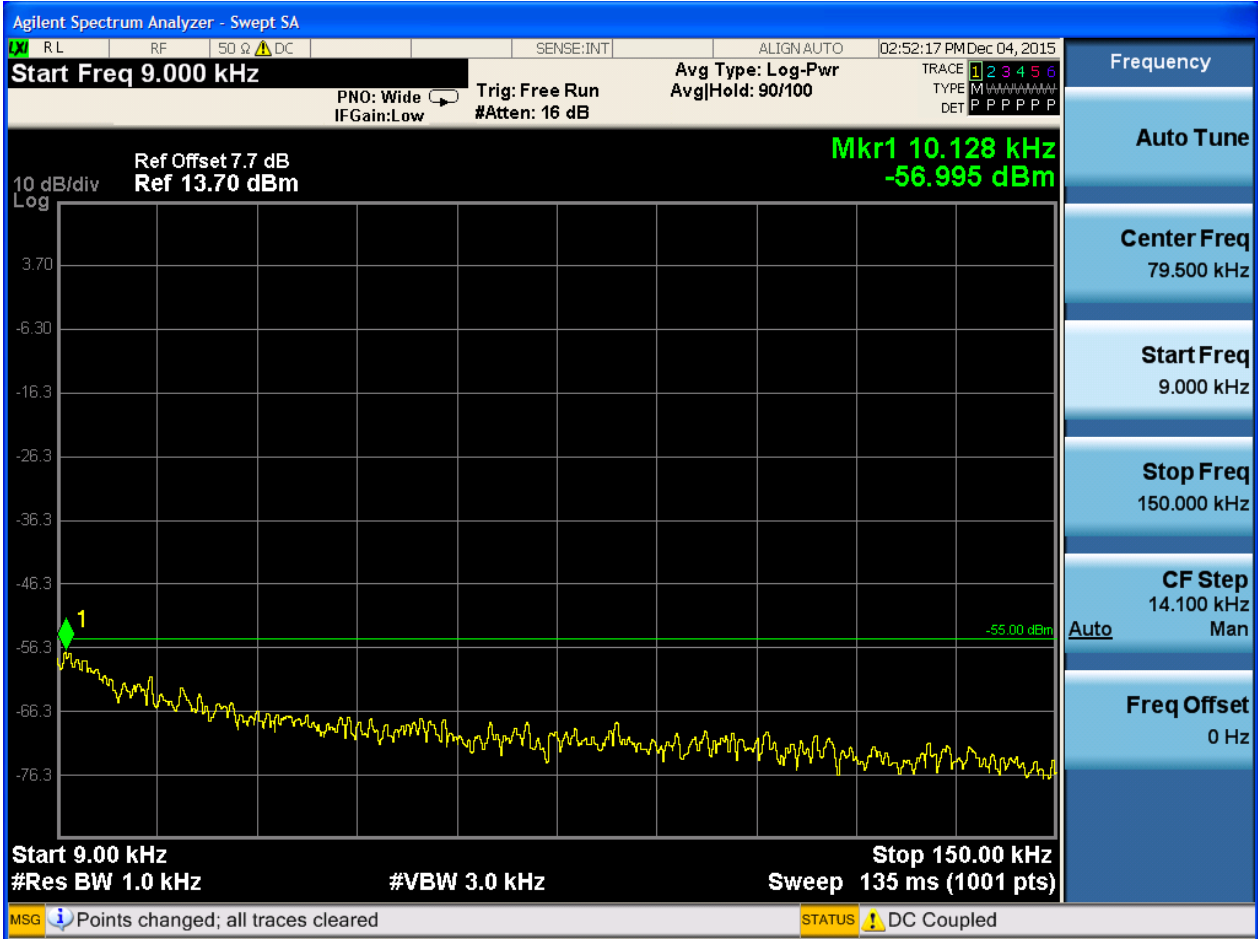
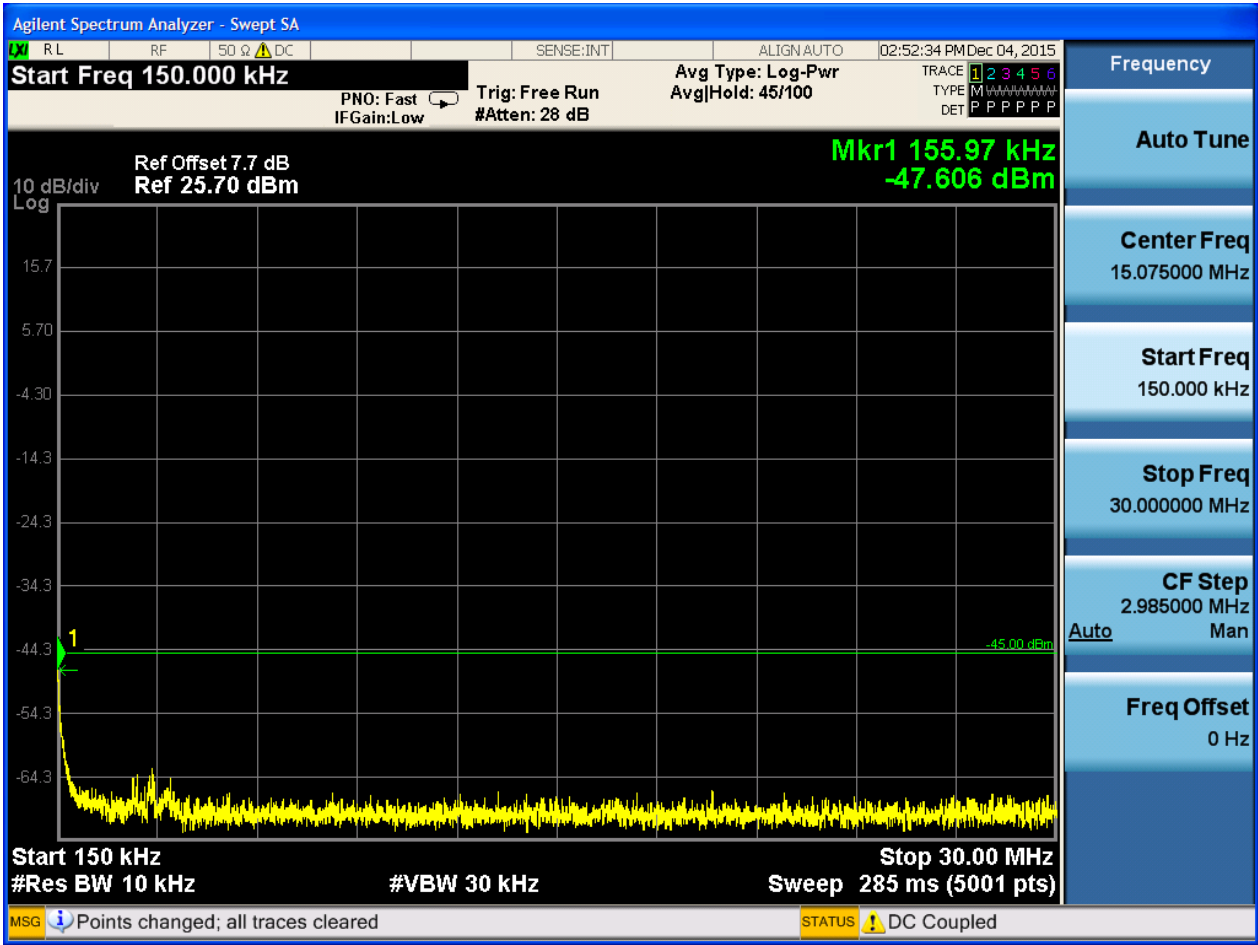


