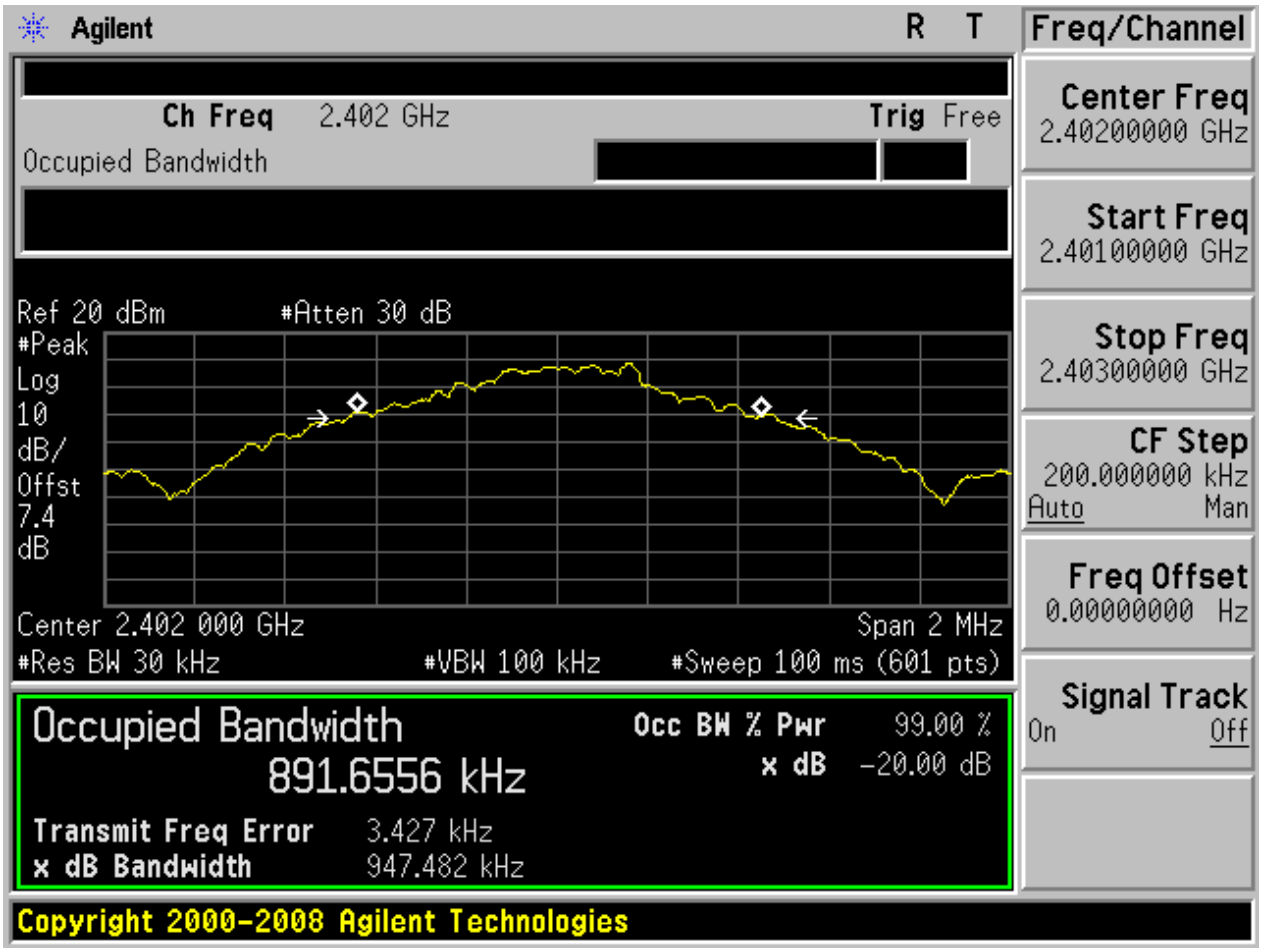
Appendix A: 20dB Emission Bandwidth (EBW)

1 Result Table

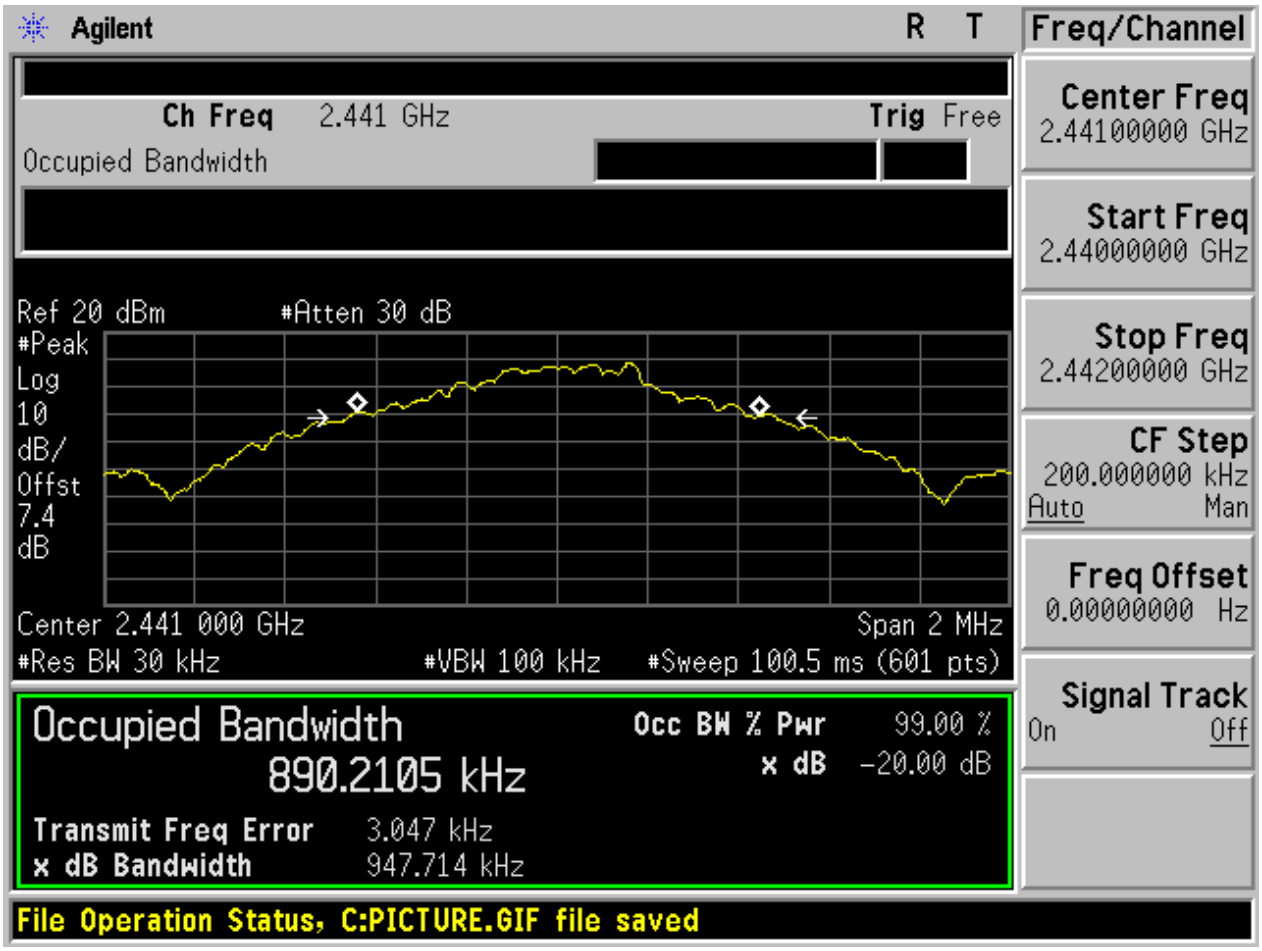
EUT Conf.	EBW [MHz]	Verdict
TM1_DH5_Ch0	0.947	Pass
TM1_DH5_Ch39	0.948	Pass
TM1_DH5_Ch78	0.948	Pass
TM2_2DH5_Ch0	1.287	Pass
TM2_2DH5_Ch39	1.287	Pass
TM2_2DH5_Ch78	1.286	Pass
TM3_3DH5_Ch0	1.281	Pass
TM3_3DH5_Ch39	1.280	Pass
TM3_3DH5_Ch78	1.284	Pass

