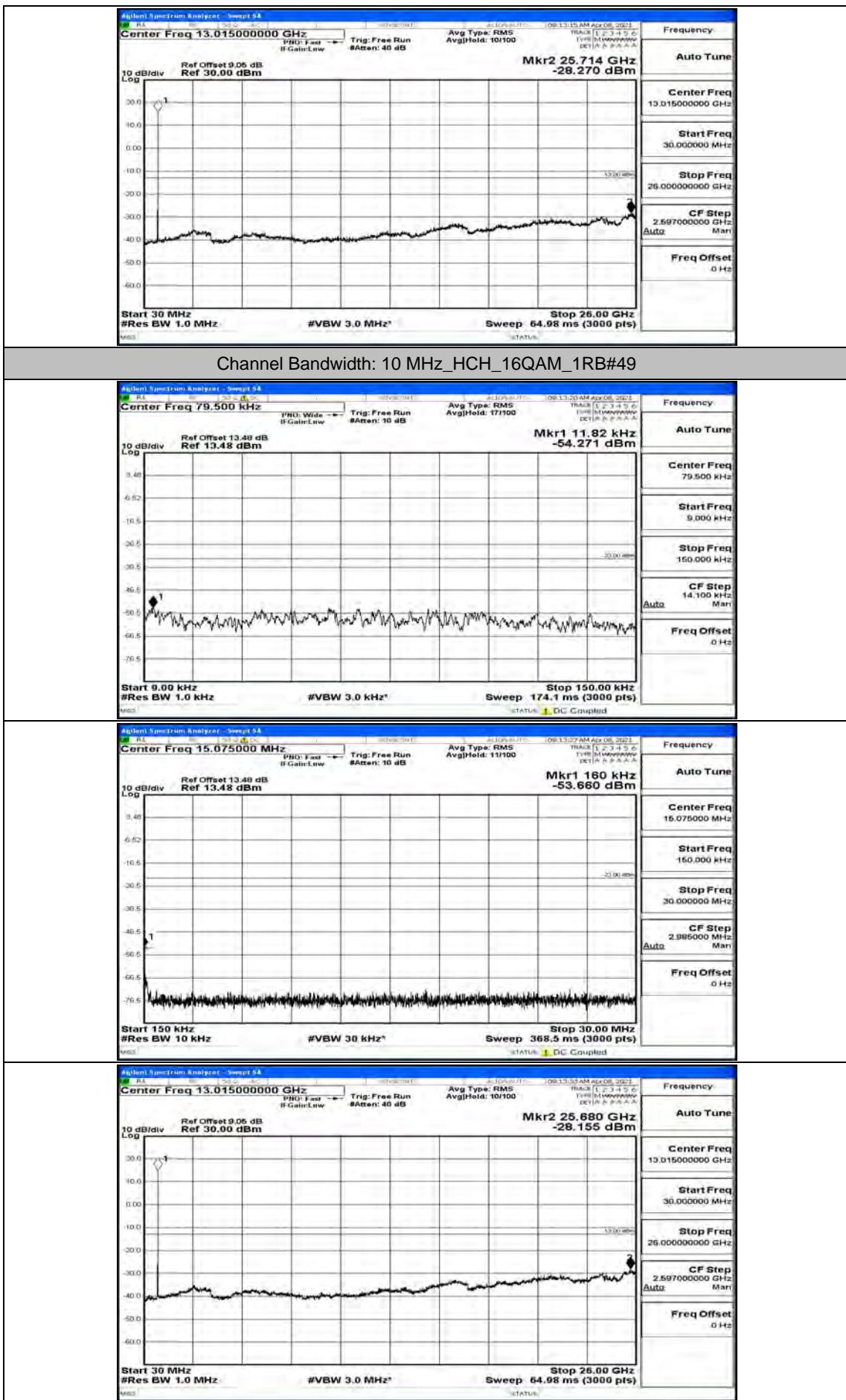
Channel Bandwidth: 10 MHz_MCH_16QAM_1RB#24



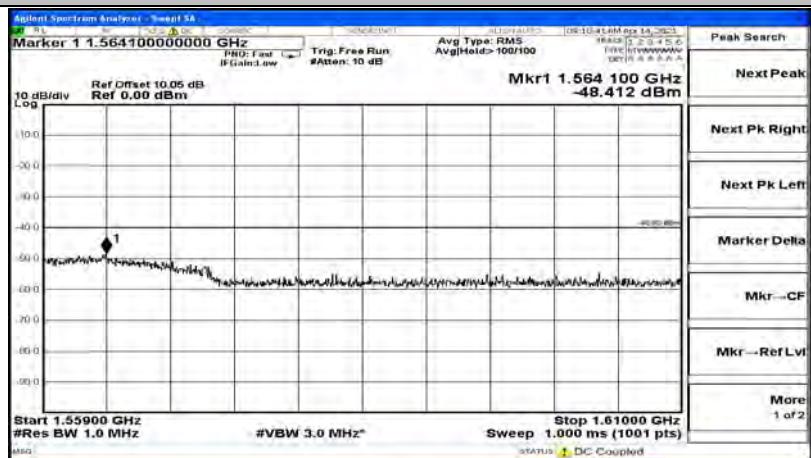




Channel Bandwidth: 10 MHz_HCH_16QAM_1RB#24



(Channel Bandwidth: 10 MHz)_MCH_QPSK



(Channel Bandwidth: 10 MHz)_MCH_16QAM