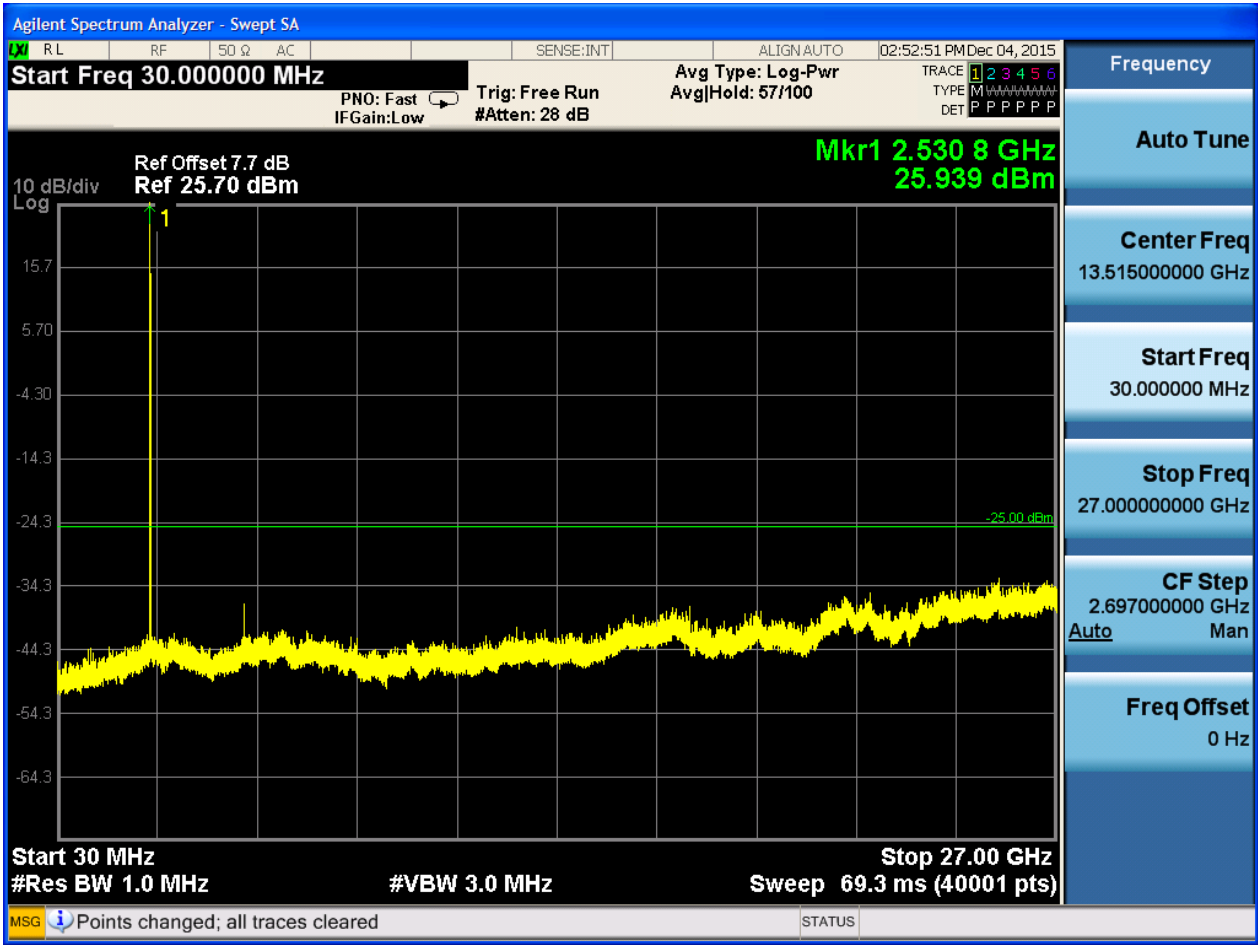


6.1.1.1.2.2 Test Channel = MCH

6.1.1.1.2.2.1 Test RB = RB1#0



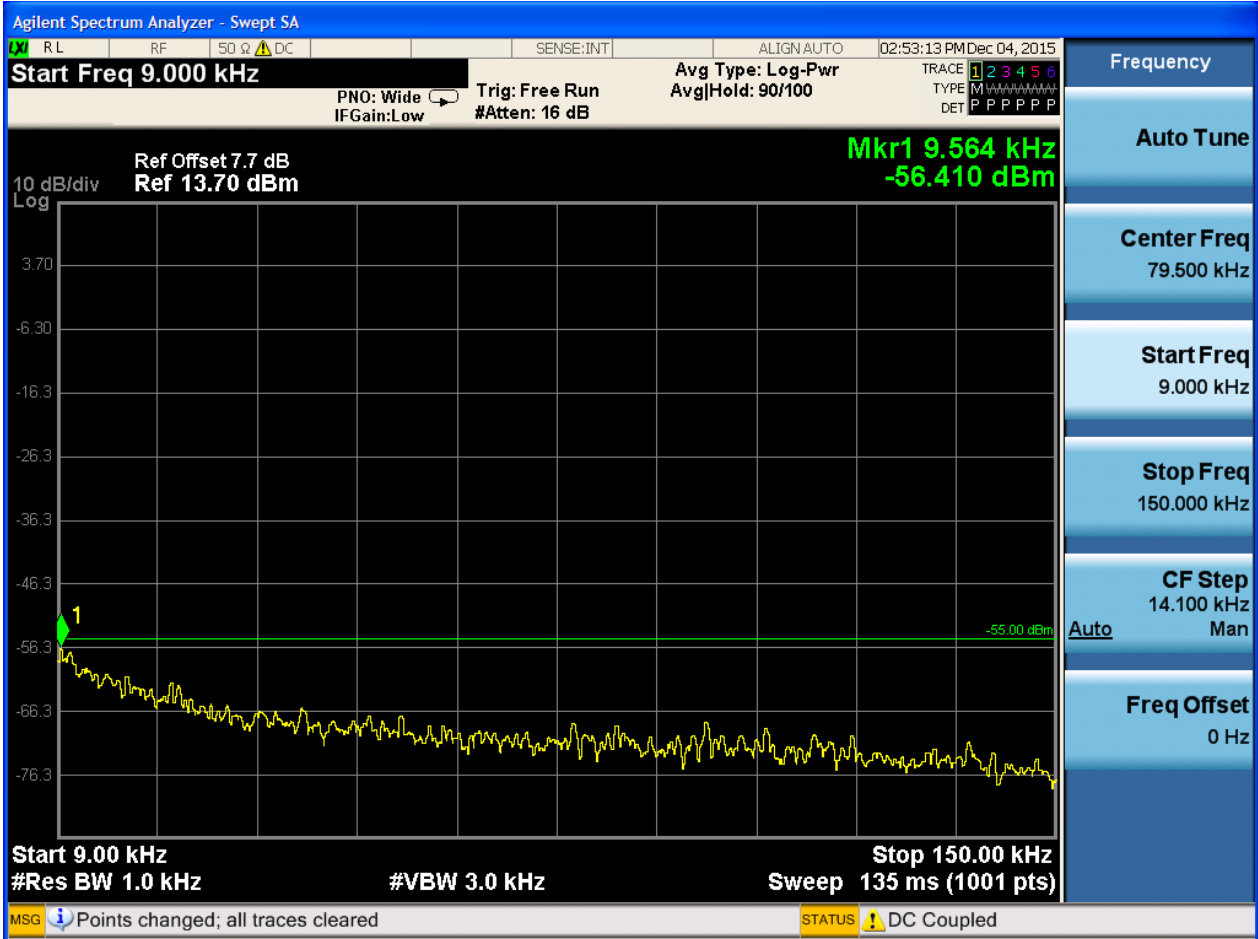


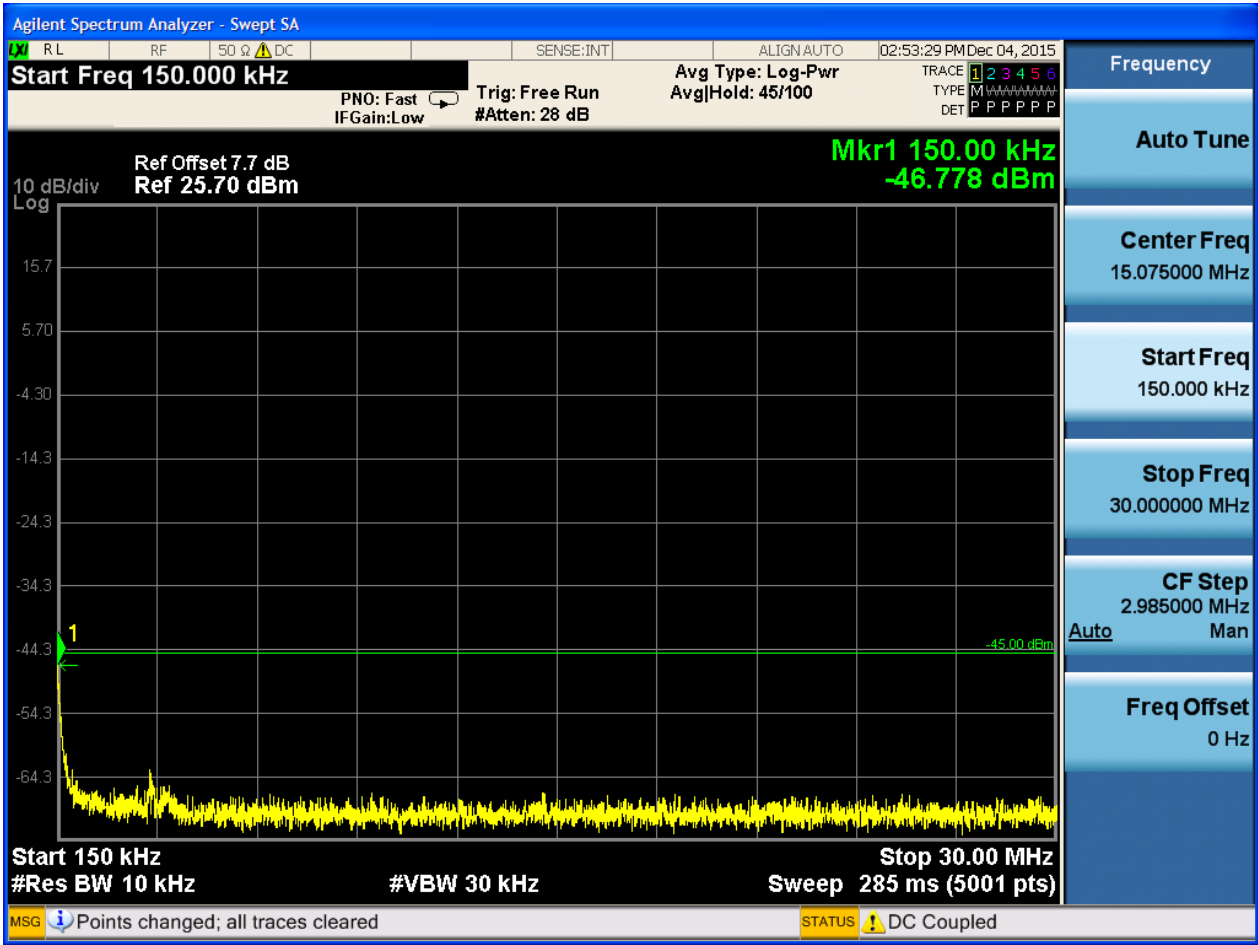


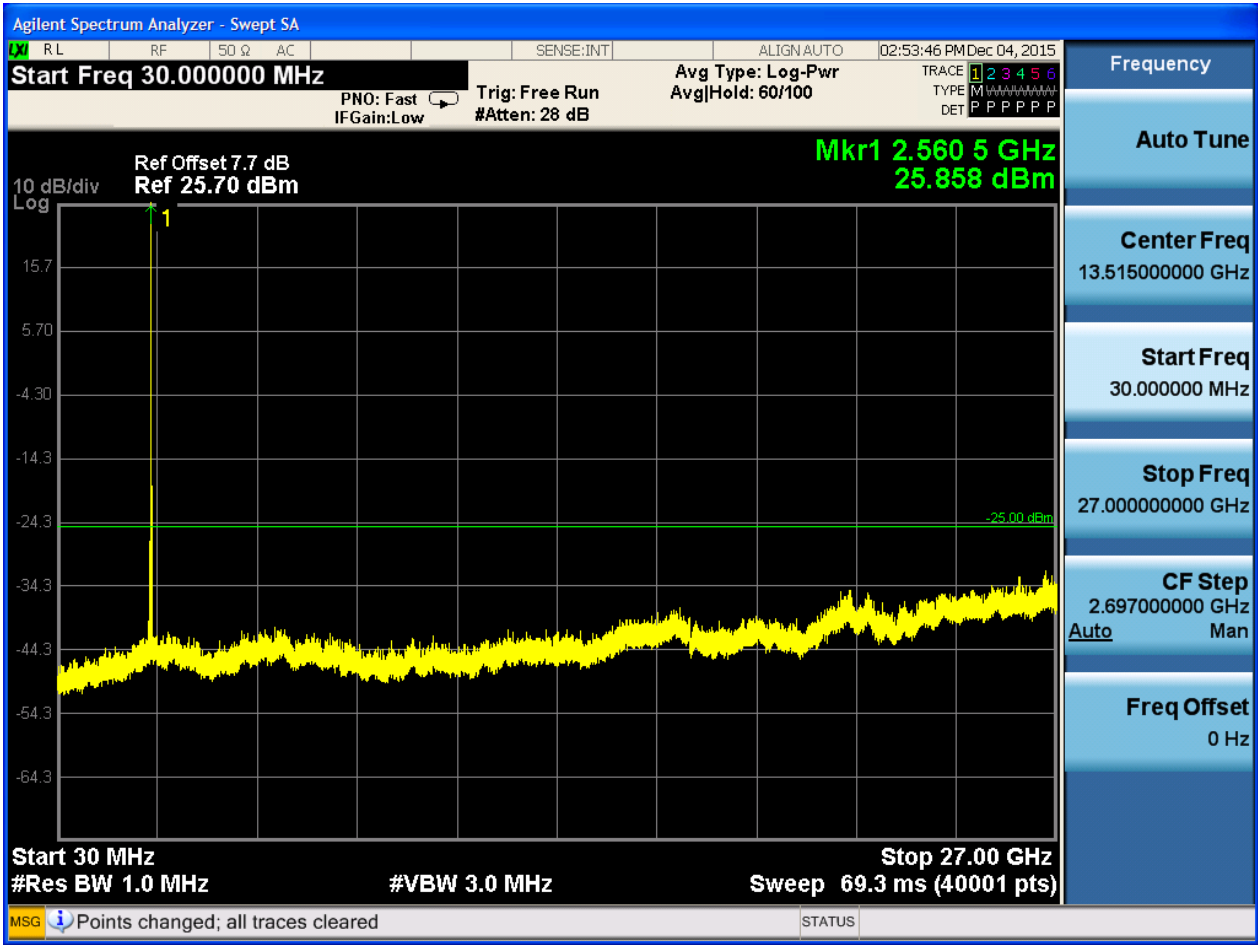


6.1.1.1.2.3 Test Channel = HCH

6.1.1.1.2.3.1 Test RB = RB1#0





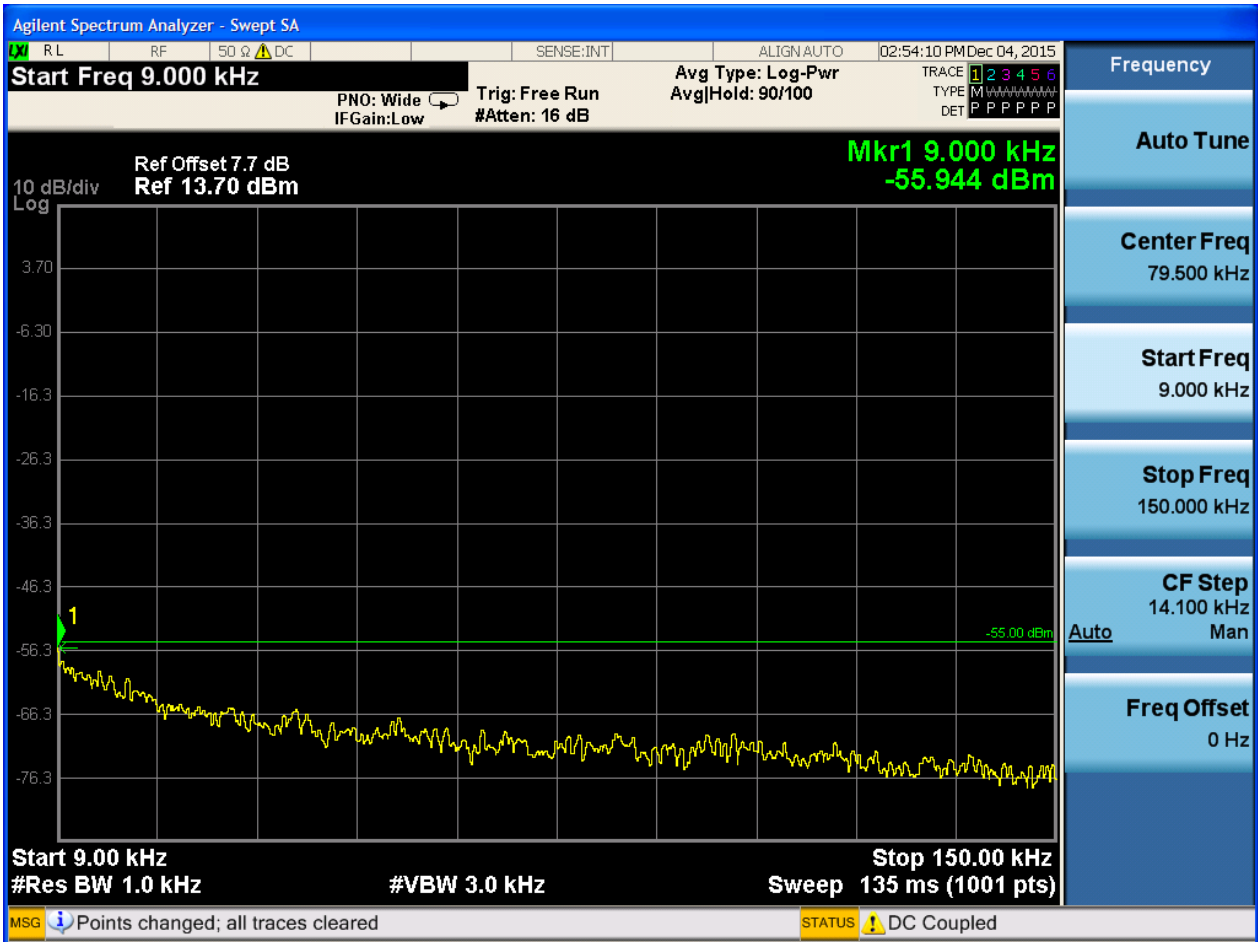


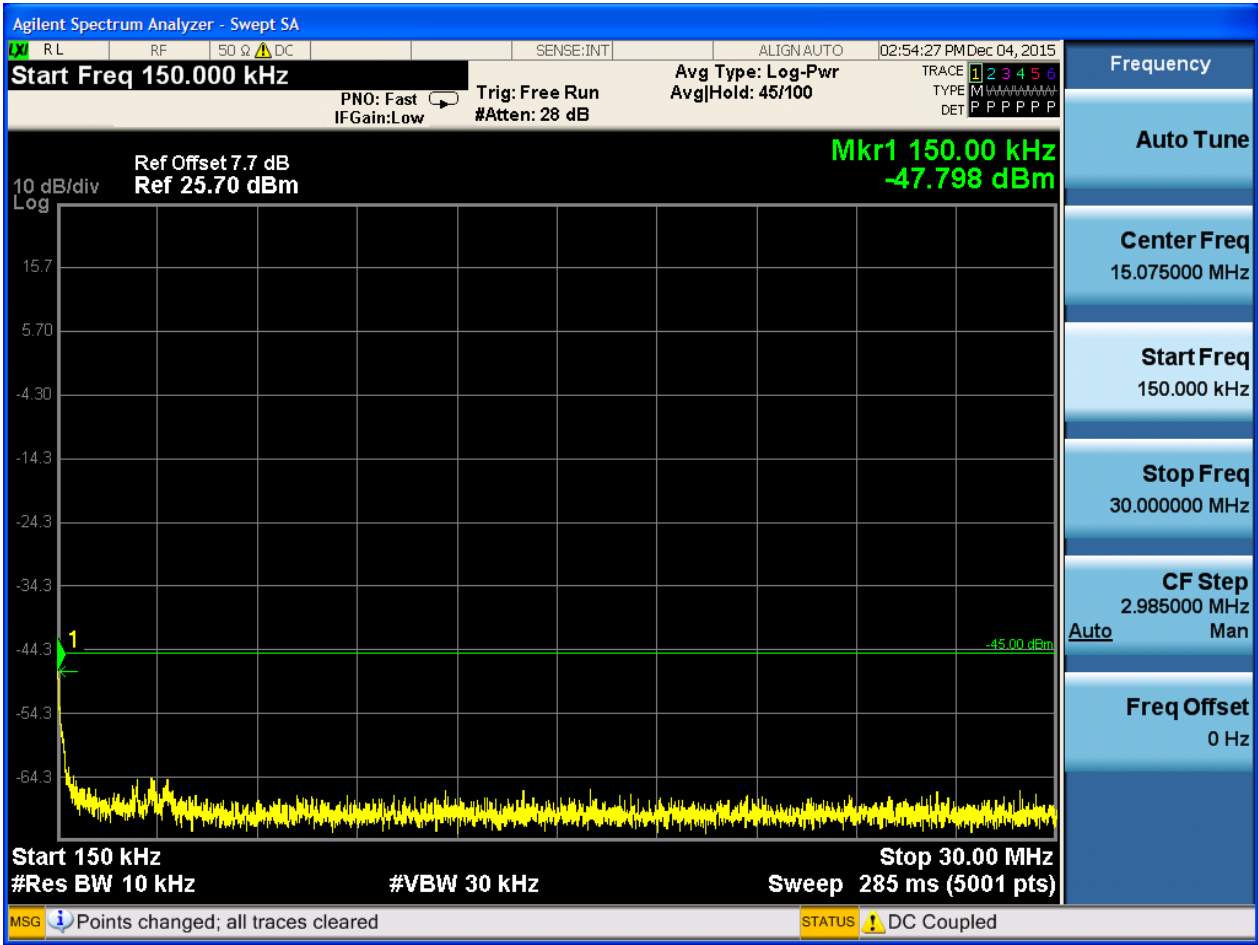


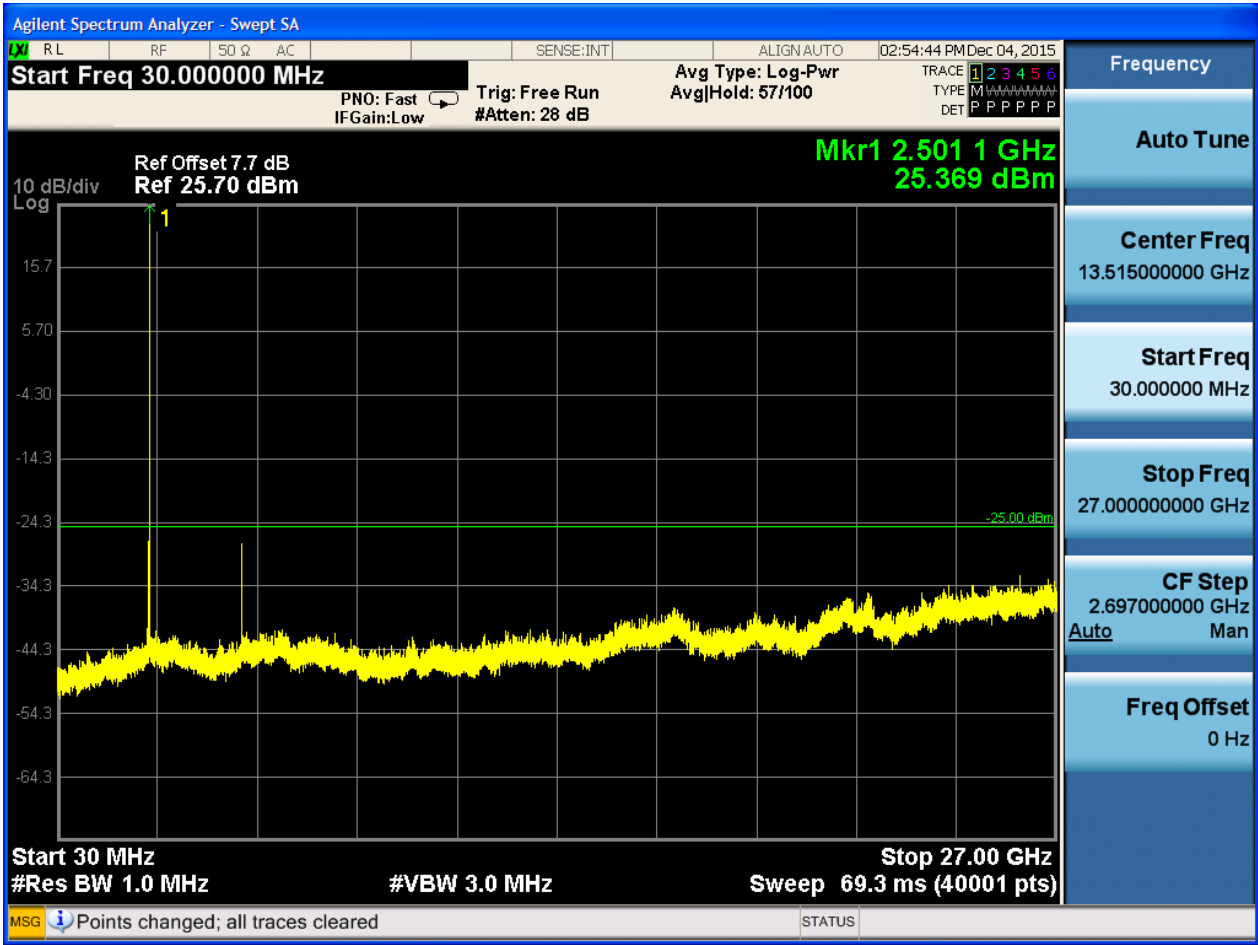
6.1.1.1.3 Test Bandwidth = 15

6.1.1.1.3.1 Test Channel = LCH

6.1.1.1.3.1.1 Test RB = RB1#0



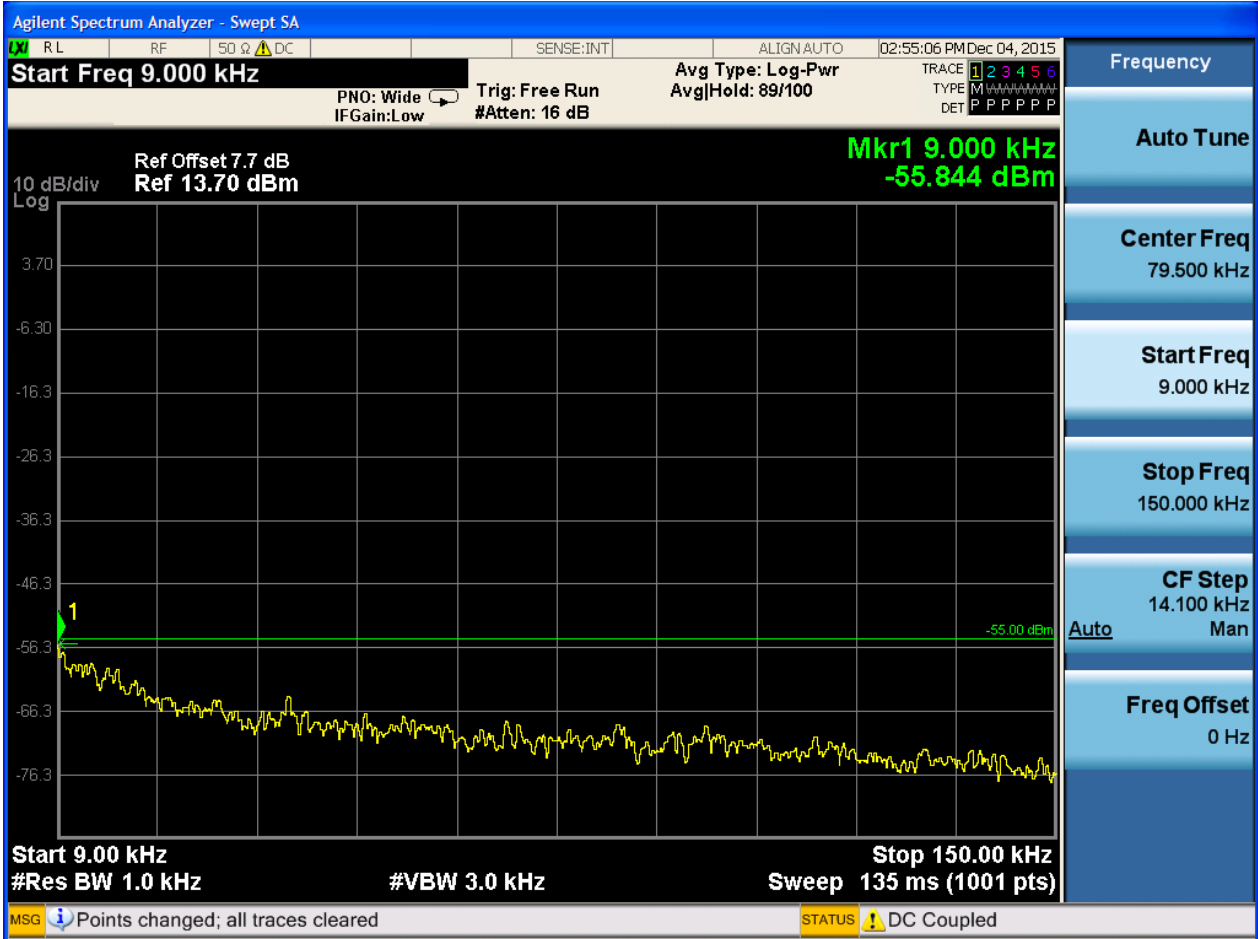


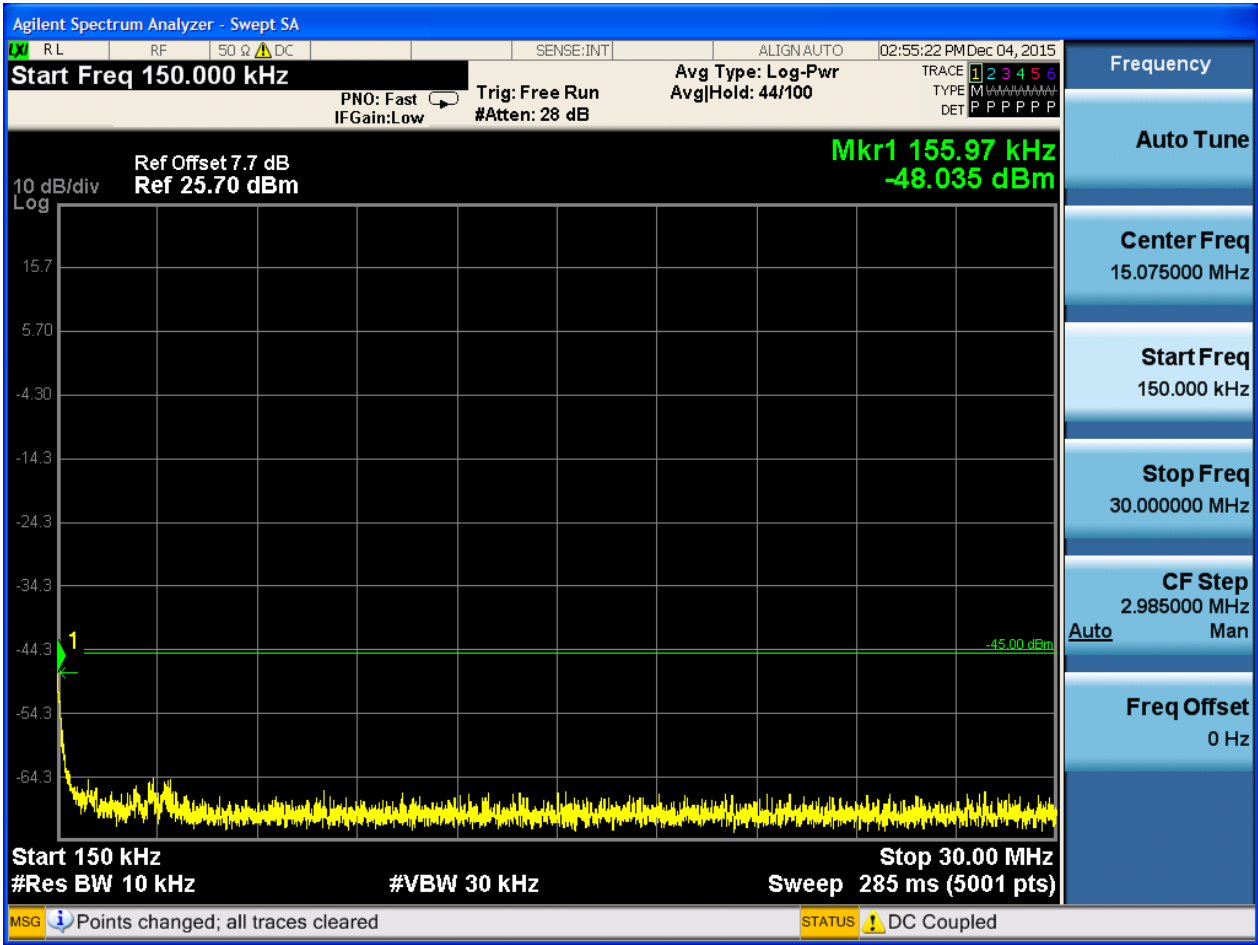


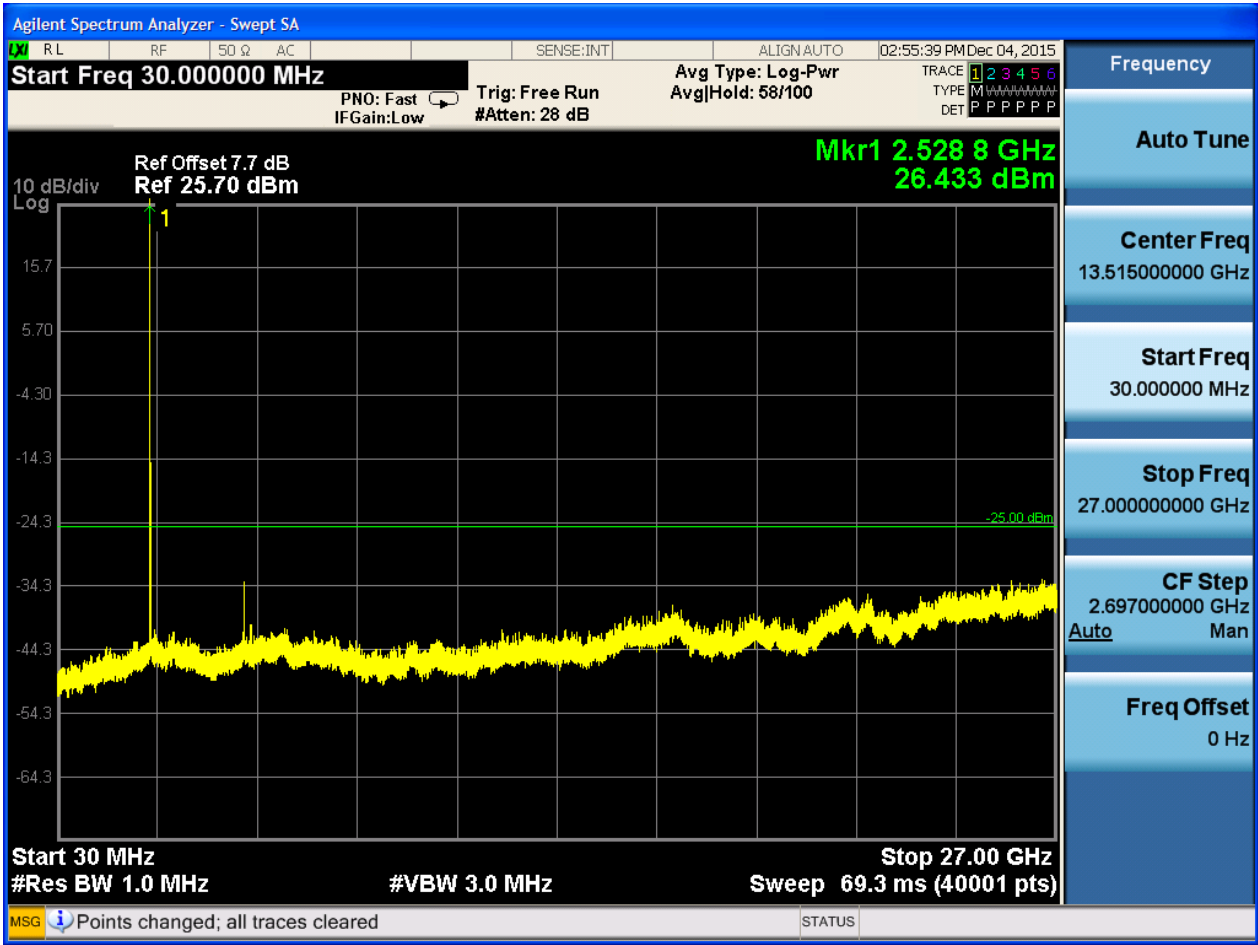


6.1.1.1.3.2 Test Channel = MCH

6.1.1.1.3.2.1 Test RB = RB1#0