2 Test Plot

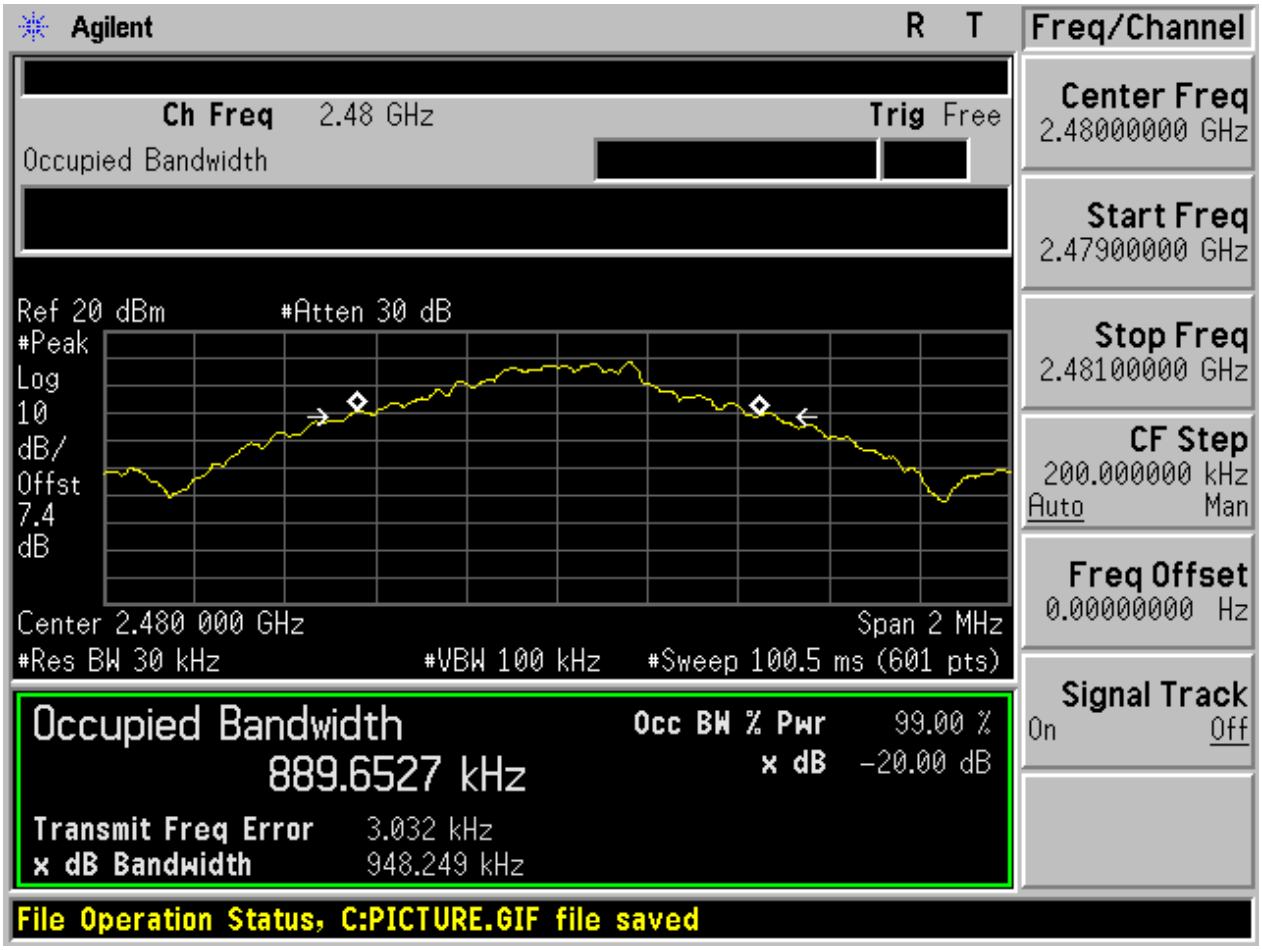
2.1 TM1_DH5_Ch0



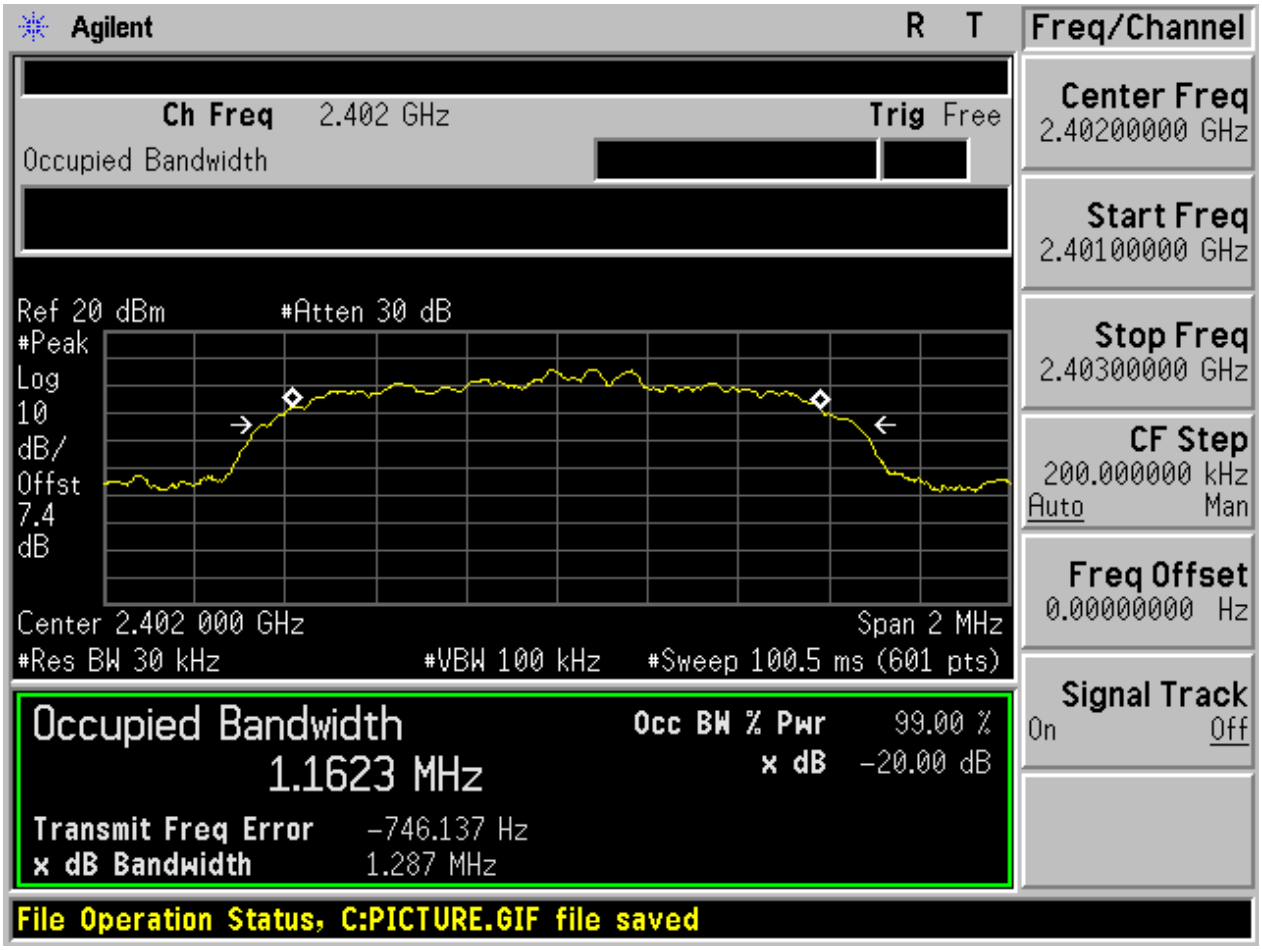
2.2 TM1_DH5_Ch39



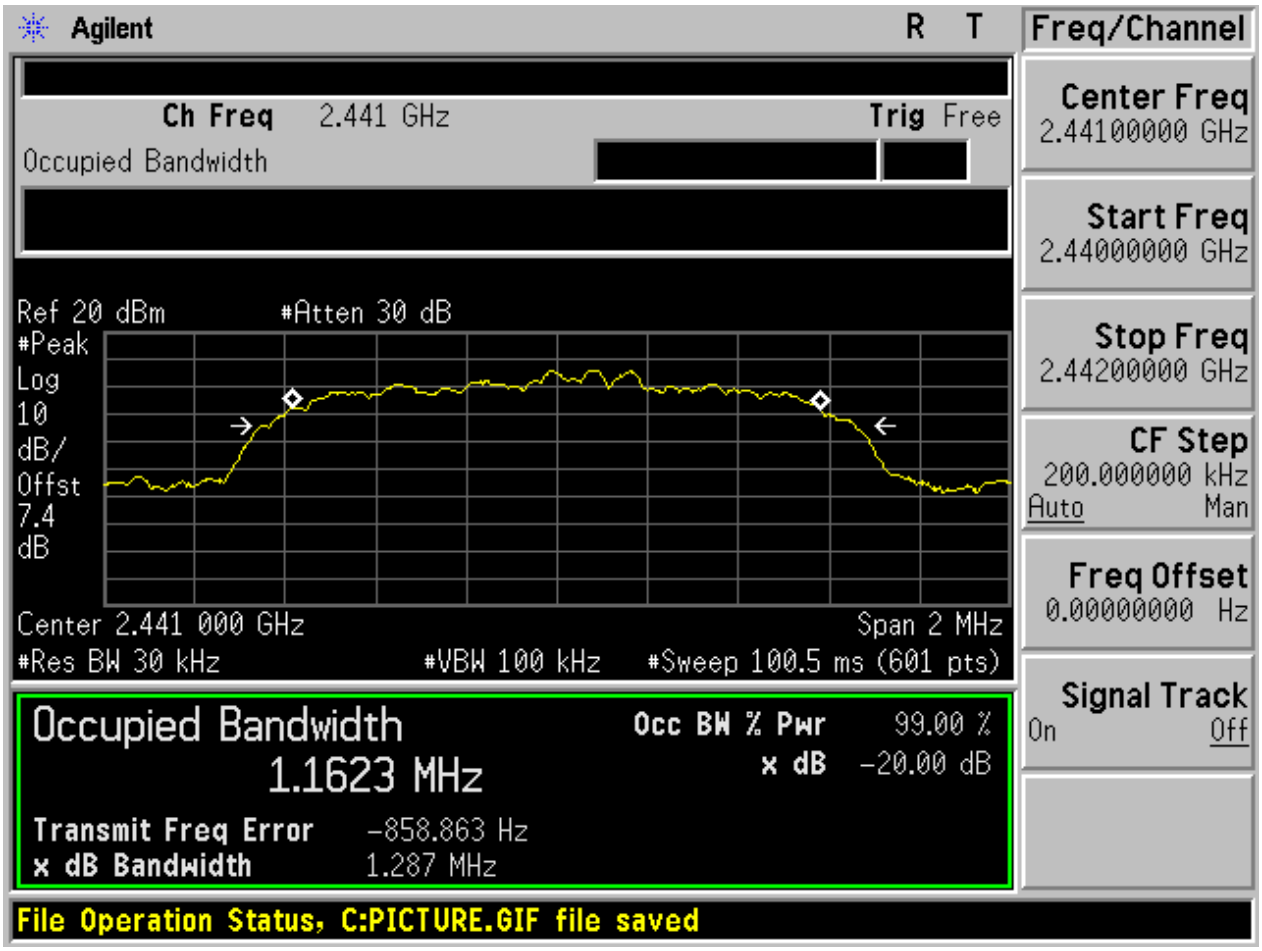
2.3 TM1_DH5_Ch78



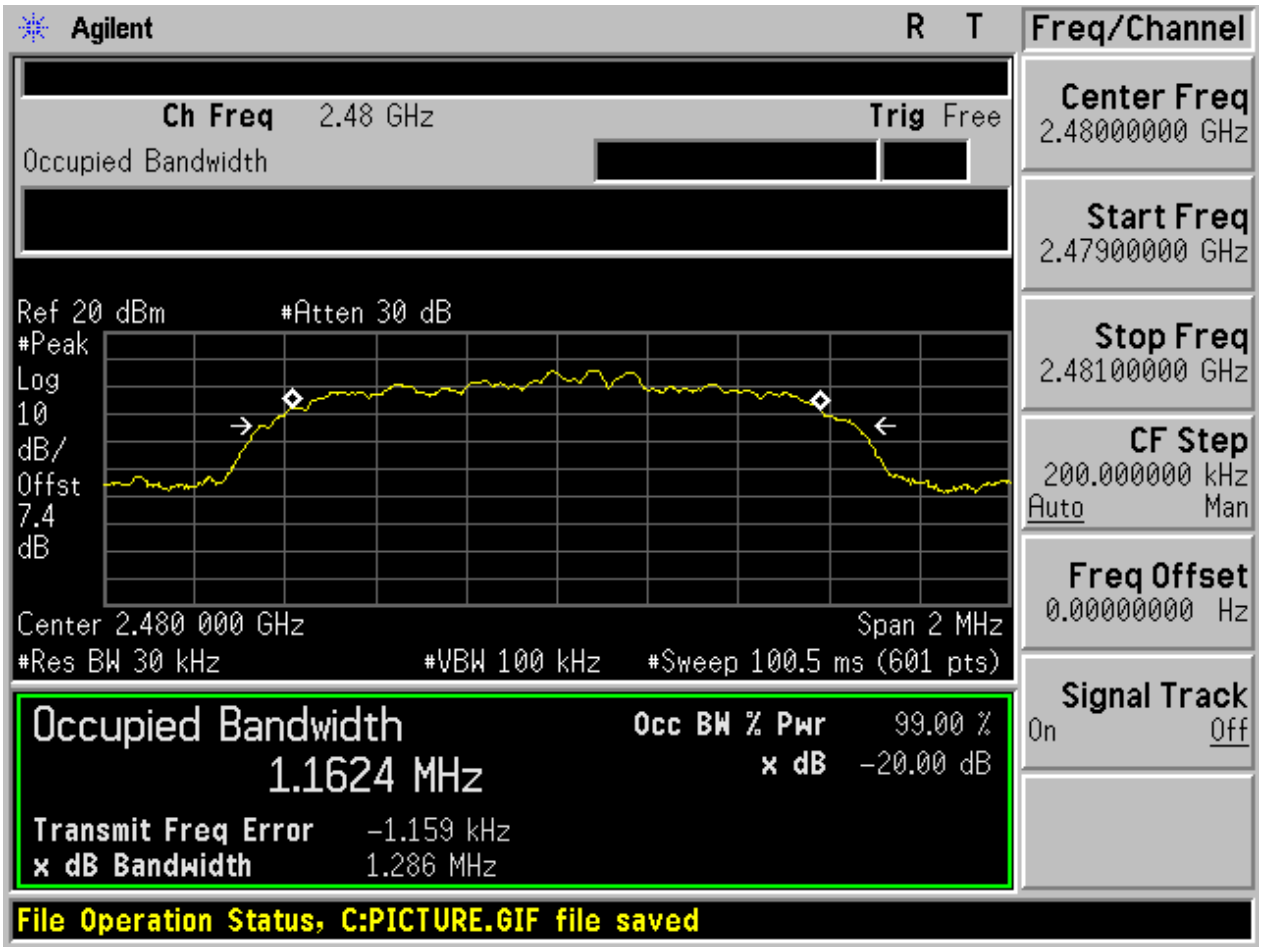
2.4 TM2_2DH5_Ch0



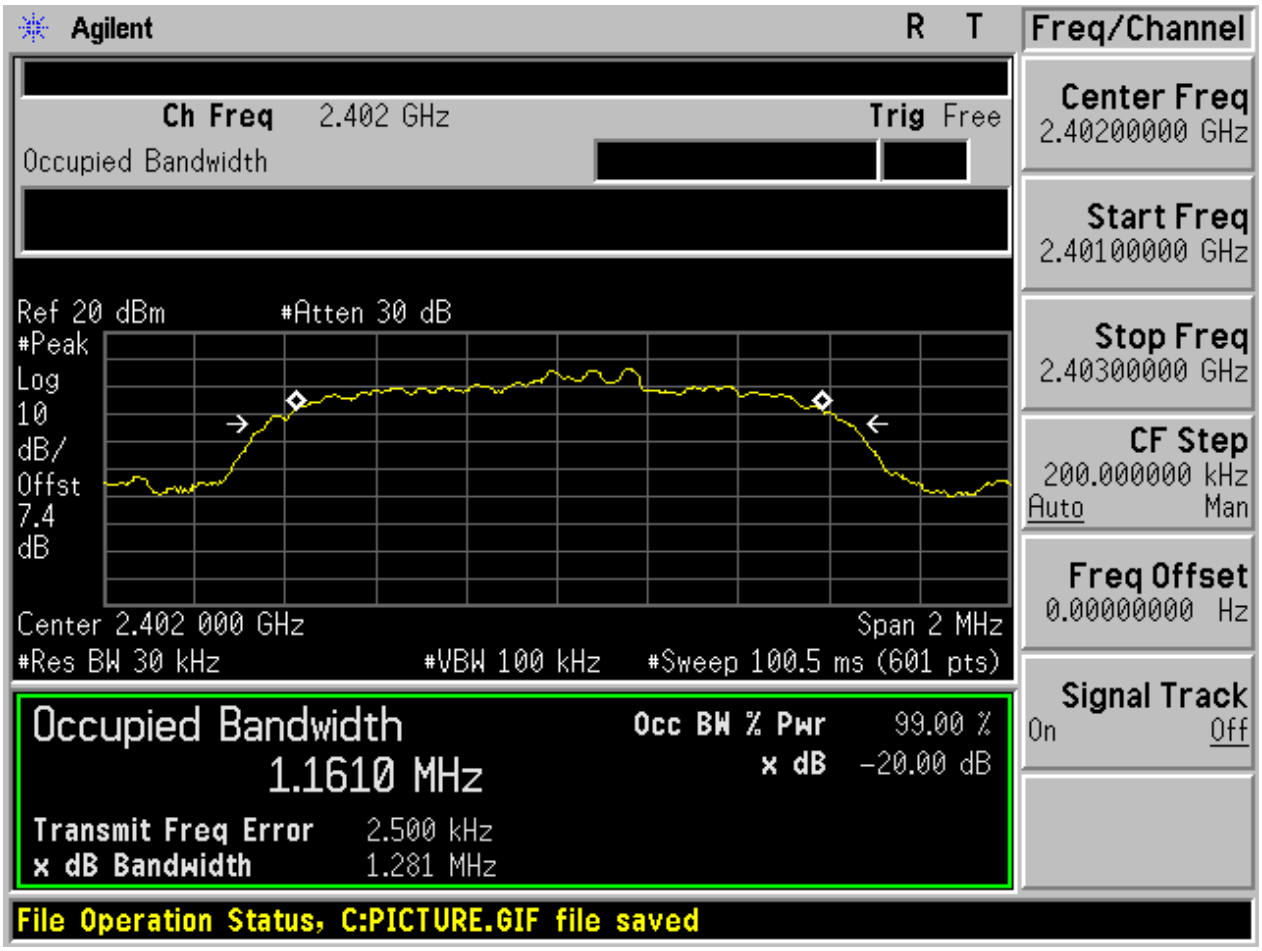
2.5 TM2_2DH5_Ch39



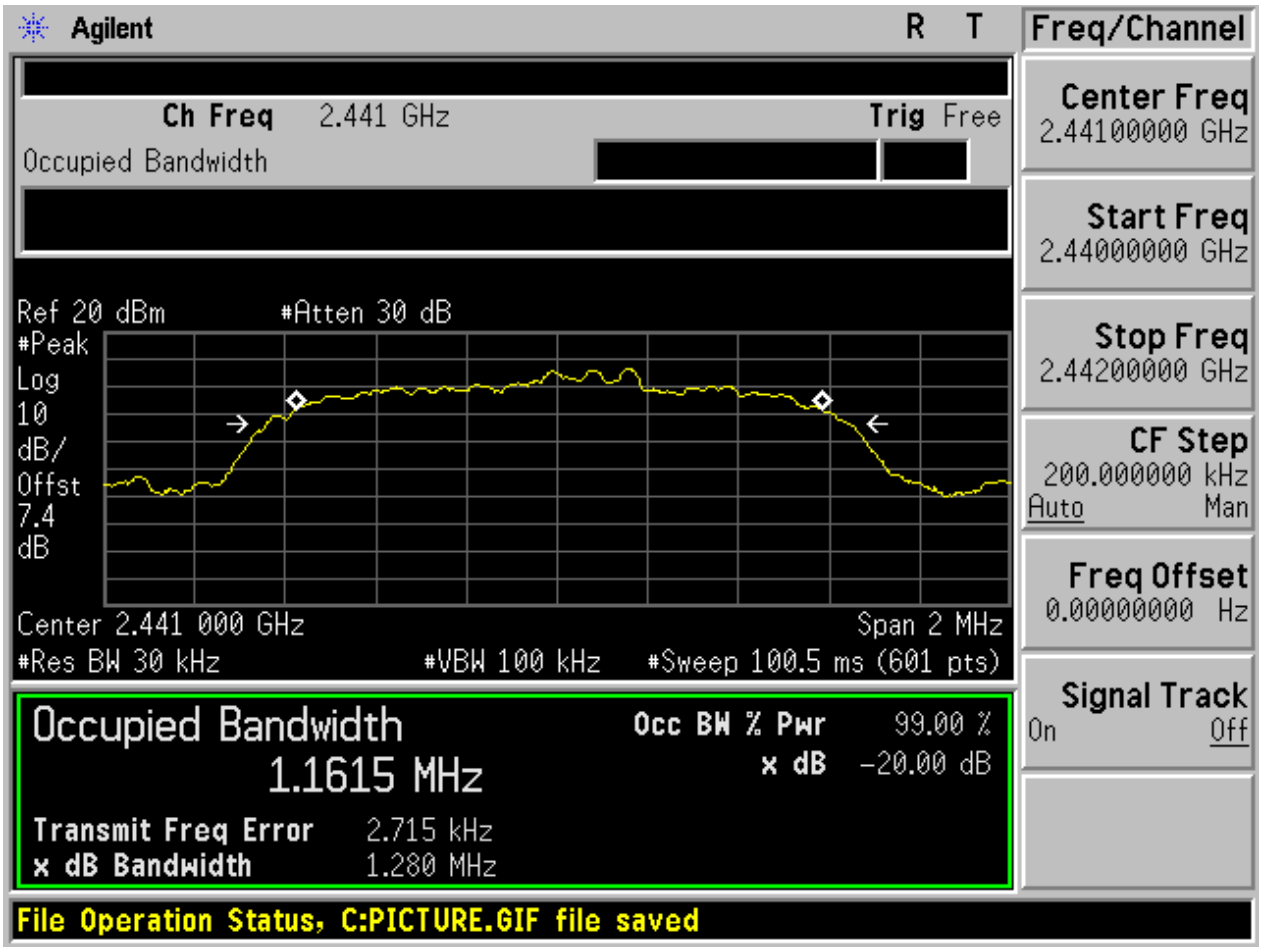
2.6 TM2_2DH5_Ch78



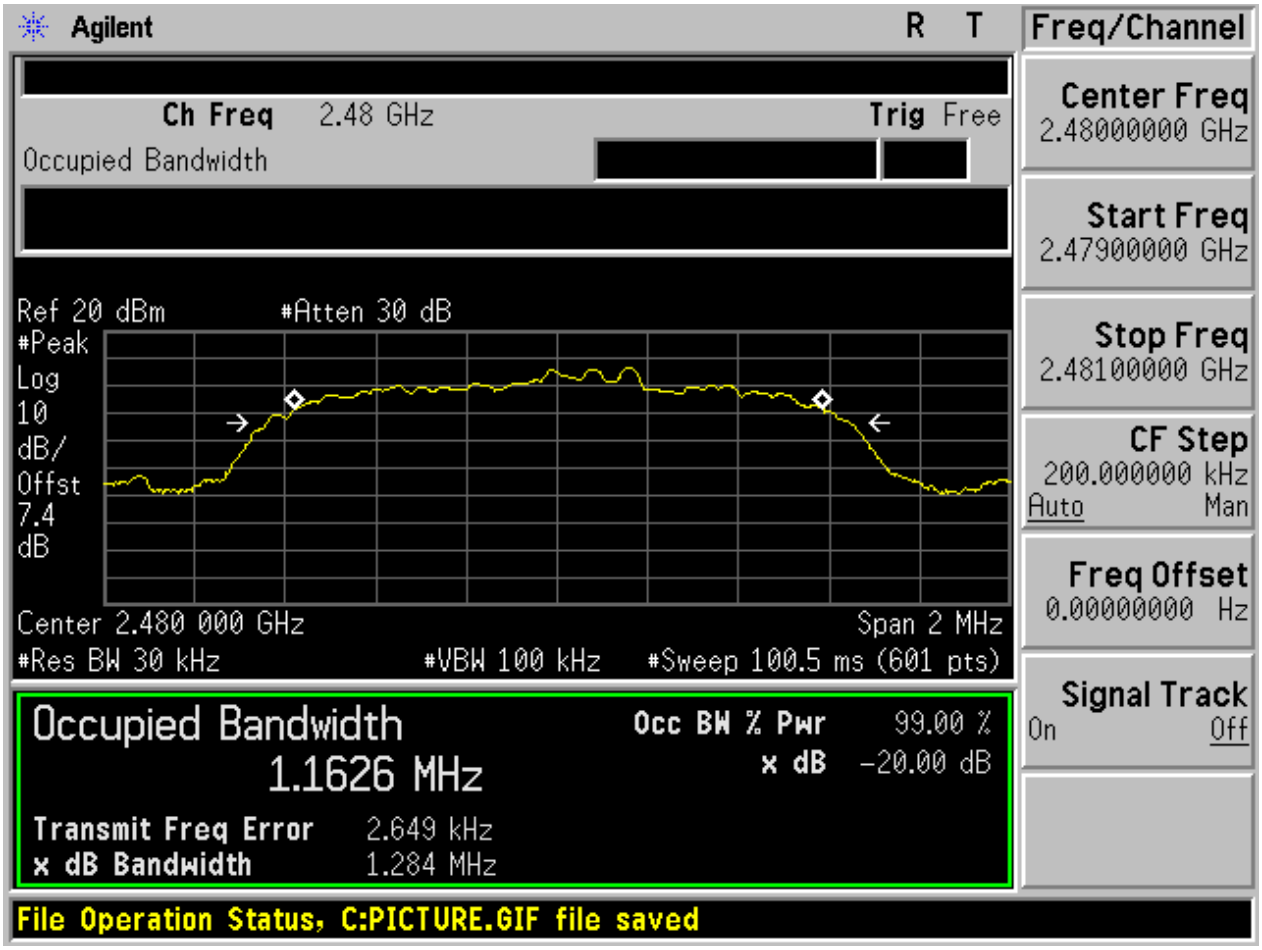
2.7 TM3_3DH5_Ch0



2.8 TM3_3DH5_Ch39



2.9 TM3_3DH5_Ch78



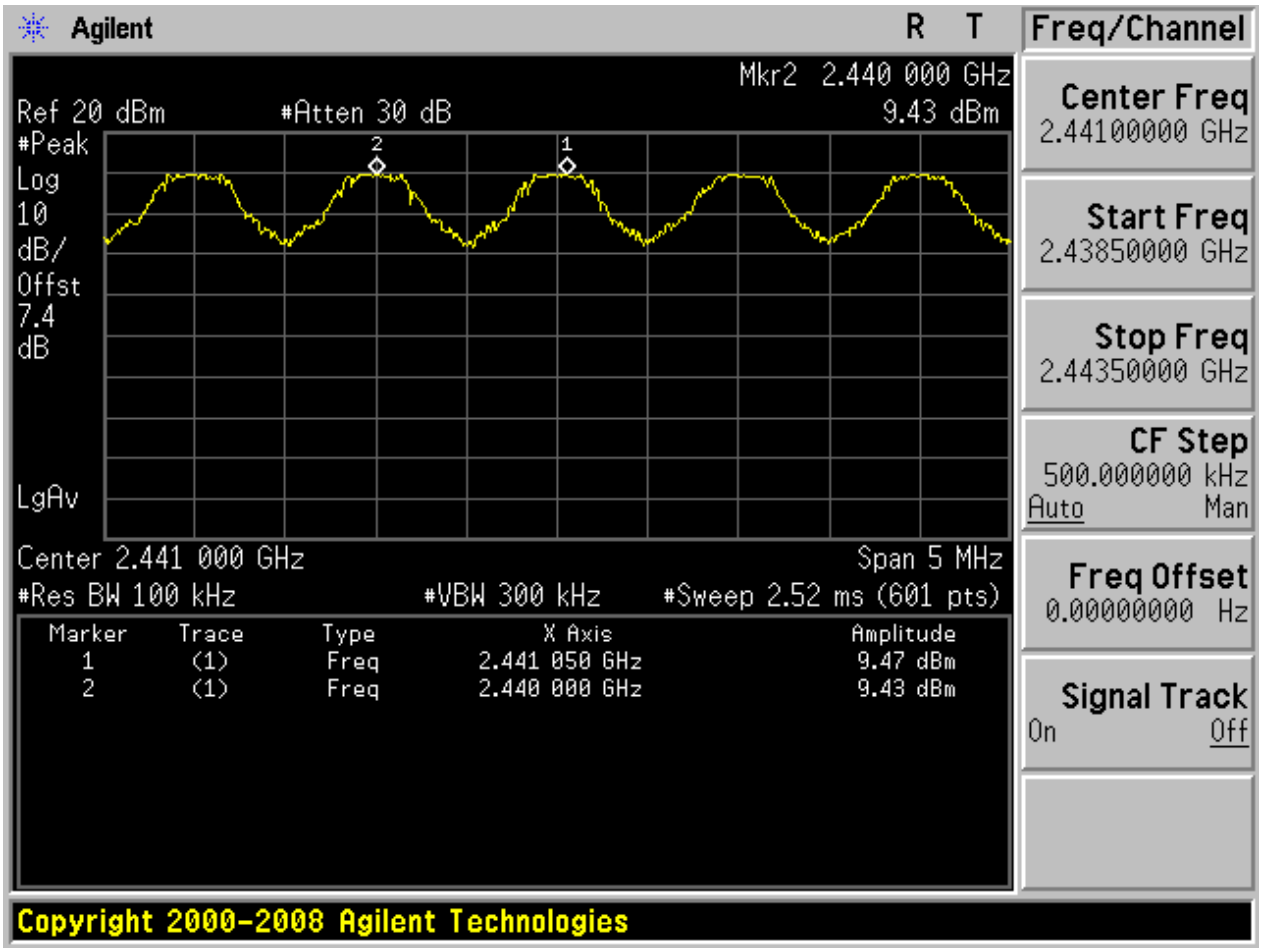
Appendix B: Carrier Frequency Separation

1 Result Table

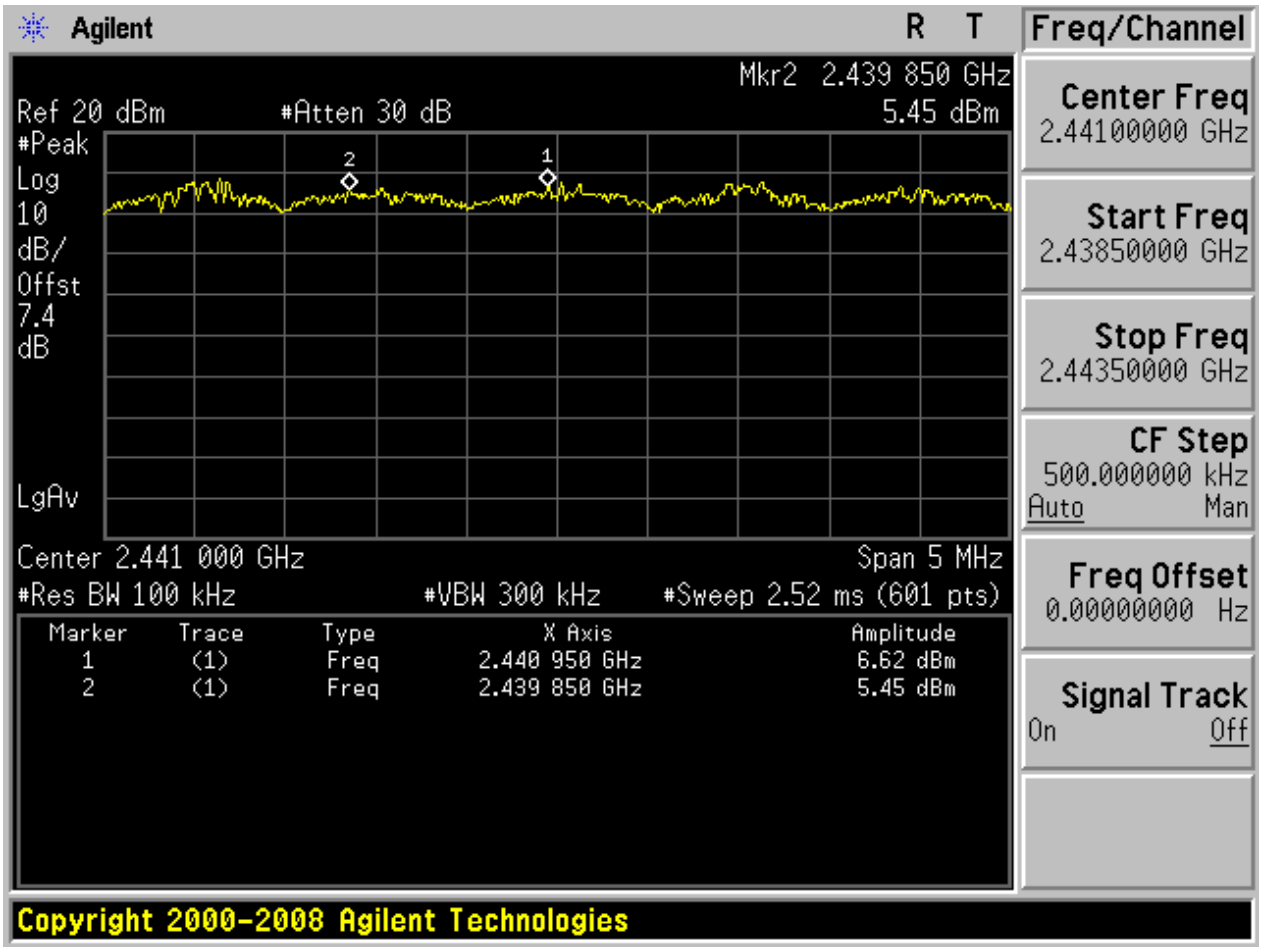
EUT Conf.	Carrier Frequency Separation [MHz]	Verdict
TM1_DH5_Hop	1.050	Pass
TM2_2DH5_Hop	1.100	Pass
TM3_3DH5_Hop	1.017	Pass