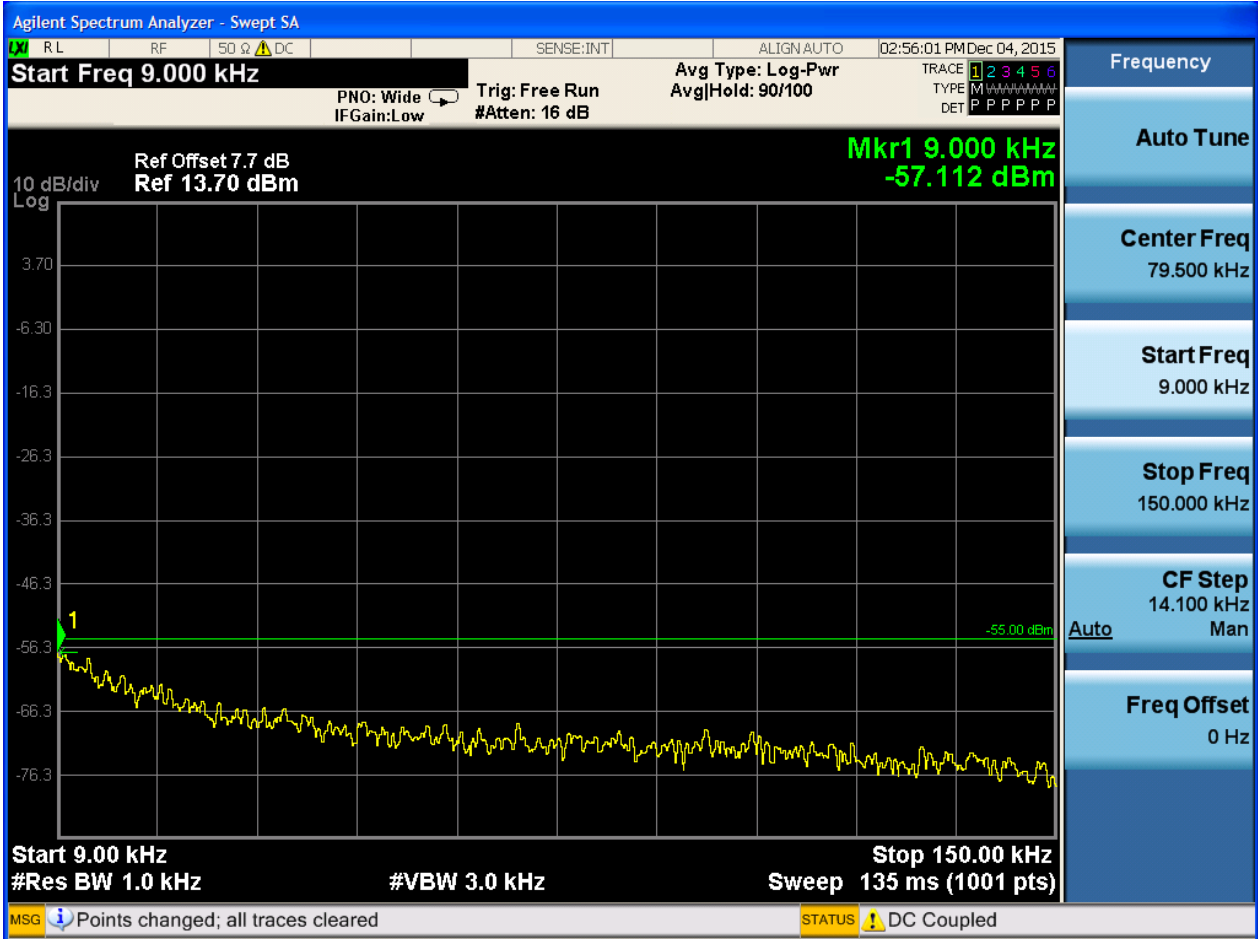


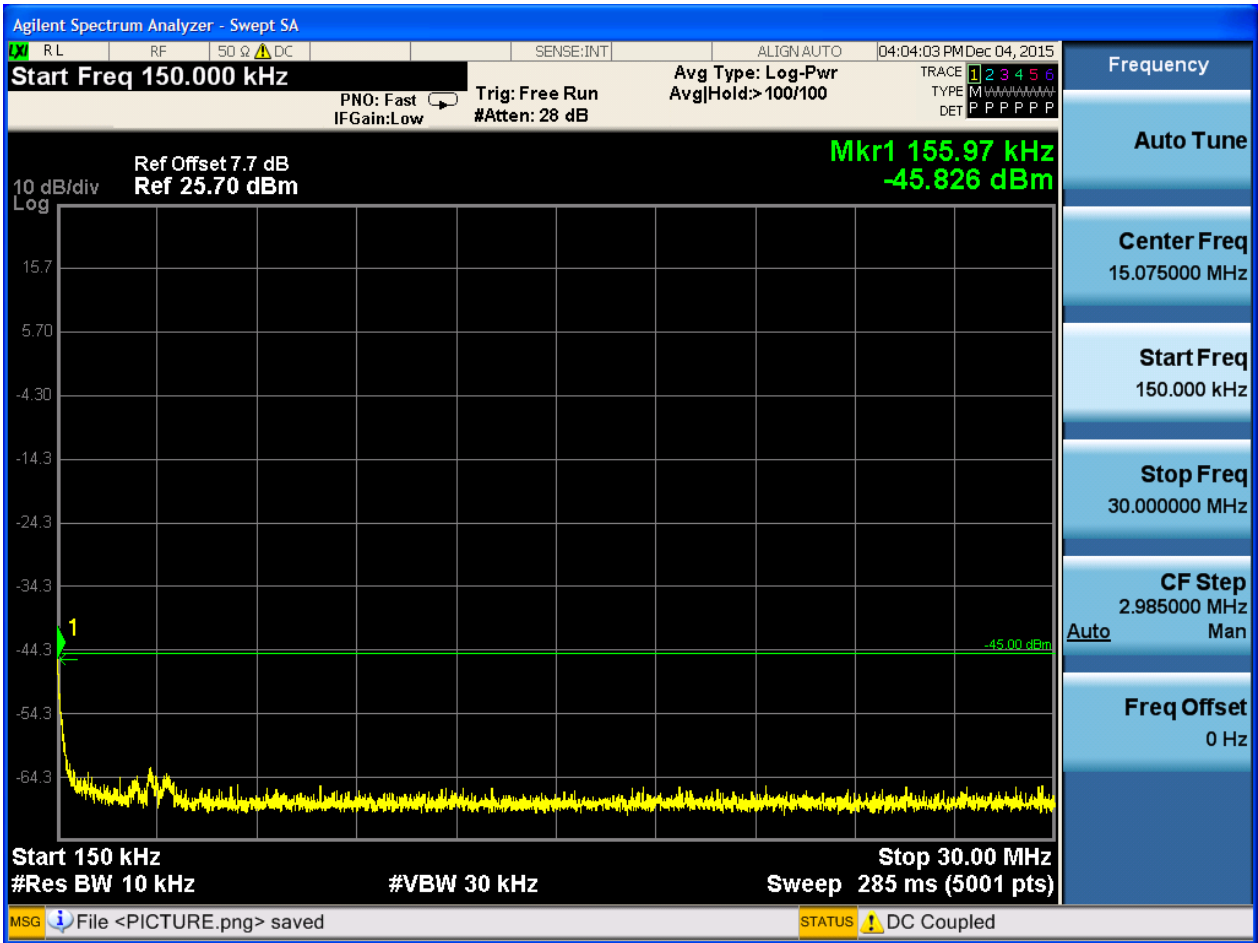


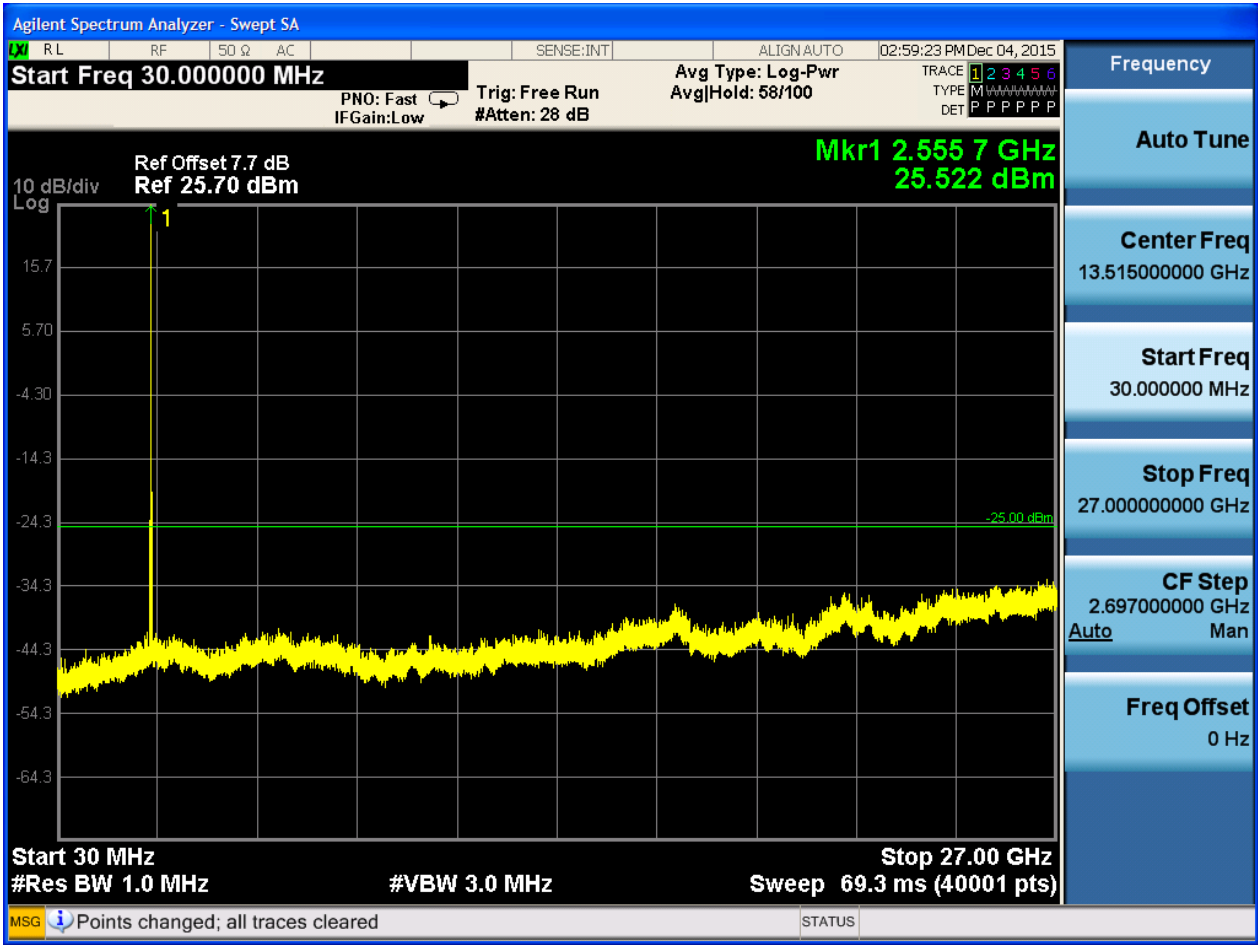


6.1.1.1.3.3 Test Channel = HCH

6.1.1.1.3.3.1 Test RB = RB1#0





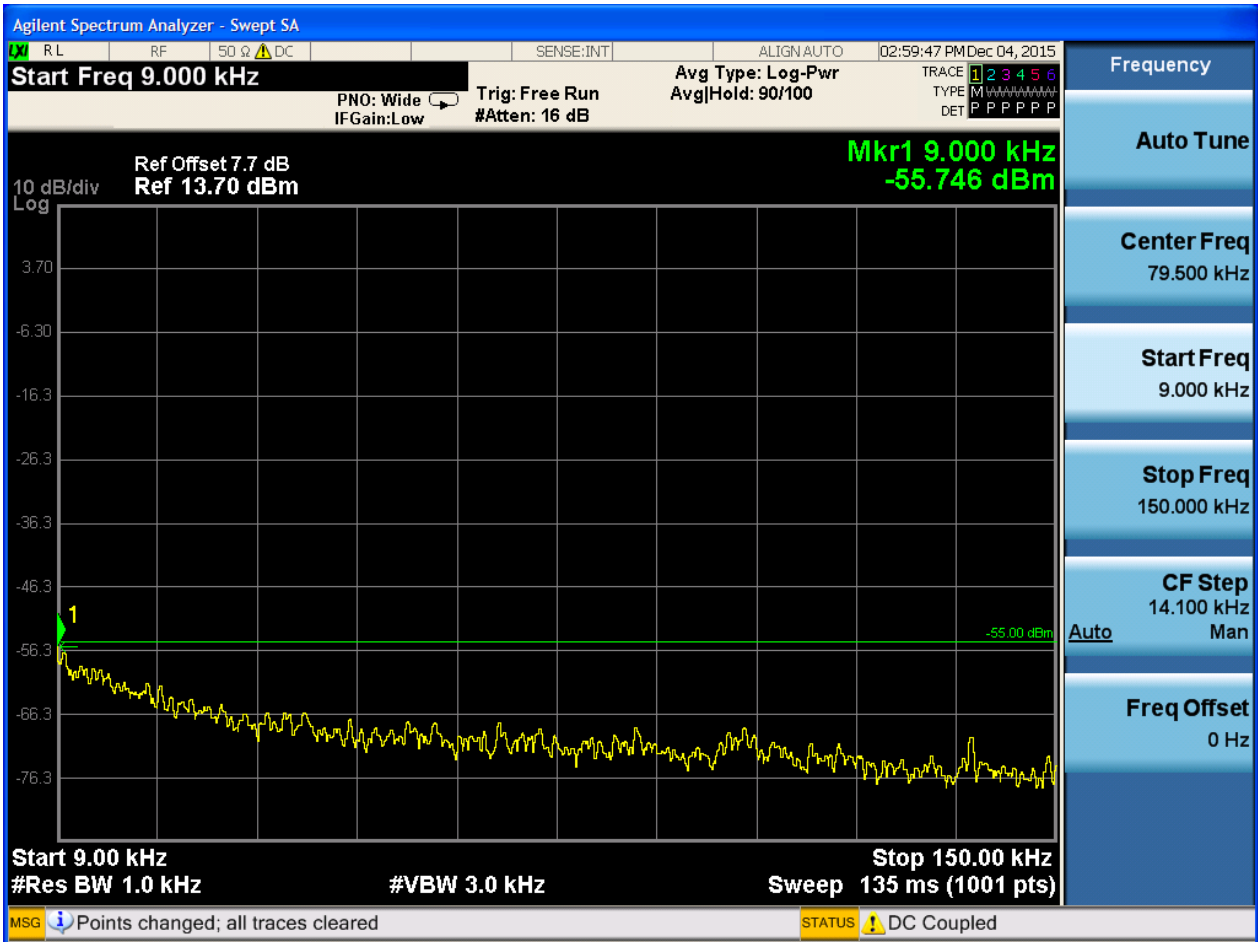


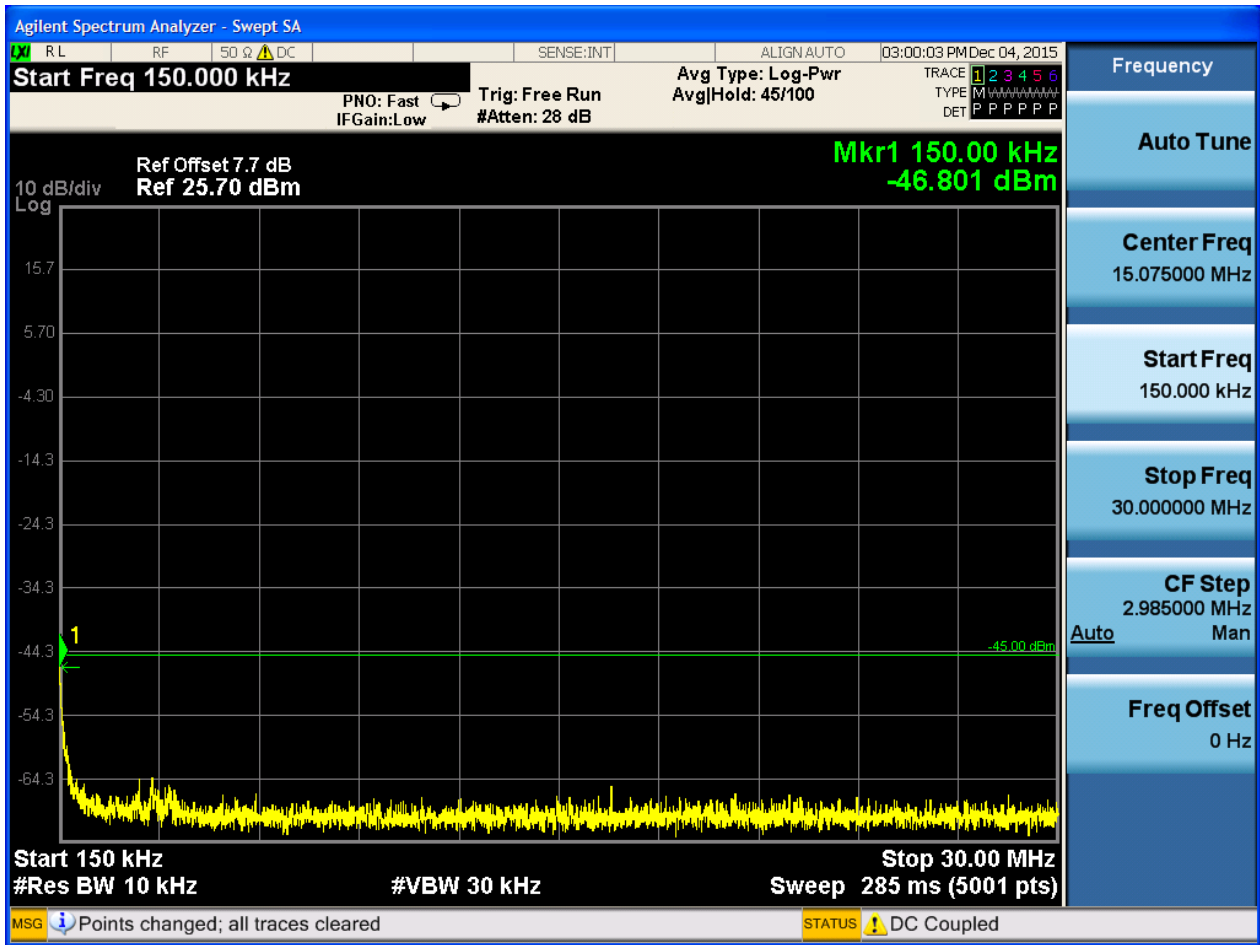


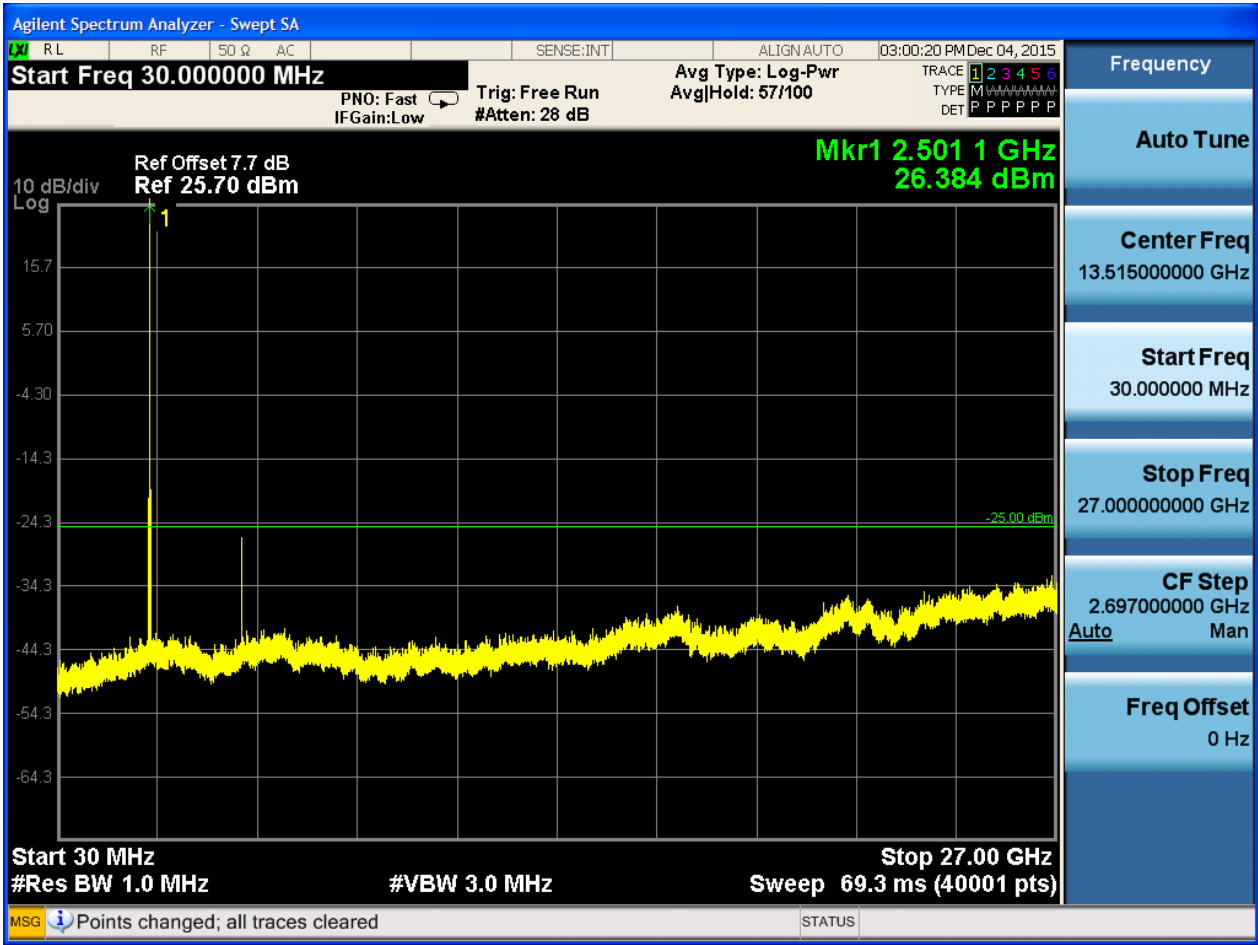
6.1.1.1.4 Test Bandwidth = 20

6.1.1.1.4.1 Test Channel = LCH

6.1.1.1.4.1.1 Test RB = RB1#0



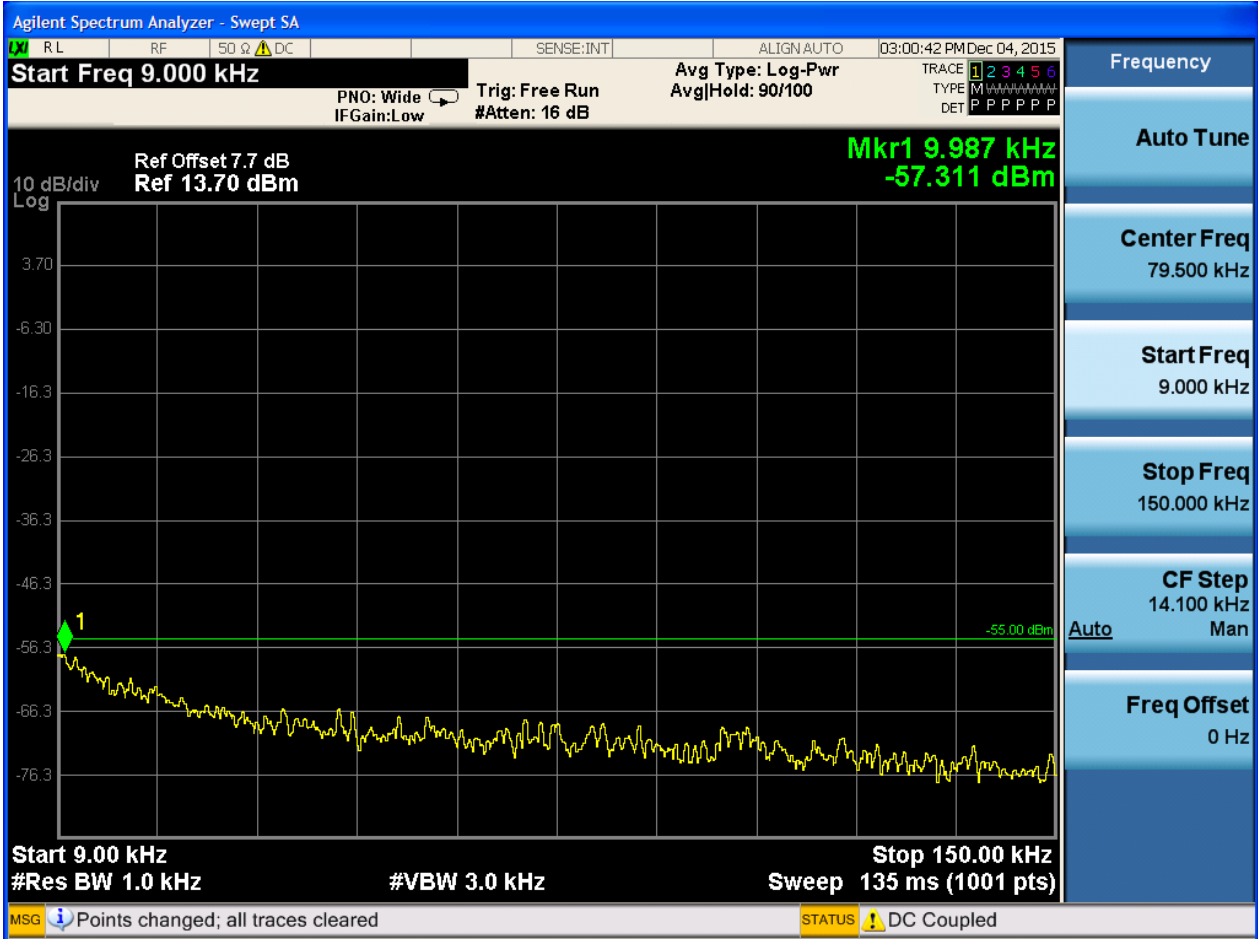


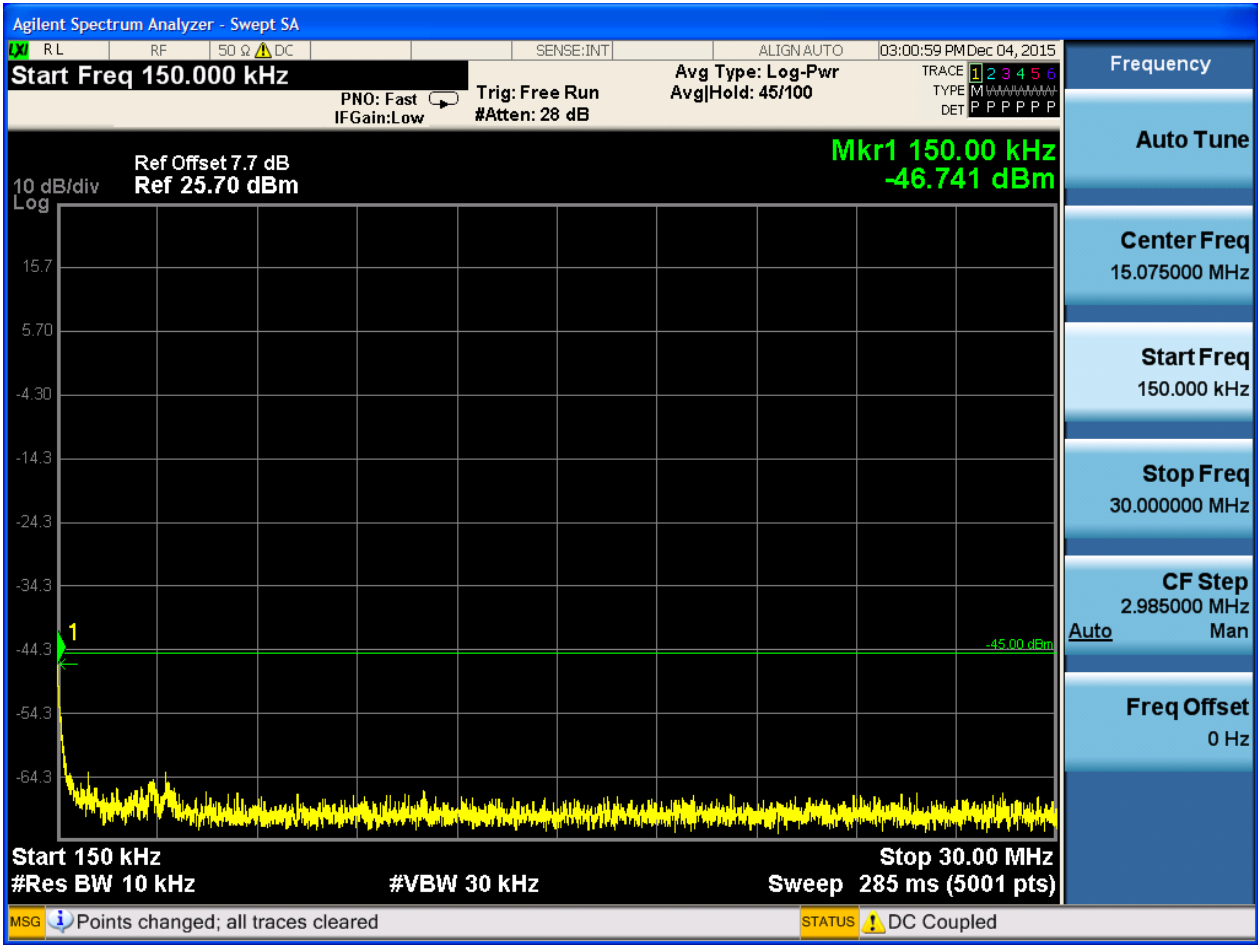


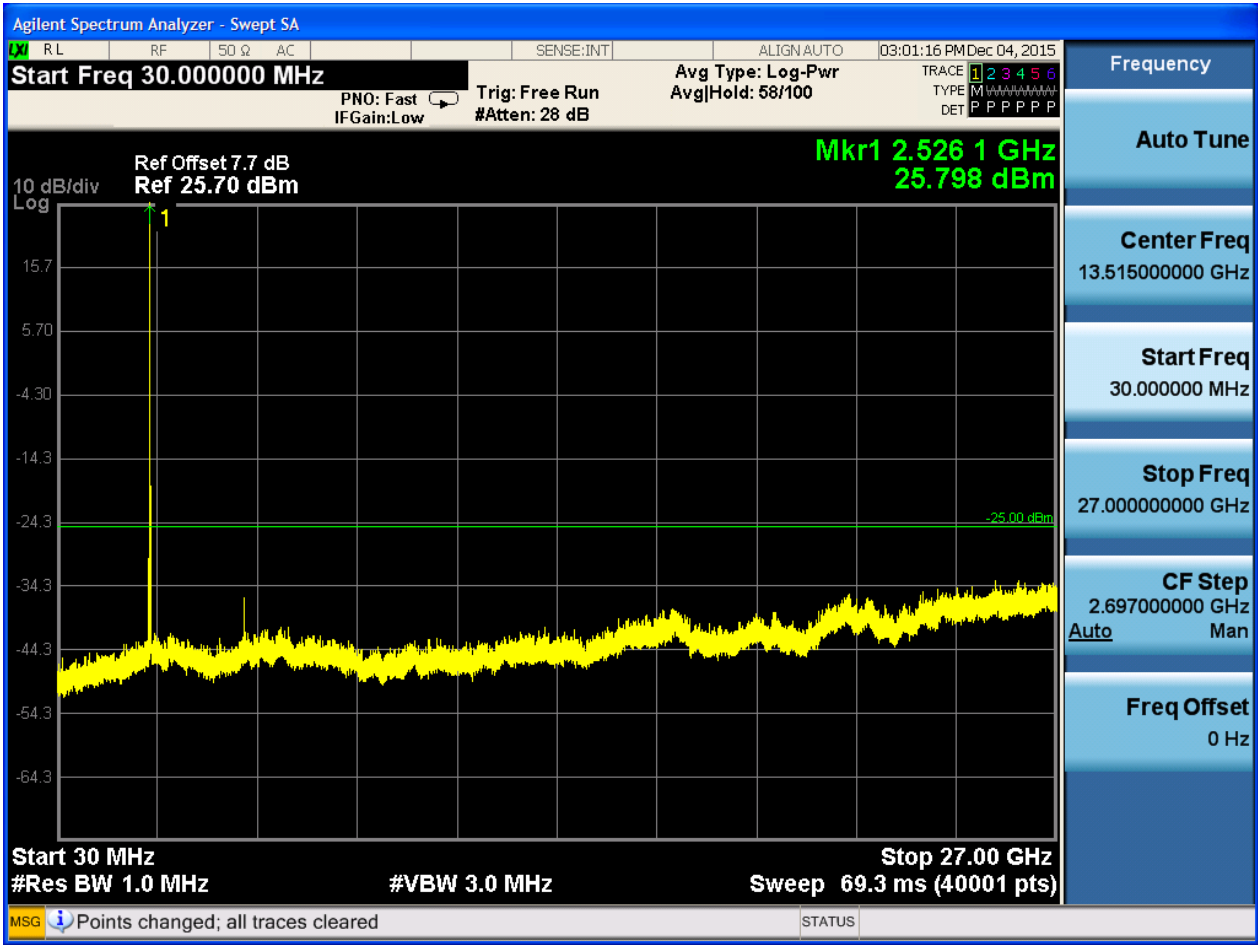


6.1.1.1.4.2 Test Channel = MCH

6.1.1.1.4.2.1 Test RB = RB1#0



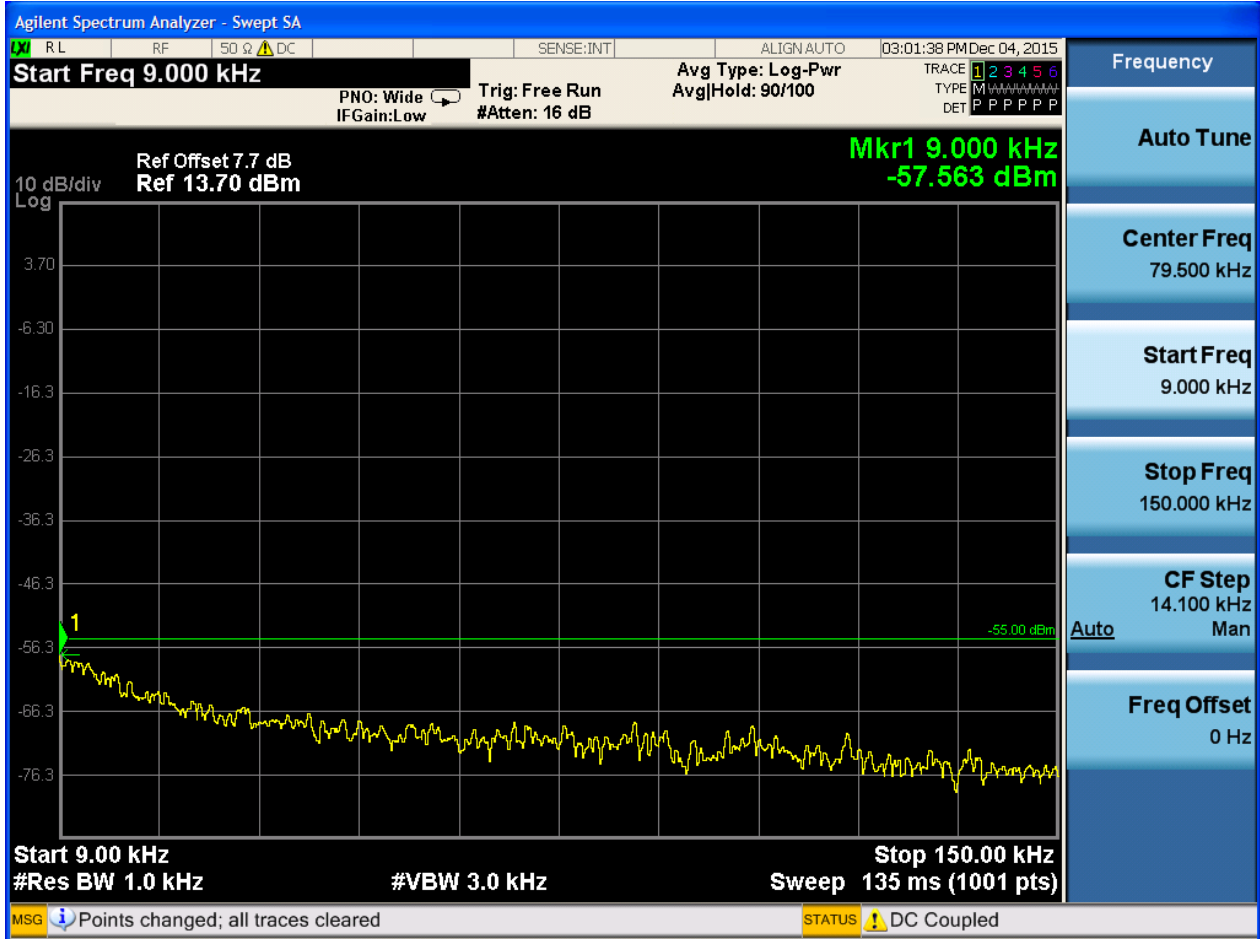


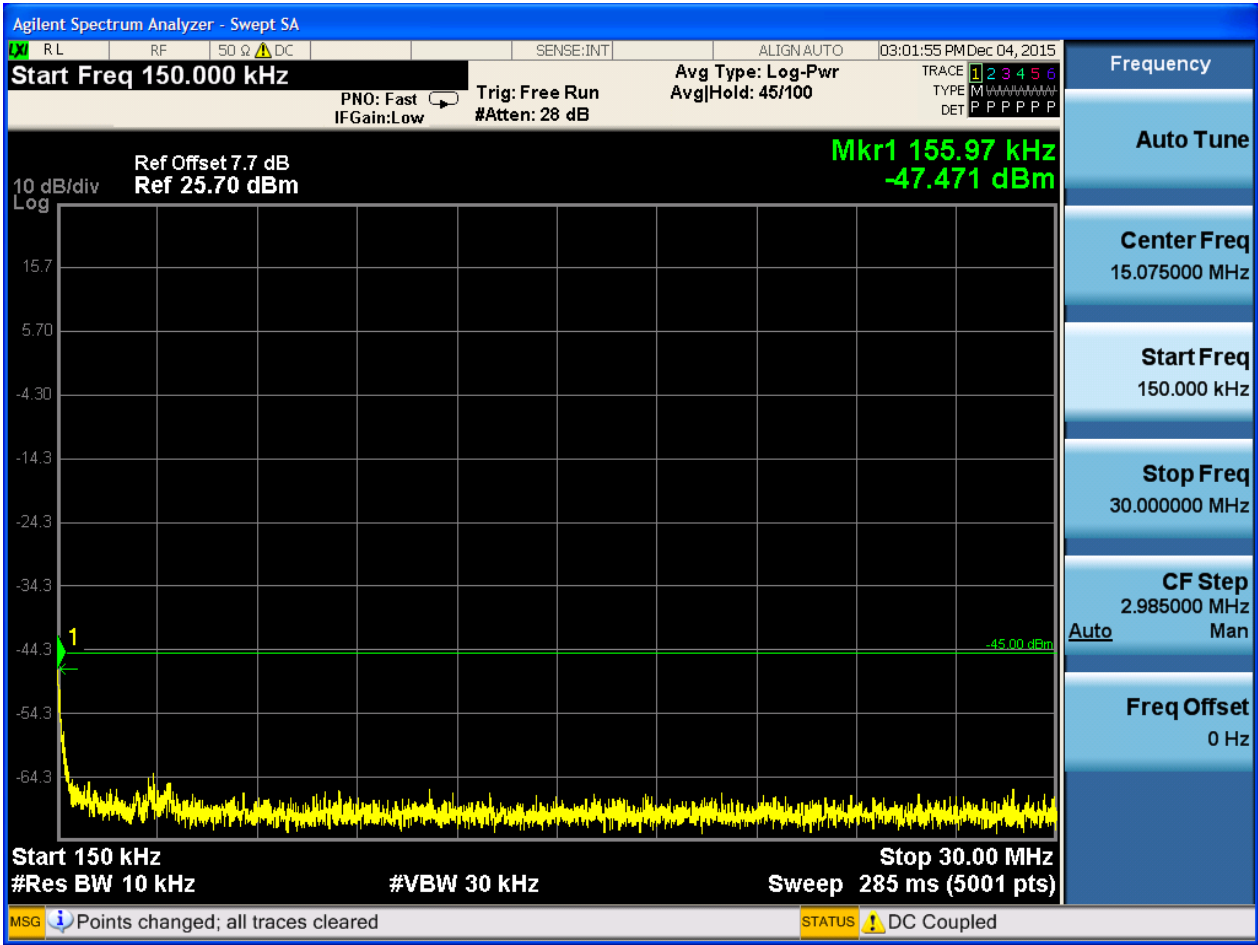


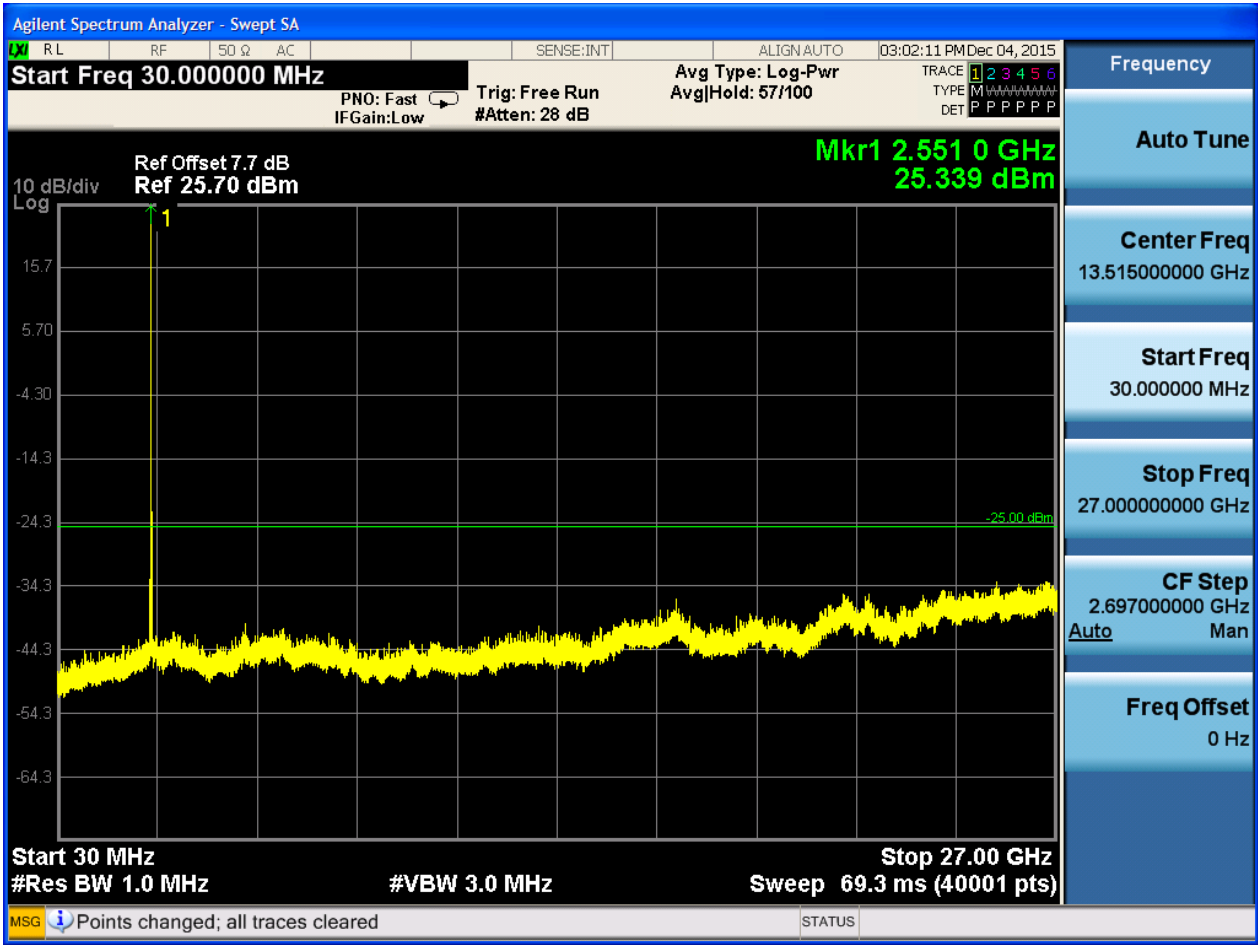


6.1.1.1.4.3 Test Channel = HCH

6.1.1.1.4.3.1 Test RB = RB1#0







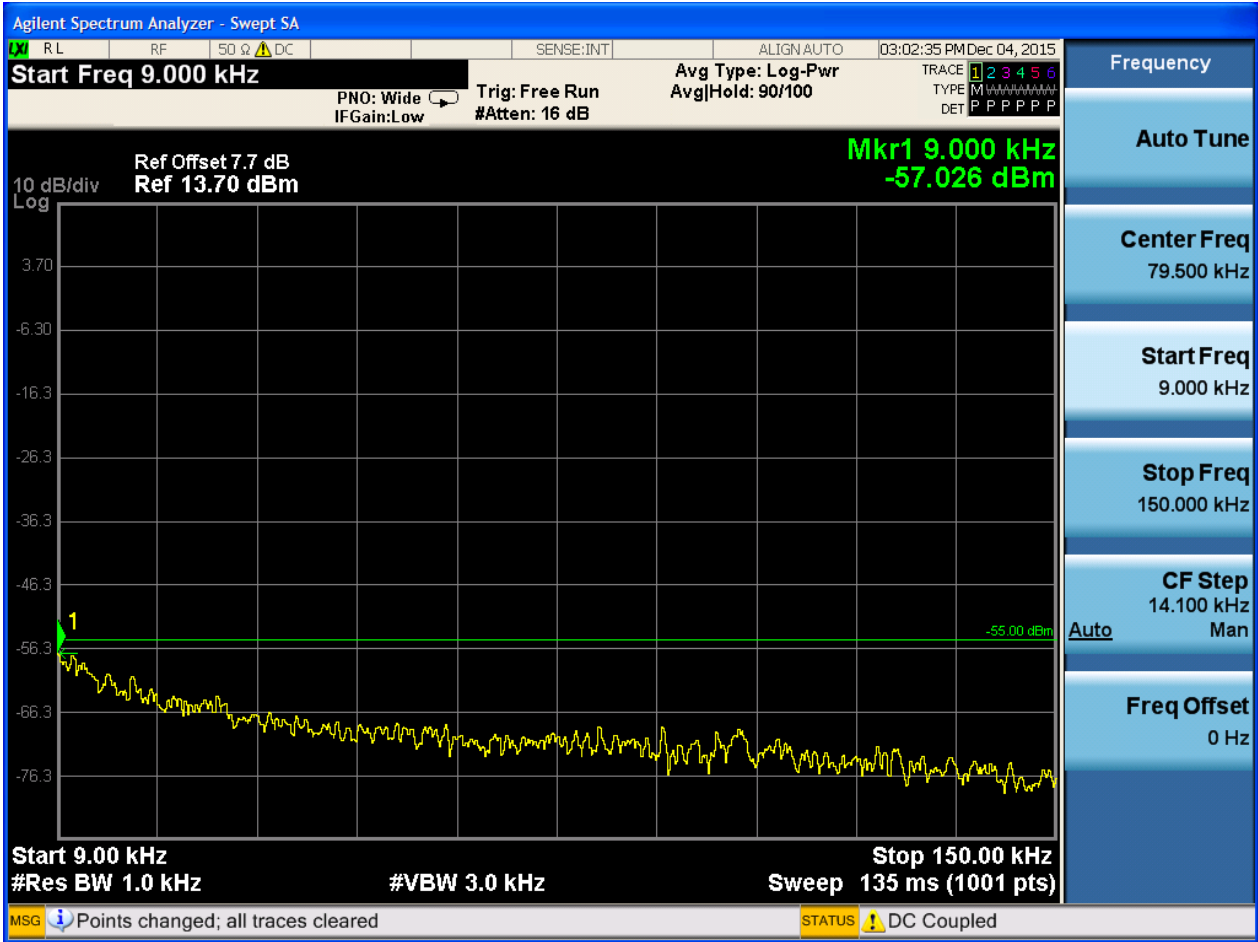


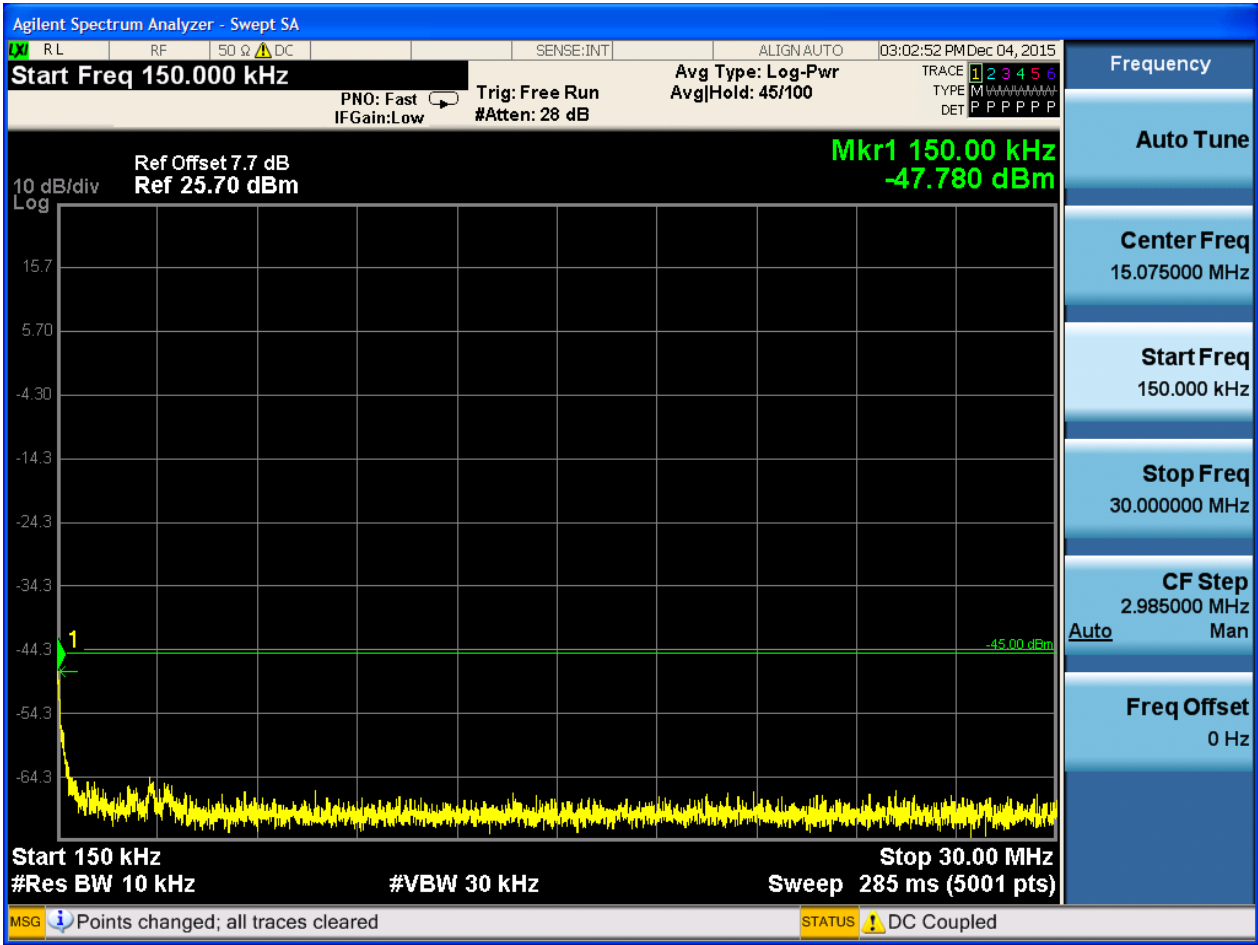
6.1.1.2 Test Mode = LTE/TM2

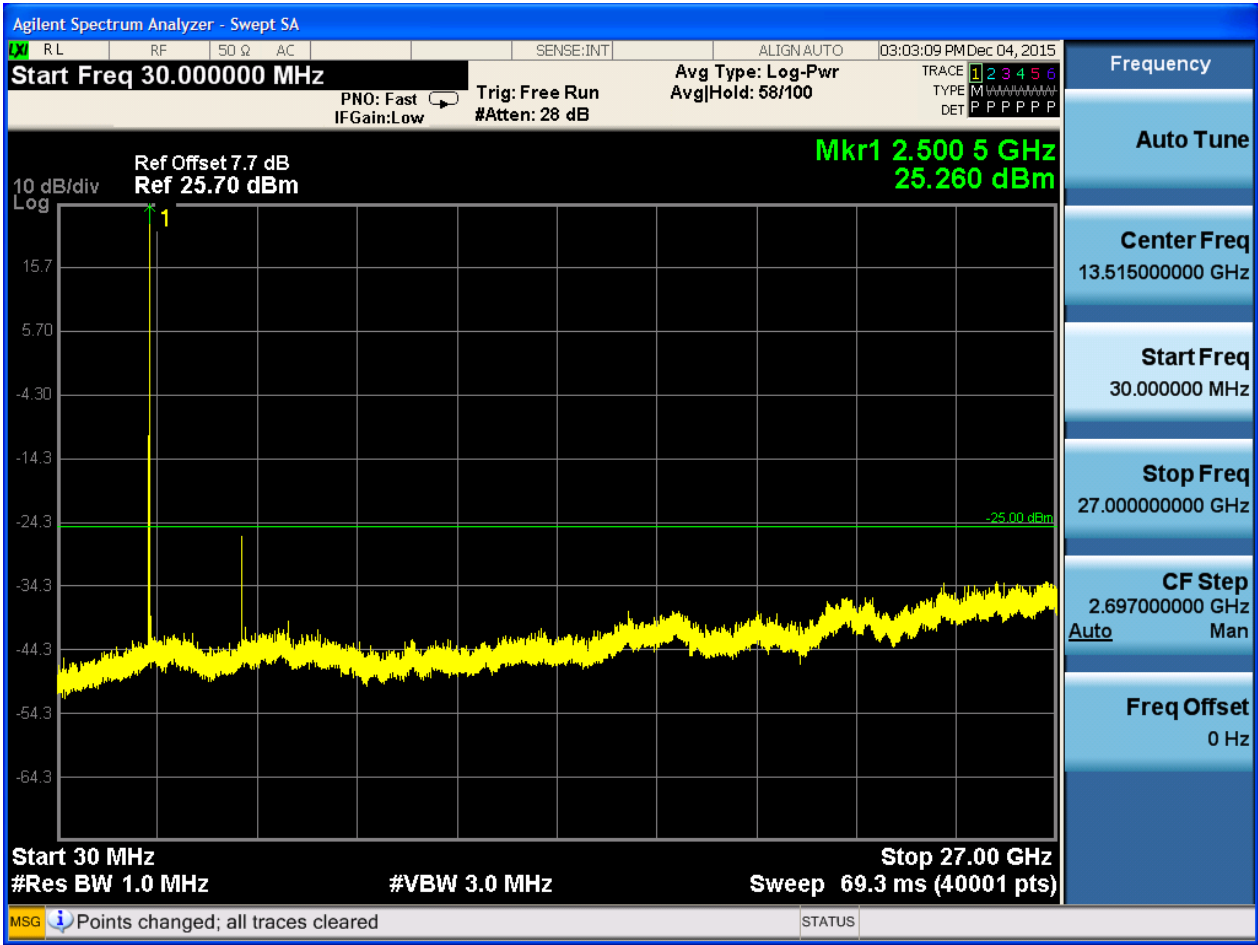
6.1.1.2.1 Test Bandwidth = 5

6.1.1.2.1.1 Test Channel = LCH

6.1.1.2.1.1.1 Test RB = RB1#0



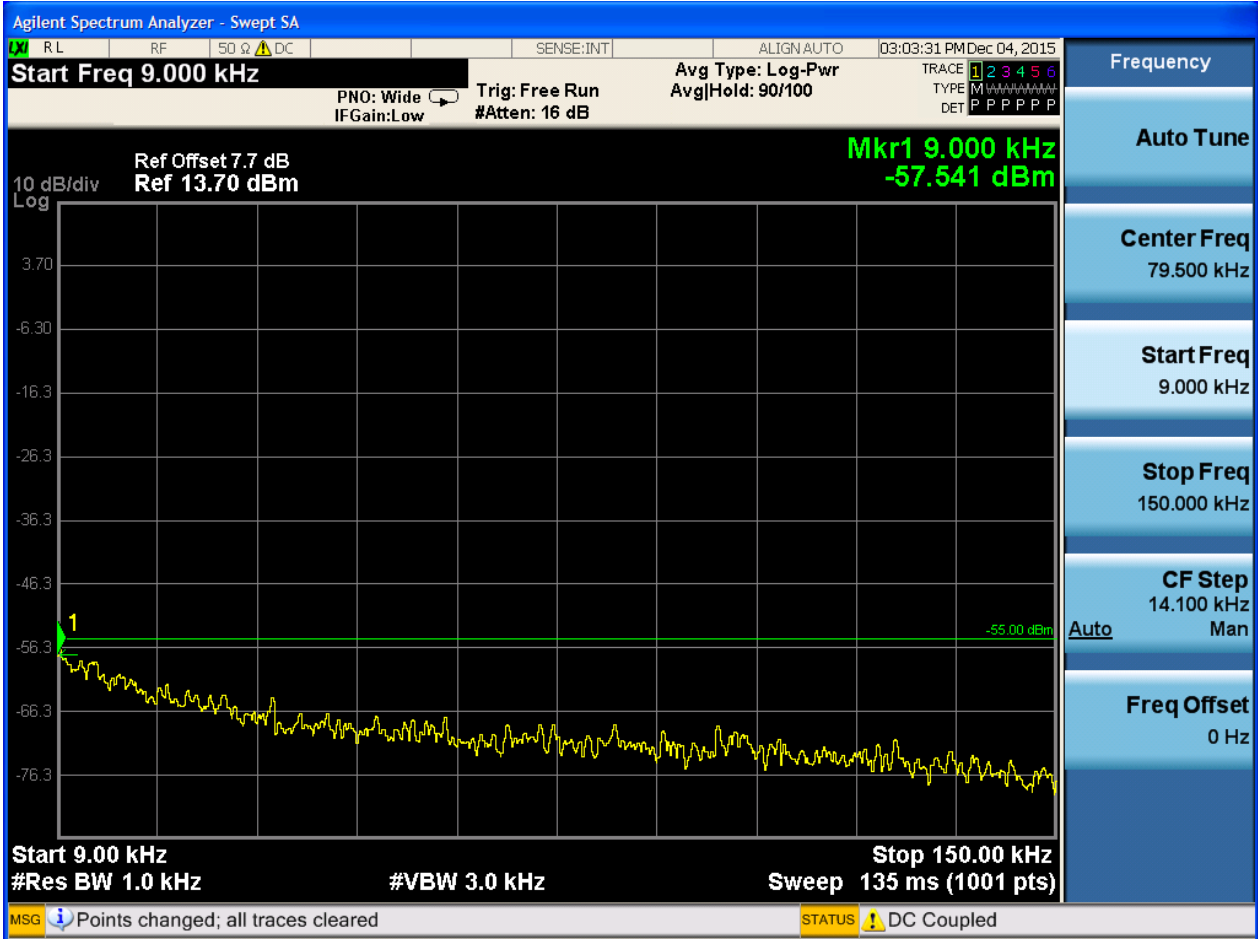


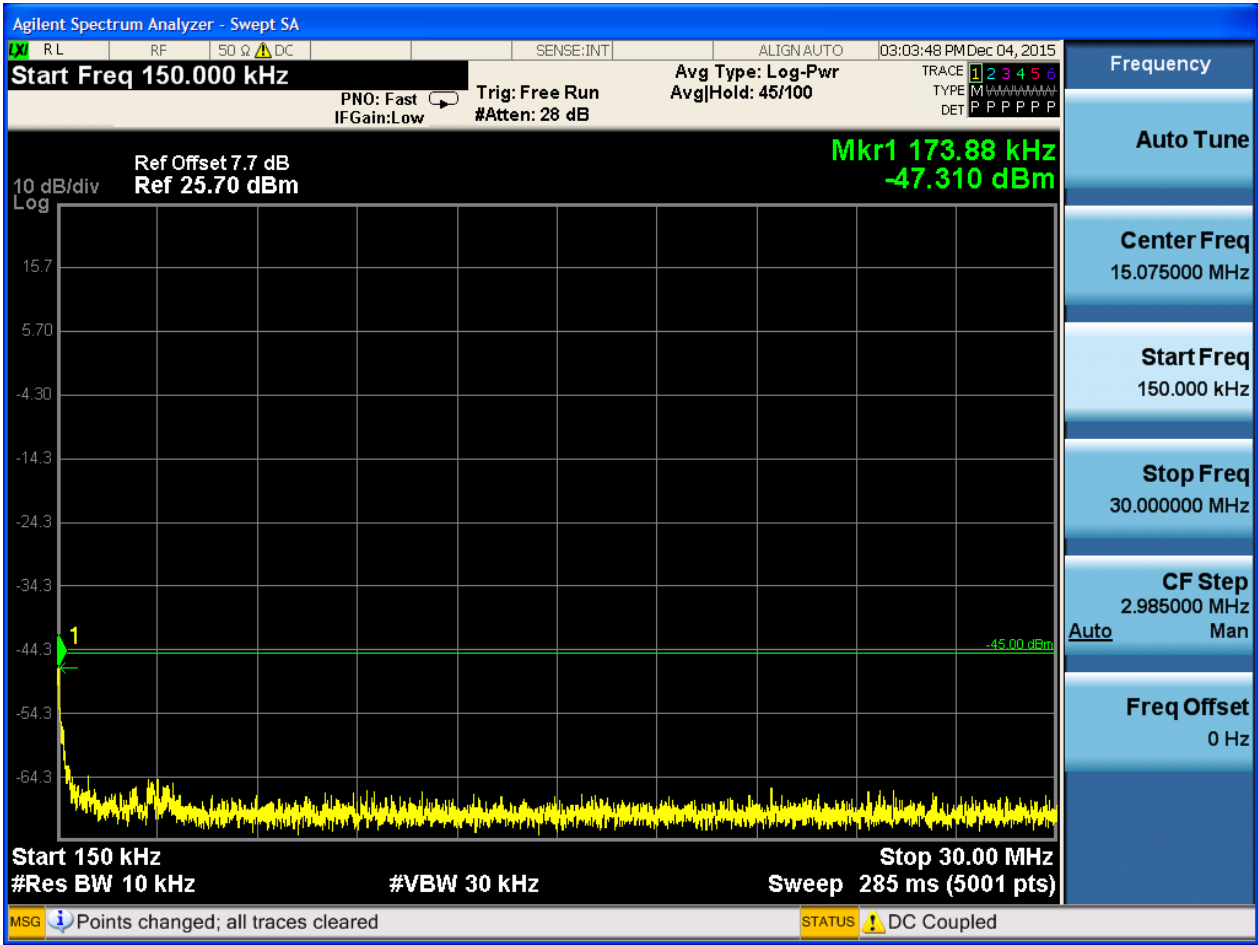


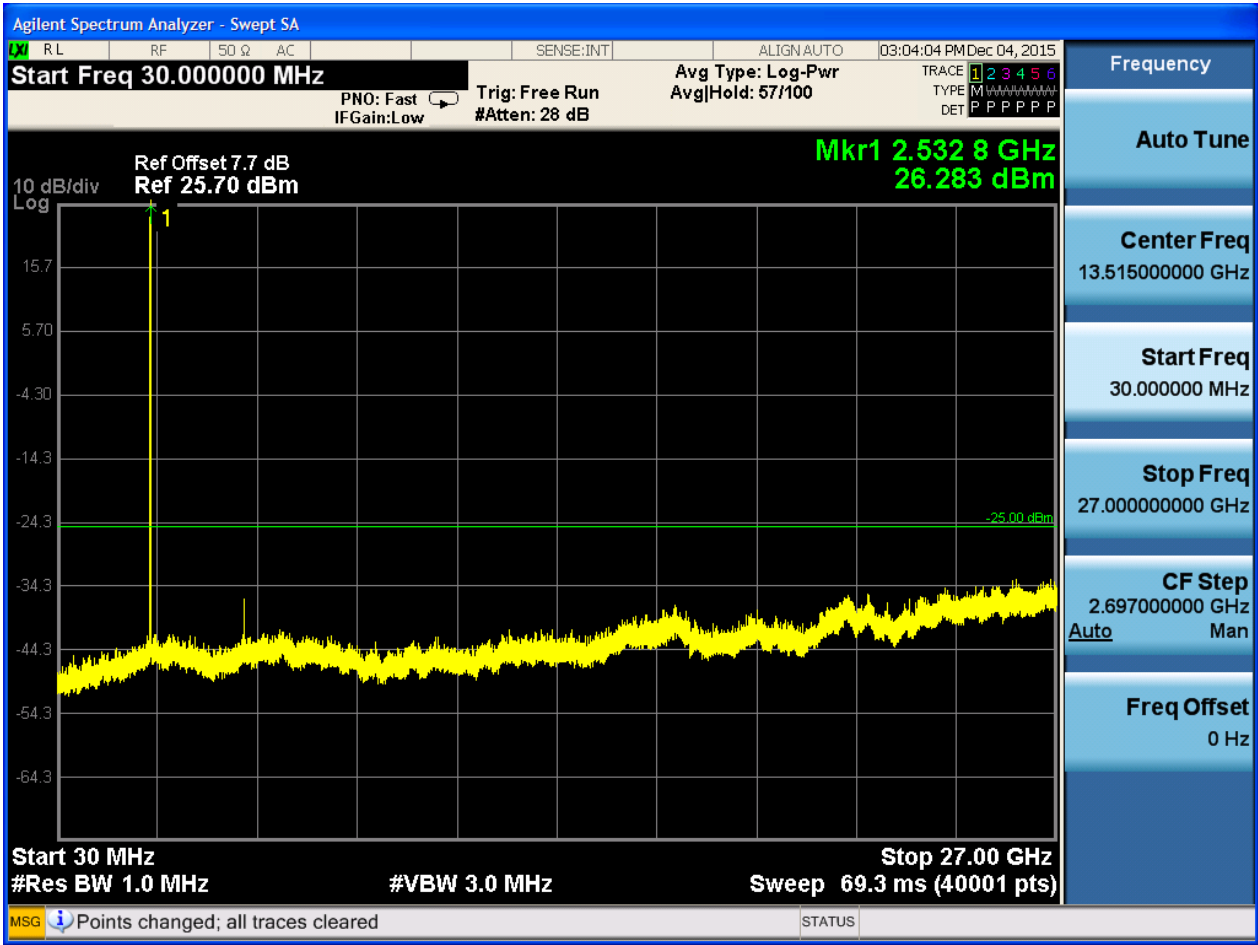


6.1.1.2.1.2 Test Channel = MCH

6.1.1.2.1.2.1 Test RB = RB1#0



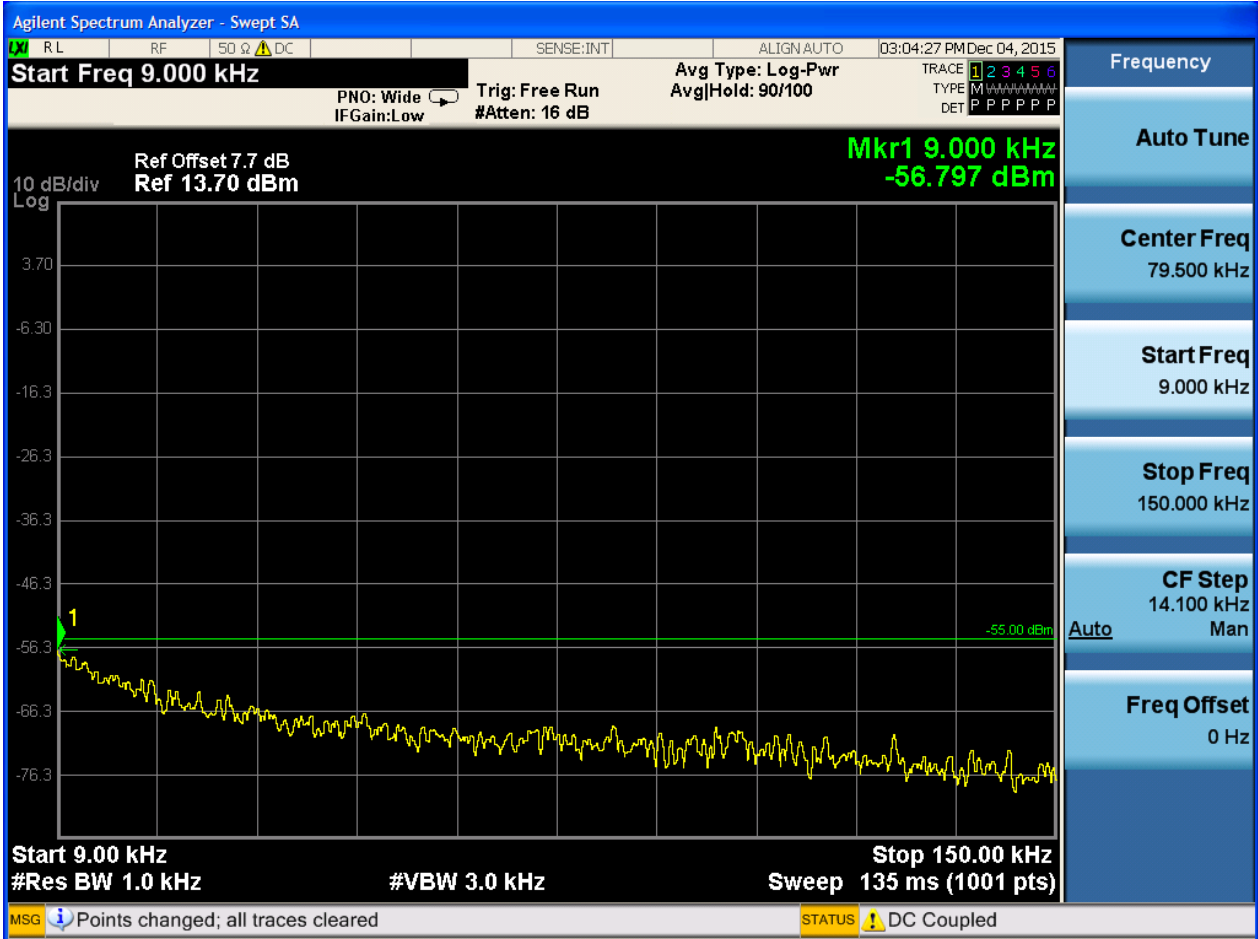


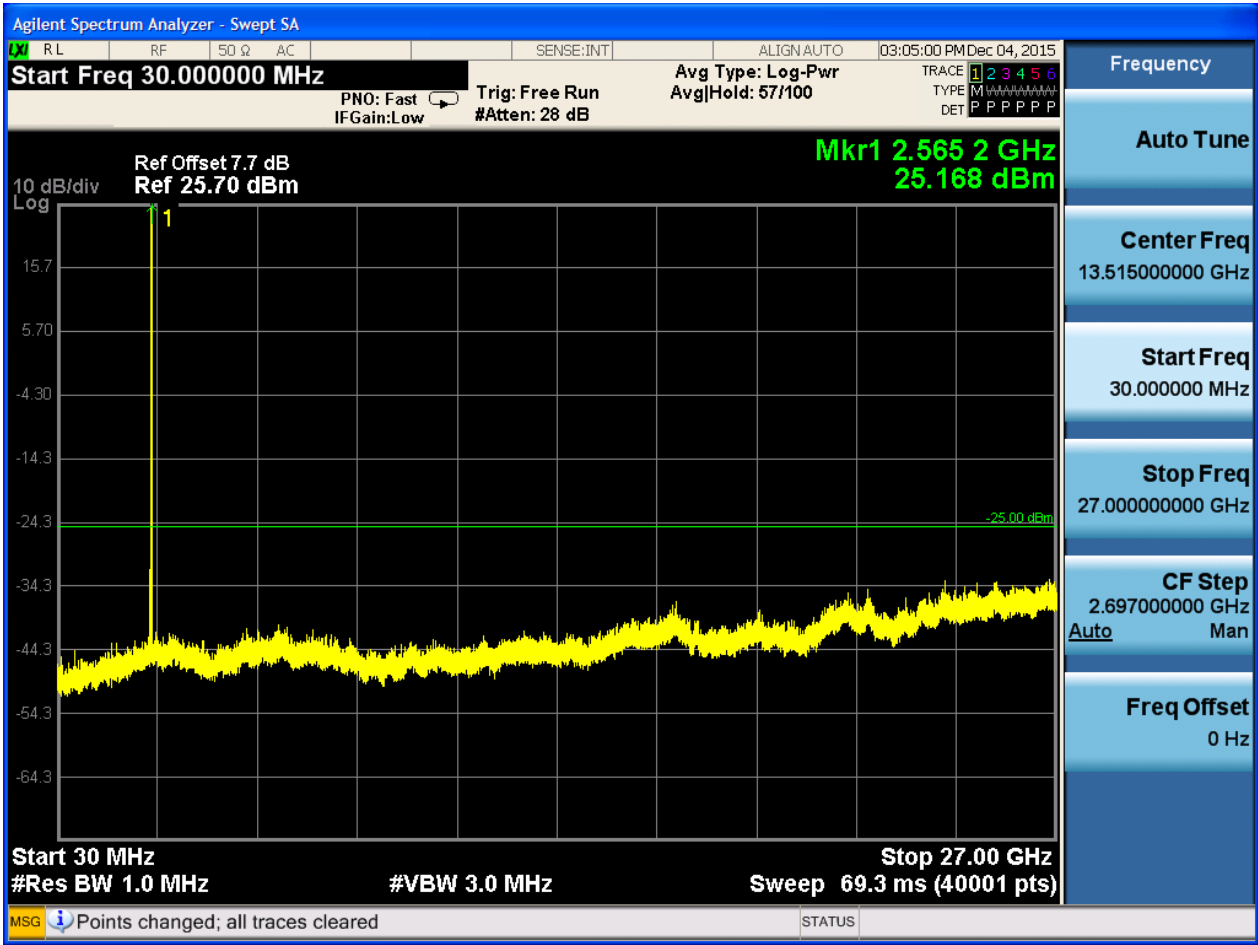




6.1.1.2.1.3 Test Channel = HCH

6.1.1.2.1.3.1 Test RB = RB1#0