2 Test Plot

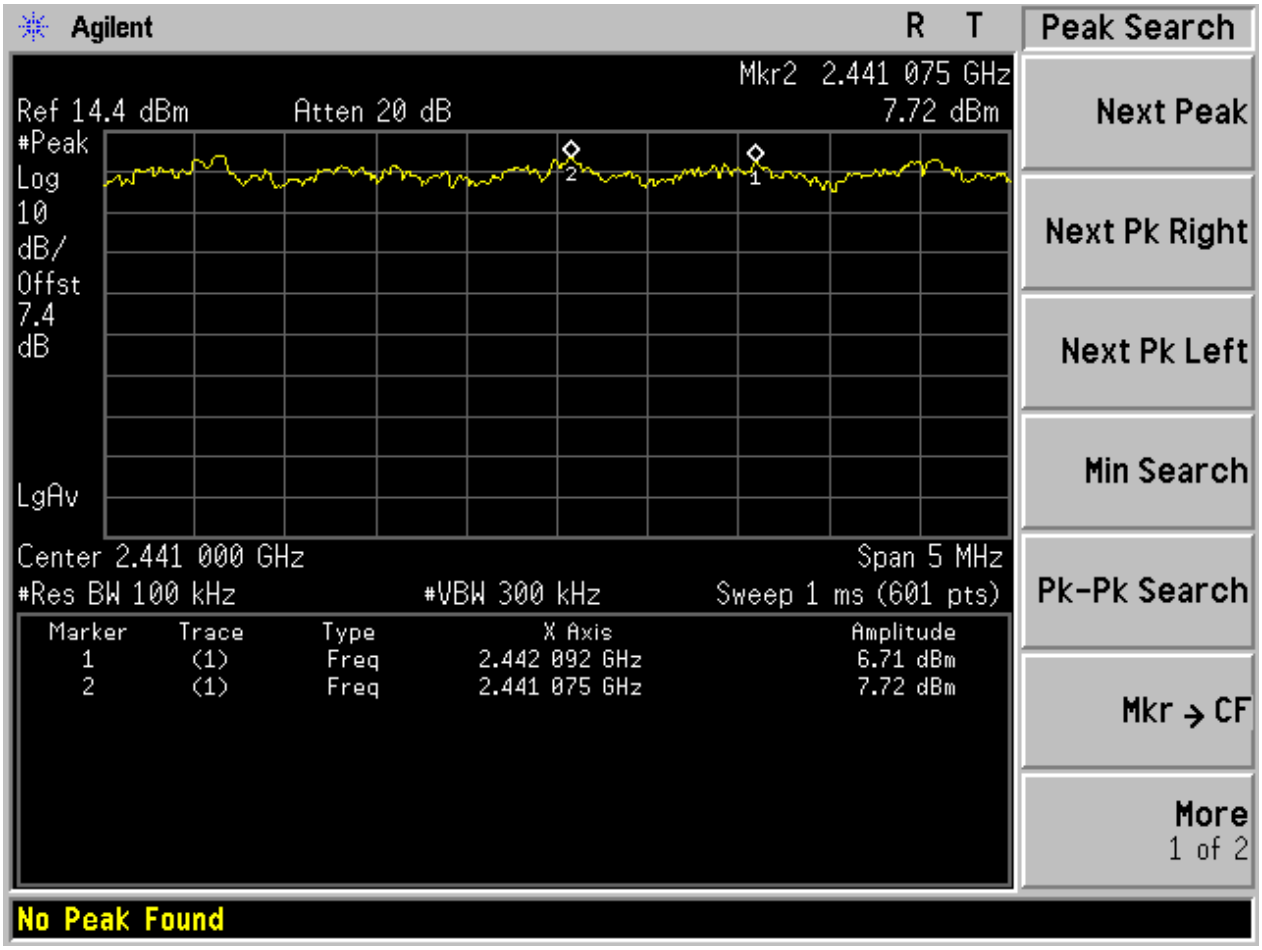
2.1 TM1_DH5_Hop



2.2 TM2_2DH5_Hop



2.3 TM3_3DH5_Hop



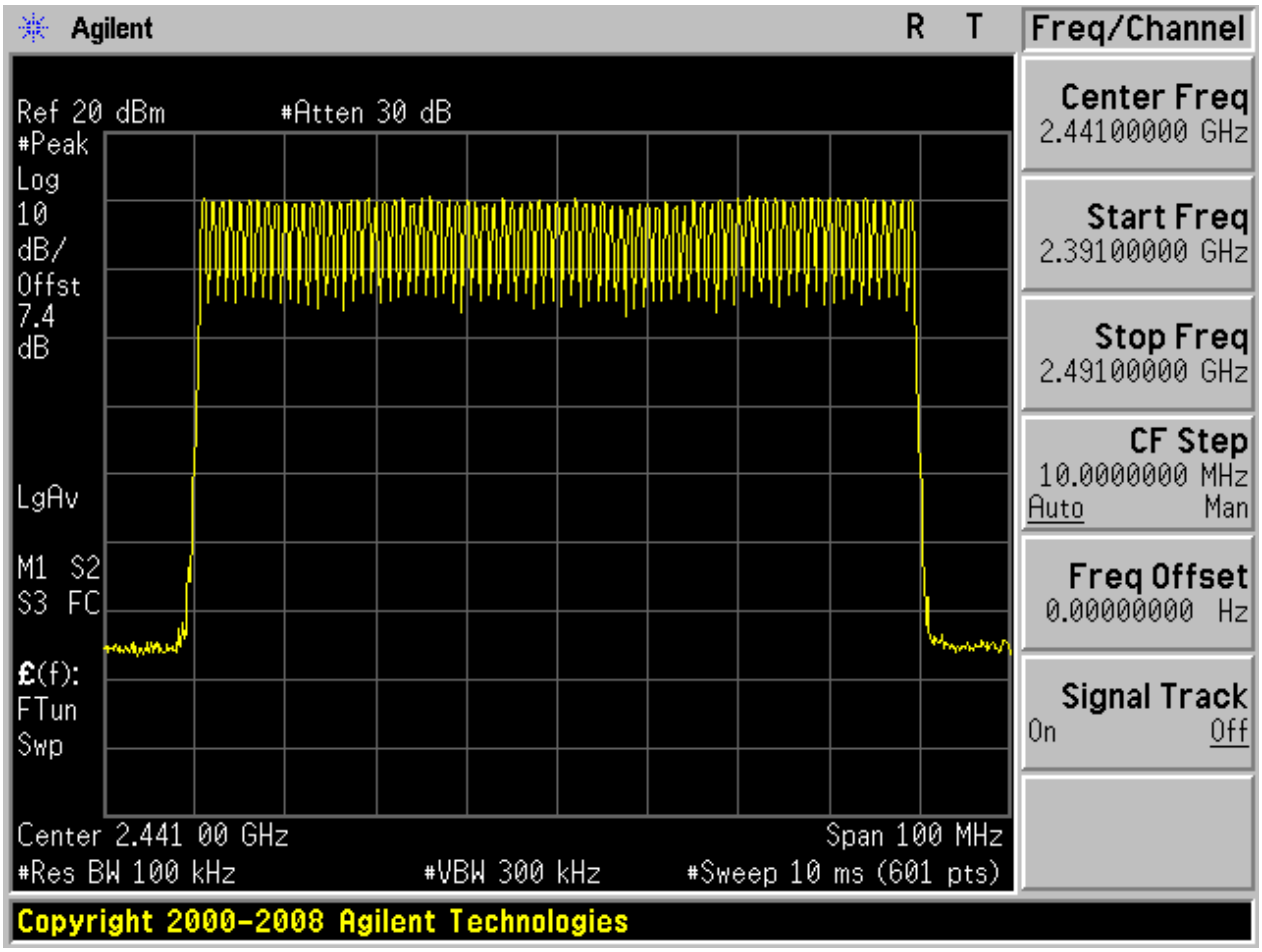
Appendix C: Number of Hopping Channel

1 Result Table

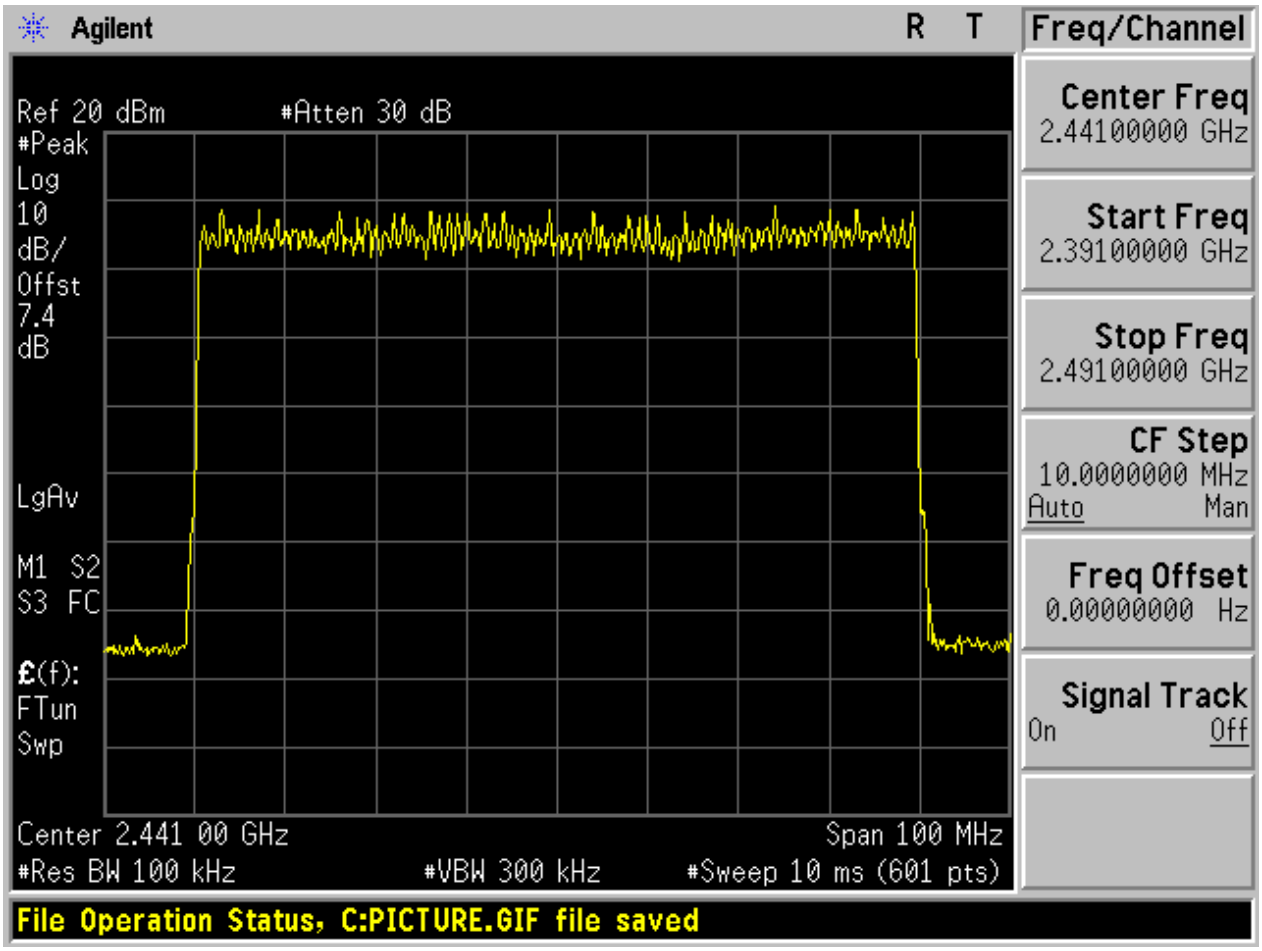
EUT Conf.	Number of Hopping Channel	Verdict
TM1_DH5_Hop	79	Pass
TM2_2DH5_Hop	79	Pass
TM3_3DH5_Hop	79	Pass

2 Test Plot

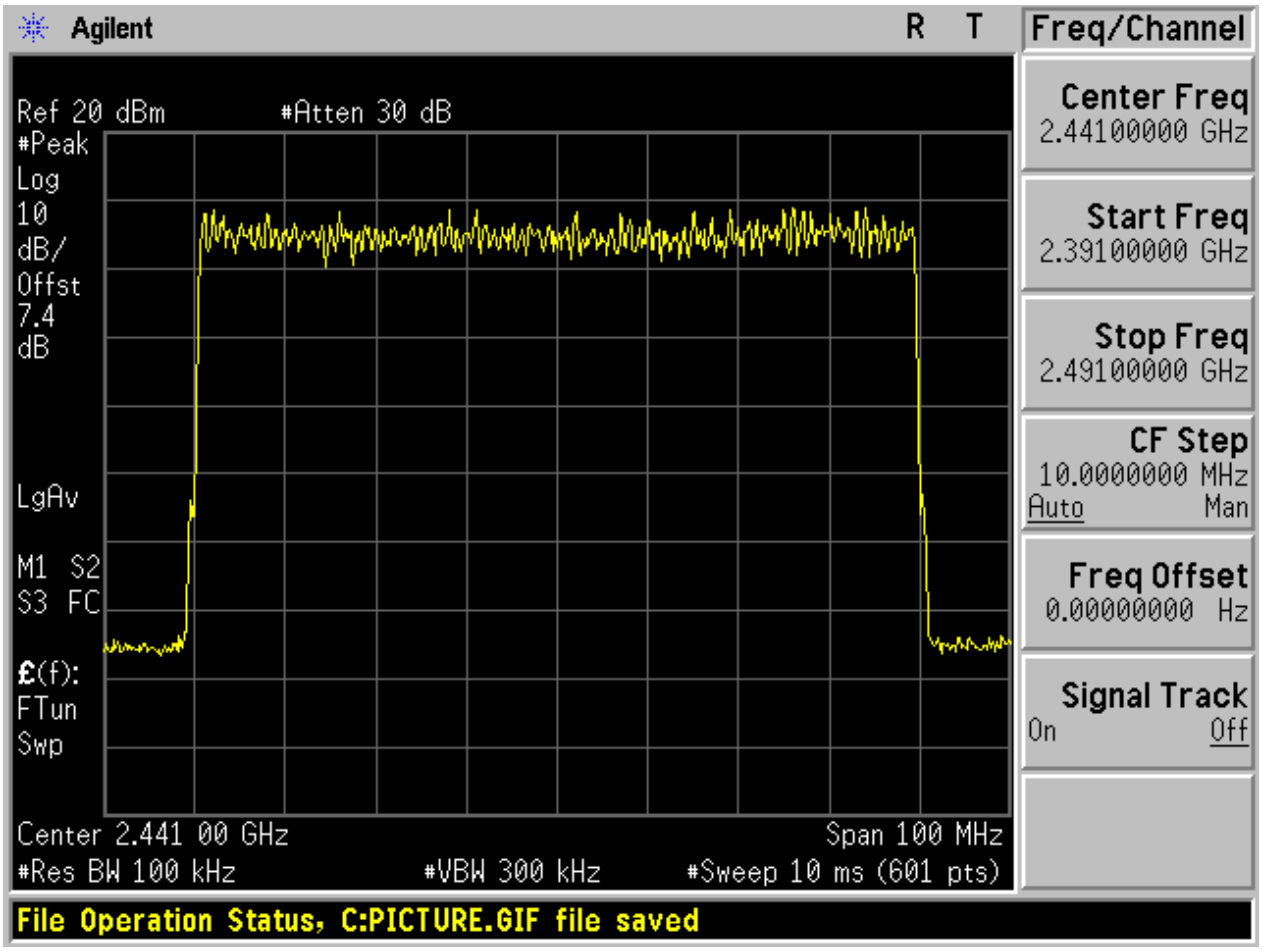
2.1 TM1_DH5_Hop



2.2 TM2_2DH5_Hop



2.3 TM3_3DH5_Hop



Appendix D: Time of Occupancy (Dwell Time)

1 Result Table

The Dwell Time = Burst Width * Total Hops. The detailed calculations are showed as follows:

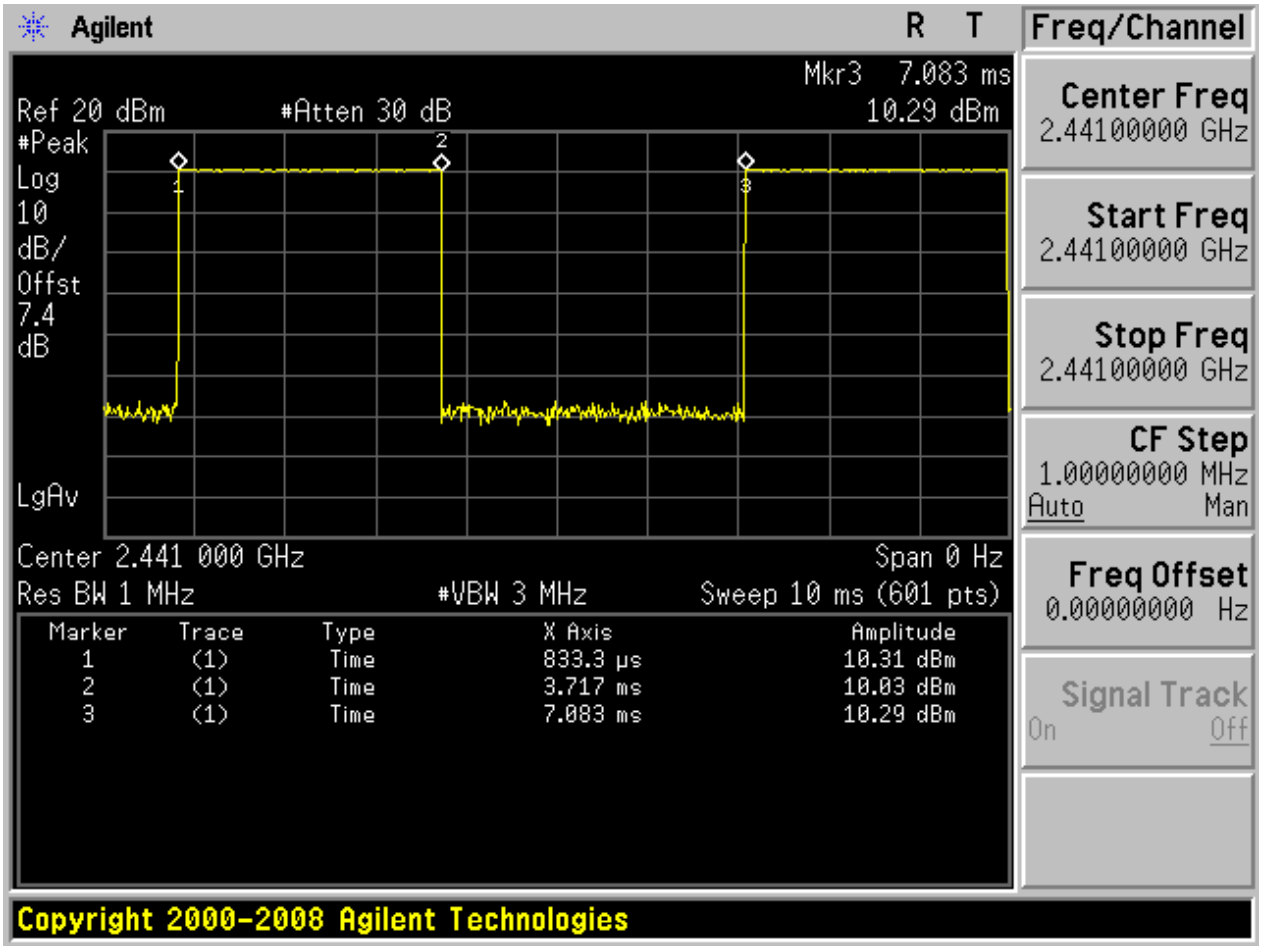
- The duration for dwell time calculation: 0.4 [s] * hopping number = 0.4 [s] * 79 [ch] = 31.6 [s*ch];
- The burst width [ms/hop/ch], which is directly measured, refers to the duration on one channel hop.
- The hops per second for all channels: The selected EUT Conf uses a slot type of 5-Tx&1-Rx and a hopping rate of 1600 [ch*hop/s] for all channels. So the final hopping rate for all channels is 1600 / 6 = 266.67 [ch*hop/s];
- The hops per second on one channel: 266.67 [ch*hop/s] / 79 [ch] =3.38 [hop/s];
- The total hops for all channels within the dwell time calculation duration: 3.38 [hop/s] * 31.6 [s*ch] = 106.67 [hop*ch];
- The dwell time for all channels hopping: 106.67 [hop*ch] * Burst Width [ms/hop/ch].

EUT Conf.	Burst Width [ms/hop/ch]	Total Hops [hop*ch]	Dwell Time [ms]	Verdict
TM1_DH5_Ch39	2.900	106.67	0.309	Pass
TM2_2DH5_Ch39	2.900	106.67	0.309	Pass
TM3_3DH5_Ch39	2.900	106.67	0.309	Pass

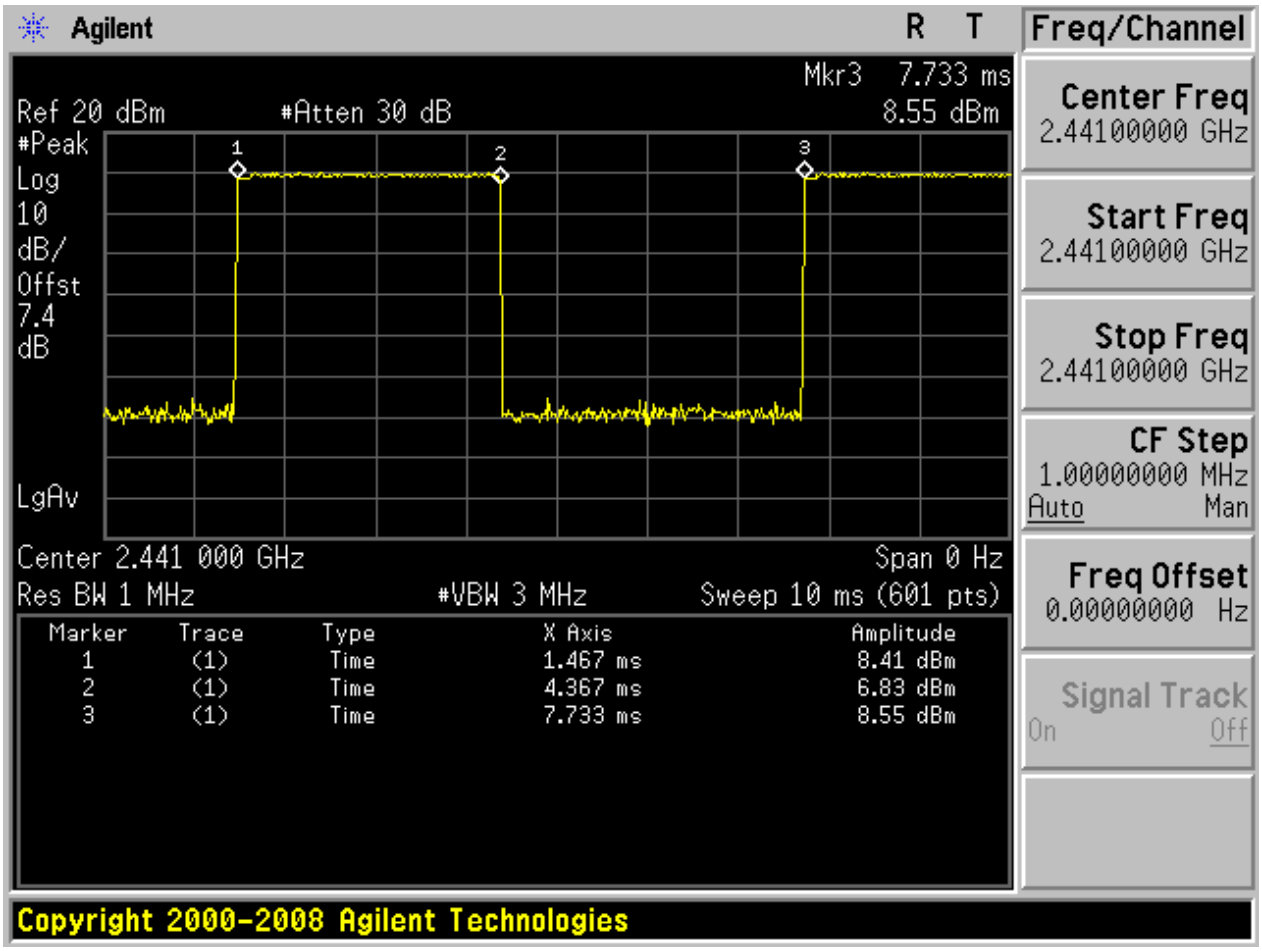
2 Test Plot

NOTE: The test plots are only for Burst Width measurements.

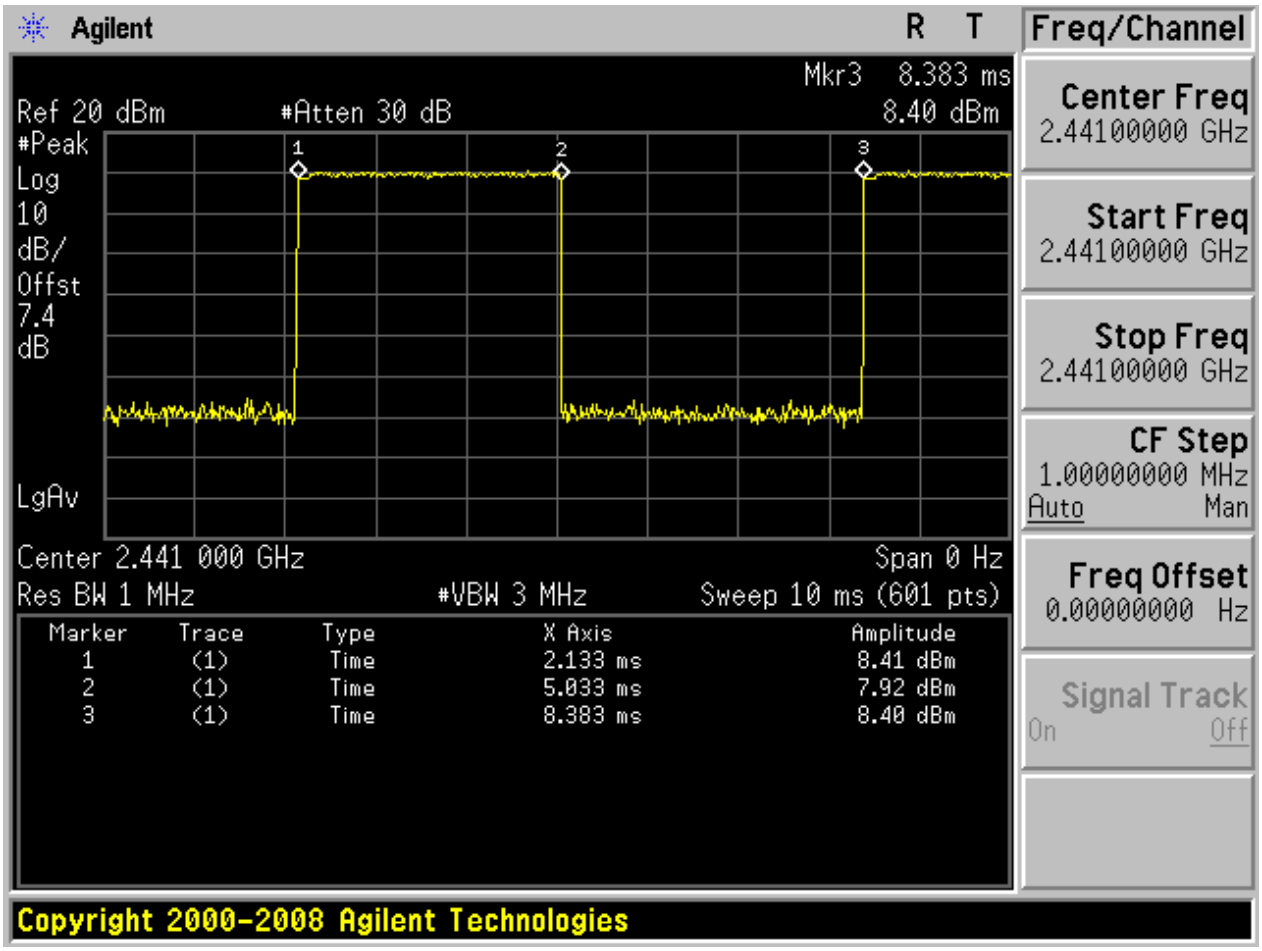
2.1 TM1_DH5_Ch39



2.2 TM2_2DH5_Ch39



2.3 TM3_3DH5_Ch39



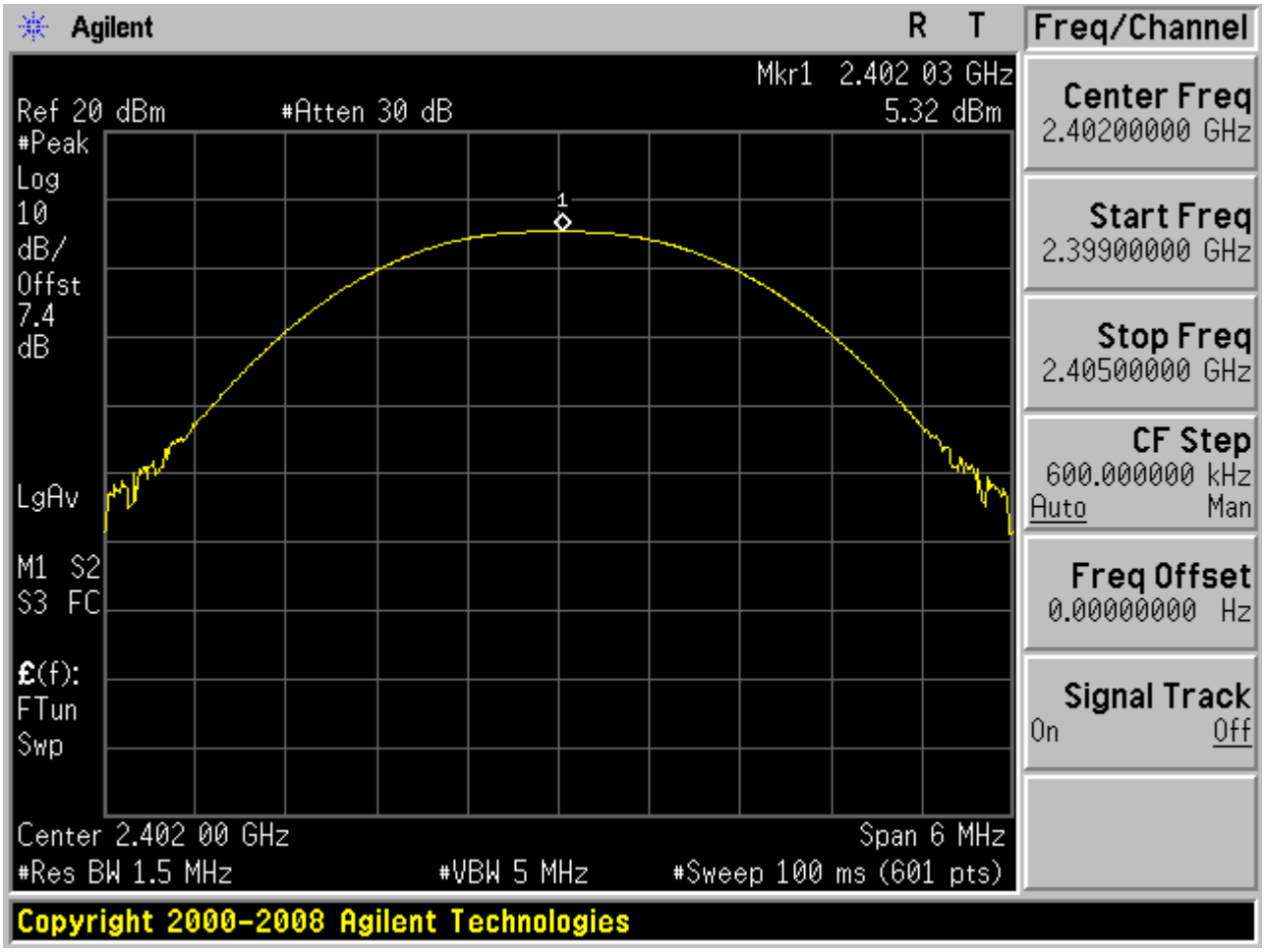
Appendix E: Maximum Peak Conducted Output Power

1 Result Table

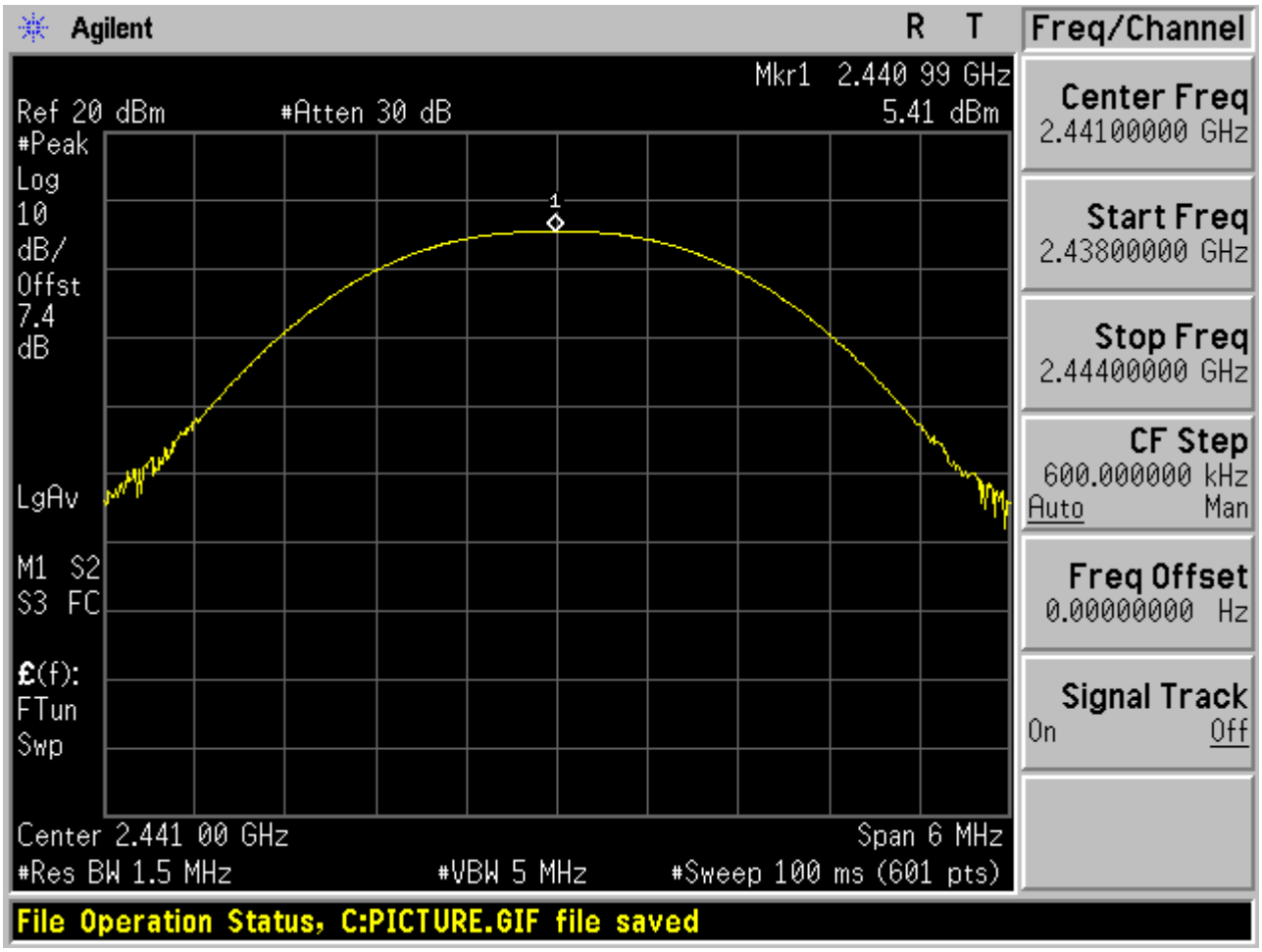
EUT Conf.	Max. Peak Power [dBm]	Verdict
TM1_DH5_Ch0	5.32	Pass
TM1_DH5_Ch39	5.41	Pass
TM1_DH5_Ch78	5.02	Pass
TM2_2DH5_Ch0	5.29	Pass
TM2_2DH5_Ch39	5.37	Pass
TM2_2DH5_Ch78	4.96	Pass
TM3_3DH5_Ch0	5.44	Pass
TM3_3DH5_Ch39	5.51	Pass
TM3_3DH5_Ch78	5.12	Pass