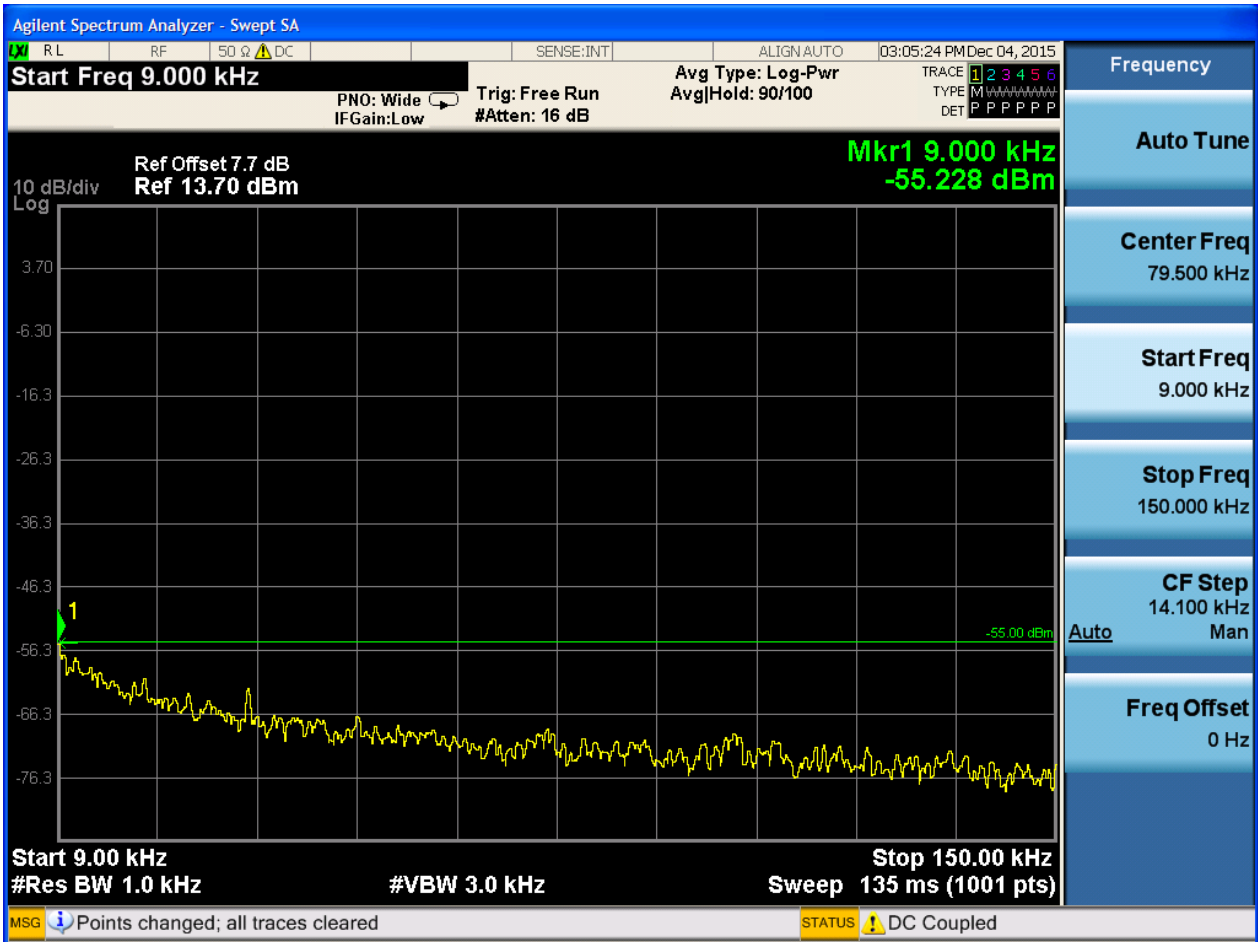


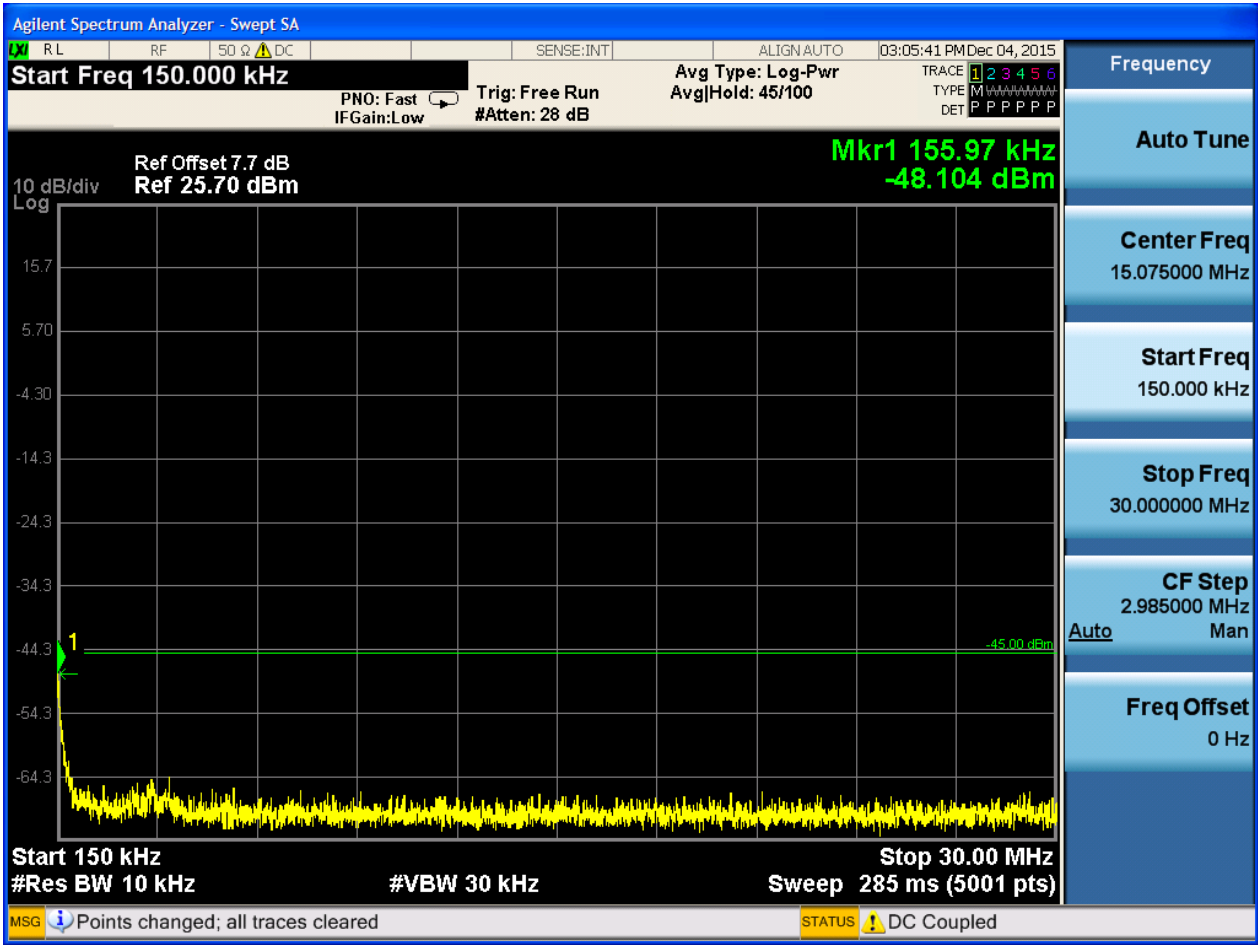


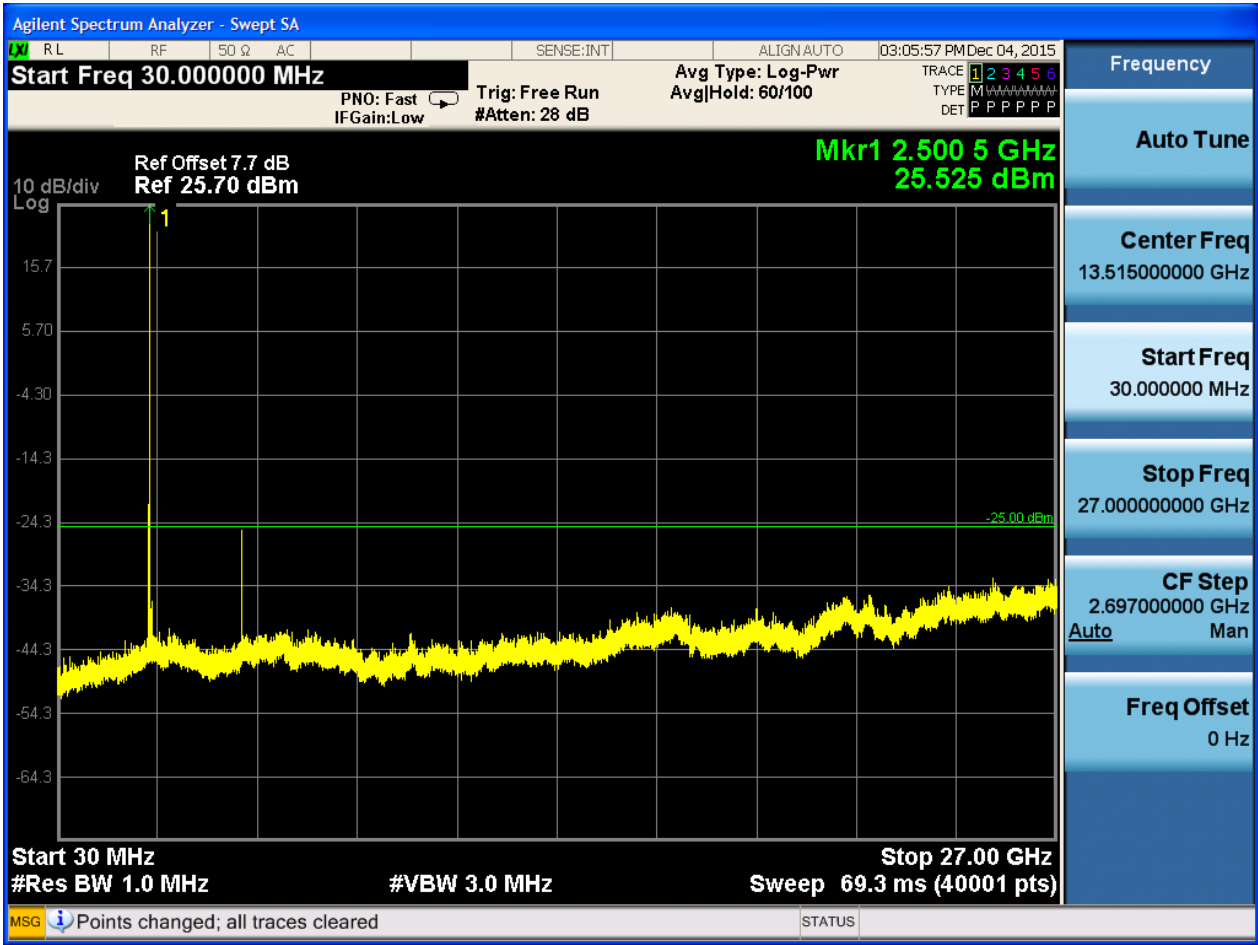
6.1.1.2.2 Test Bandwidth = 10

6.1.1.2.2.1 Test Channel = LCH

6.1.1.2.2.1.1 Test RB = RB1#0



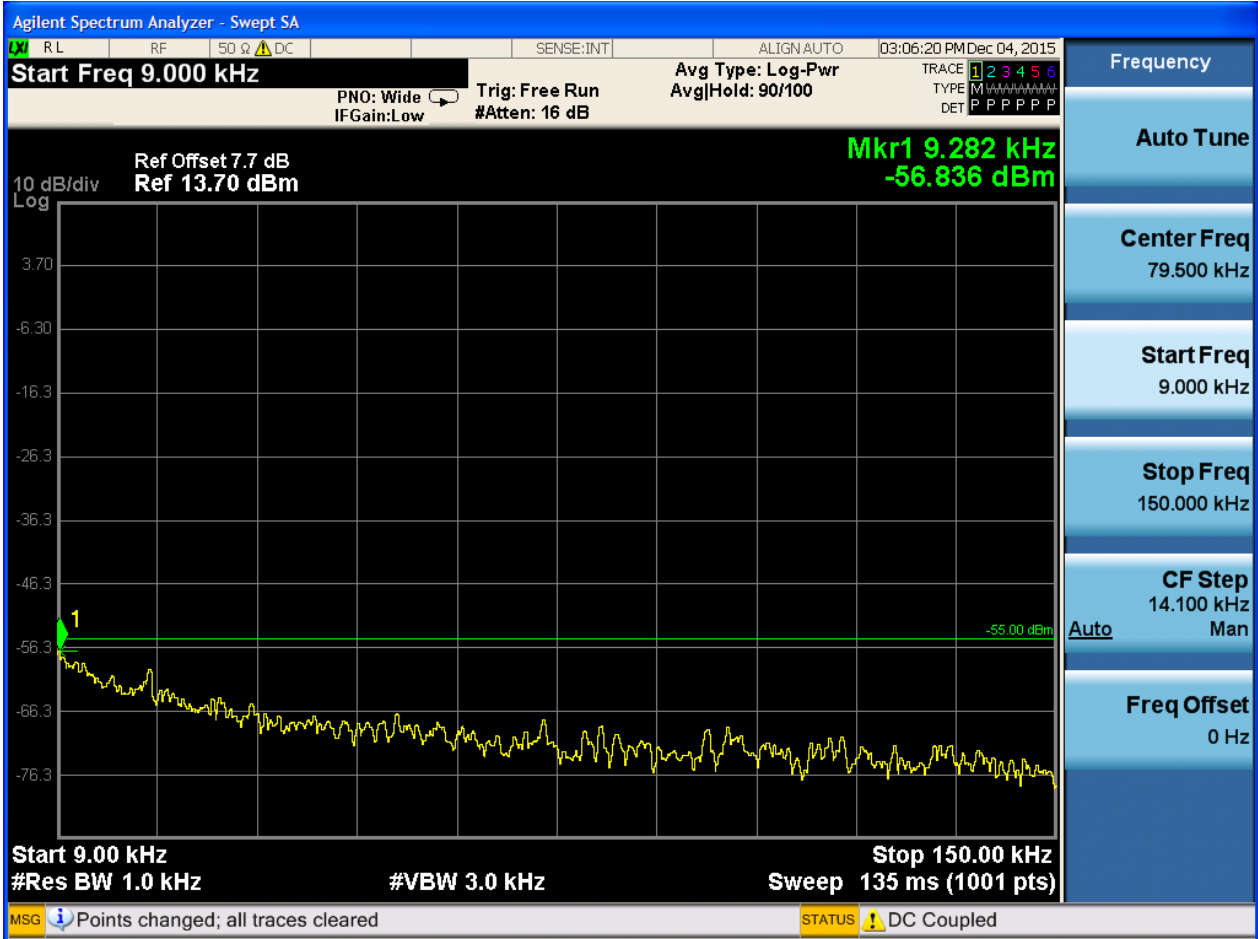


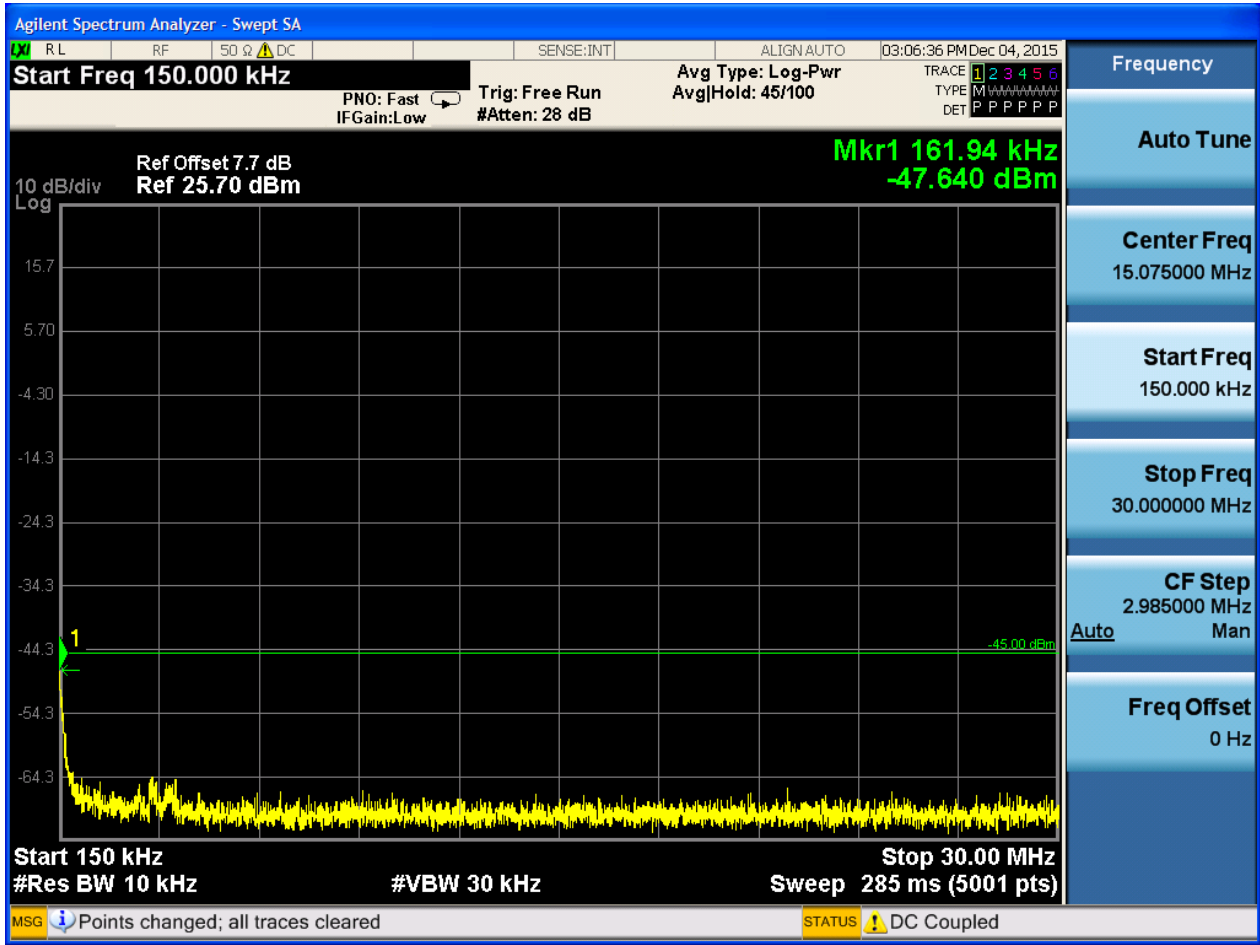


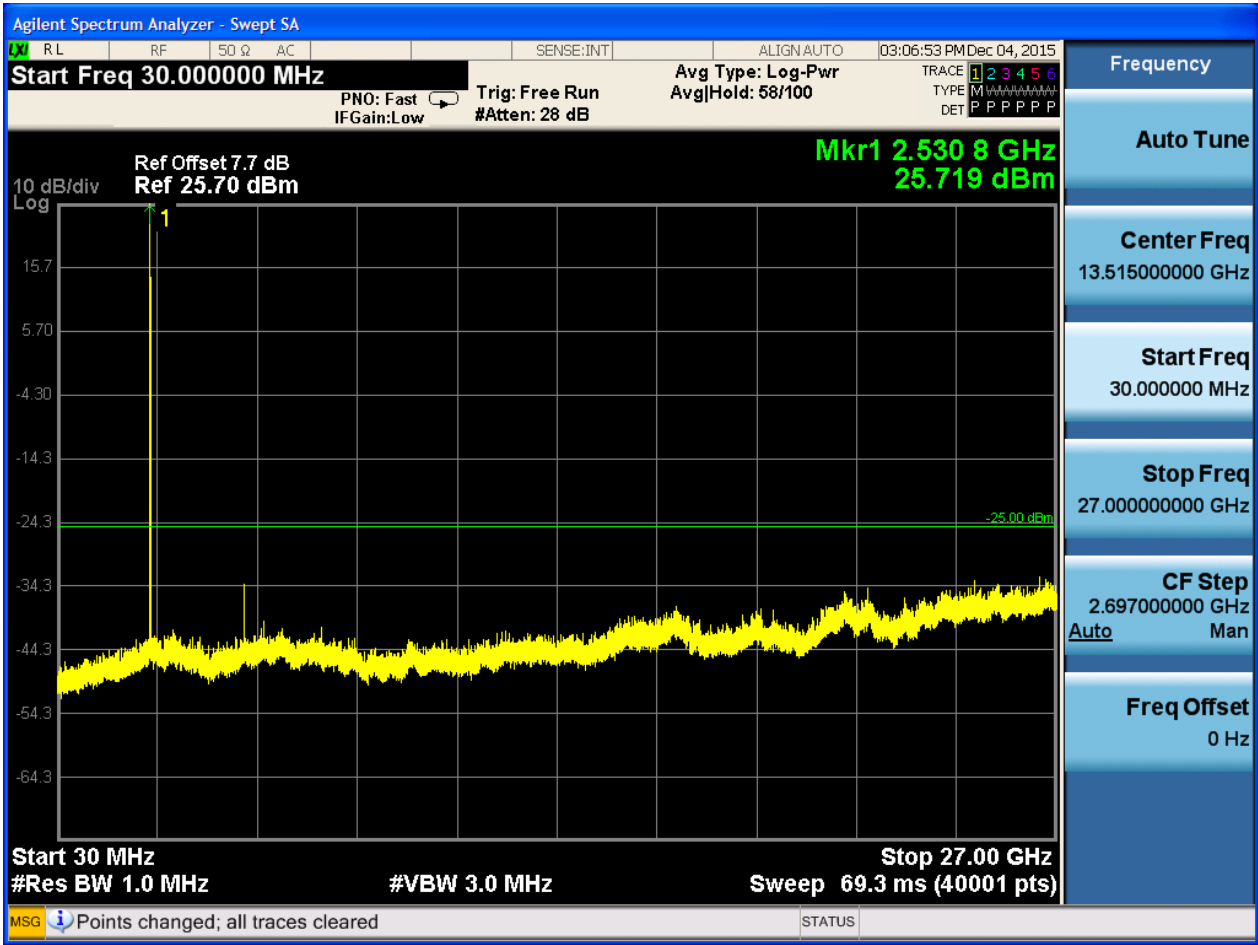


6.1.1.2.2.2 Test Channel = MCH

6.1.1.2.2.2.1 Test RB = RB1#0



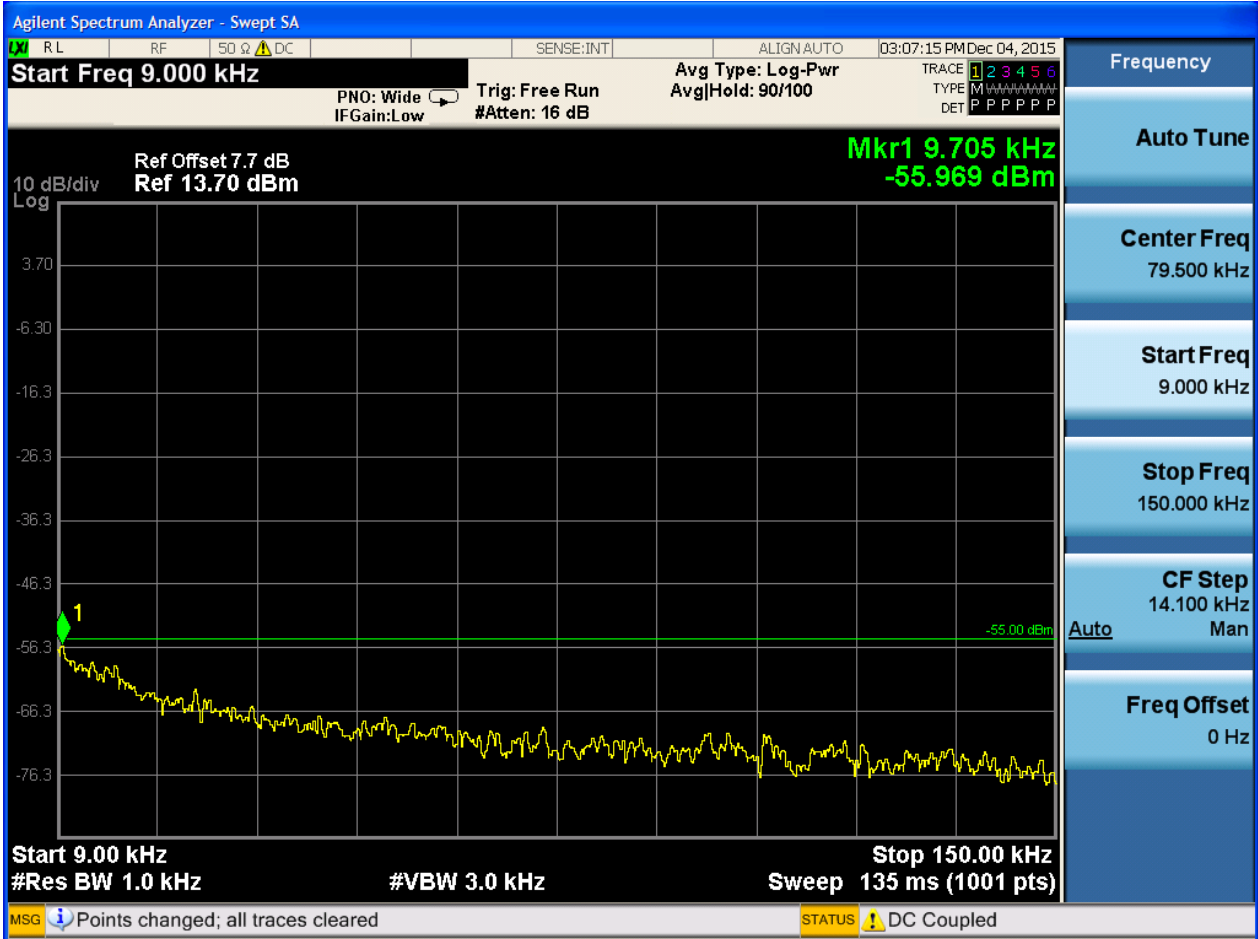


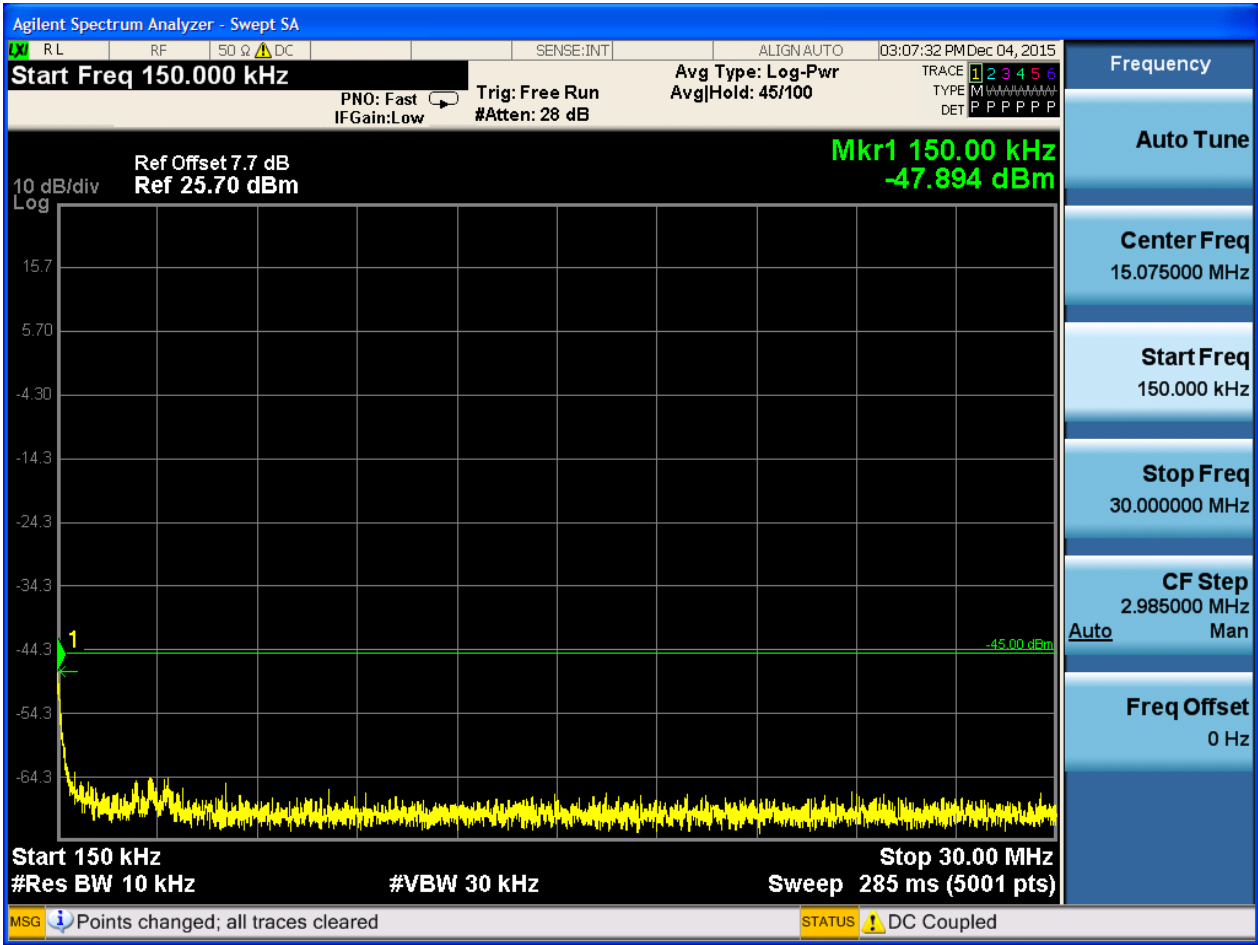


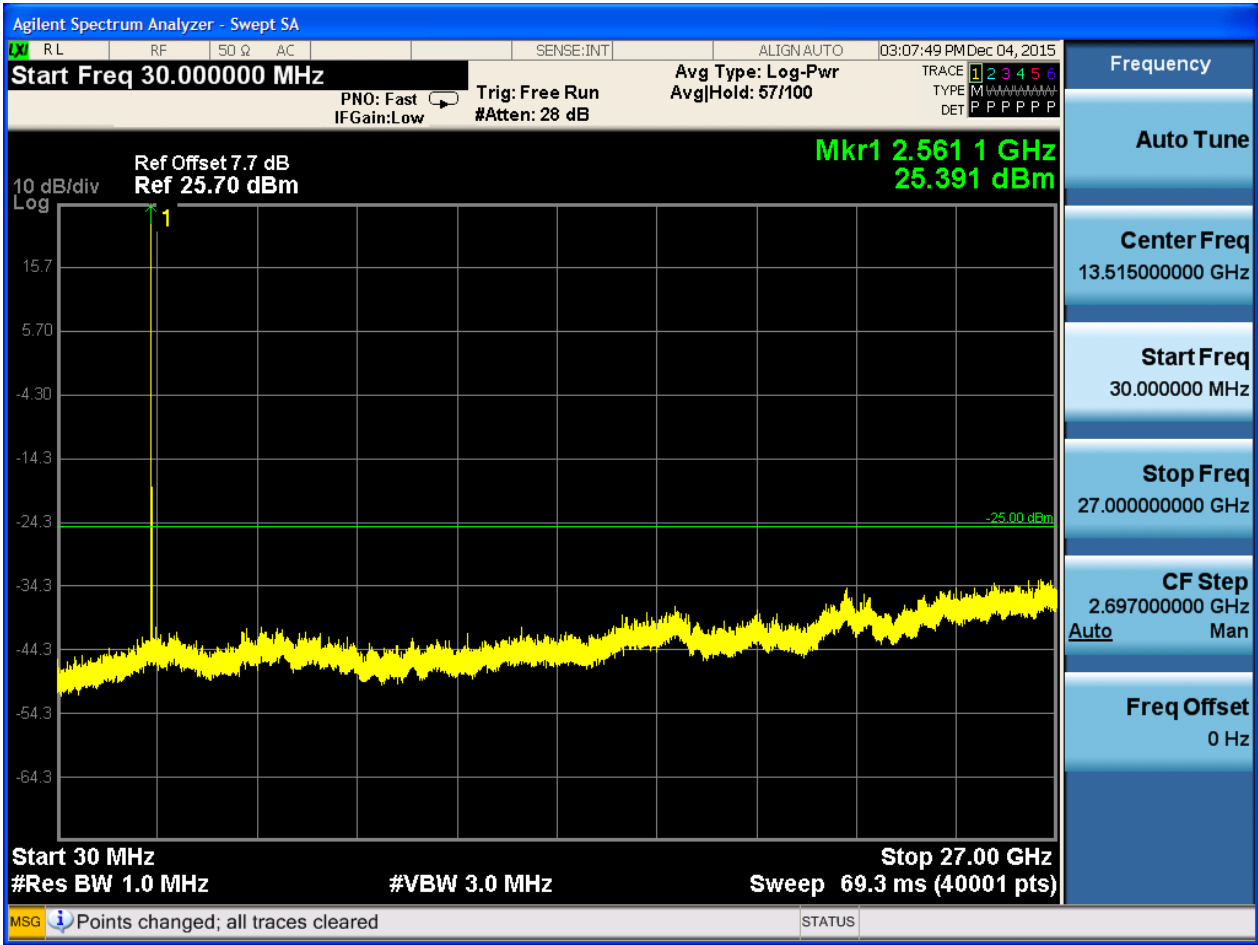


6.1.1.2.2.3 Test Channel = HCH

6.1.1.2.2.3.1 Test RB = RB1#0





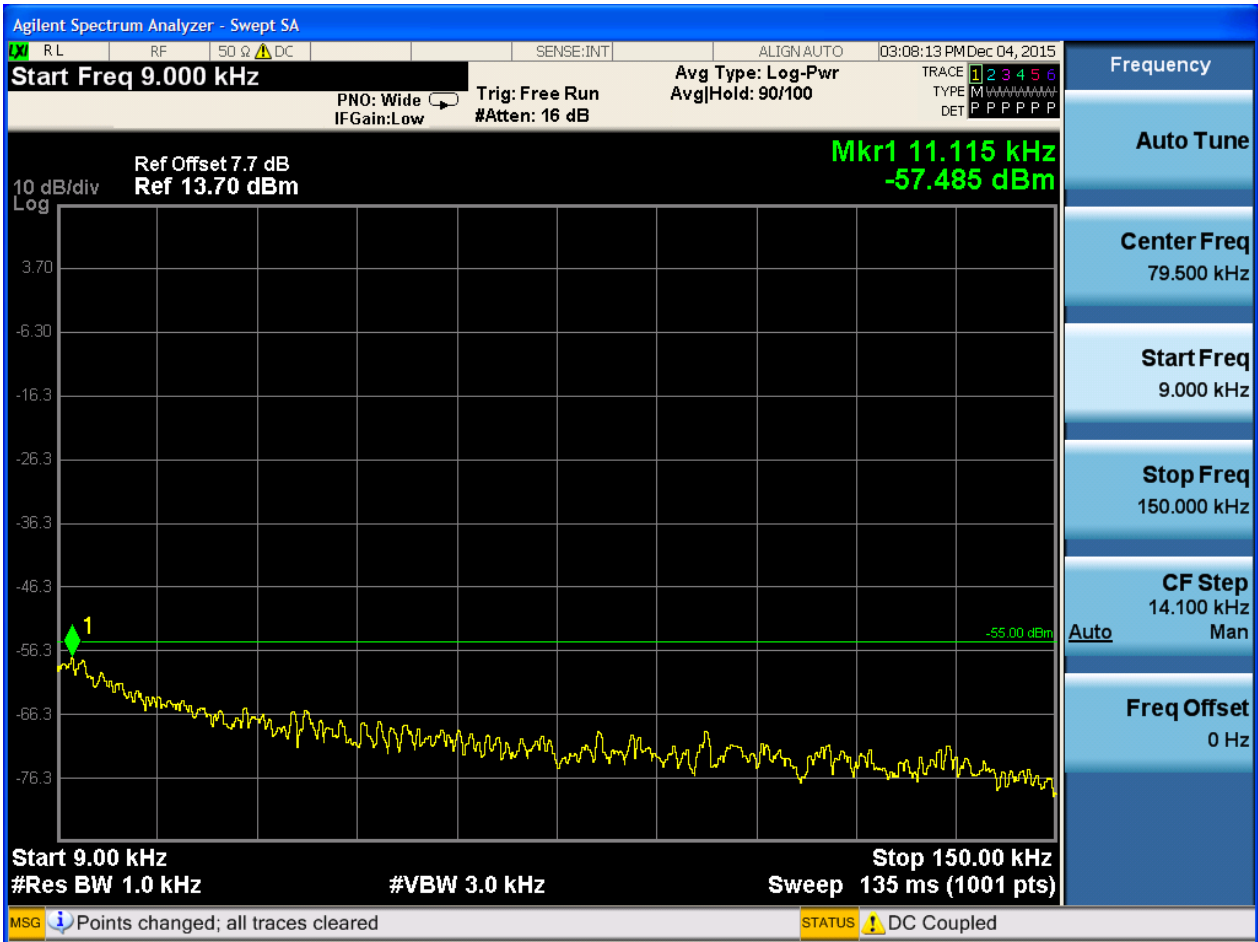


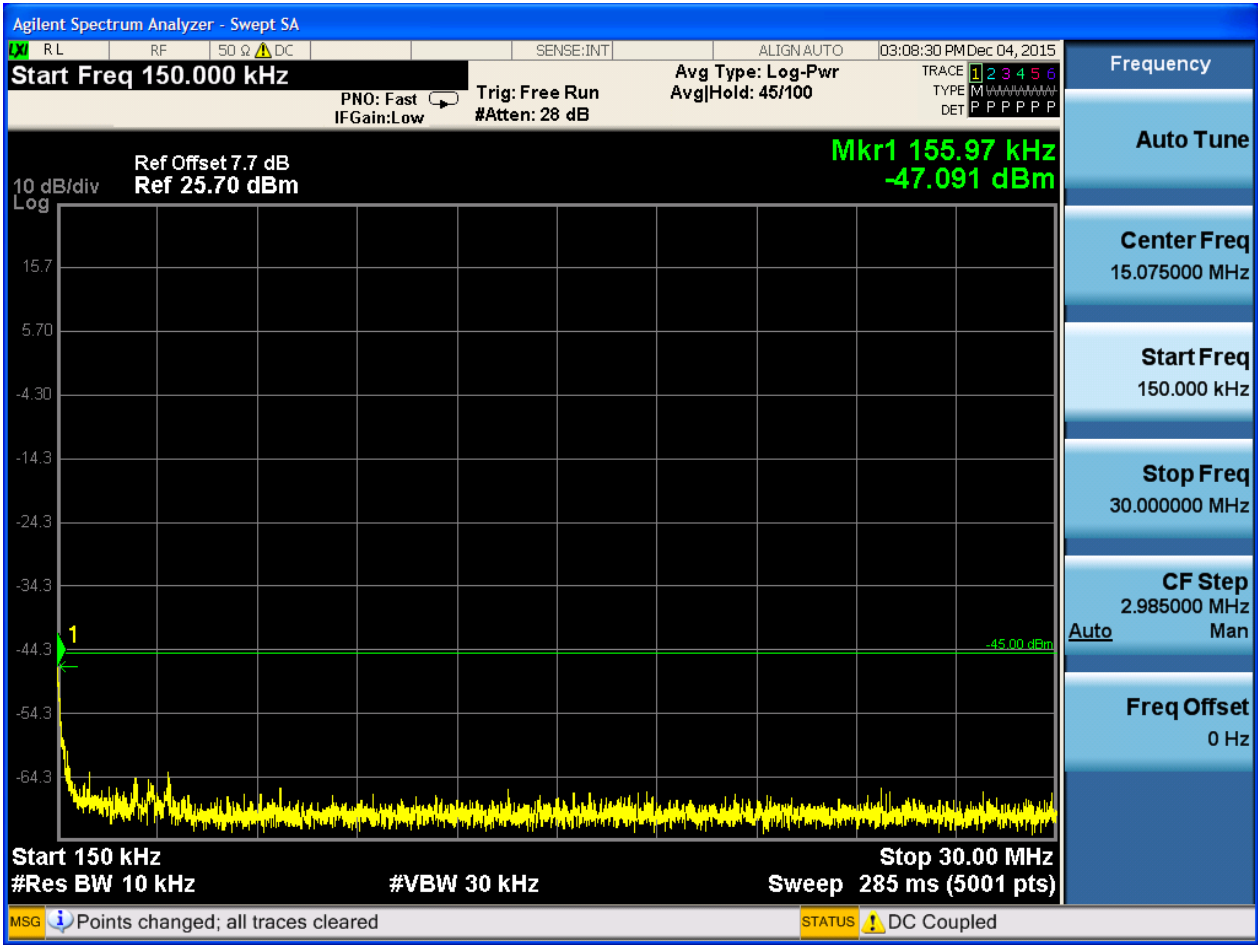