2 Test Plot

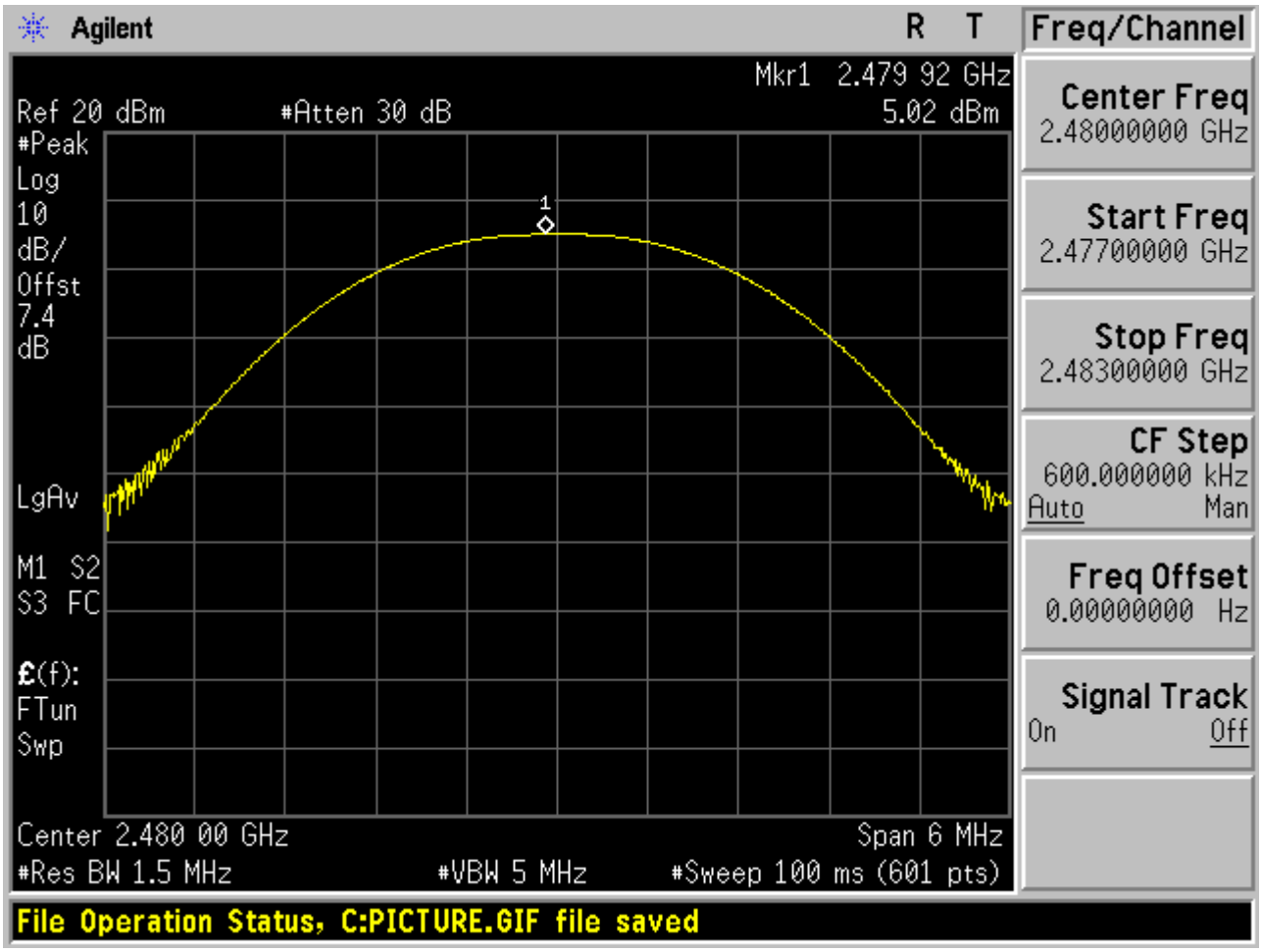
2.1 TM1_DH5_Ch0



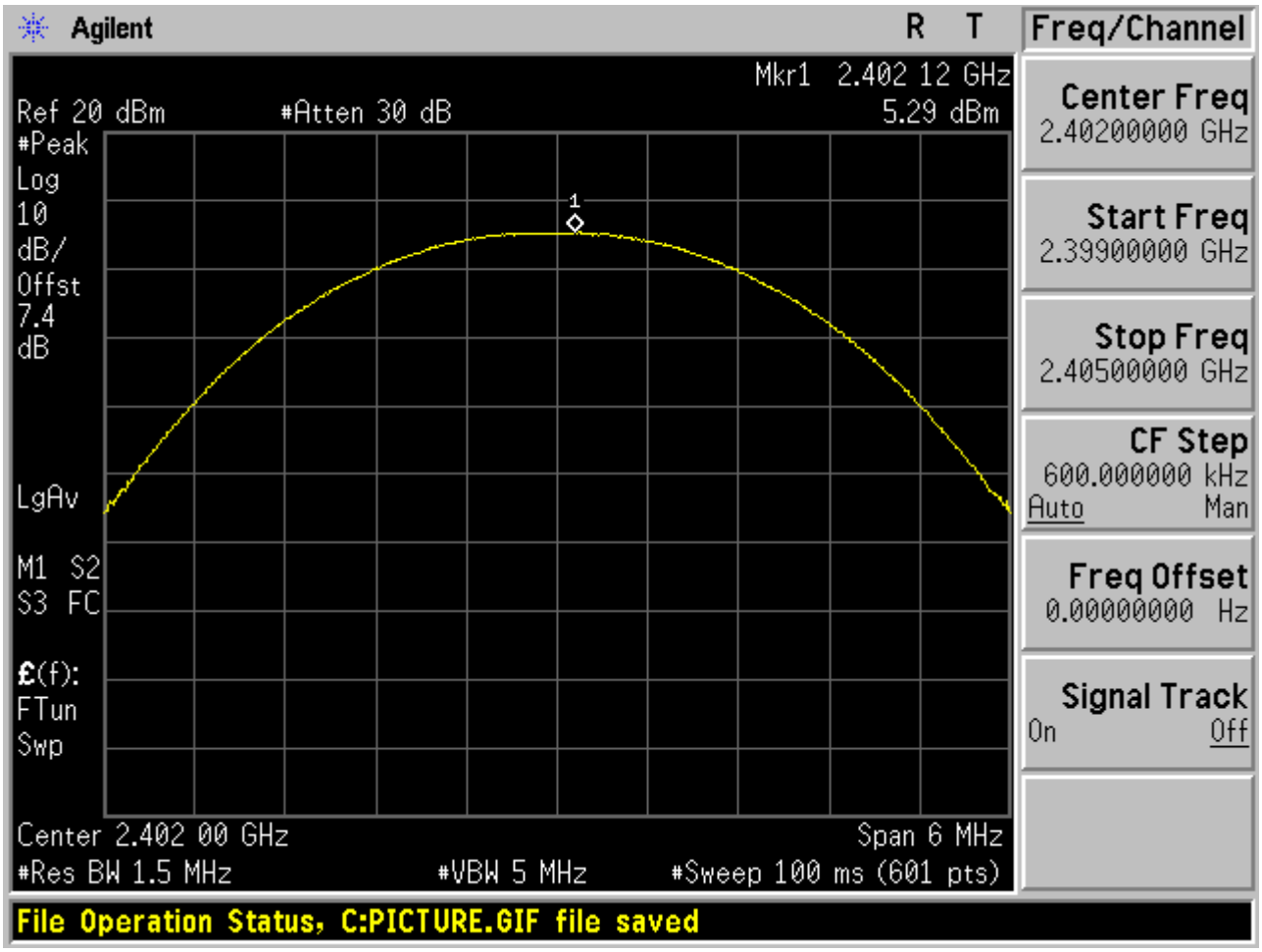
2.2 TM1_DH5_Ch39



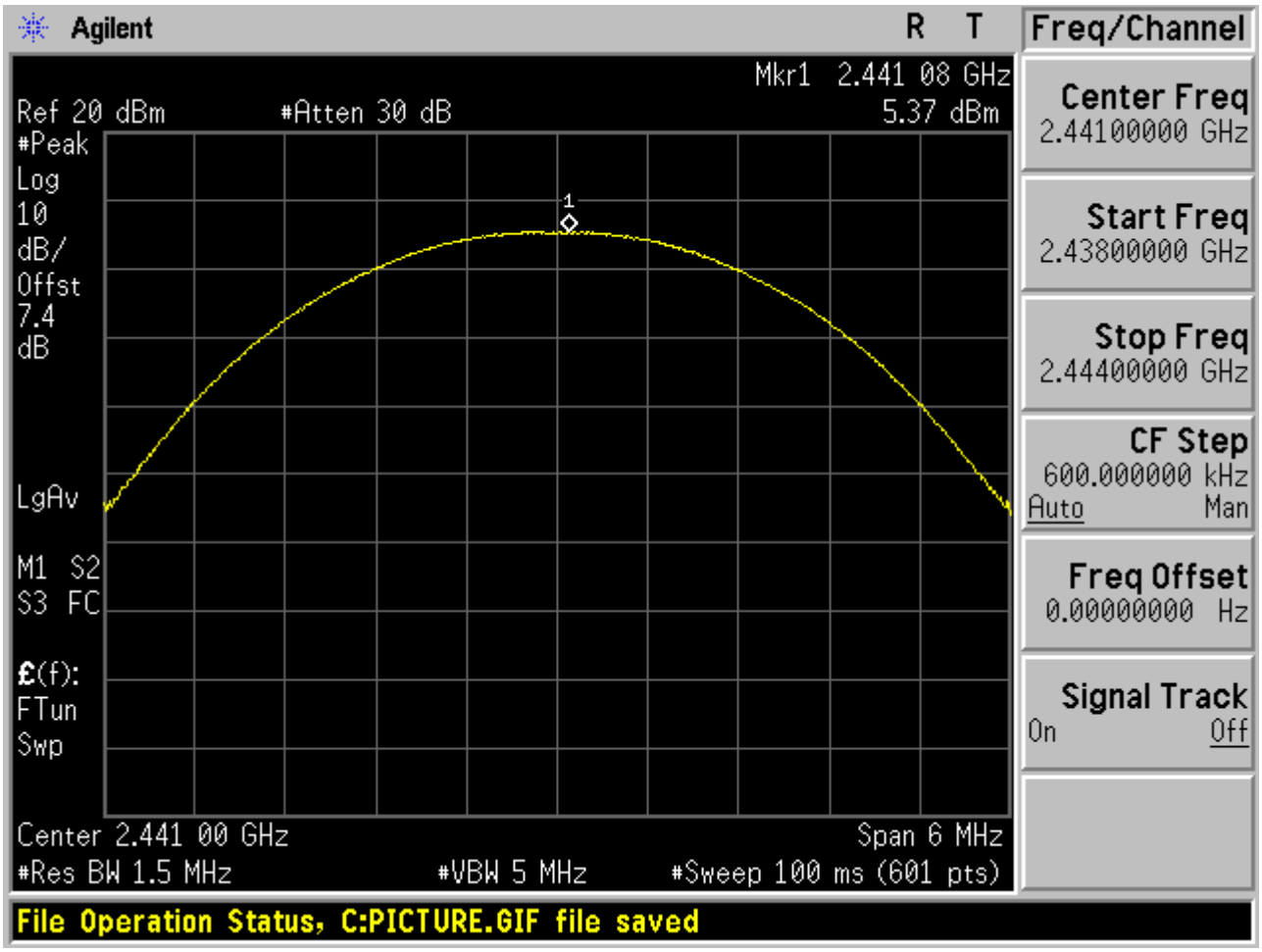
2.3 TM1_DH5_Ch78



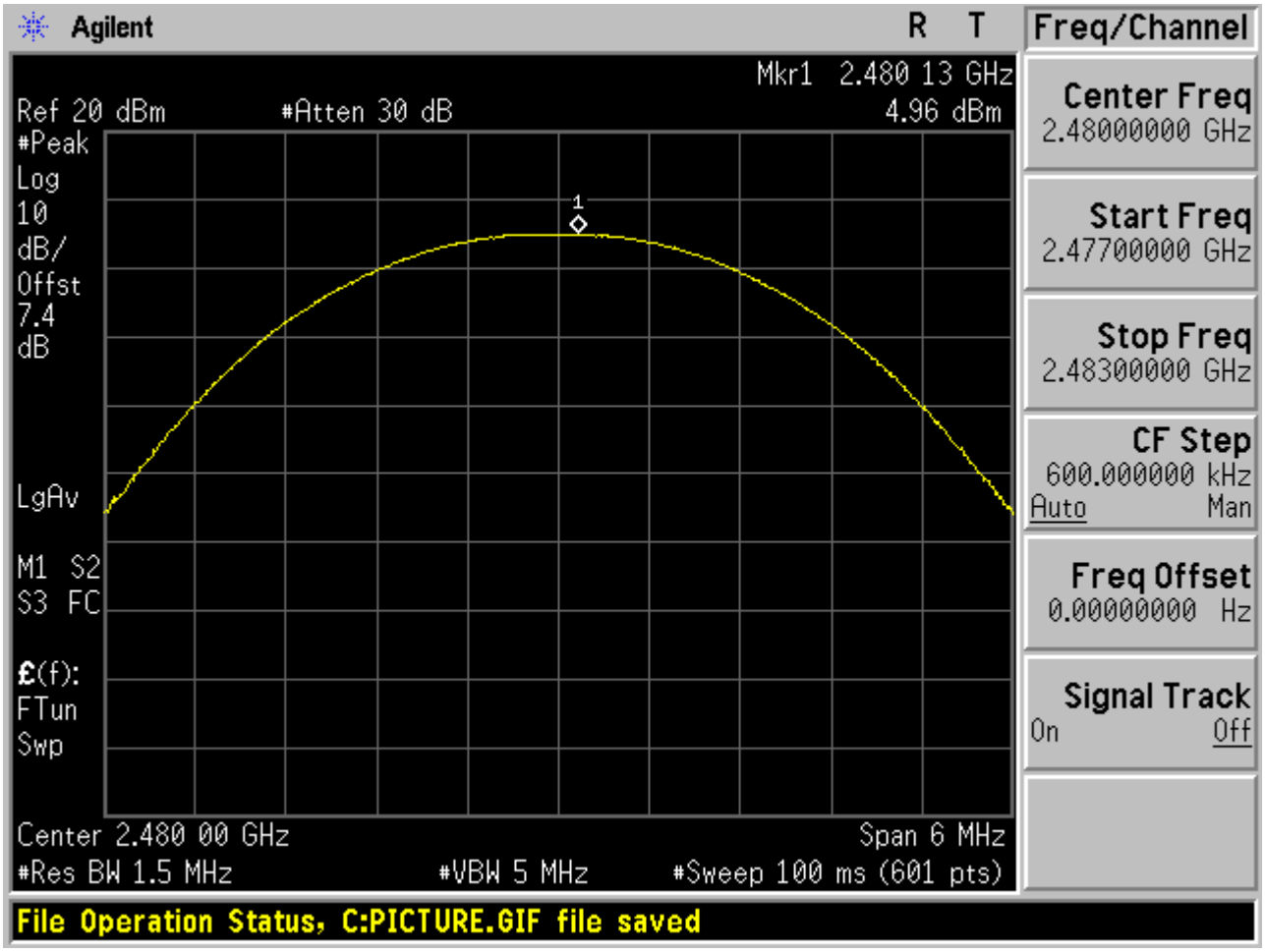
2.4 TM2_2DH5_Ch0



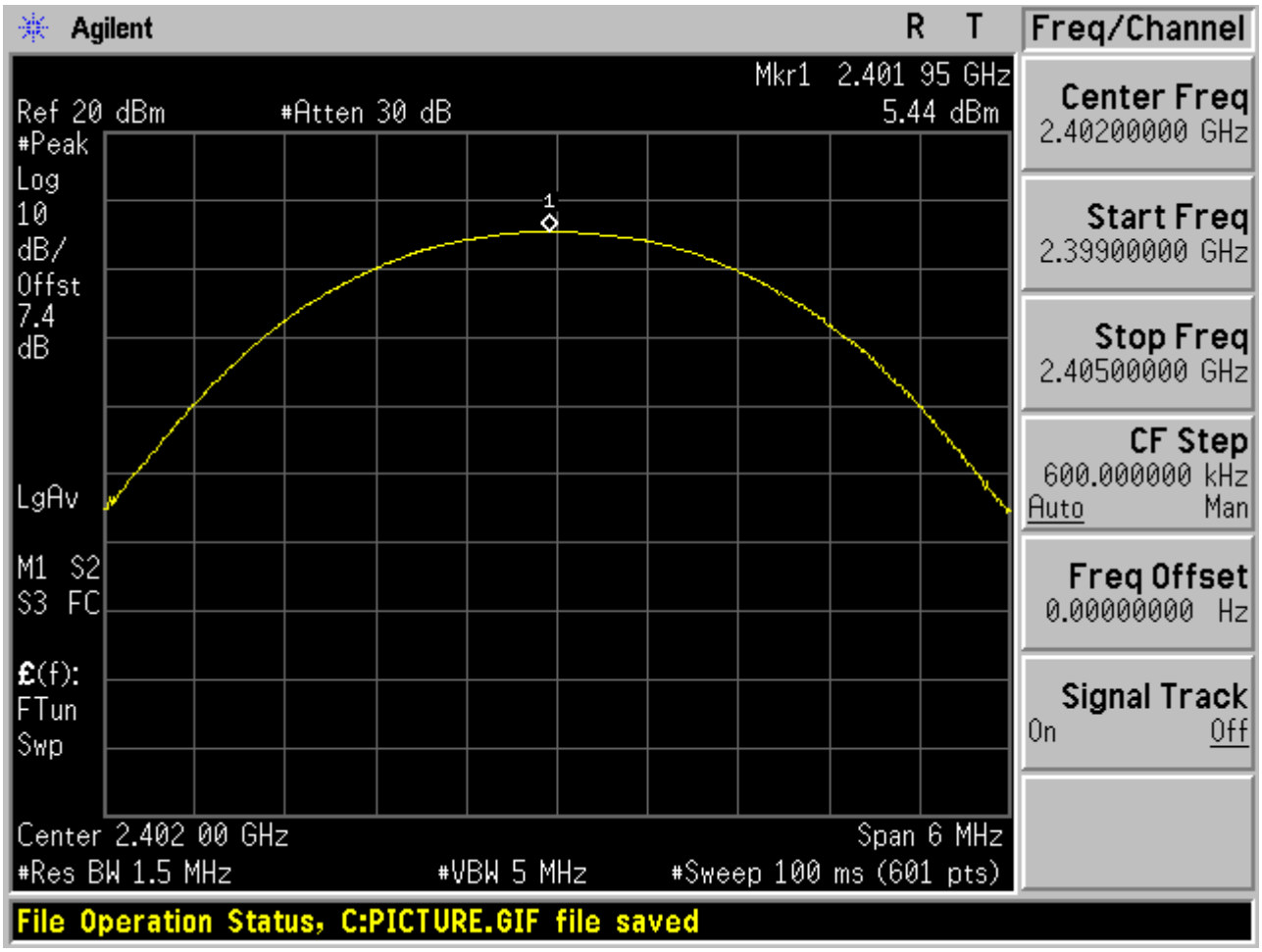
2.5 TM2_2DH5_Ch39



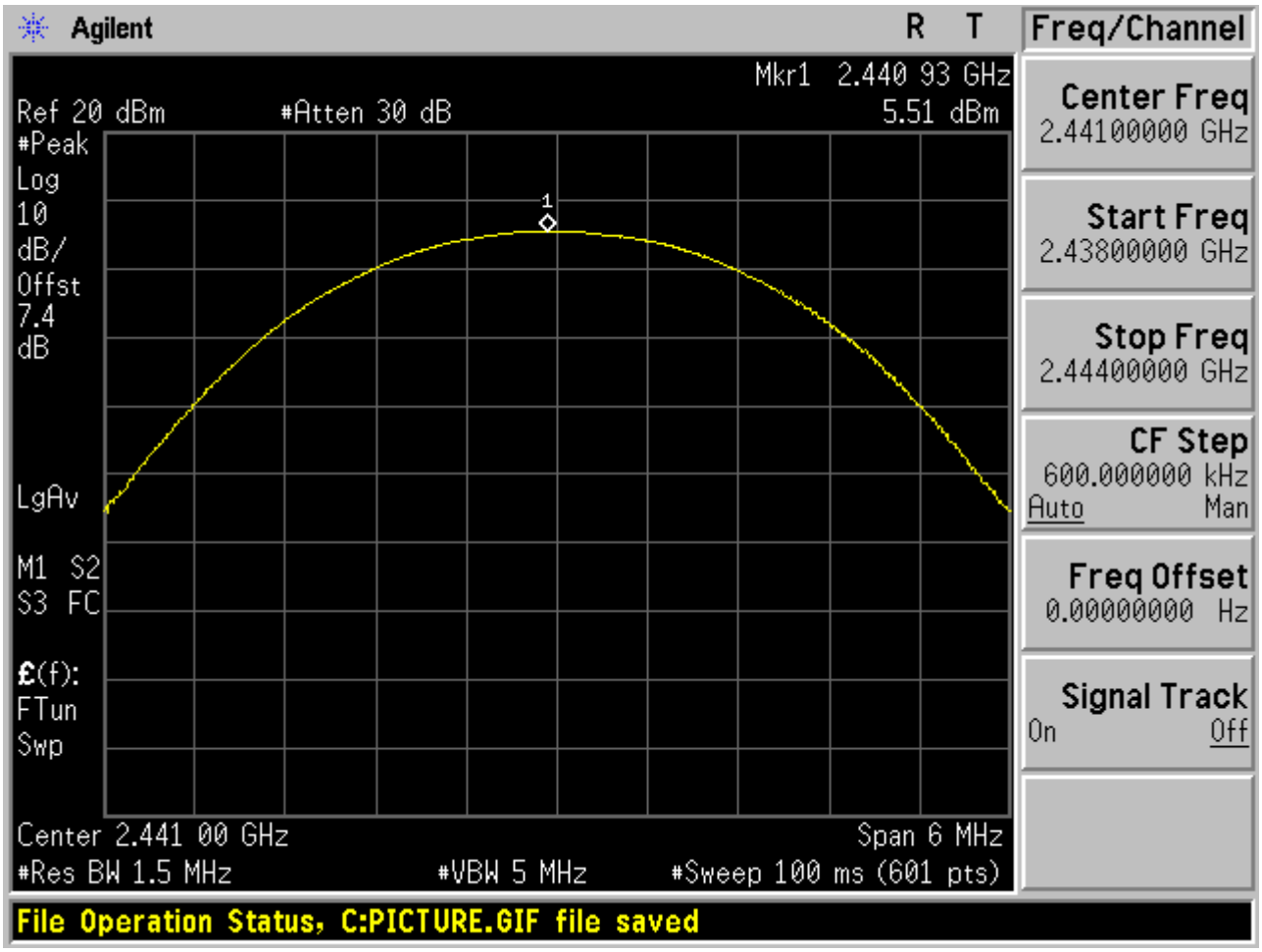
2.6 TM2_2DH5_Ch78



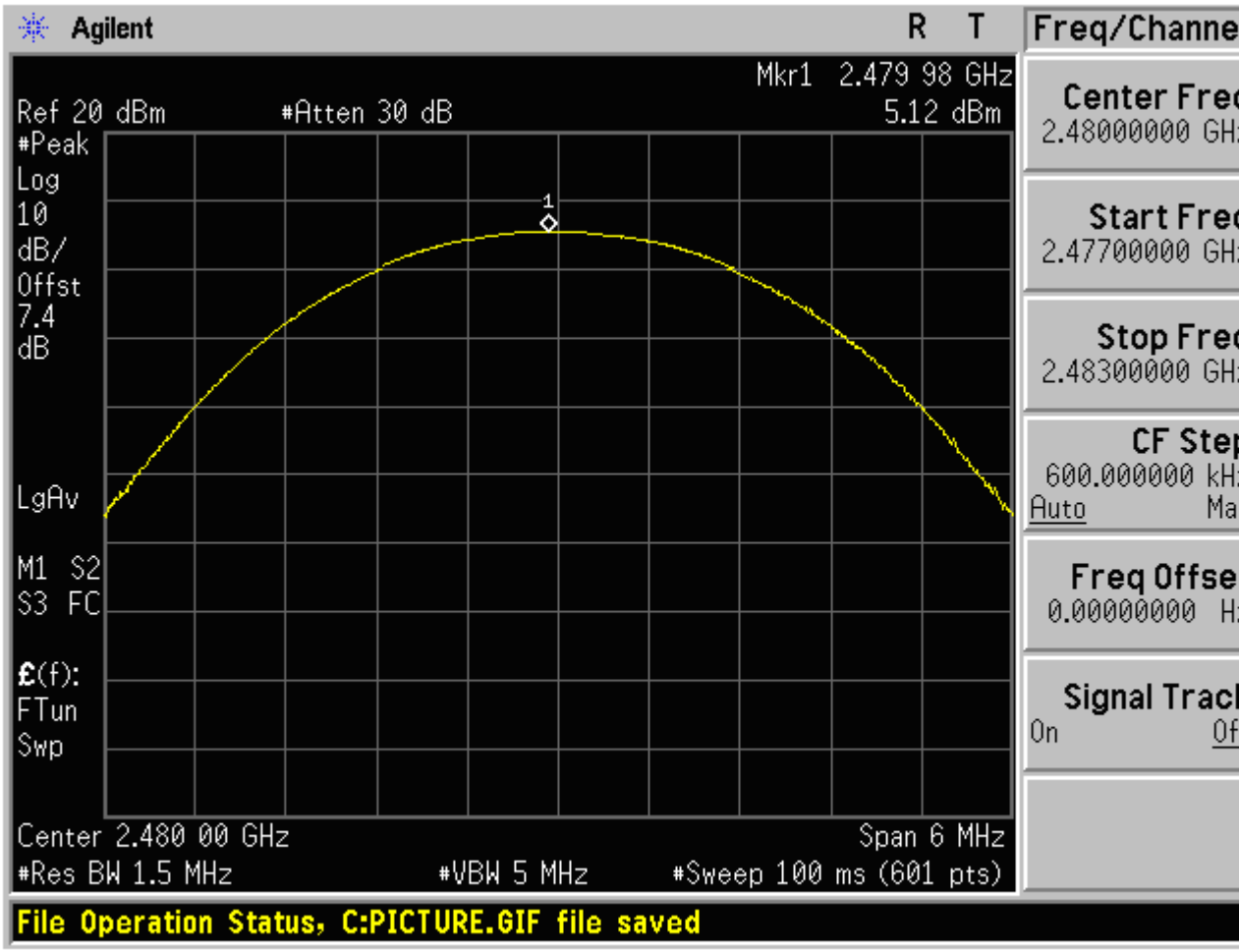
2.7 TM3_3DH5_Ch0



2.8 TM3_3DH5_Ch39



2.9 TM3_3DH5_Ch78



Appendix F: Band edge spurious emission

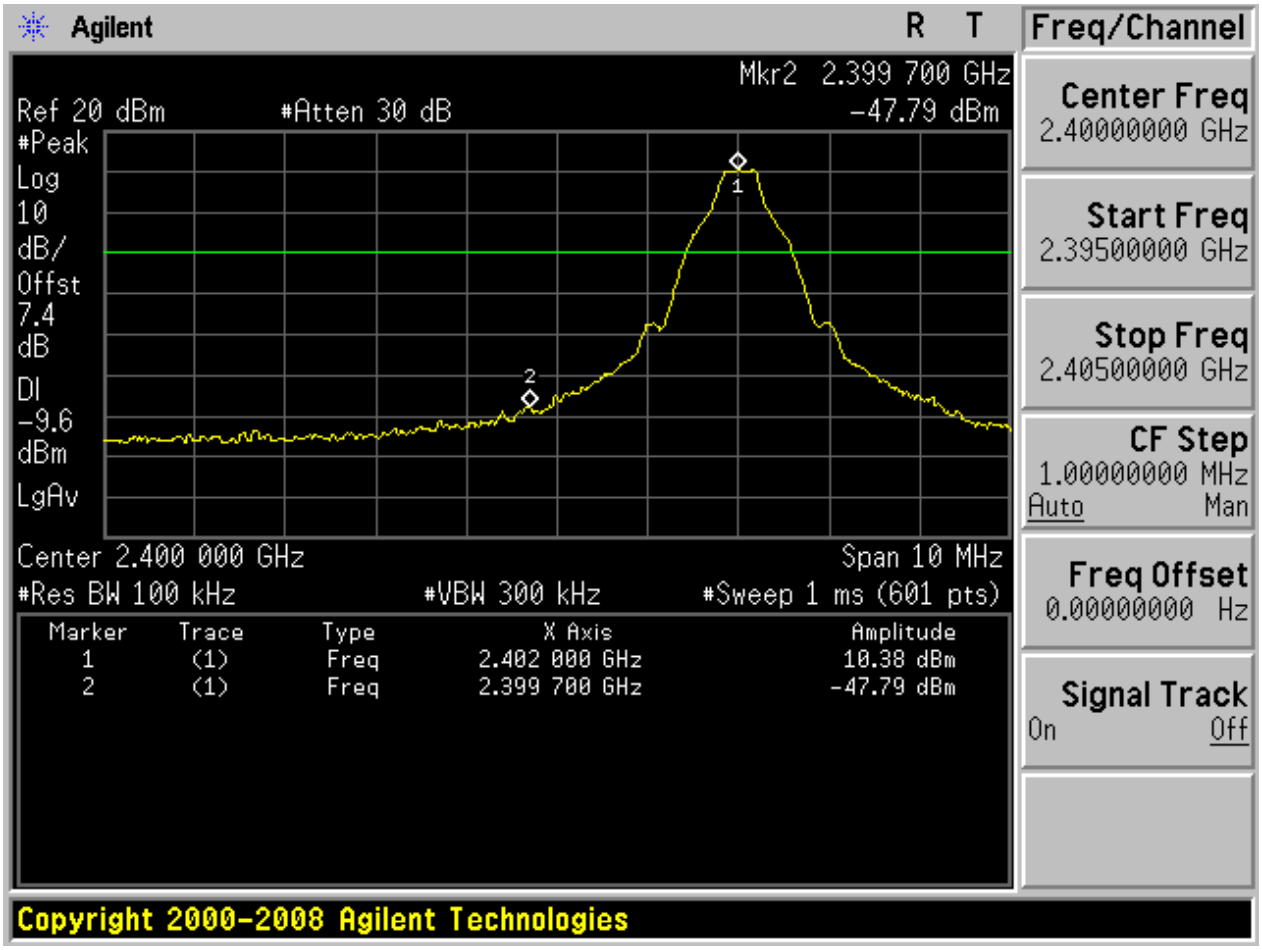
1 Result Table

EUT Conf.	Channel No.	Carrier Frequency [MHz]	Max. Spurious Level [dBm]	Frequency Hopping	Carrier Power [dBm]	Limit [dBm]	Result
TM1_DH5_Ch0	0	2402	-47.79	Off	10.38	-9.62	Pass
	-	-	-49.63	On	9.85	-10.15	Pass
TM1_DH5_Ch78	78	2480	-53.02	Off	10.33	-9.67	Pass
	-	-	-54.34	On	9.72	-10.28	Pass
TM2_2DH5_Ch0	0	2402	-50.92	Off	8.53	-11.47	Pass
	-	-	-53.34	On	7.46	-12.54	Pass
TM2_2DH5_Ch78	78	2480	-53.95	Off	8.45	-11.55	Pass
	-	-	-54.17	On	8.53	-11.47	Pass
TM3_3DH5_Ch0	0	2402	-49.53	Off	8.33	-11.67	Pass
	-	-	-53.44	On	7.48	-12.52	Pass
TM3_3DH5_Ch78	78	2480	-54.07	Off	8.60	-11.4	Pass
	-	-	-53.46	On	8.08	-11.92	Pass

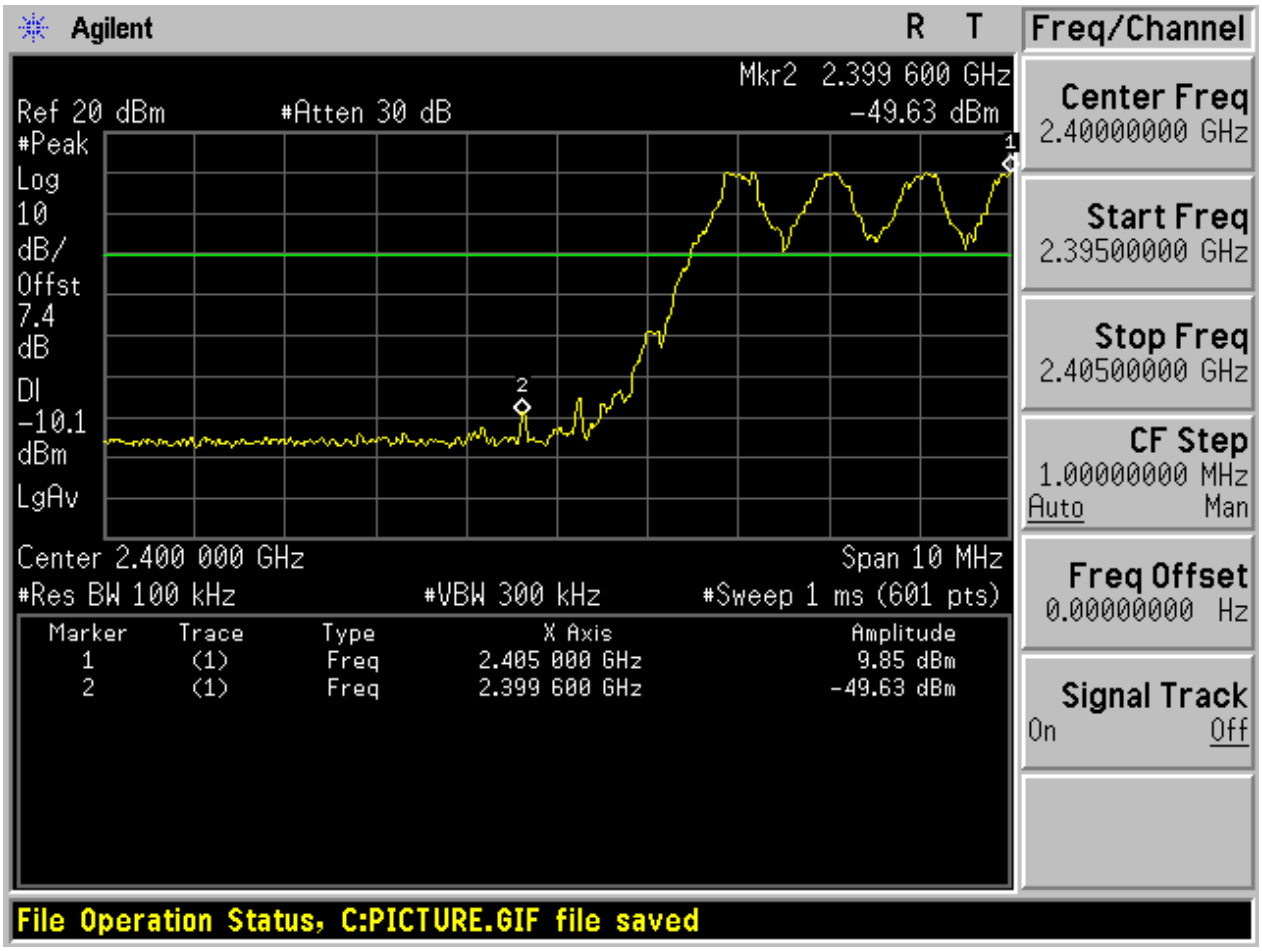
2 Test Plot

2.1 TM1_DH5_Ch0

No hopping

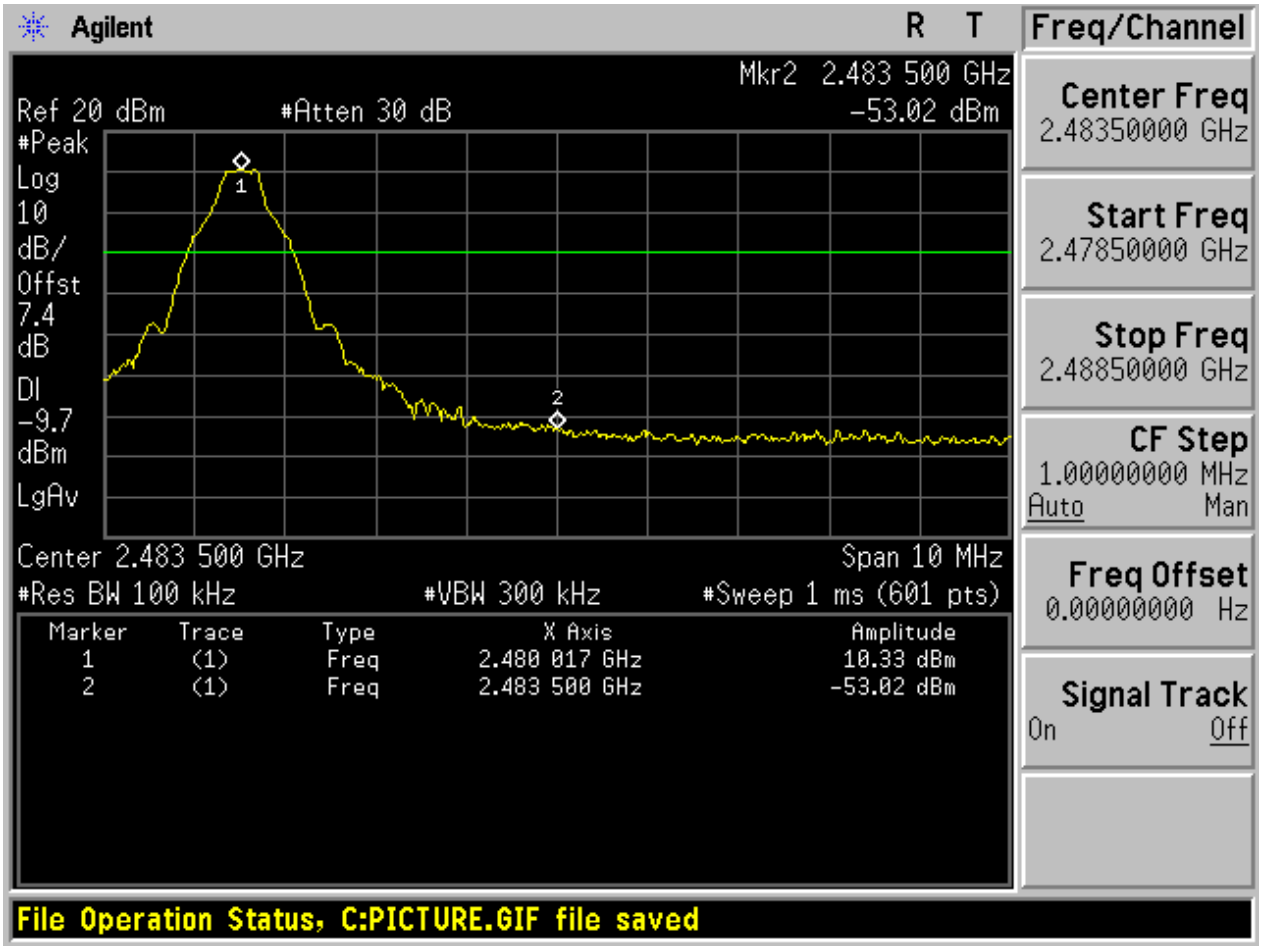


With hopping

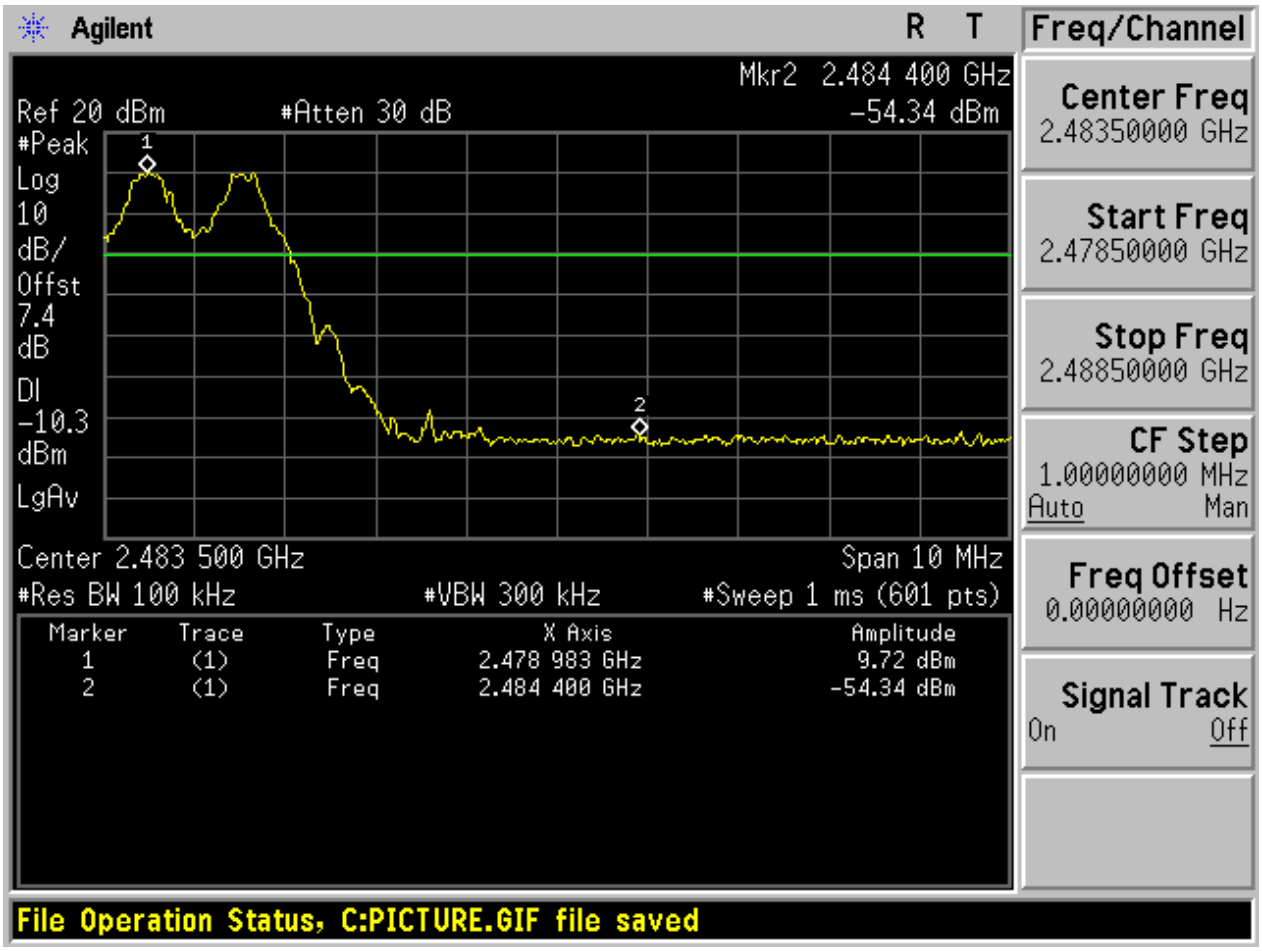


2.2 TM1_DH5_Ch78

No hopping

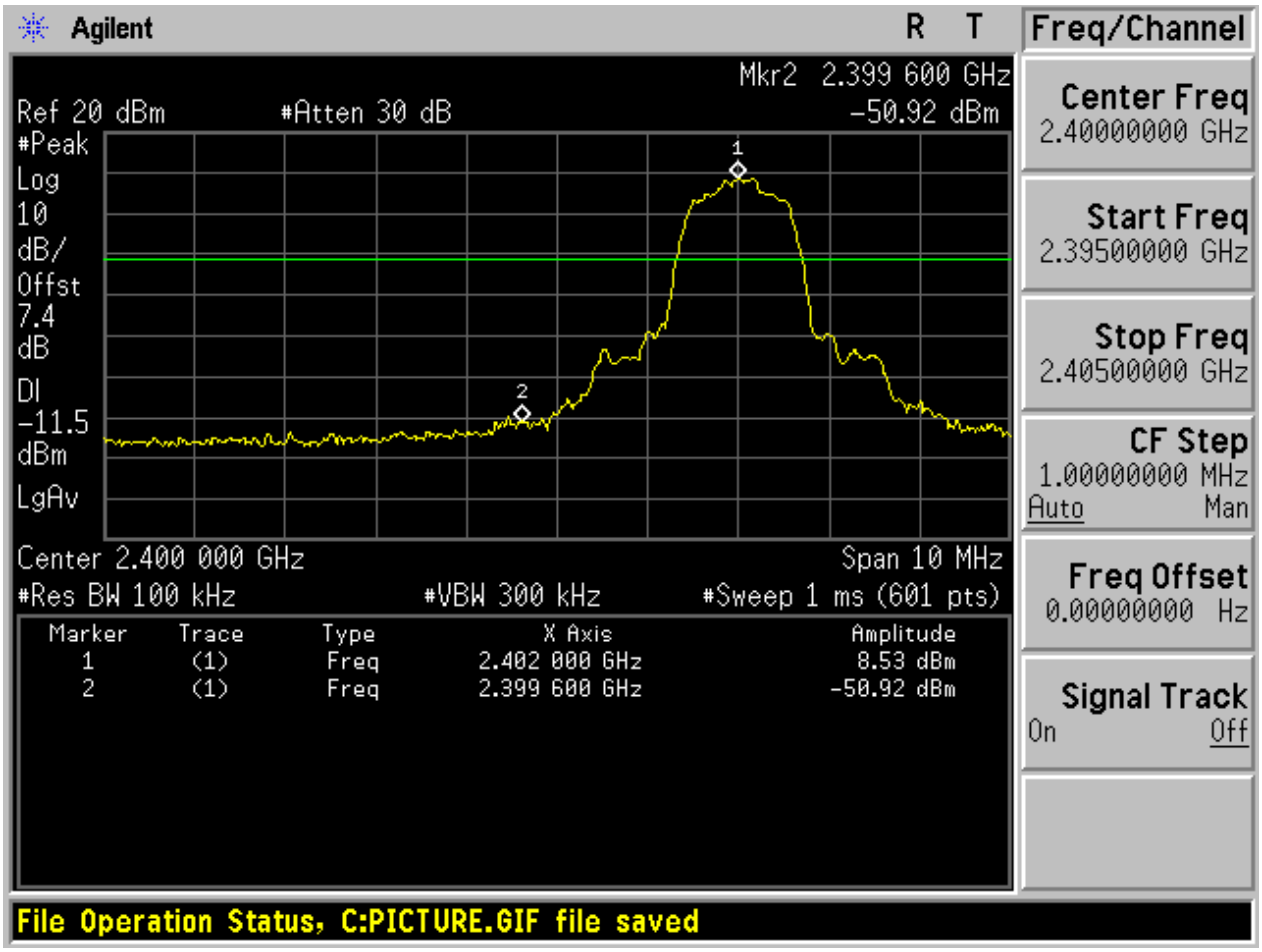


With hopping

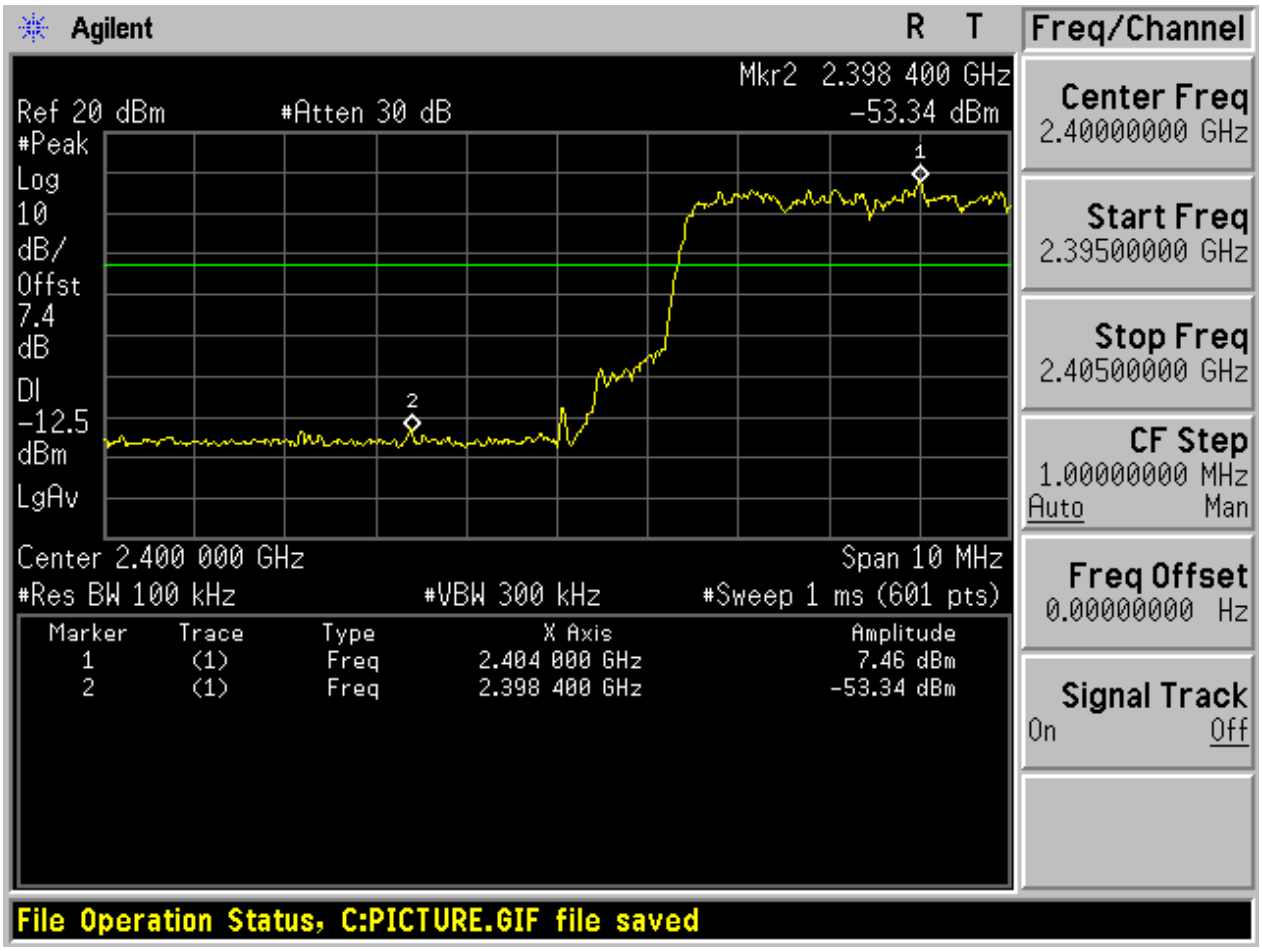


2.3 TM2_2DH5_Ch0

No hopping

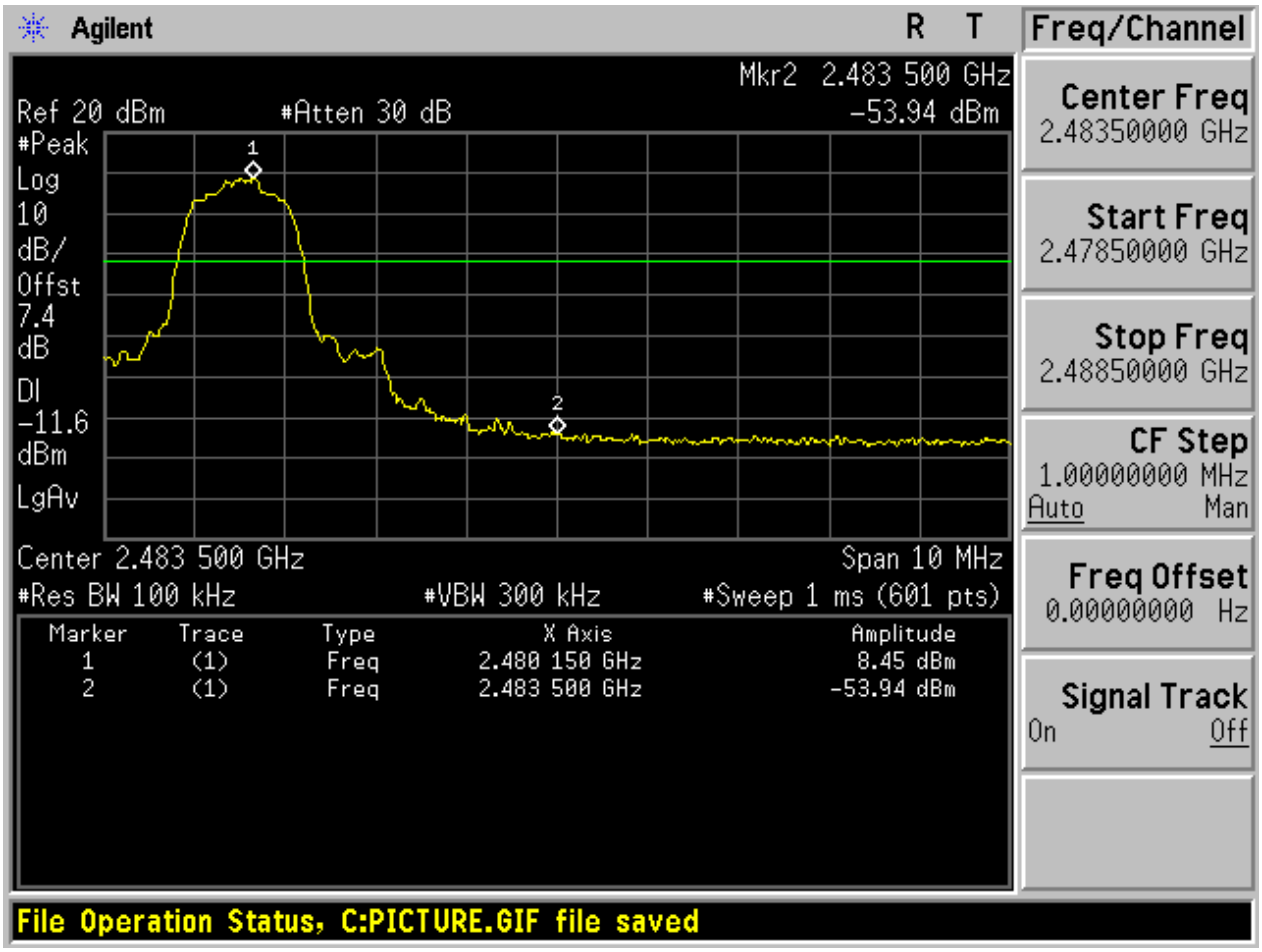


With hopping

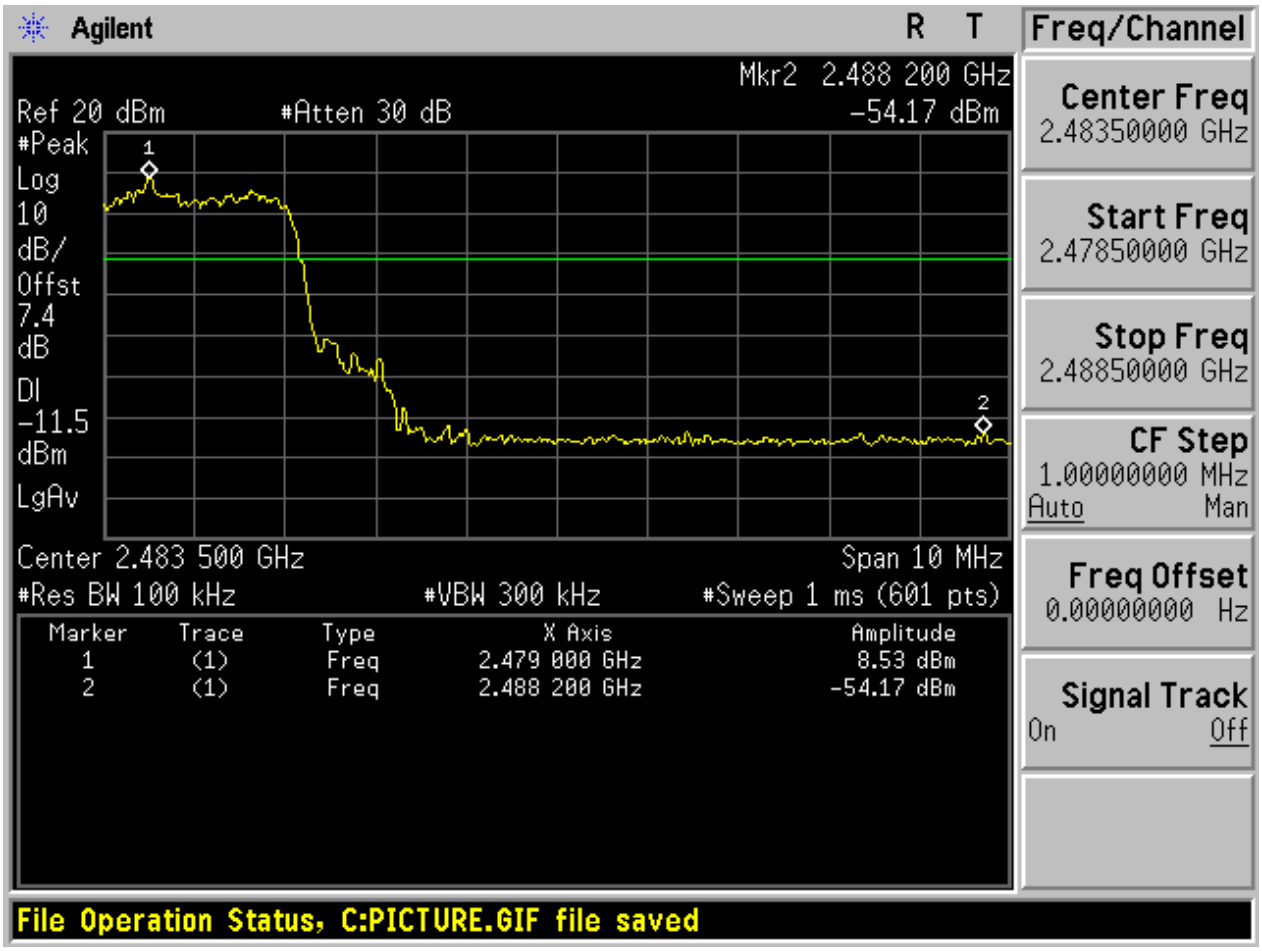


2.4 TM2_2DH5_Ch78

No hopping

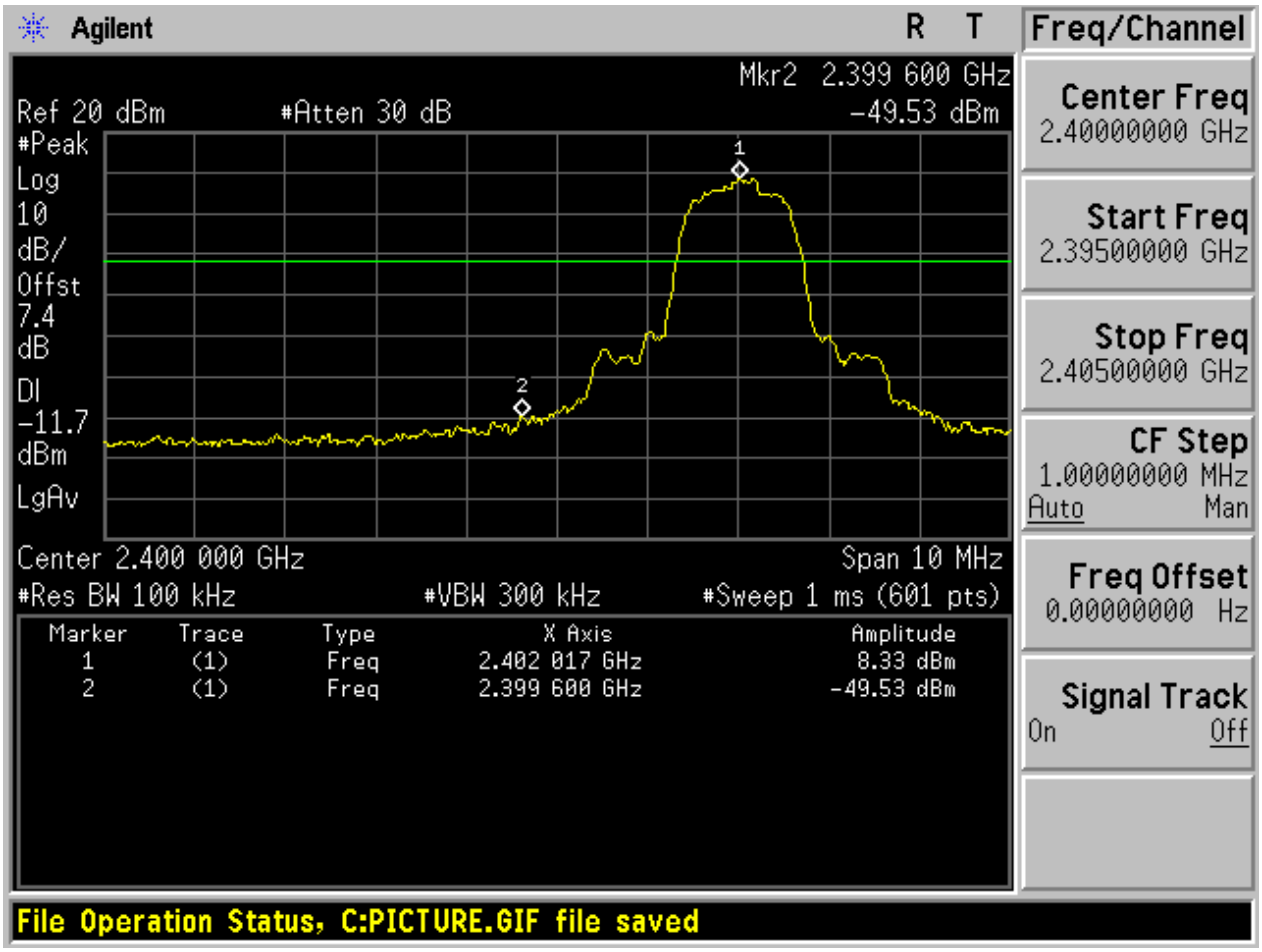


With hopping

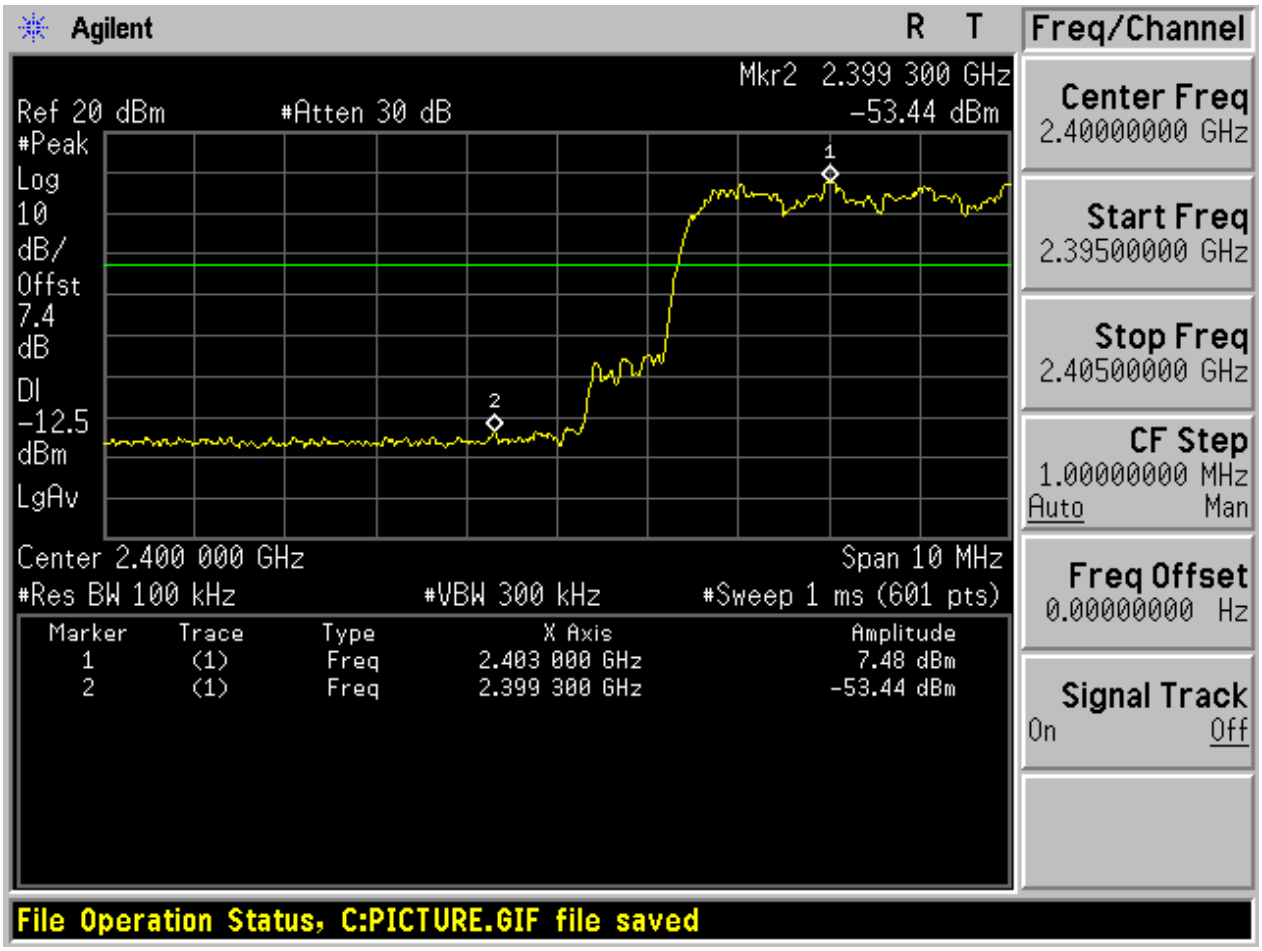


2.5 TM3_3DH5_Ch0

No hopping

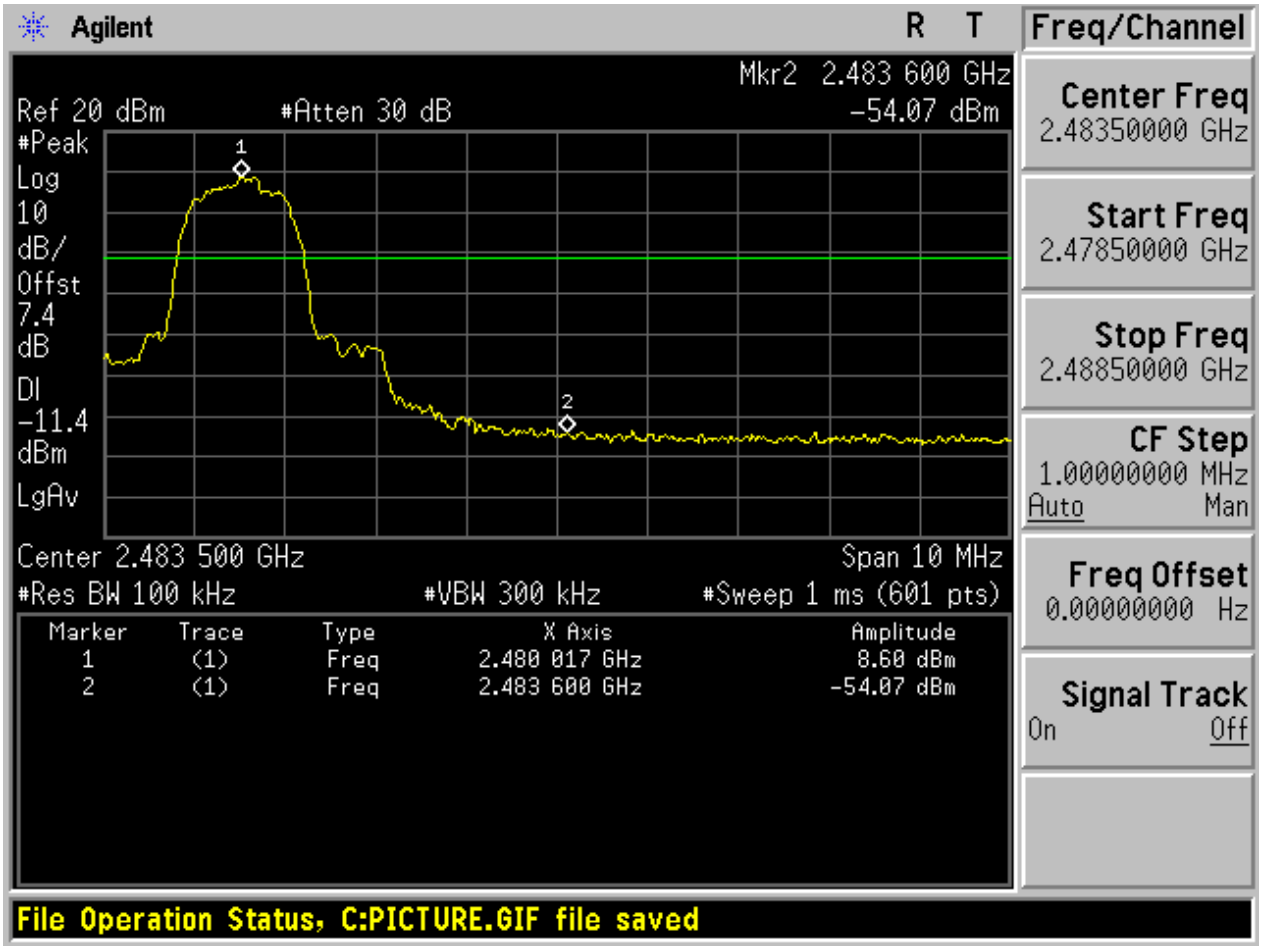


With hopping

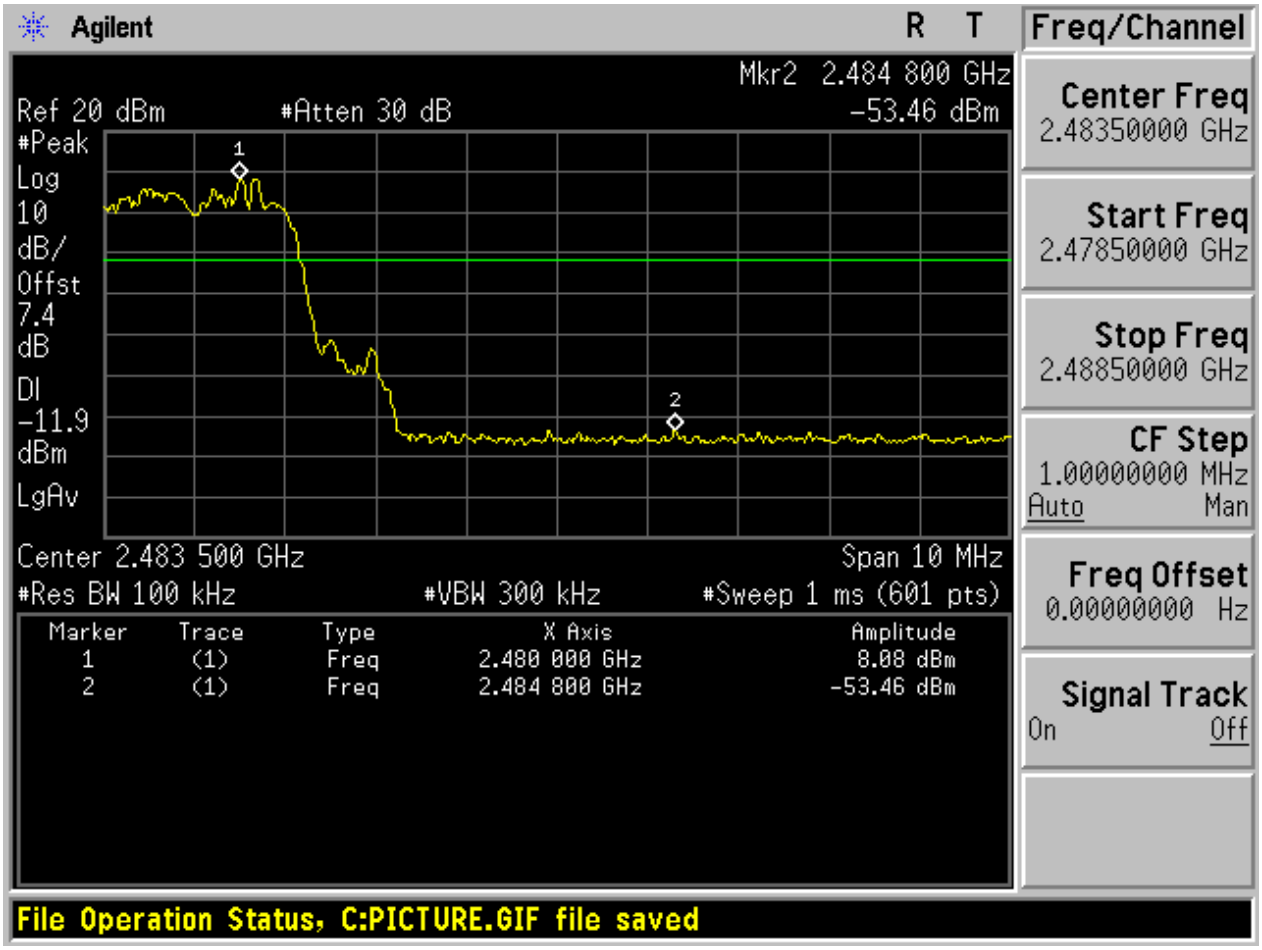


2.6 TM3_3DH5_Ch78

No hopping



With hopping



Appendix G: Conducted RF Spurious Emission

1 Result Table

In this Appendix, the “Pref” refers to the peak power level in any 100 kHz bandwidth within the fundamental emission which is used as the reference level, the “Puw” referrers to the maximum emission power in 100 kHz band segments outside of the authorized frequency band.