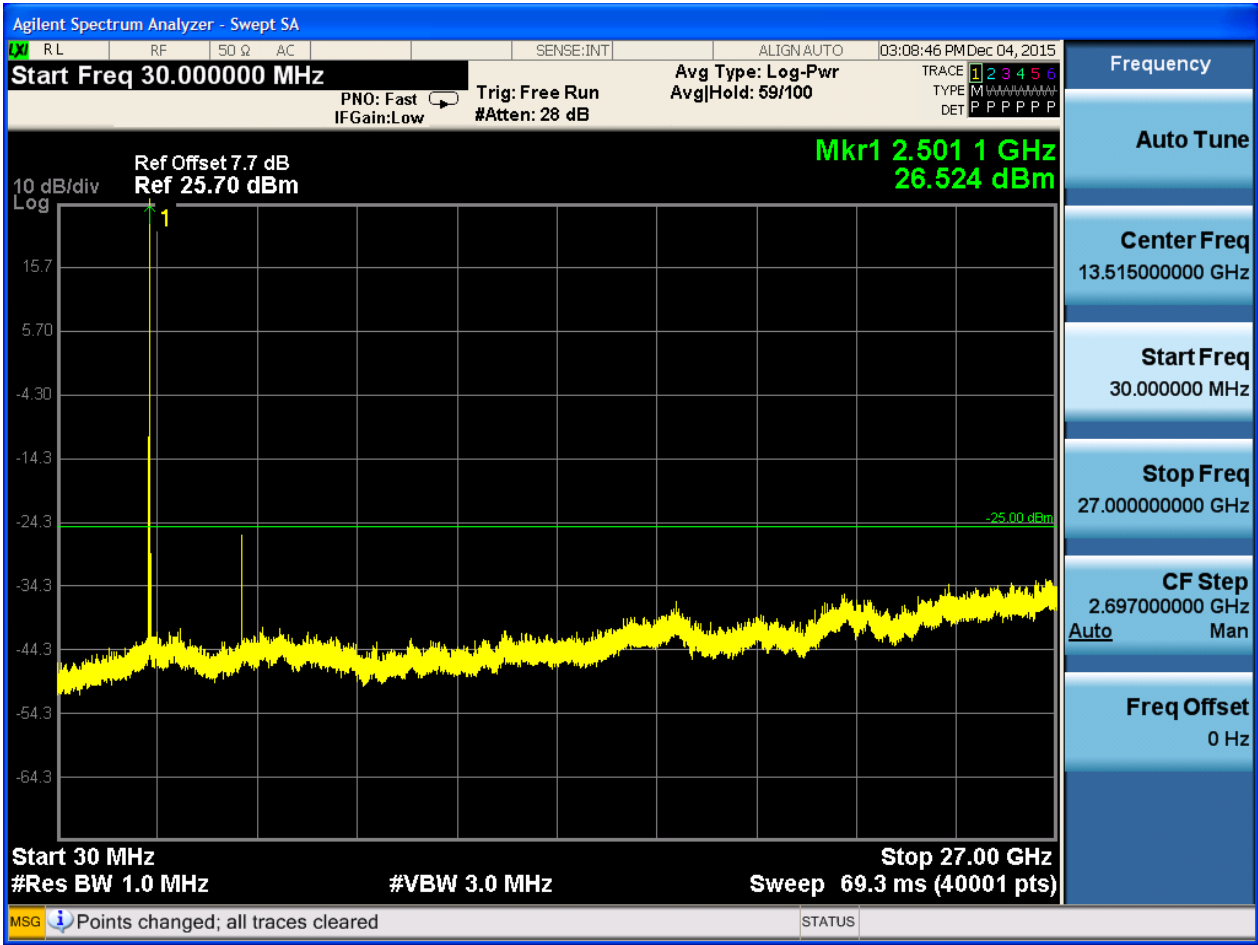
6.1.1.2.3 Test Bandwidth = 15

6.1.1.2.3.1 Test Channel = LCH

6.1.1.2.3.1.1 Test RB = RB1#0



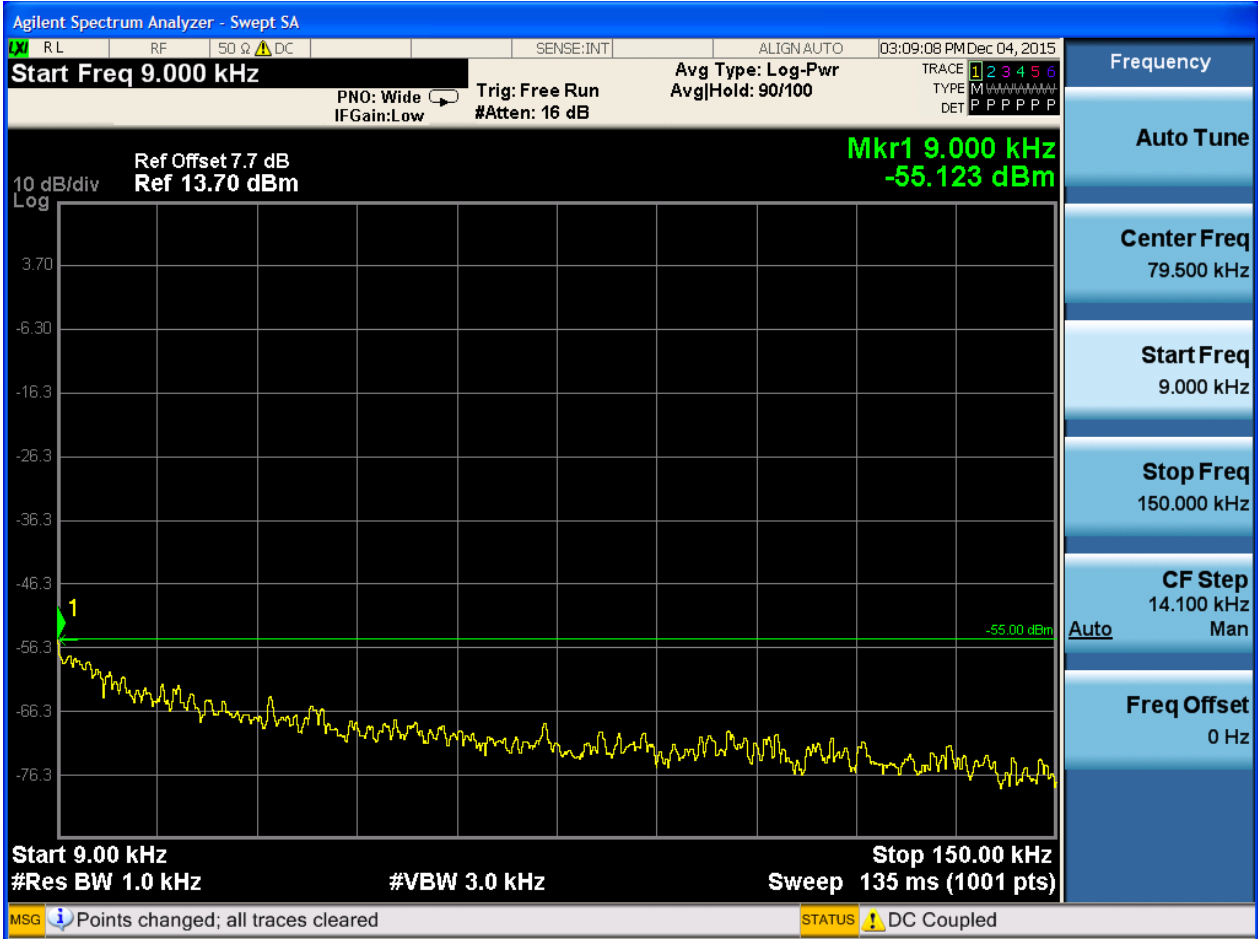


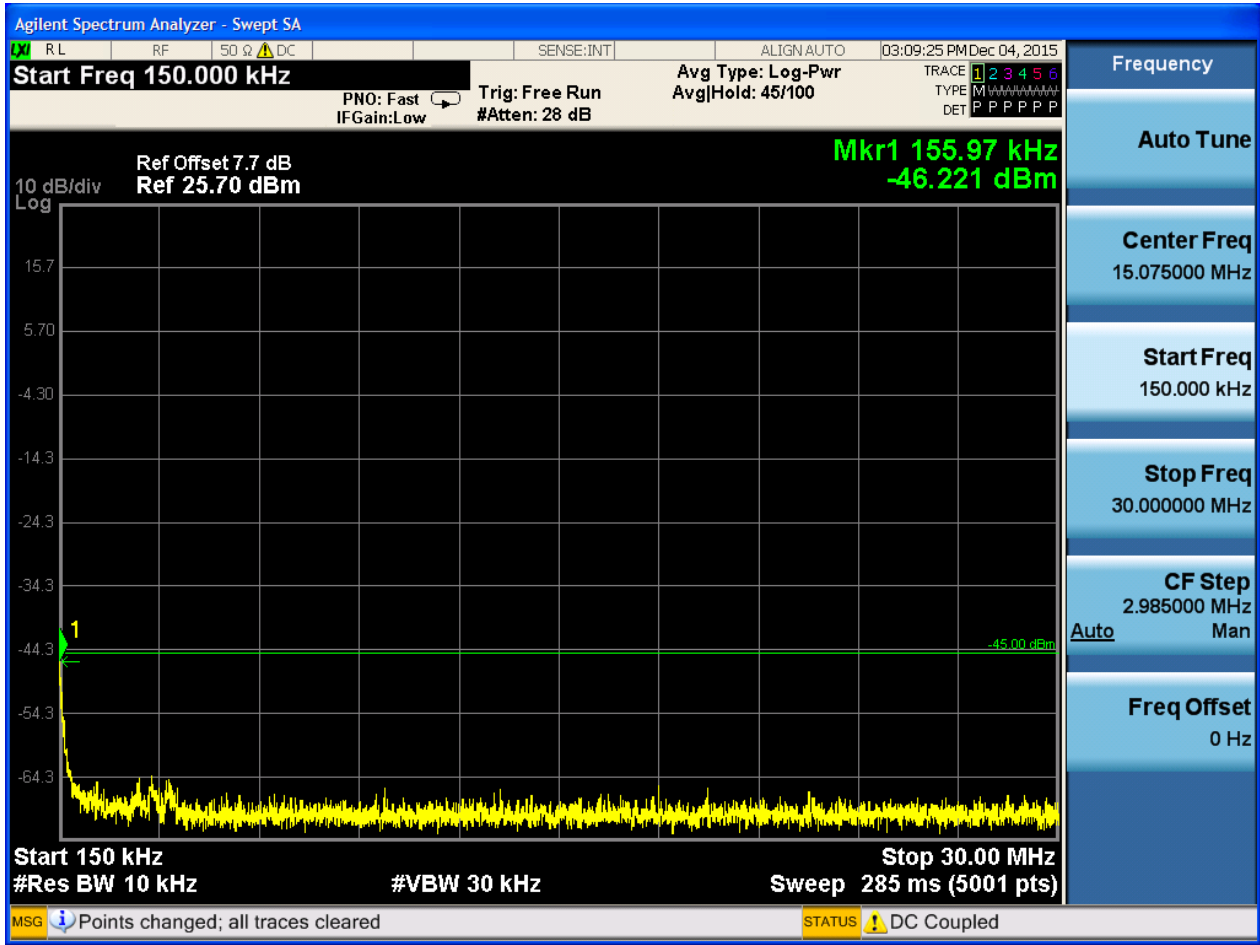


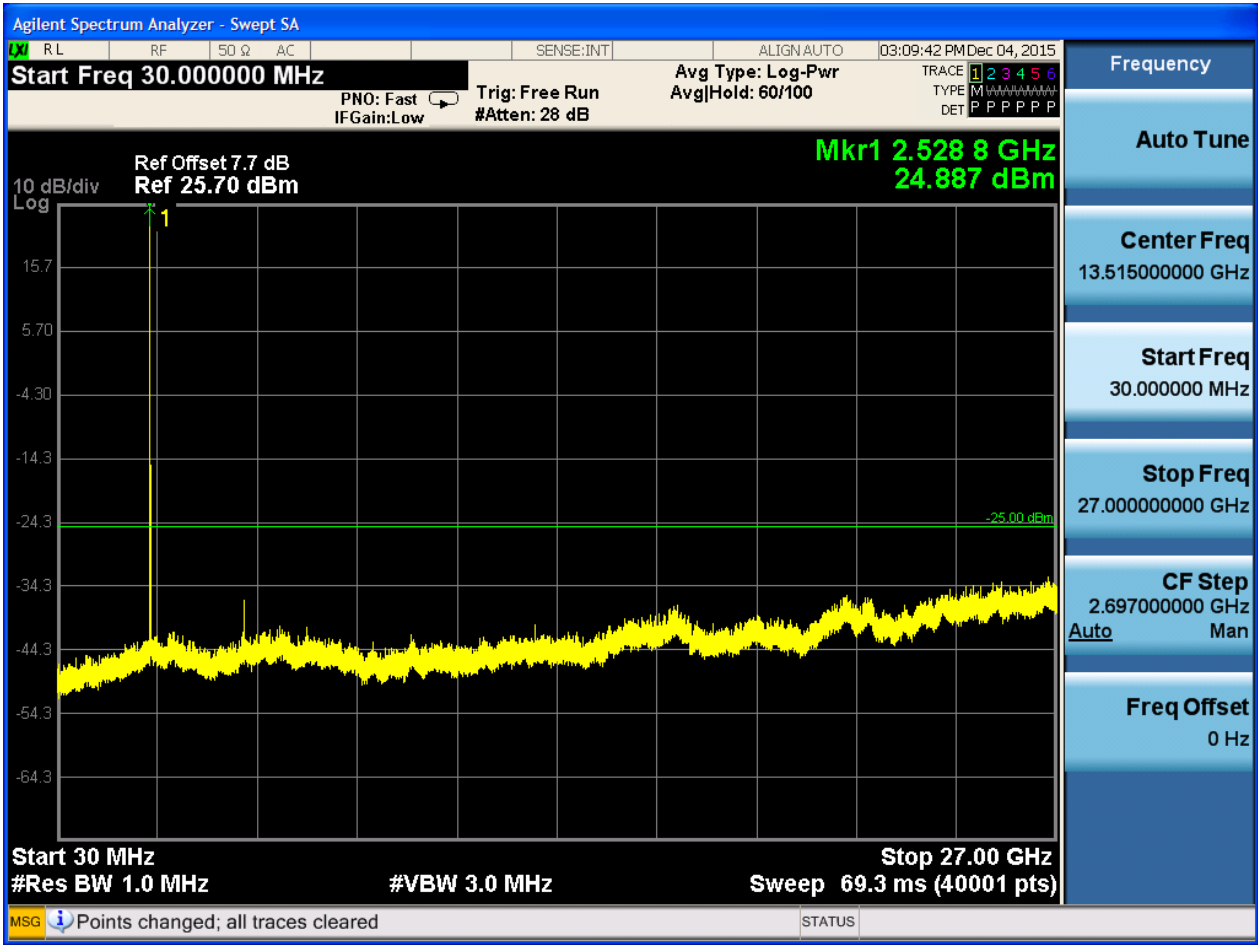


6.1.1.2.3.2 Test Channel = MCH

6.1.1.2.3.2.1 Test RB = RB1#0



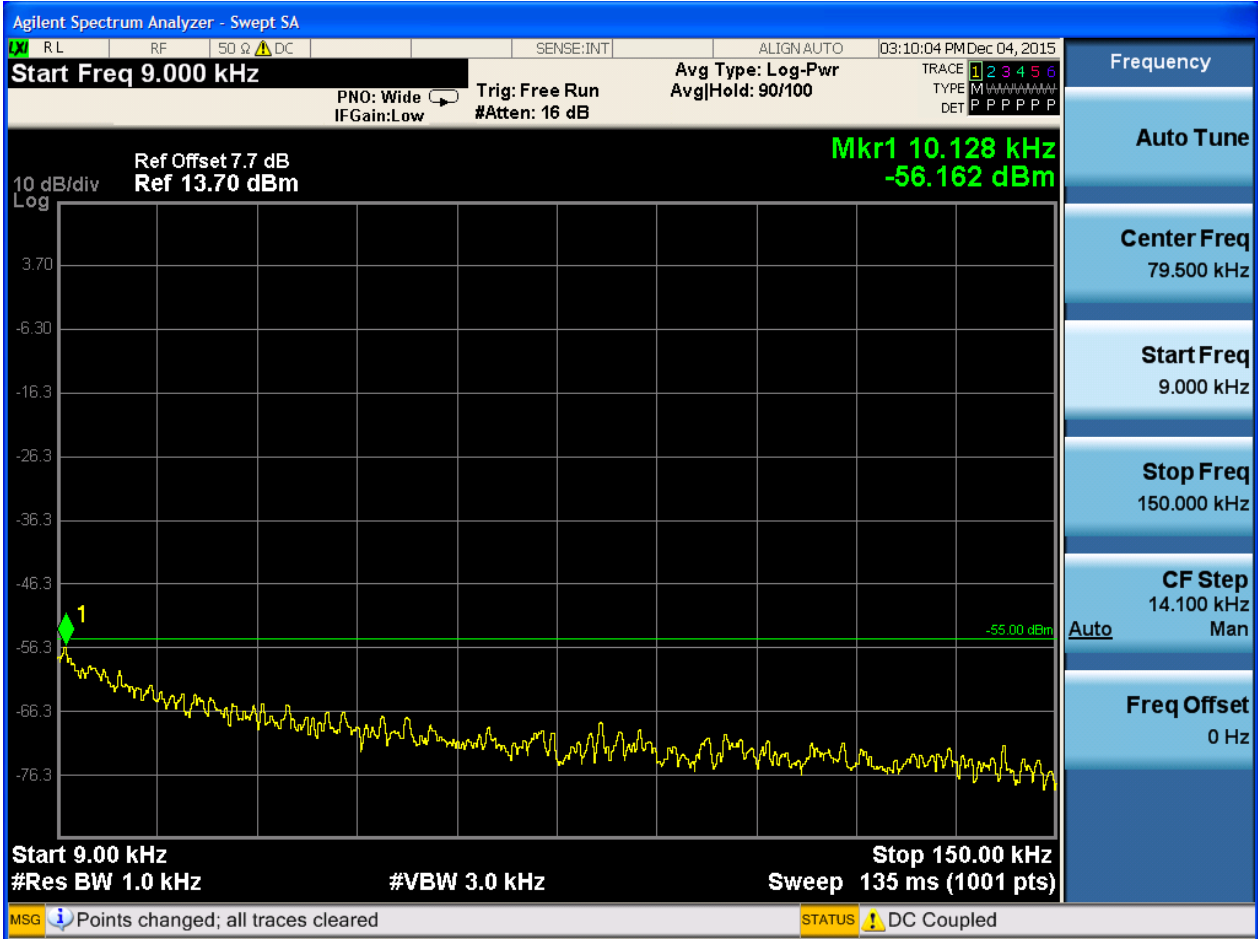


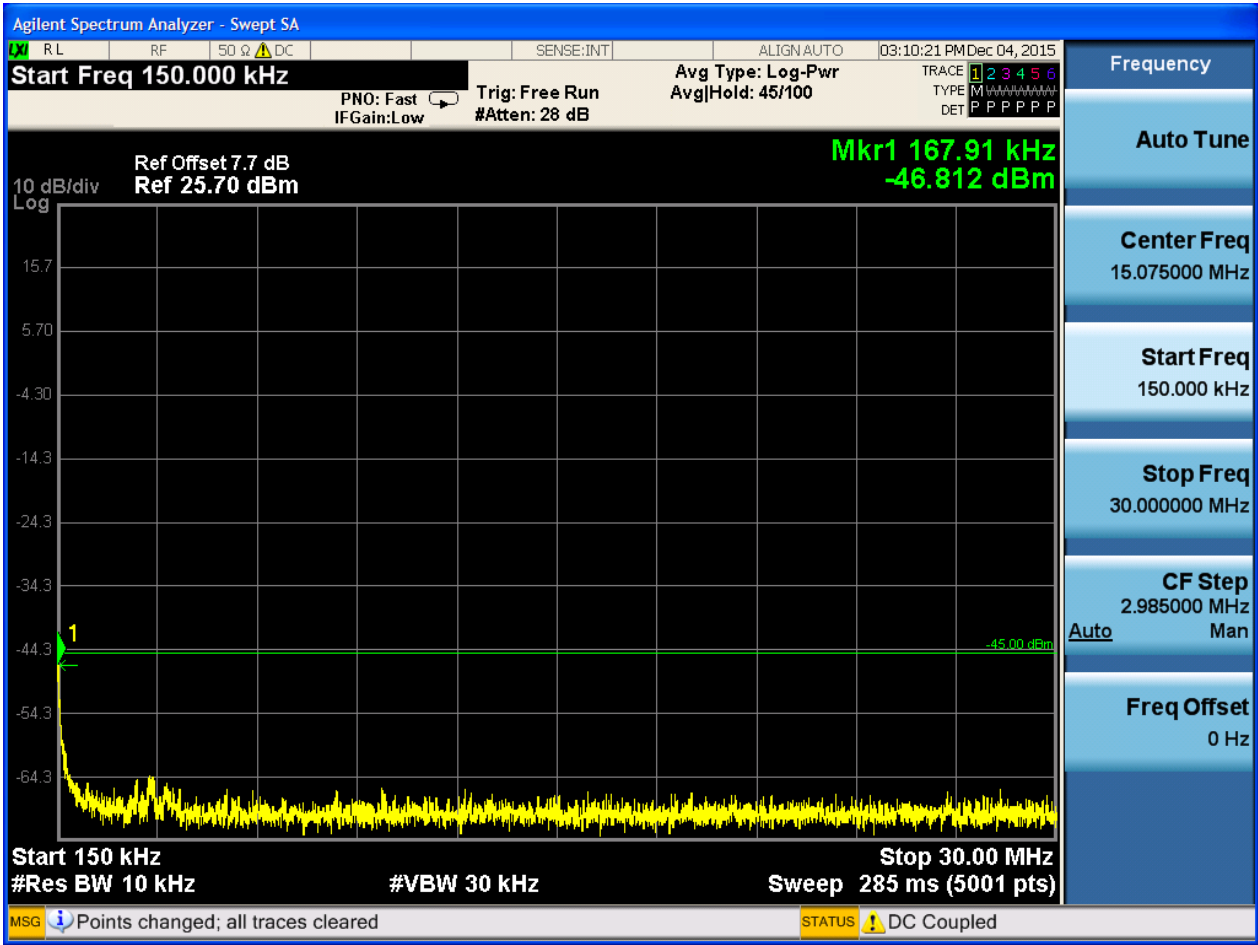


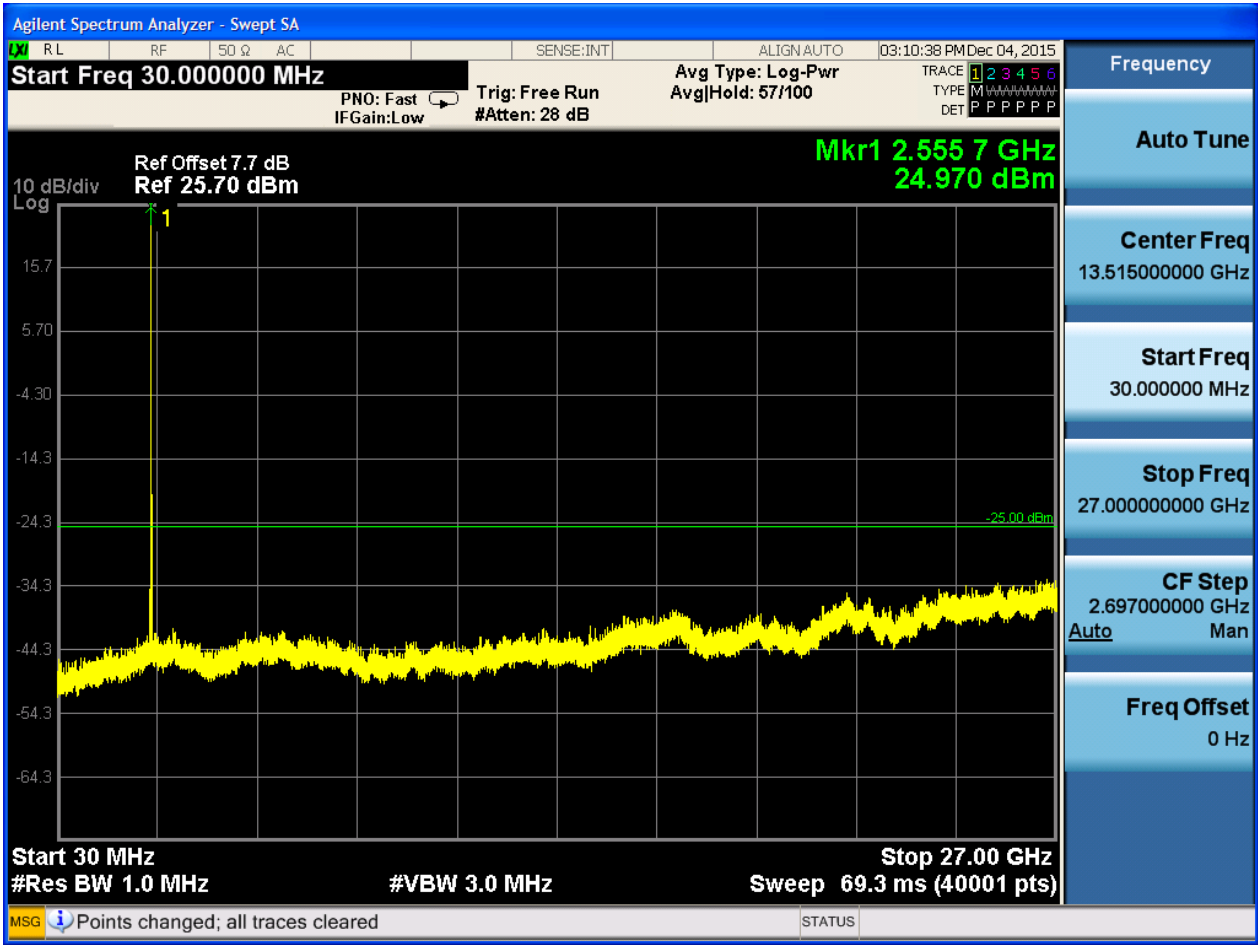


6.1.1.2.3.3 Test Channel = HCH

6.1.1.2.3.3.1 Test RB = RB1#0





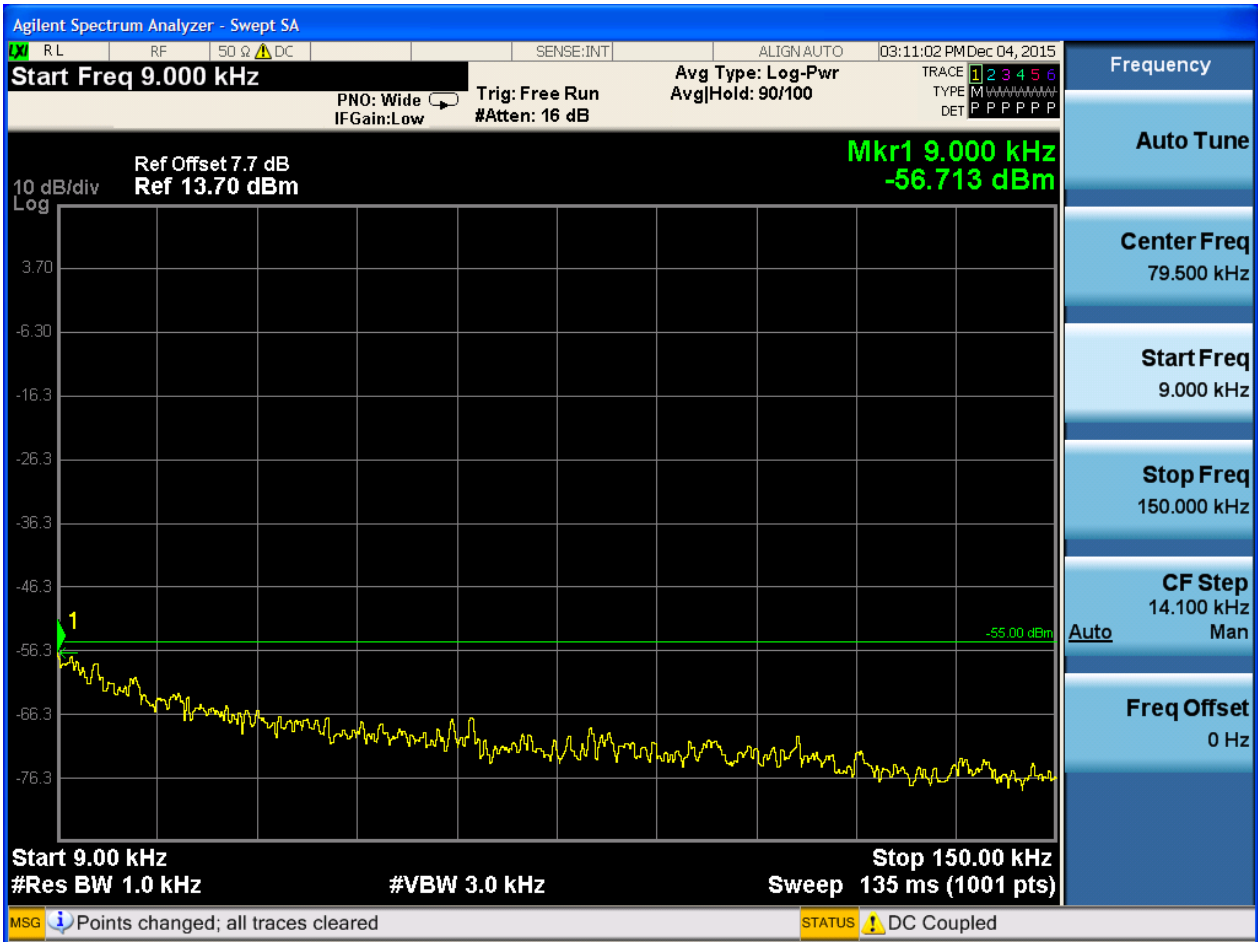


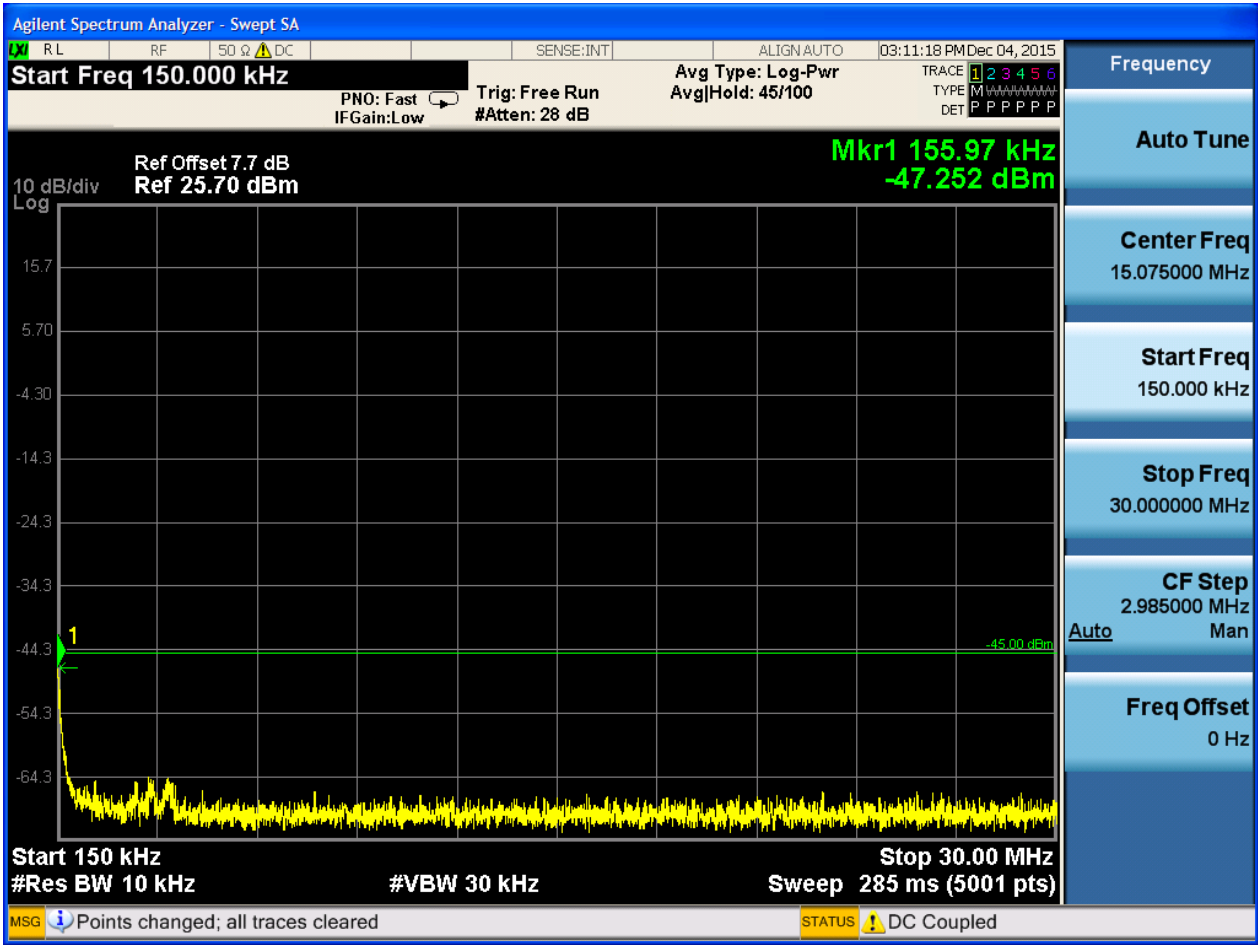


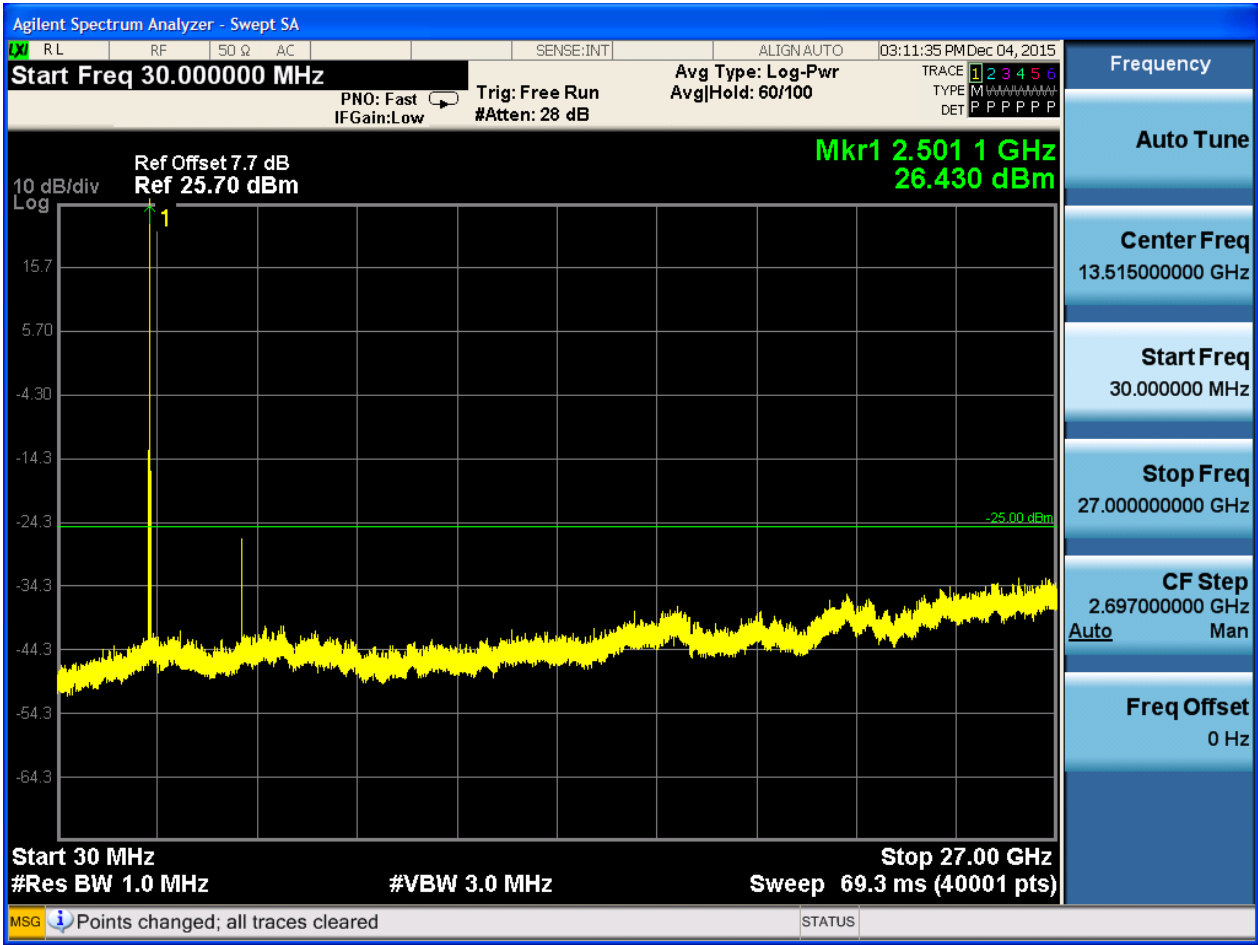
6.1.1.2.4 Test Bandwidth = 20

6.1.1.2.4.1 Test Channel = LCH