Considering that the higher ratio of RBW to the span for the frequency ranges below 30 MHz makes the results determination be complicated, a narrower RBW other than 100 kHz is used for these ranges. The measured value should add a RBW correction factor (RBWCF) where RBWCF [dB] = 10 x lg(100 [kHz]/narrower RBW [kHz]). As to this Appendix, the narrower RBW is 1 kHz and RBWCF is 20 dB for the frequency 9 kHz to 150 kHz, and the narrower RBW is 10 kHz and RBWCF is 10 dB for the frequency 150 kHz to 30 MHz.

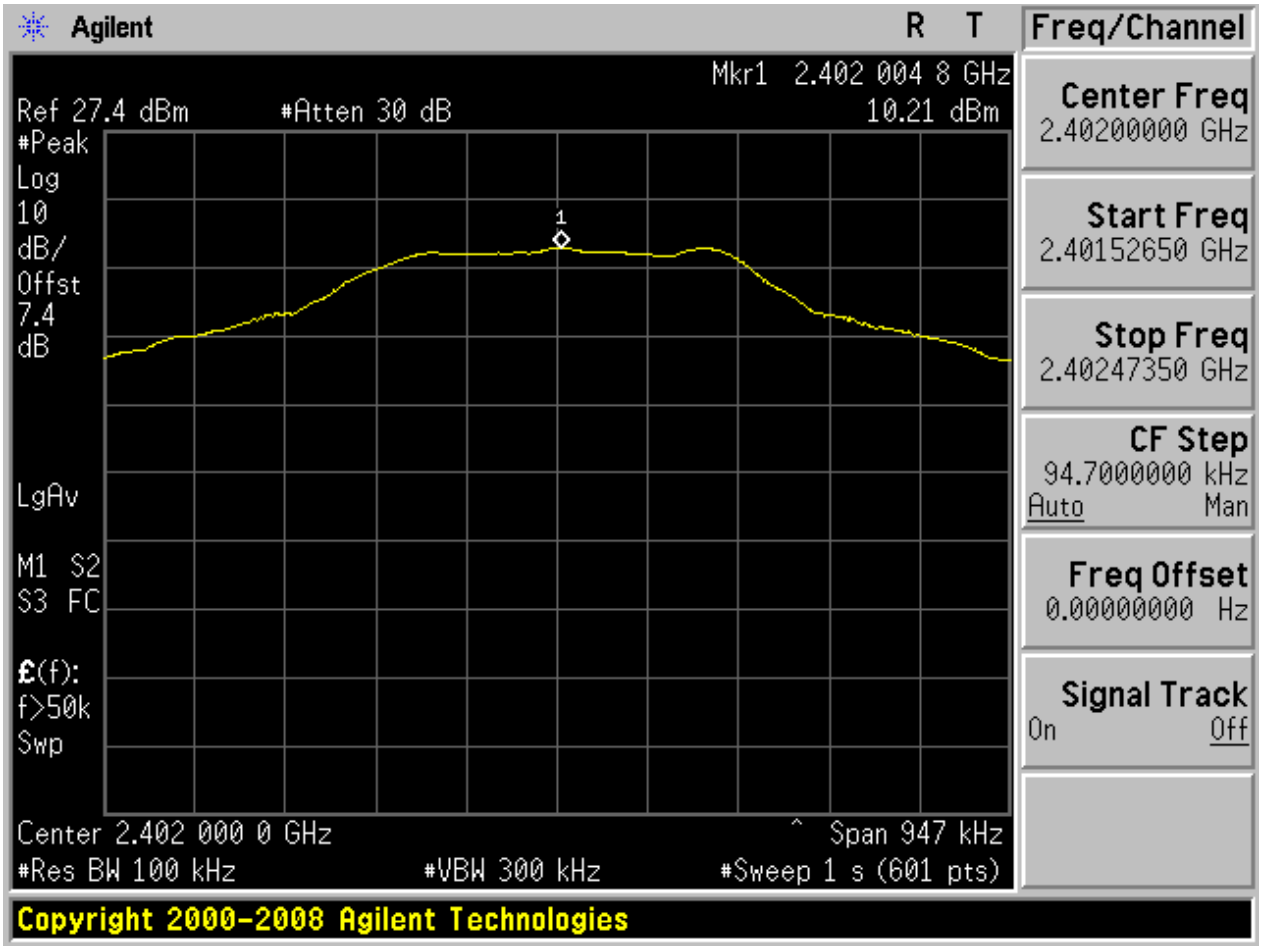
In the result table, the “< Limit” denotes that “The Puw [dBm] is less than Pref [dBm] - 20 [dB], see test plots for detailed”.

EUT Conf.	Pref [dBm/100 kHz]	Puw [dBm/100 kHz]	Verdict
TM1_DH5_Ch0	10.21	< Limit	Pass
TM1_DH5_Ch39	10.22	< Limit	Pass
TM1_DH5_Ch78	10.15	< Limit	Pass
TM2_2DH5_Ch0	8.40	< Limit	Pass
TM2_2DH5_Ch39	8.38	< Limit	Pass
TM2_2DH5_Ch78	8.33	< Limit	Pass
TM3_3DH5_Ch0	8.43	< Limit	Pass
TM3_3DH5_Ch39	8.37	< Limit	Pass
TM3_3DH5_Ch78	8.36	< Limit	Pass