6.1.1.2.4.1.1 Test RB = RB1#0



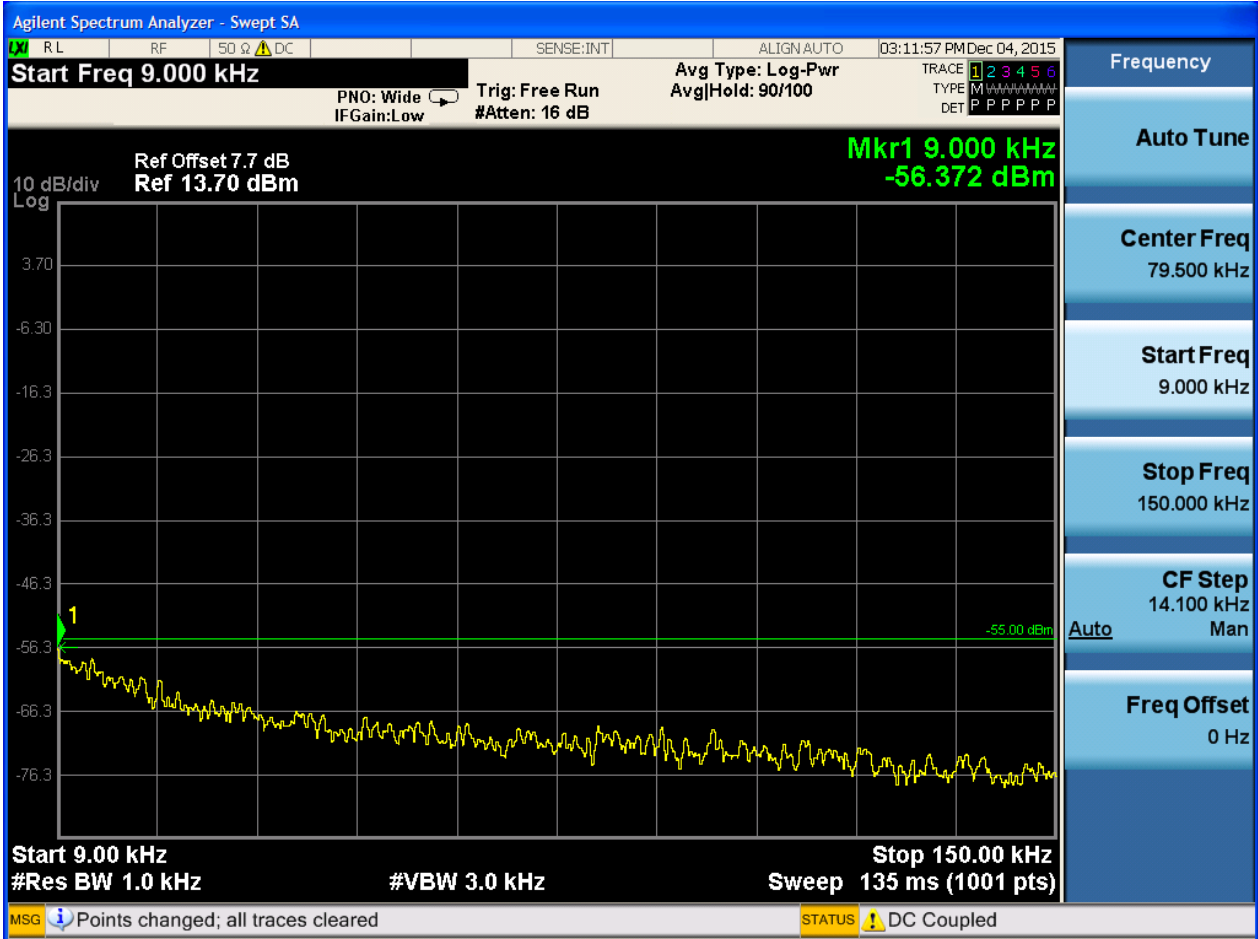


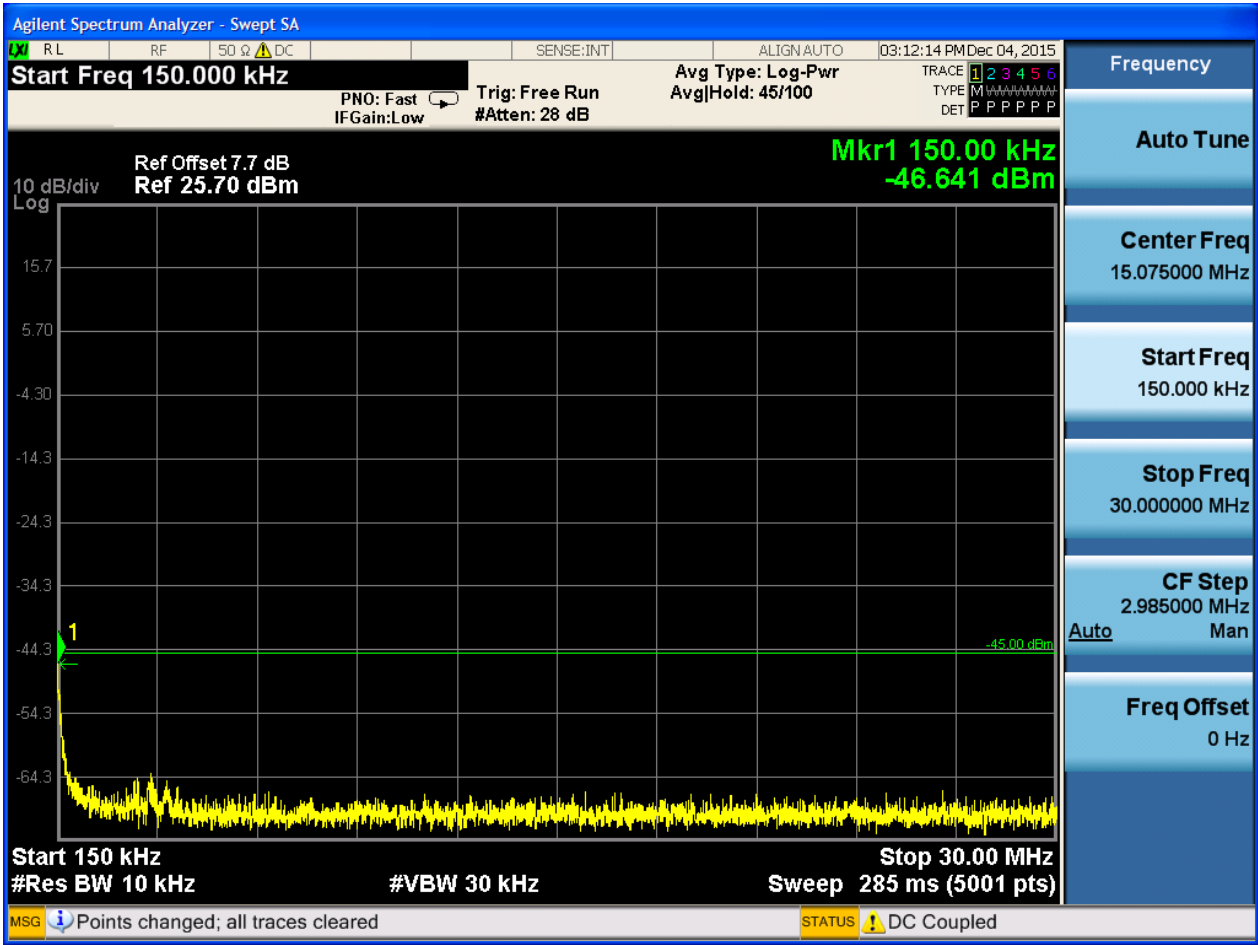


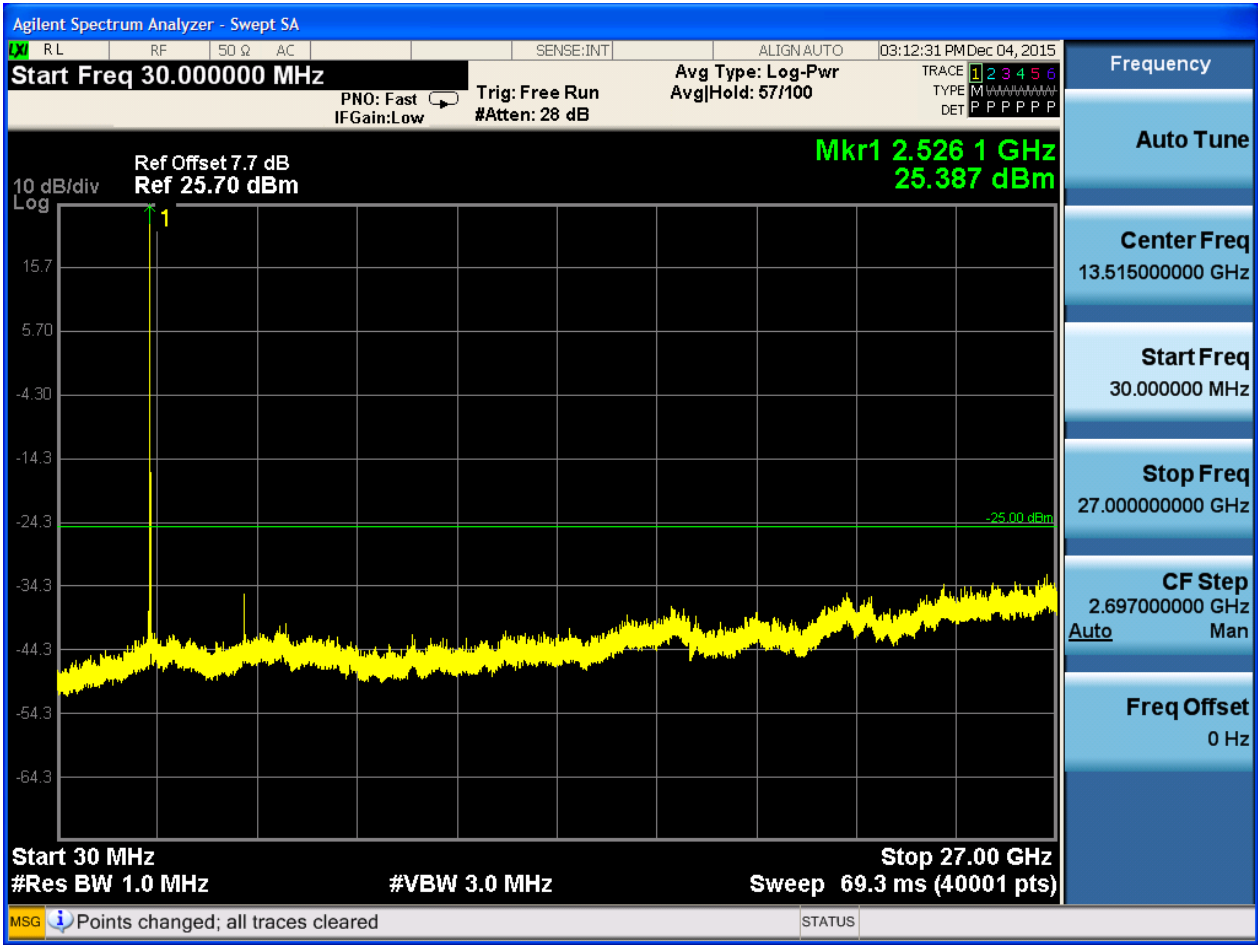


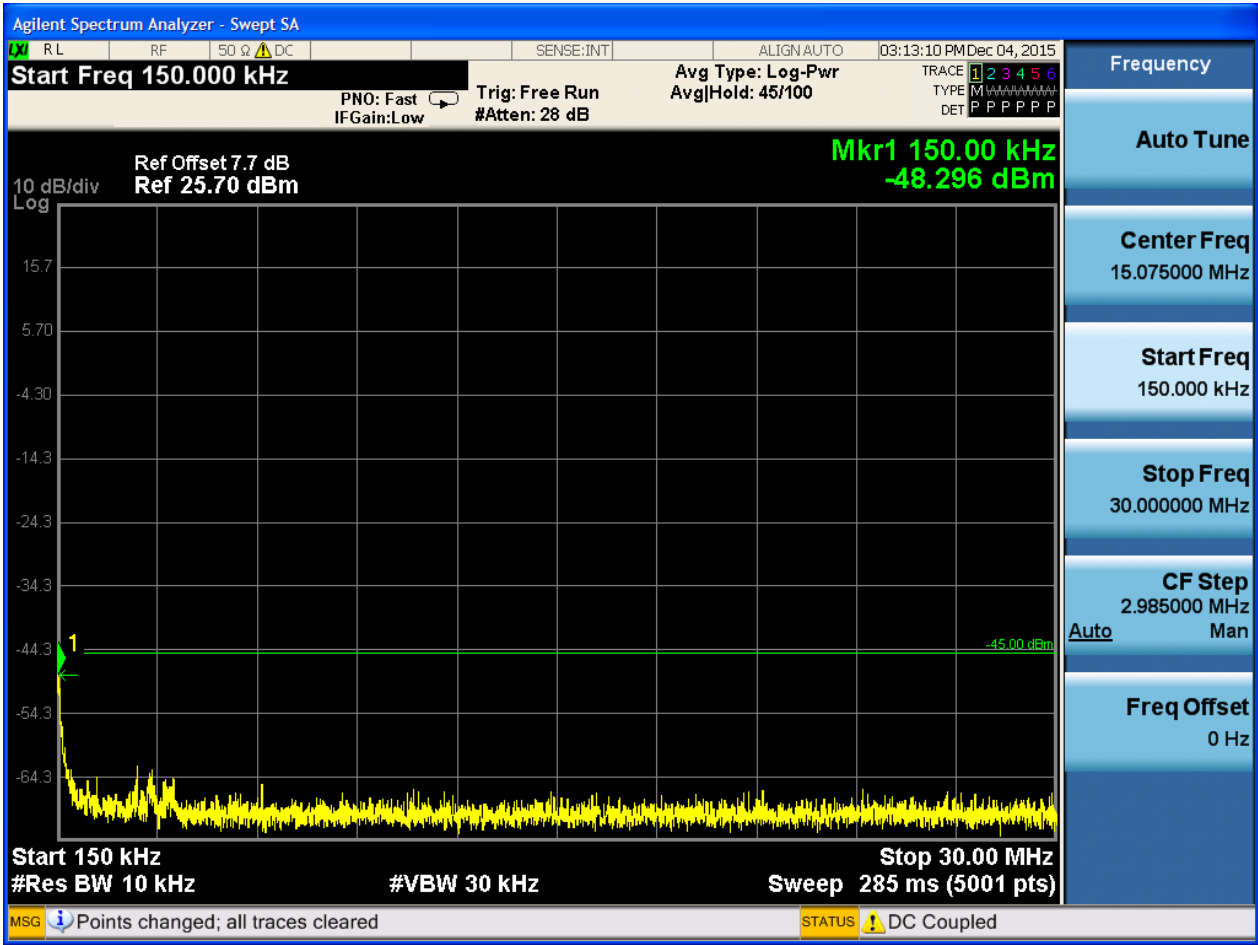
6.1.1.2.4.2 Test Channel = MCH

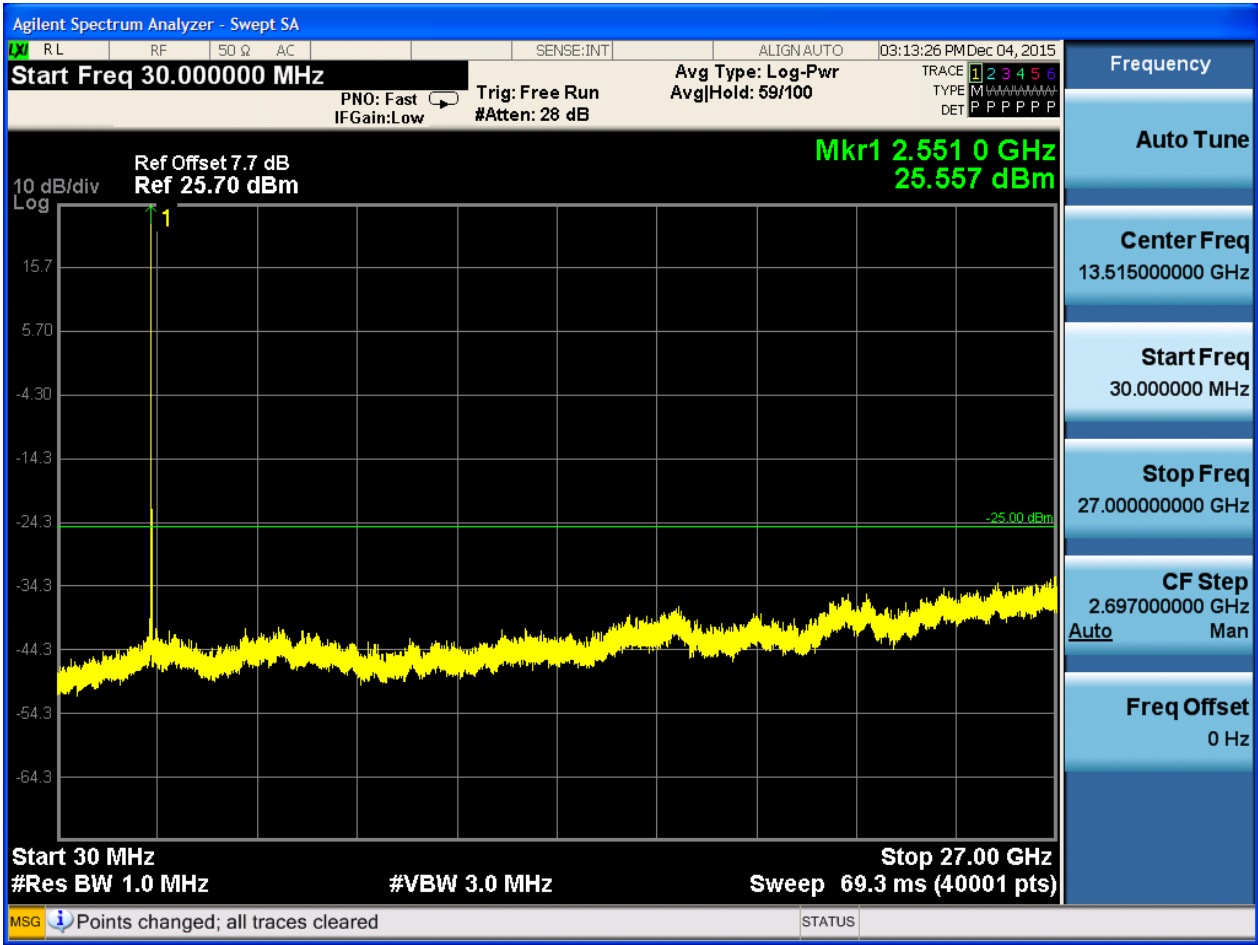
6.1.1.2.4.2.1 Test RB = RB1#0











7Appendix_G: Field Strength of Spurious Radiation

Note:

9kHz~150kHz, VBW = 200Hz, VBW = 600 Hz, Detector: PK

150kHz~30MHz, VBW = 9kHz, VBW = 30k Hz, Detector: PK

30MHz~1GHz, RBW = 100 kHz, VBW = 300 kHz. Detector: PK

Above 1GHz, RBW = 1 MHz, VBW = 3 MHz. Detector: PK

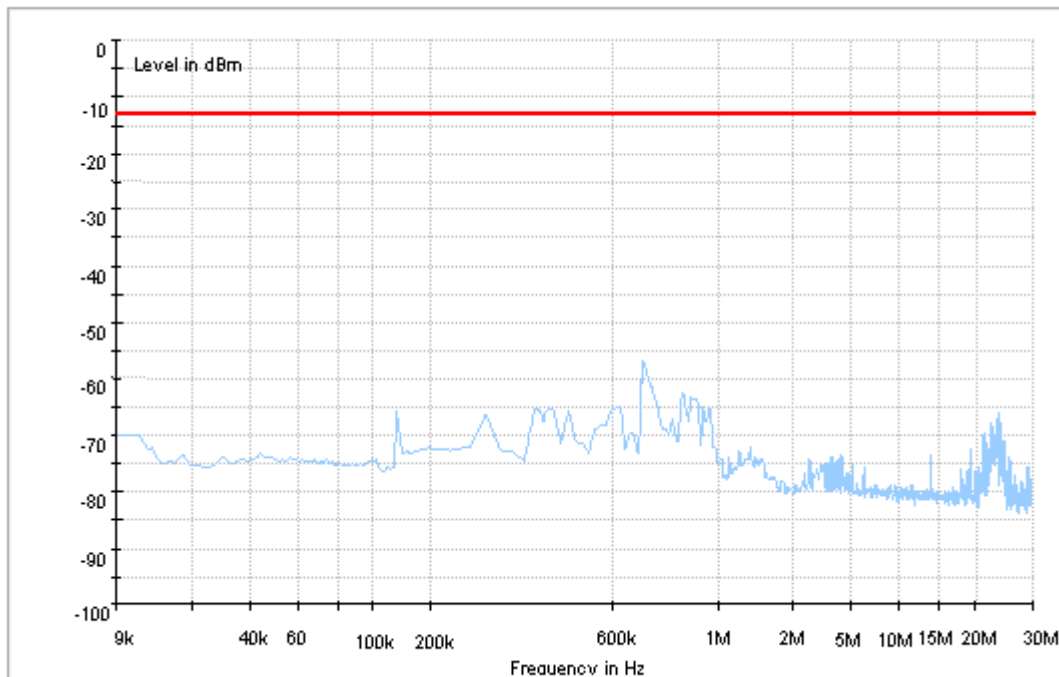
We tested all modes, but the data presented below is the worst case.

Part I - Test Plots

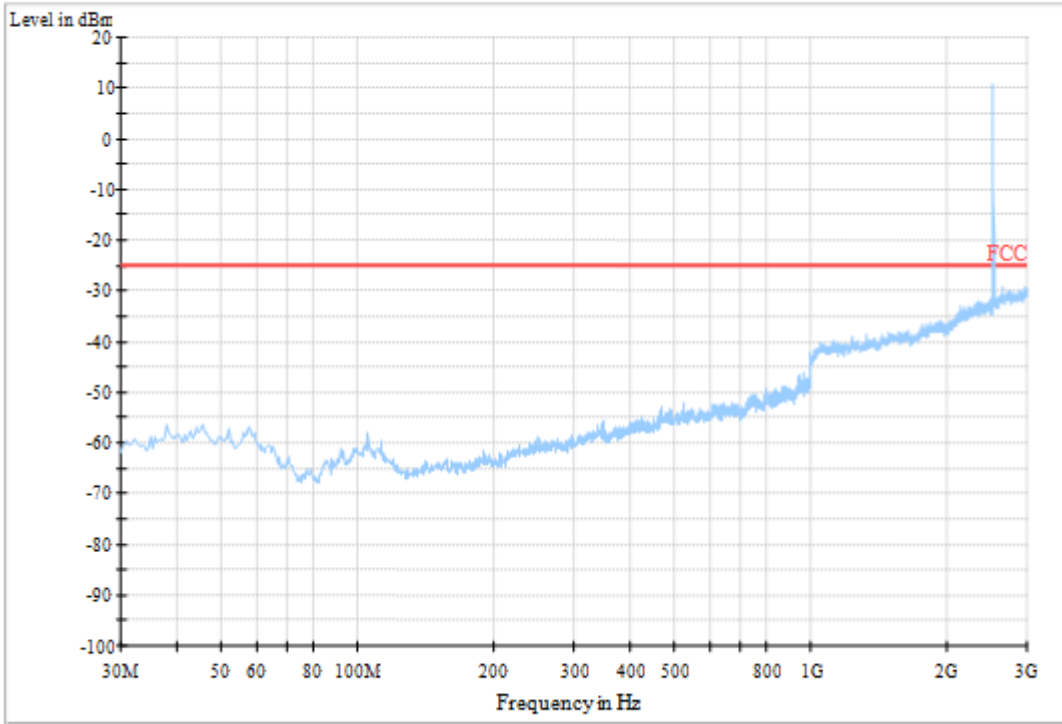
7.1 For LTE

7.1.1 Test Band = BAND7

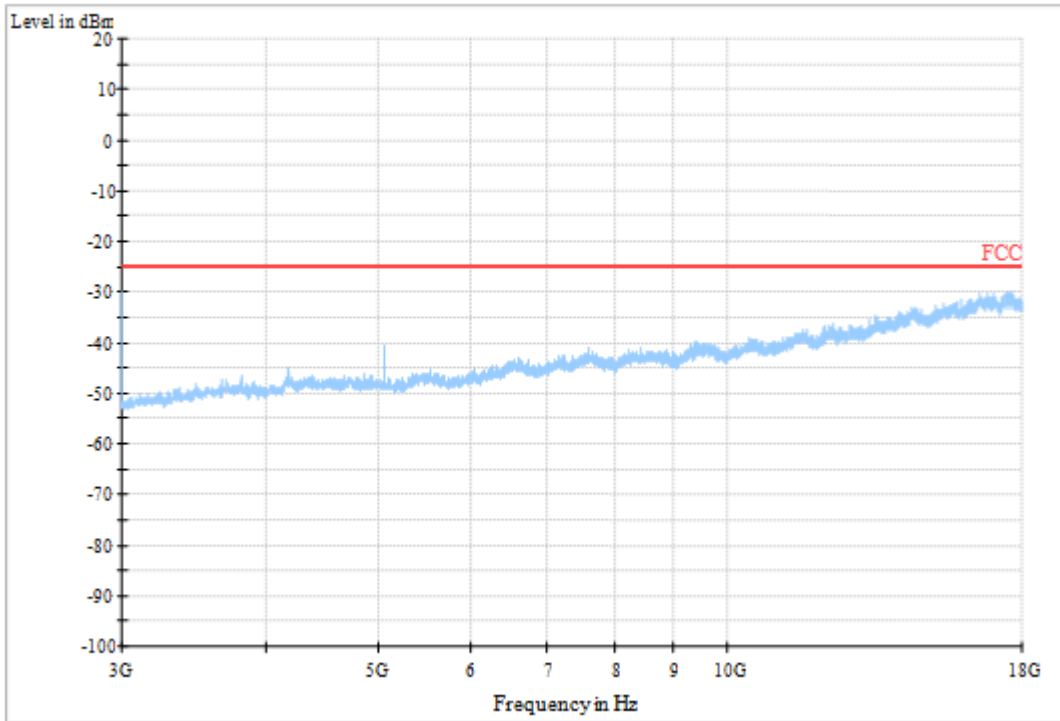
7.1.1.1 Test Bandwidth = 5

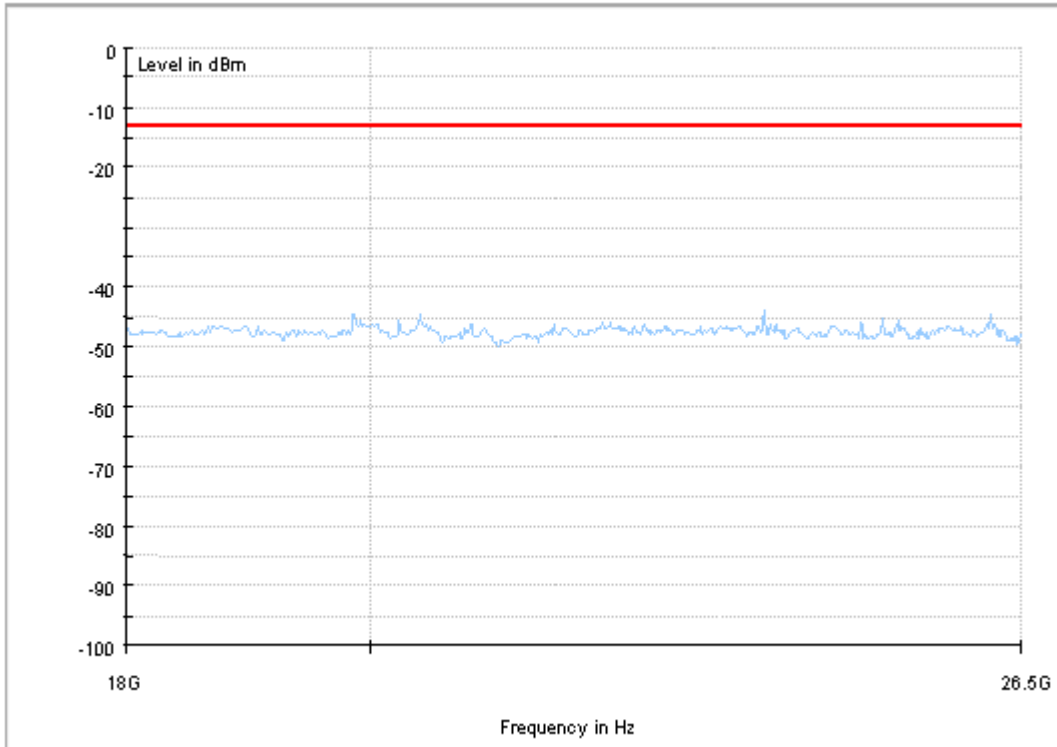


Copy of RSE-TX-DIRECTOR.ABOVE 1.5G_L

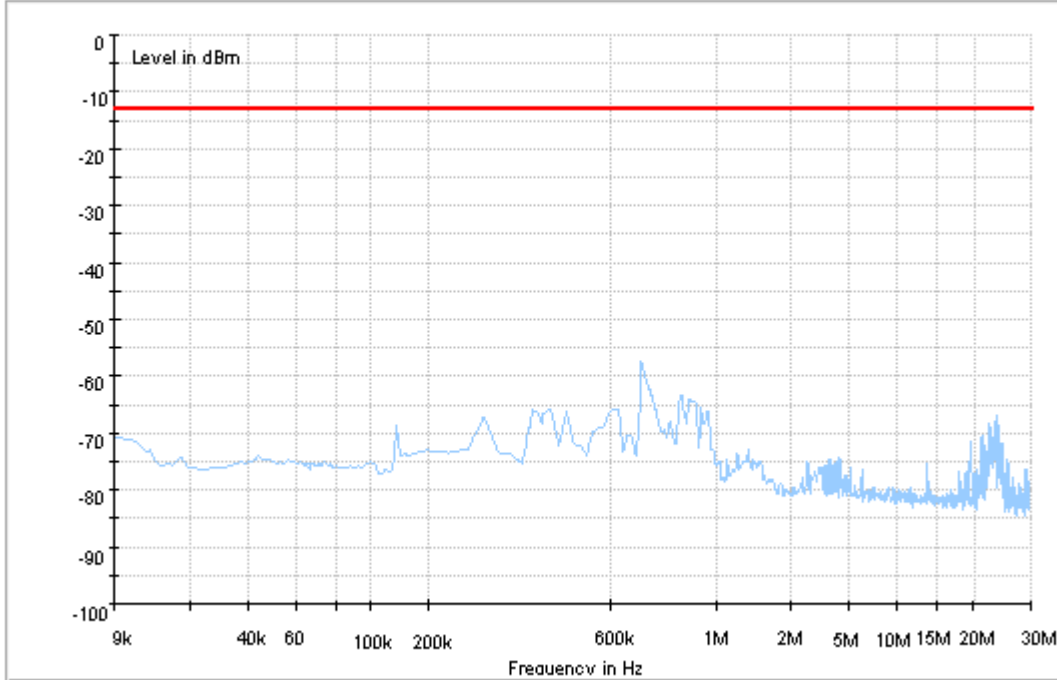


Copy of RSE-TX-DIRECTOR.ABOVE 1.5G_H

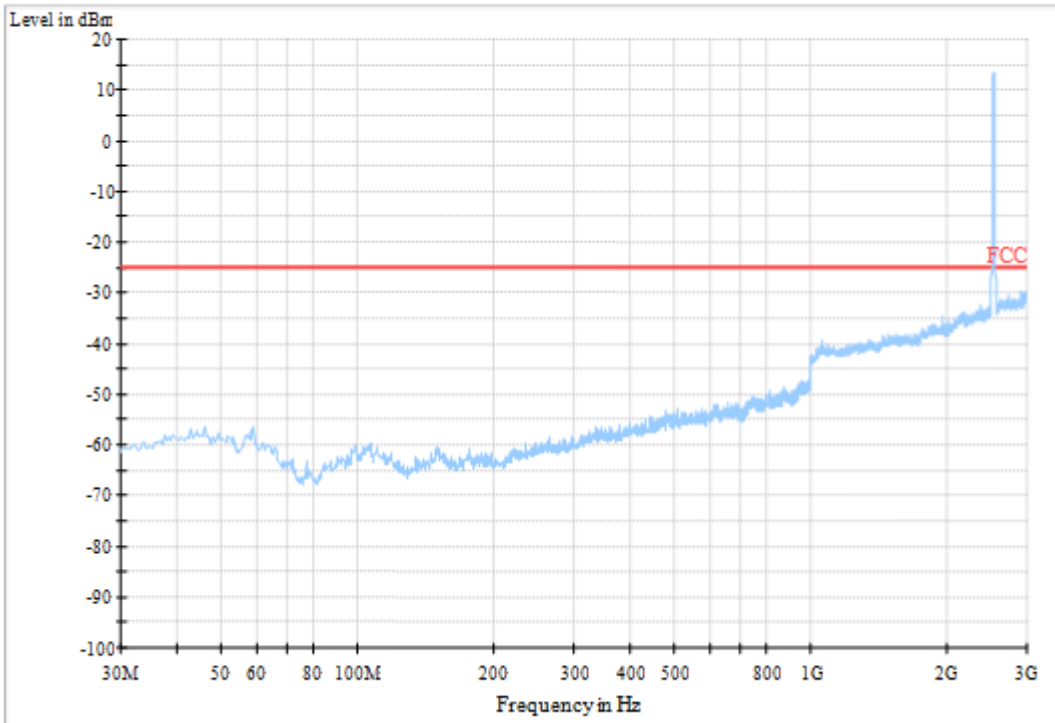




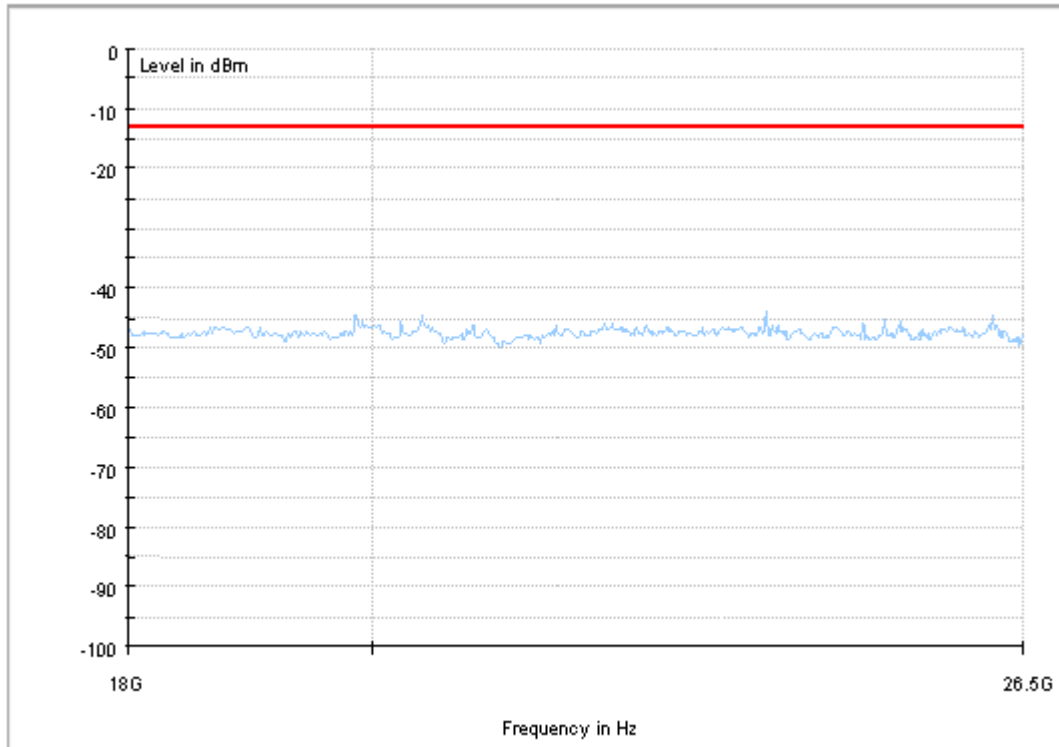
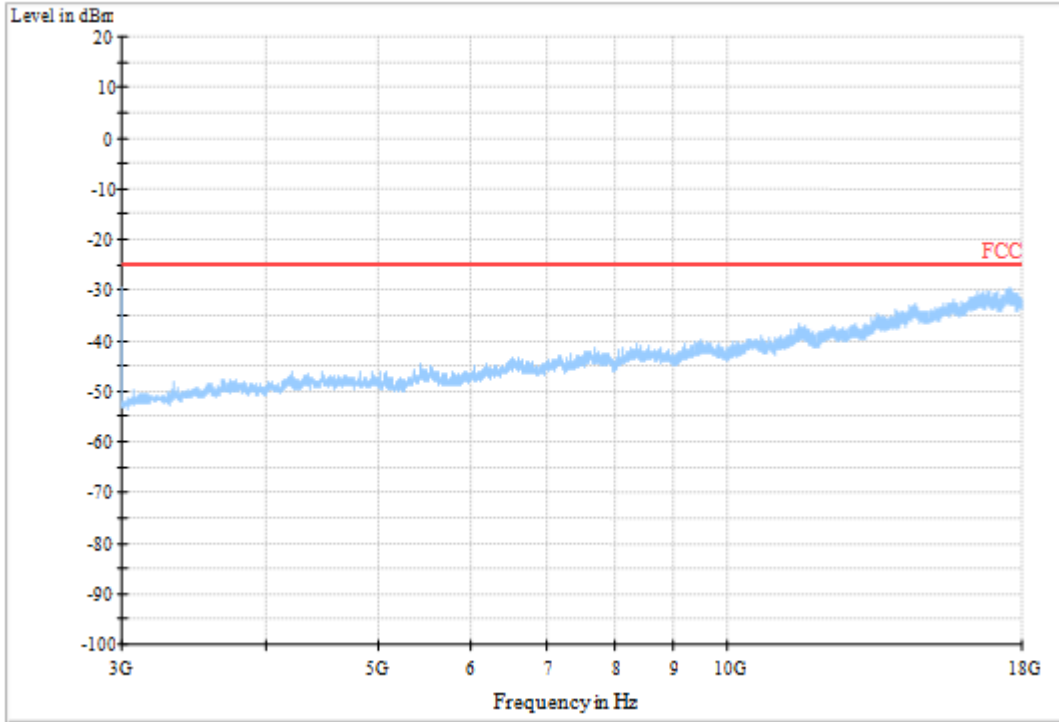
7.1.1.2 Test Bandwidth = 20



Copy of RSE-TX-DIRECTOR.ABOVE 1.5G_L



Copy of RSE-TX-DIRECTOR.ABOVE 1.5G_H



8Appendix_H: Frequency Stability

8.1 For LTE

8.1.1Frequency Error vs. Voltage:

Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Temp.	Test Volt.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict
BAND7	LTE/TM1	5	LCH	TN	VL	25.53	0.0102	PASS
					VN	-6.94	-0.00277	PASS
					VH	-13.82	-0.00552	PASS
			MCH	TN	VL	6.85	0.0027	PASS
					VN	9.06	0.00357	PASS
					VH	7.97	0.00314	PASS
			HCH	TN	VL	3.65	0.00142	PASS
					VN	5.62	0.00219	PASS
					VH	4.38	0.00171	PASS
		10	LCH	TN	VL	-1.5	-0.0006	PASS
					VN	-0.17	-0.00007	PASS
					VH	0.64	0.00026	PASS
			MCH	TN	VL	5.91	0.00233	PASS
					VN	7.14	0.00282	PASS
					VH	3.33	0.00131	PASS
			HCH	TN	VL	0.92	0.00036	PASS
					VN	2.23	0.00087	PASS
					VH	2.73	0.00106	PASS
		15	LCH	TN	VL	2.12	0.00085	PASS
					VN	8.85	0.00353	PASS
					VH	2.78	0.00111	PASS
			MCH	TN	VL	6.11	0.00241	PASS
					VN	4.11	0.00162	PASS
					VH	4.22	0.00166	PASS
HCH	TN		VL	4.56	0.00178	PASS		
			VN	6.88	0.00268	PASS		
			VH	6.05	0.00236	PASS		
20	LCH	TN	VL	5.61	0.00224	PASS		



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Temp.	Test Volt.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict				
					VN	9.97	0.00397	PASS				
					VH	5.49	0.00219	PASS				
					MCH	TN	VL	2.86	0.00113	PASS		
							VN	1.32	0.00052	PASS		
					VH	2.12	0.00084	PASS				
					HCH	TN	VL	-1.32	-0.00052	PASS		
			VN	-1.19			-0.00046	PASS				
			VH	-1.13	-0.00044	PASS						
			LTE/TM2	5	LCH	TN	VL	15.59	0.00623	PASS		
							VN	5.95	0.00238	PASS		
							VH	8.33	0.00333	PASS		
							MCH	TN	VL	11.53	0.00455	PASS
									VN	11	0.00434	PASS
							VH	5.48	0.00216	PASS		
	HCH	TN			VL	6.85	0.00267	PASS				
					VN	5.91	0.0023	PASS				
	VH	4.51			0.00176	PASS						
	10	LCH			TN	VL	5.39	0.00215	PASS			
						VN	3.39	0.00135	PASS			
						VH	1.9	0.00076	PASS			
		MCH			TN	VL	3.56	0.0014	PASS			
						VN	5.16	0.00204	PASS			
						VH	2.5	0.00099	PASS			
	HCH	TN			VL	1.44	0.00056	PASS				
					VN	4.68	0.00182	PASS				
					VH	4.12	0.00161	PASS				
	15	LCH	TN	VL	6.05	0.00241	PASS					
				VN	2.53	0.00101	PASS					
				VH	-1.72	-0.00069	PASS					
		MCH	TN	VL	8.65	0.00341	PASS					
				VN	2.8	0.0011	PASS					
				VH	4.69	0.00185	PASS					
		HCH	TN	VL	2.65	0.00103	PASS					
				VN	3.32	0.0013	PASS					
				VH	3.28	0.00128	PASS					
	20	LCH	TN	VL	12.53	0.00499	PASS					
				VN	6.34	0.00253	PASS					
				VH	0.62	0.00025	PASS					
		MCH	TN	VL	6.49	0.00256	PASS					



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Temp.	Test Volt.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict
					VN	5.19	0.00205	PASS
					VH	3.85	0.00152	PASS
			HCH	TN	VL	-1.06	-0.00041	PASS
					VN	-1.33	-0.00052	PASS
					VH	-1.32	-0.00052	PASS

8.1.2 Frequency Error vs. Temperature:

Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Volt.	Test Temp.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict
BAND7	LTE/TM1	5	LCH	VN	-30	20.41	0.00816	PASS
					-20	-0.97	-0.00039	PASS
					-10	18.97	0.00758	PASS
					0	-15.39	-0.00615	PASS
					10	-5.08	-0.00203	PASS
					20	3.55	0.00142	PASS
					30	11.12	0.00444	PASS
					40	-4.59	-0.00183	PASS
			50	6.67	0.00267	PASS		
			MCH	VN	-30	8.64	0.00341	PASS
					-20	5.78	0.00228	PASS
					-10	5.79	0.00228	PASS
					0	4.38	0.00173	PASS
					10	5.04	0.00199	PASS
					20	3.98	0.00157	PASS
					30	3.4	0.00134	PASS
					40	3.78	0.00149	PASS
			50	3.16	0.00125	PASS		
			HCH	VN	-30	2.66	0.00104	PASS
					-20	4.31	0.00168	PASS
					-10	1.56	0.00061	PASS
					0	0.49	0.00019	PASS
					10	3.23	0.00126	PASS
					20	2.2	0.00086	PASS
		30			1.96	0.00076	PASS	
		40			1.52	0.00059	PASS	
		50	2.76	0.00107	PASS			
10	LCH	VN	-30	-0.14	-0.00006	PASS		



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Volt.	Test Temp.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict	
					-20	5.82	0.00232	PASS	
					-10	5.64	0.00225	PASS	
					0	3.55	0.00142	PASS	
					10	4.35	0.00174	PASS	
					20	3.71	0.00148	PASS	
					30	4.62	0.00184	PASS	
					40	6.27	0.0025	PASS	
					50	6.85	0.00273	PASS	
			MCH	VN	-30	3.38	0.00133	PASS	
					-20	1.93	0.00076	PASS	
					-10	7.3	0.00288	PASS	
					0	2.96	0.00117	PASS	
					10	1.46	0.00058	PASS	
					20	1.72	0.00068	PASS	
					30	2.32	0.00092	PASS	
					40	3.49	0.00138	PASS	
			HCH	VN	-30	3.39	0.00132	PASS	
					-20	3.09	0.0012	PASS	
					-10	2.95	0.00115	PASS	
					0	2.78	0.00108	PASS	
					10	1.44	0.00056	PASS	
					20	1.57	0.00061	PASS	
					30	3.23	0.00126	PASS	
					40	4.55	0.00177	PASS	
			15	LCH	VN	-30	3.79	0.00151	PASS
						-20	-1.16	-0.00046	PASS
						-10	11.62	0.00463	PASS
						0	3.25	0.0013	PASS
		10				18.68	0.00745	PASS	
		20				18.01	0.00718	PASS	
		30				11.99	0.00478	PASS	
		40				8.61	0.00343	PASS	
		50		6.74	0.00269	PASS			
		MCH		VN	-30	6.34	0.0025	PASS	
					-20	7.68	0.00303	PASS	
					-10	2.56	0.00101	PASS	
			0		3.36	0.00133	PASS		



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Volt.	Test Temp.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict	
					10	2.95	0.00116	PASS	
					20	2.78	0.0011	PASS	
					30	0.92	0.00036	PASS	
					40	5.05	0.00199	PASS	
					50	1.32	0.00052	PASS	
			HCH	VN	-30	2.92	0.00114	PASS	
					-20	4.26	0.00166	PASS	
					-10	3.38	0.00132	PASS	
					0	3.99	0.00156	PASS	
					10	4.35	0.0017	PASS	
					20	3.6	0.0014	PASS	
					30	3.81	0.00149	PASS	
					40	2.96	0.00116	PASS	
					50	1.66	0.00065	PASS	
			20	LCH	VN	-30	7.68	0.00306	PASS
						-20	-3.38	-0.00135	PASS
						-10	-2.66	-0.00106	PASS
						0	3.13	0.00125	PASS
		10				1.47	0.00059	PASS	
		20				10.17	0.00405	PASS	
		30				24.3	0.00968	PASS	
		40				13.48	0.00537	PASS	
		50				12.82	0.00511	PASS	
		MCH		VN	-30	3.32	0.00131	PASS	
					-20	2.22	0.00088	PASS	
					-10	2.52	0.00099	PASS	
					0	3.45	0.00136	PASS	
					10	4.19	0.00165	PASS	
					20	3.3	0.0013	PASS	
					30	1.57	0.00062	PASS	
					40	3.25	0.00128	PASS	
					50	1.22	0.00048	PASS	
		HCH	VN	-30	1.57	0.00061	PASS		
				-20	1.62	0.00063	PASS		
				-10	2.25	0.00088	PASS		
				0	1.95	0.00076	PASS		
10	2.09			0.00082	PASS				
20	2.66			0.00104	PASS				
30	2.02			0.00079	PASS				



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Volt.	Test Temp.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict
	LTE/TM2	5	LCH	VN	40	0.86	0.00034	PASS
					50	2.26	0.00088	PASS
					-30	0.66	0.00026	PASS
					-20	12.85	0.00513	PASS
					-10	-0.29	-0.00012	PASS
					0	0.21	0.00008	PASS
					10	10.29	0.00411	PASS
					20	14.1	0.00563	PASS
					30	-6.18	-0.00247	PASS
			40	2.4	0.00096	PASS		
			50	14.48	0.00579	PASS		
			MCH	VN	-30	9.81	0.00387	PASS
					-20	9.34	0.00368	PASS
					-10	9.41	0.00371	PASS
					0	7.05	0.00278	PASS
					10	6.07	0.00239	PASS
					20	5.34	0.00211	PASS
					30	4.84	0.00191	PASS
		40			4.45	0.00176	PASS	
		50			4.19	0.00165	PASS	
		HCH	VN	-30	4.72	0.00184	PASS	
				-20	4.49	0.00175	PASS	
				-10	1.03	0.0004	PASS	
				0	-0.86	-0.00033	PASS	
				10	-1.9	-0.00074	PASS	
				20	0.53	0.00021	PASS	
				30	2.3	0.0009	PASS	
				40	-2.02	-0.00079	PASS	
				50	0.37	0.00014	PASS	
		10	LCH	VN	-30	4.96	0.00198	PASS
					-20	9.43	0.00376	PASS
					-10	6.77	0.0027	PASS
					0	7.34	0.00293	PASS
					10	5.69	0.00227	PASS
					20	7.37	0.00294	PASS
					30	5.74	0.00229	PASS
40	4.18				0.00167	PASS		
50	3.99				0.00159	PASS		
MCH	VN		-30	3.68	0.00145	PASS		



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Volt.	Test Temp.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict		
					-20	4.59	0.00181	PASS		
					-10	2.95	0.00116	PASS		
					0	4.29	0.00169	PASS		
					10	0.27	0.00011	PASS		
					20	4.98	0.00196	PASS		
					30	5.78	0.00228	PASS		
					40	3.79	0.0015	PASS		
					50	2.86	0.00113	PASS		
			HCH	VN	-30	0.62	0.00024	PASS		
					-20	0.54	0.00021	PASS		
					-10	1.16	0.00045	PASS		
					0	2.35	0.00092	PASS		
					10	0.2	0.00008	PASS		
					20	0.23	0.00009	PASS		
					30	0.67	0.00026	PASS		
					40	0.97	0.00038	PASS		
			LCH	VN	-30	9.31	0.00371	PASS		
					-20	3.25	0.0013	PASS		
					-10	5.41	0.00216	PASS		
					0	4.65	0.00185	PASS		
					10	2.32	0.00093	PASS		
					20	0.54	0.00022	PASS		
					30	1.44	0.00057	PASS		
					40	3.63	0.00145	PASS		
			MCH	VN	-30	3.83	0.00151	PASS		
					-20	6.97	0.00275	PASS		
					-10	1.86	0.00073	PASS		
					0	3.73	0.00147	PASS		
		10			3.13	0.00123	PASS			
		20			2.13	0.00084	PASS			
		30			1.37	0.00054	PASS			
		40			2.07	0.00082	PASS			
		HCH	VN	-30	2.13	0.00083	PASS			
				-20	3.88	0.00151	PASS			
				-10	4.18	0.00163	PASS			
				0	2.82	0.0011	PASS			
				15						



Test Band	Test Mode	Test Bandwidth (MHz)	Test Channel	Test Volt.	Test Temp.	Freq. Error [Hz]	Freq. vs. rated [ppm]	Verdict			
					10	2.56	0.001	PASS			
					20	4.71	0.00184	PASS			
					30	6.21	0.00242	PASS			
					40	4.96	0.00194	PASS			
					50	4.51	0.00176	PASS			
					20	LCH	VN	-30	16.32	0.0065	PASS
								-20	1.54	0.00061	PASS
								-10	-0.56	-0.00022	PASS
								0	3.06	0.00122	PASS
								10	-11.44	-0.00456	PASS
								20	11.6	0.00462	PASS
								30	2.42	0.00096	PASS
								40	-0.64	-0.00025	PASS
								50	4.25	0.00169	PASS
						MCH	VN	-30	6.62	0.00261	PASS
		-20	5.85	0.00231				PASS			
		-10	2.82	0.00111				PASS			
		0	2.89	0.00114				PASS			
		10	3.23	0.00127				PASS			
		20	2.23	0.00088				PASS			
		30	4.06	0.0016				PASS			
		40	1.83	0.00072				PASS			
		50	2.7	0.00107				PASS			
		HCH	VN	-30	0.13	0.00005	PASS				
				-20	-0.47	-0.00018	PASS				
				-10	-0.56	-0.00022	PASS				
				0	1.02	0.0004	PASS				
				10	1.36	0.00053	PASS				
				20	1.16	0.00045	PASS				
				30	0.34	0.00013	PASS				
				40	-0.09	-0.00004	PASS				
				50	1.66	0.00065	PASS				

END