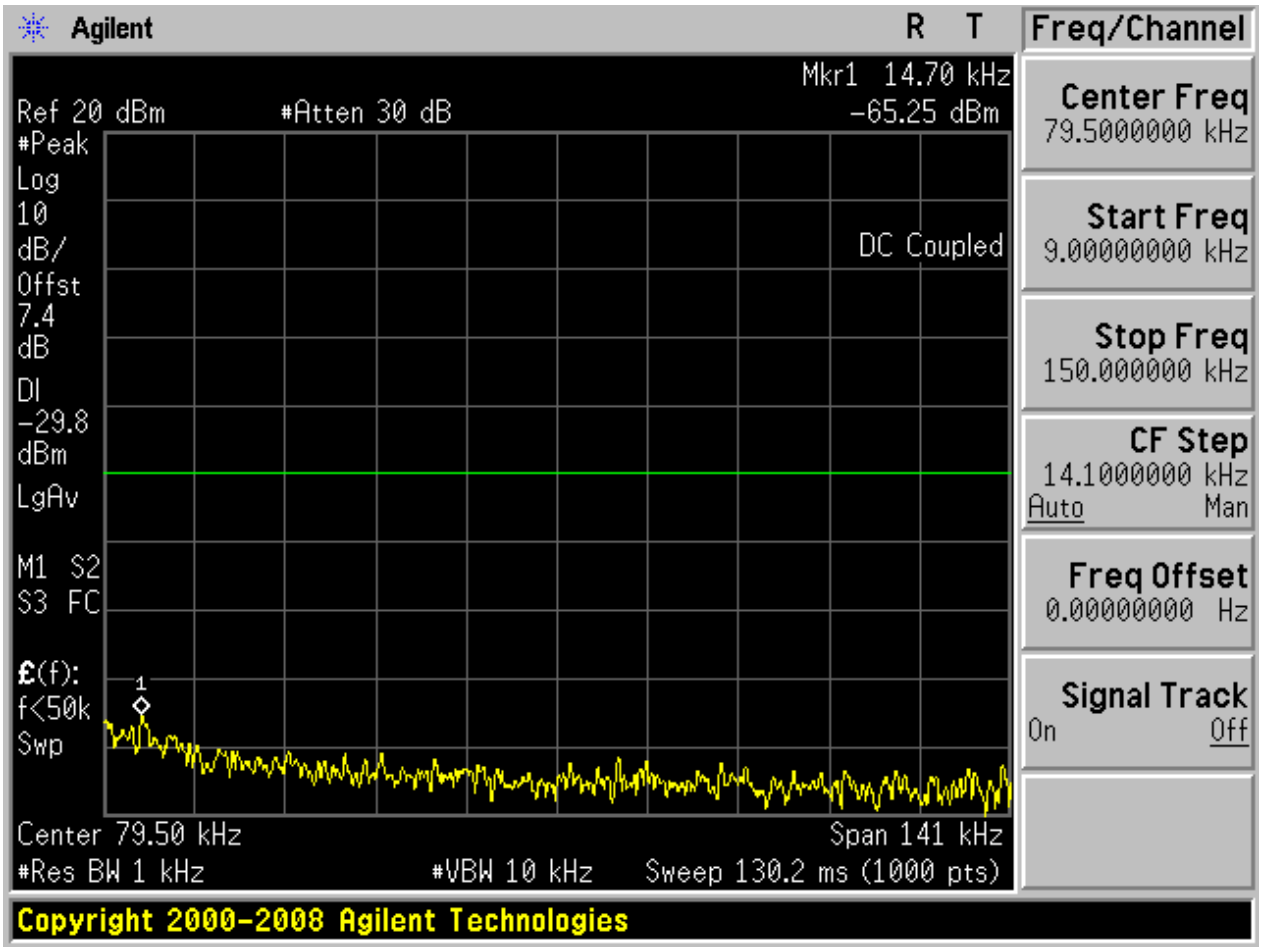
2 Test Plot

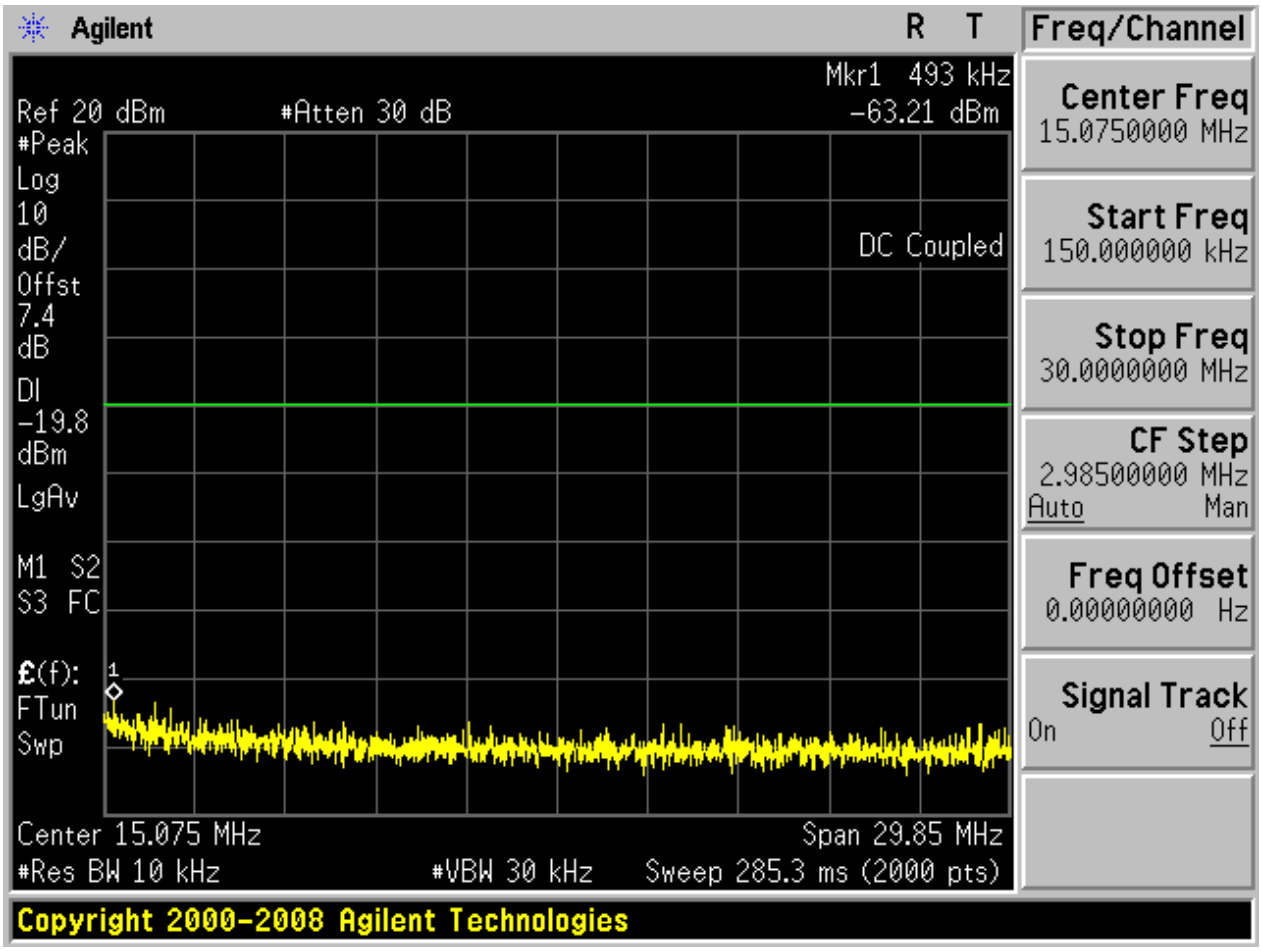
2.1 TM1_DH5_Ch0

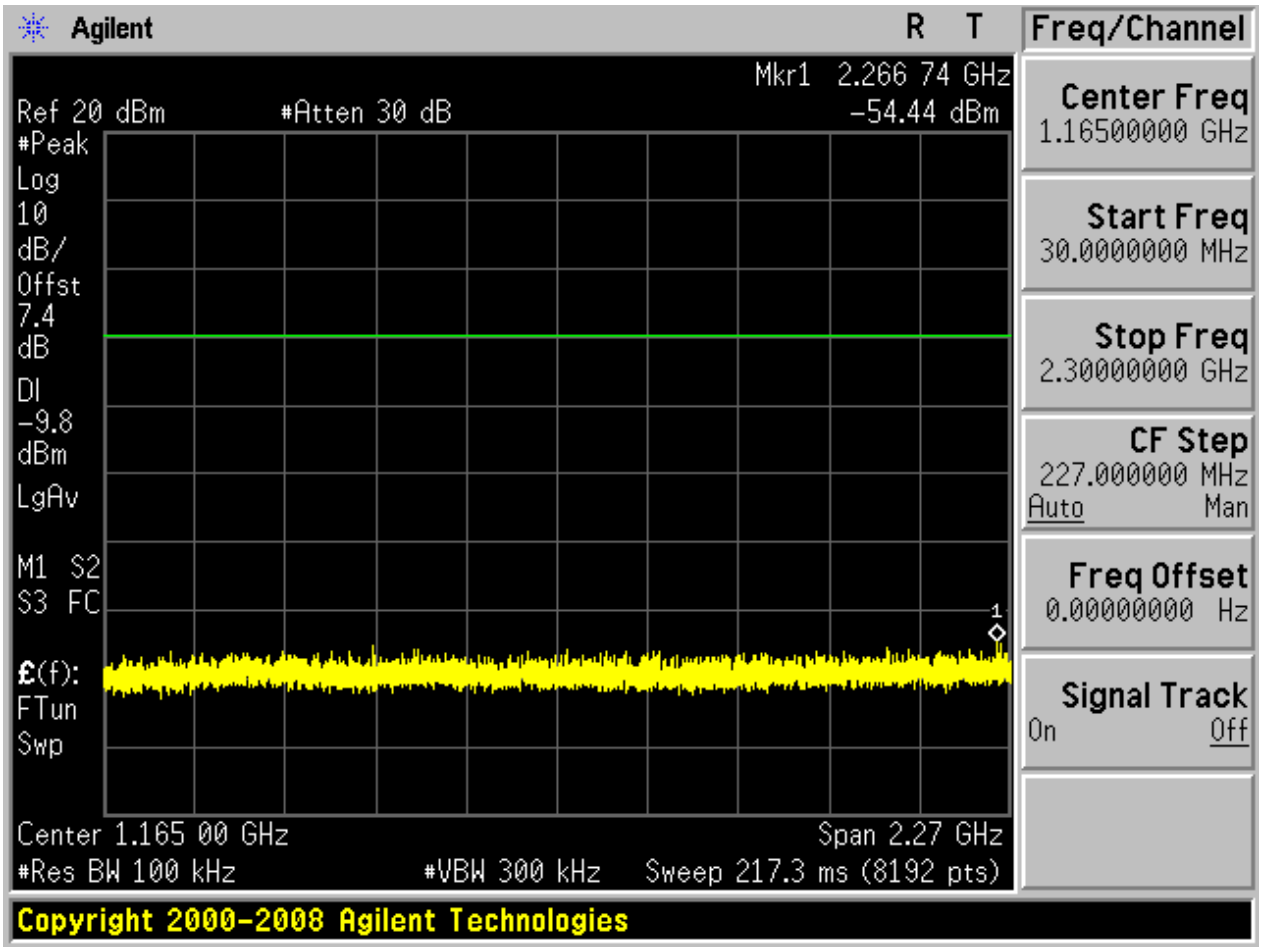
2.1.1 Pref

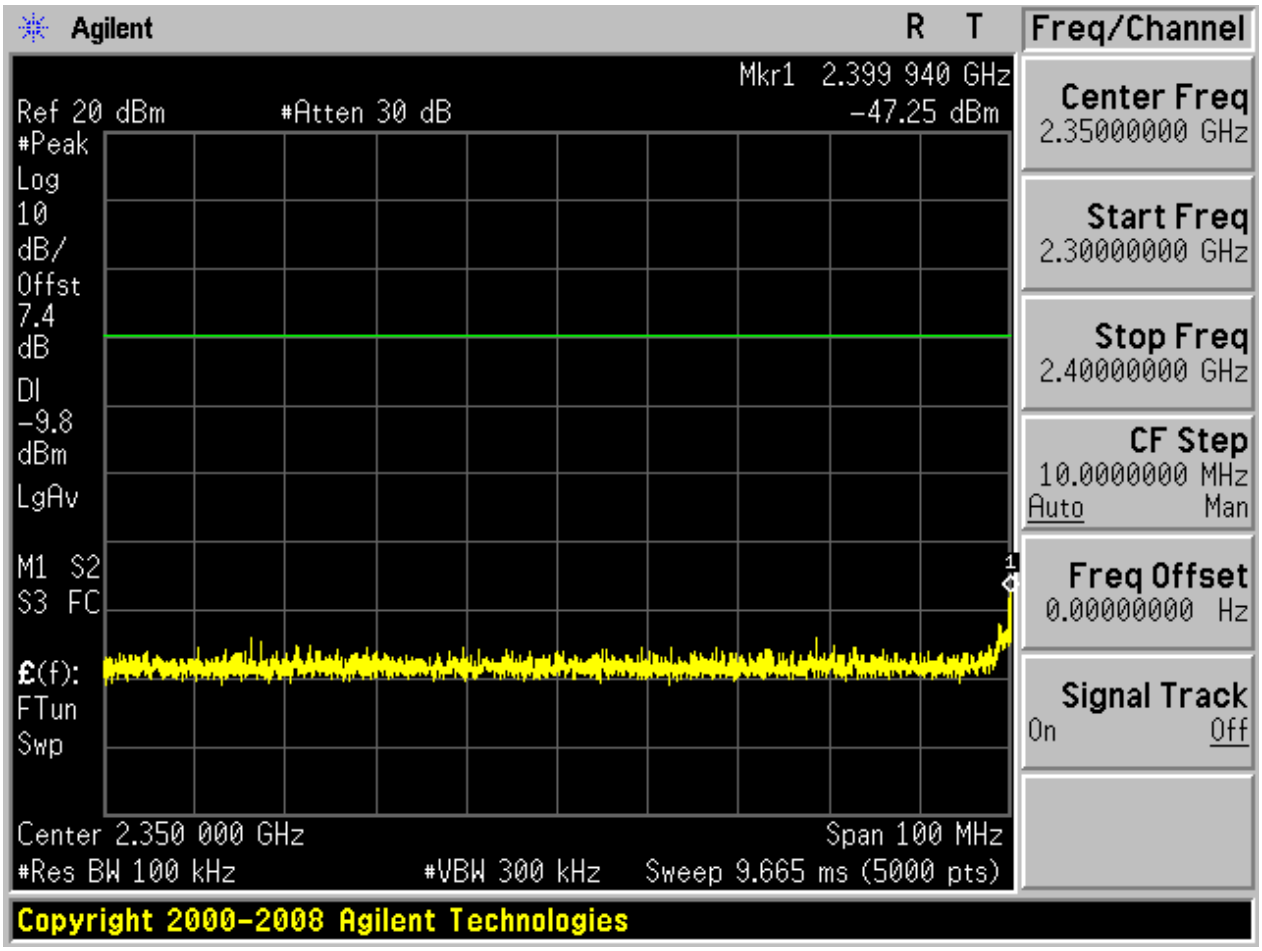


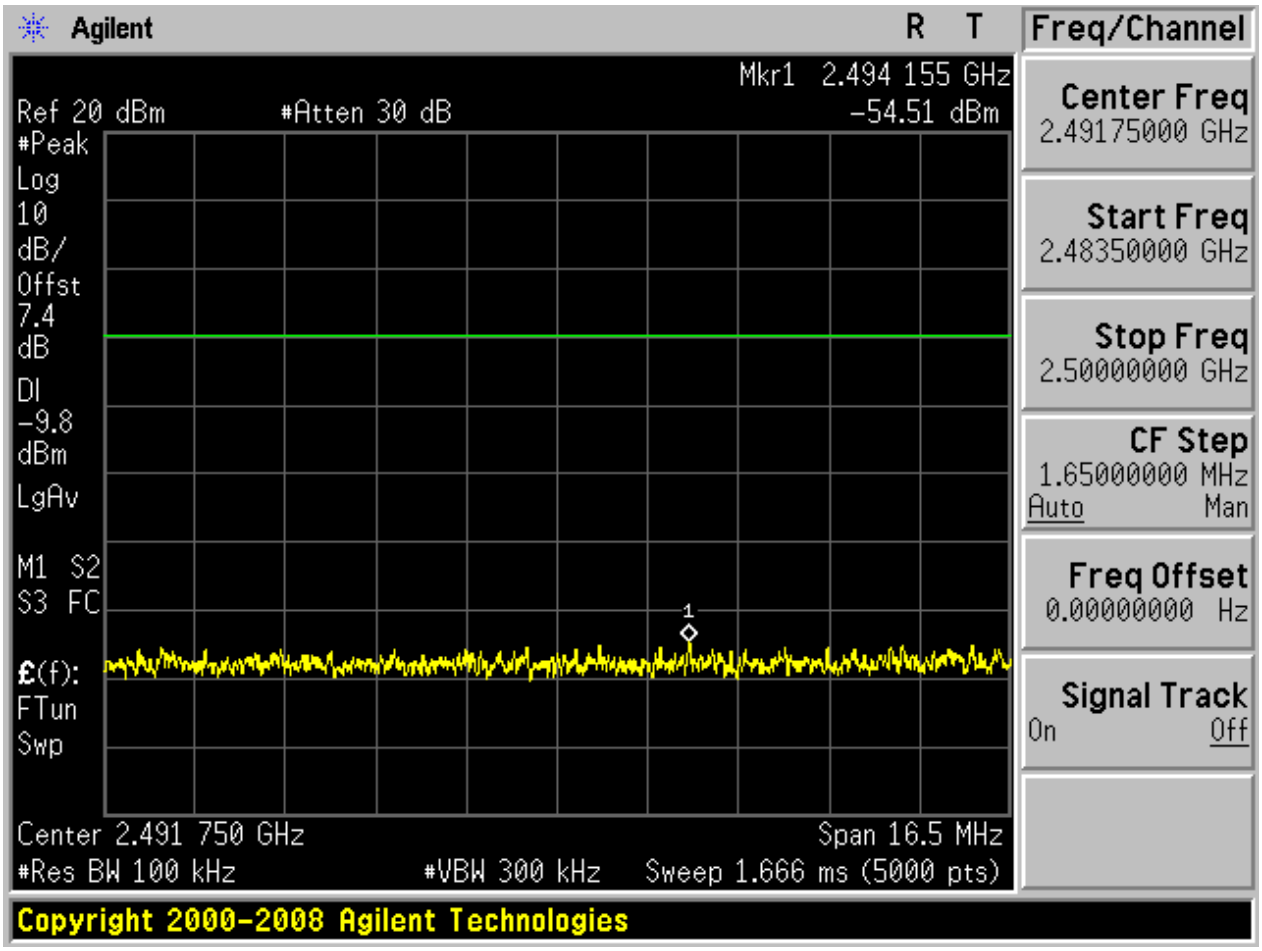
2.1.2 Puw

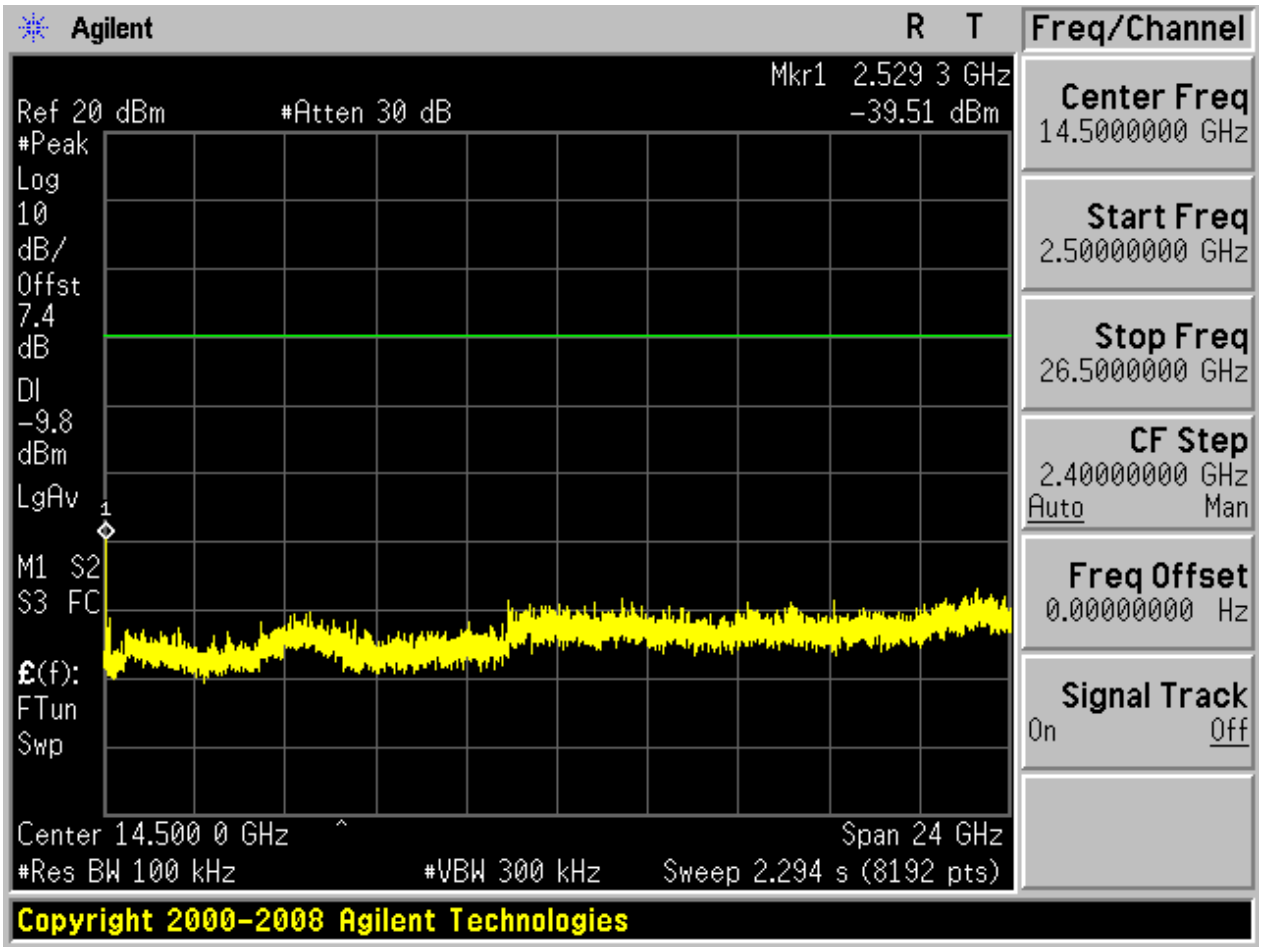






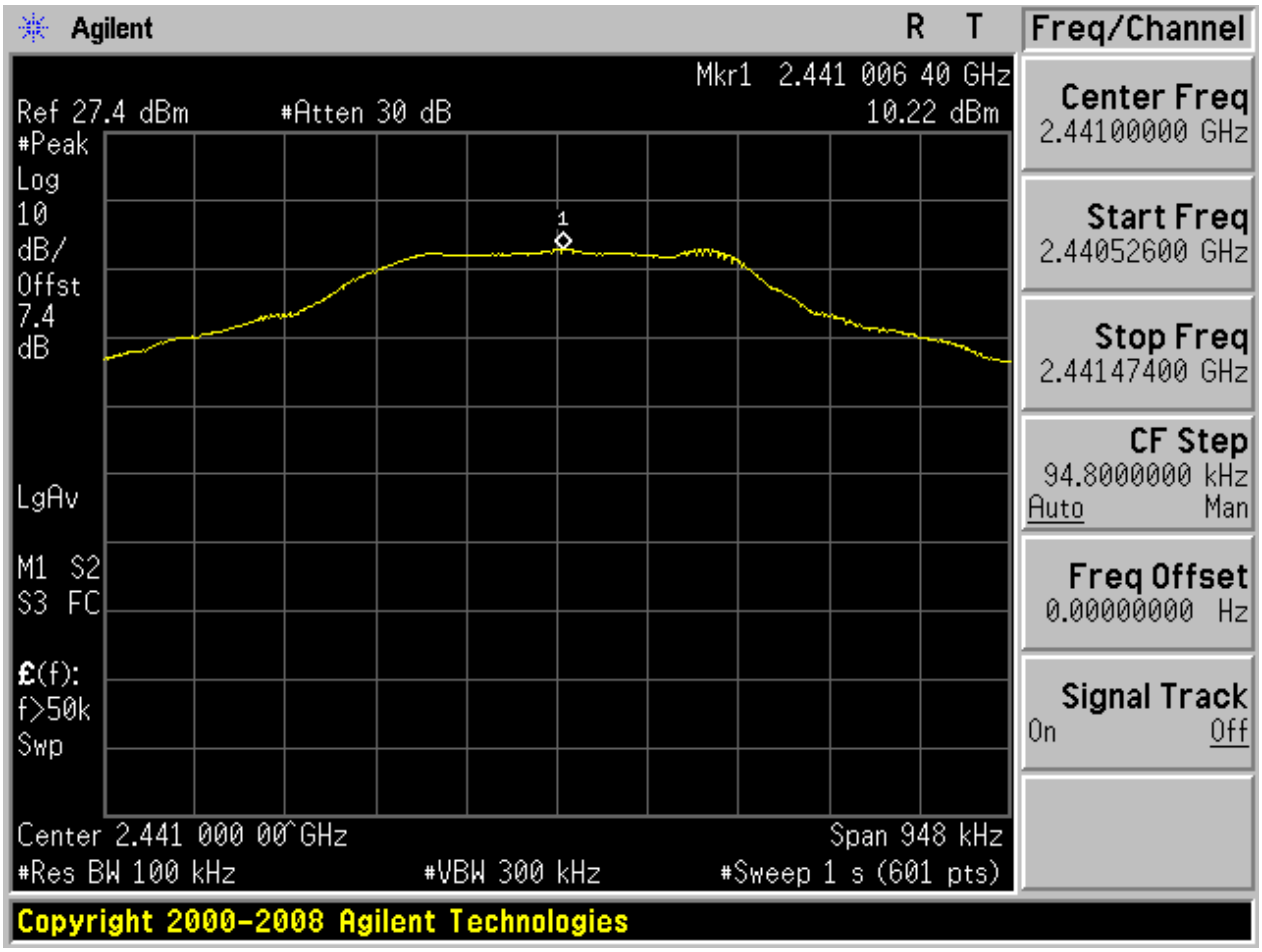




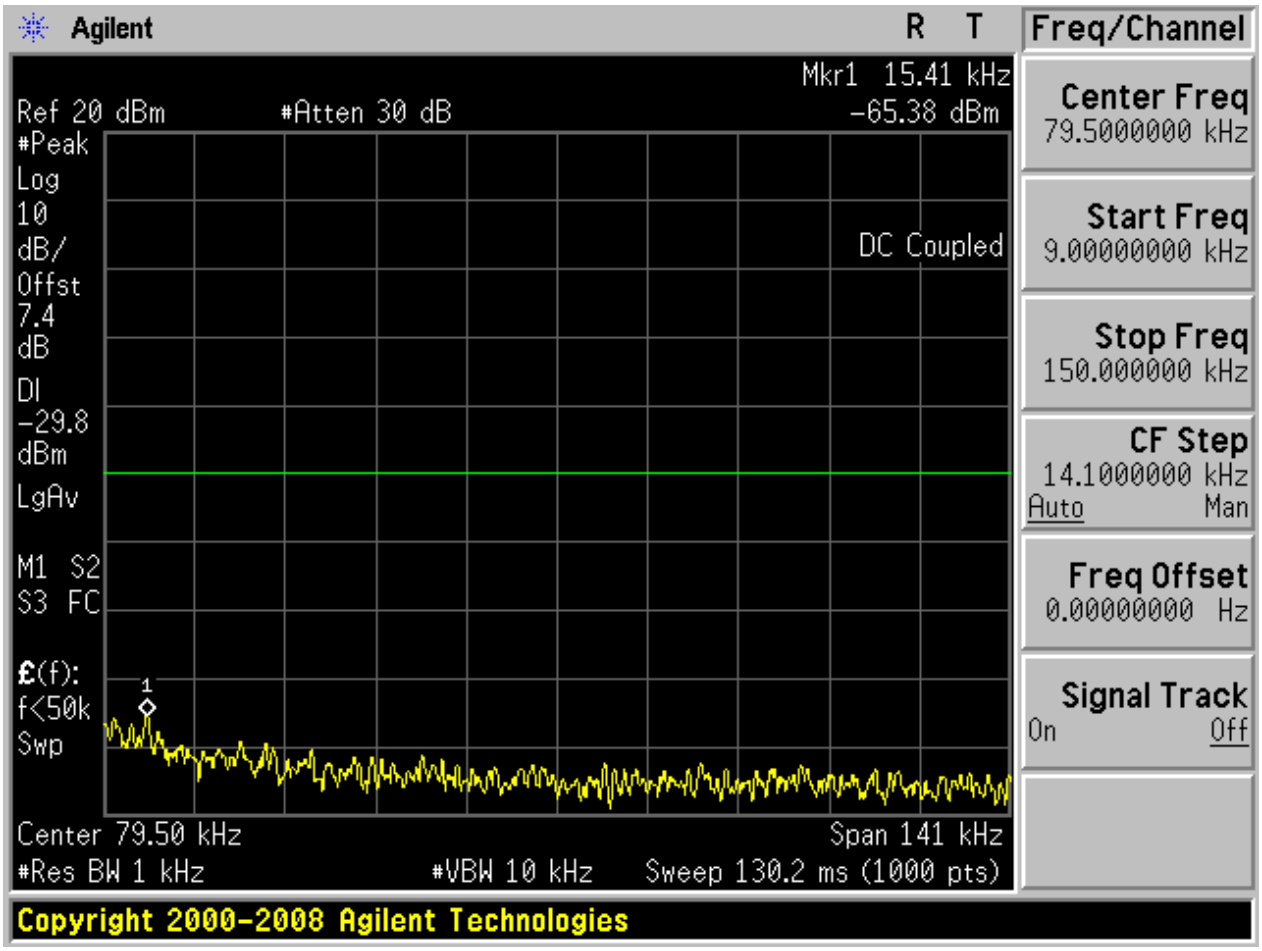


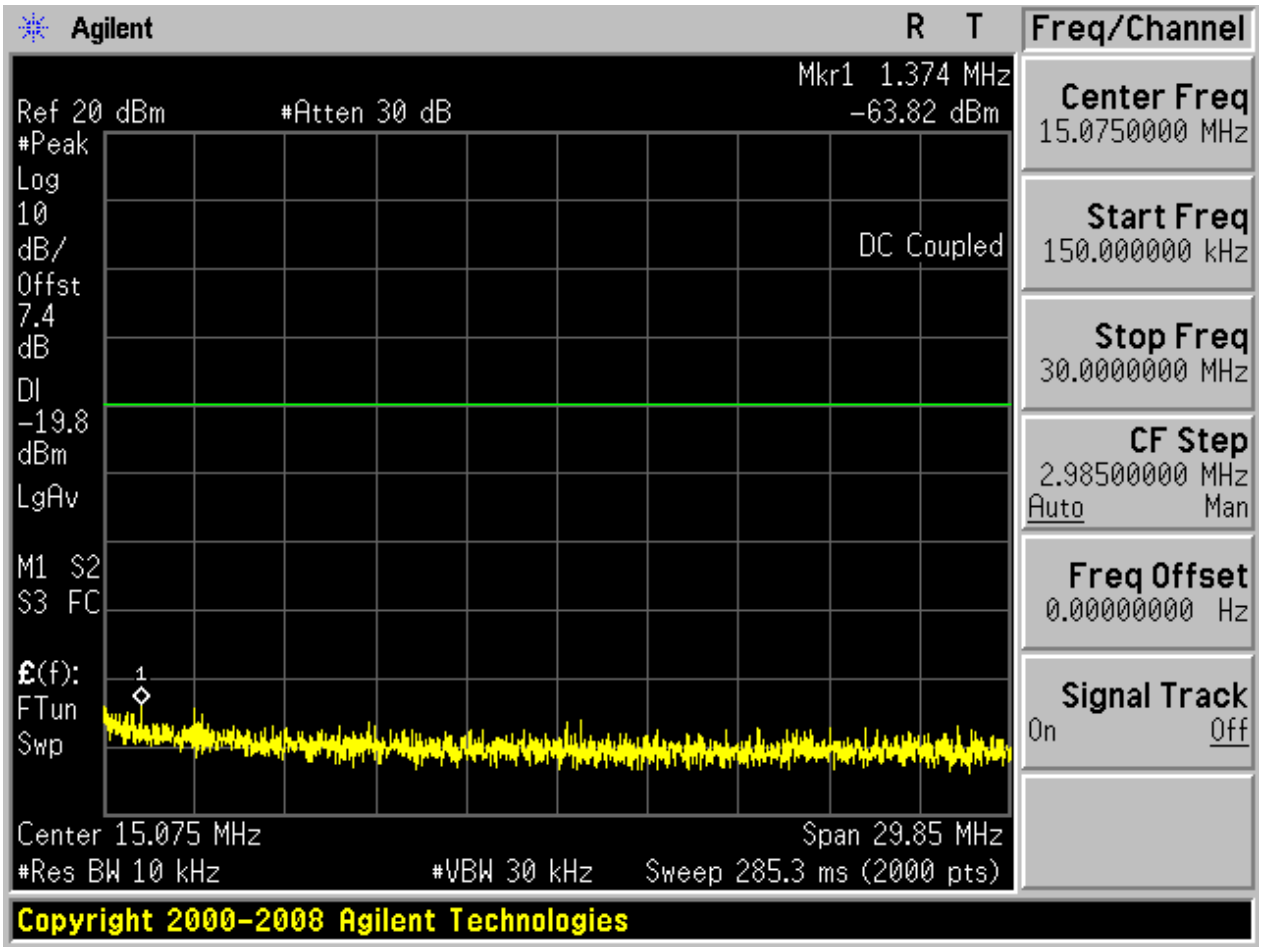
2.2 TM1_DH5_Ch39

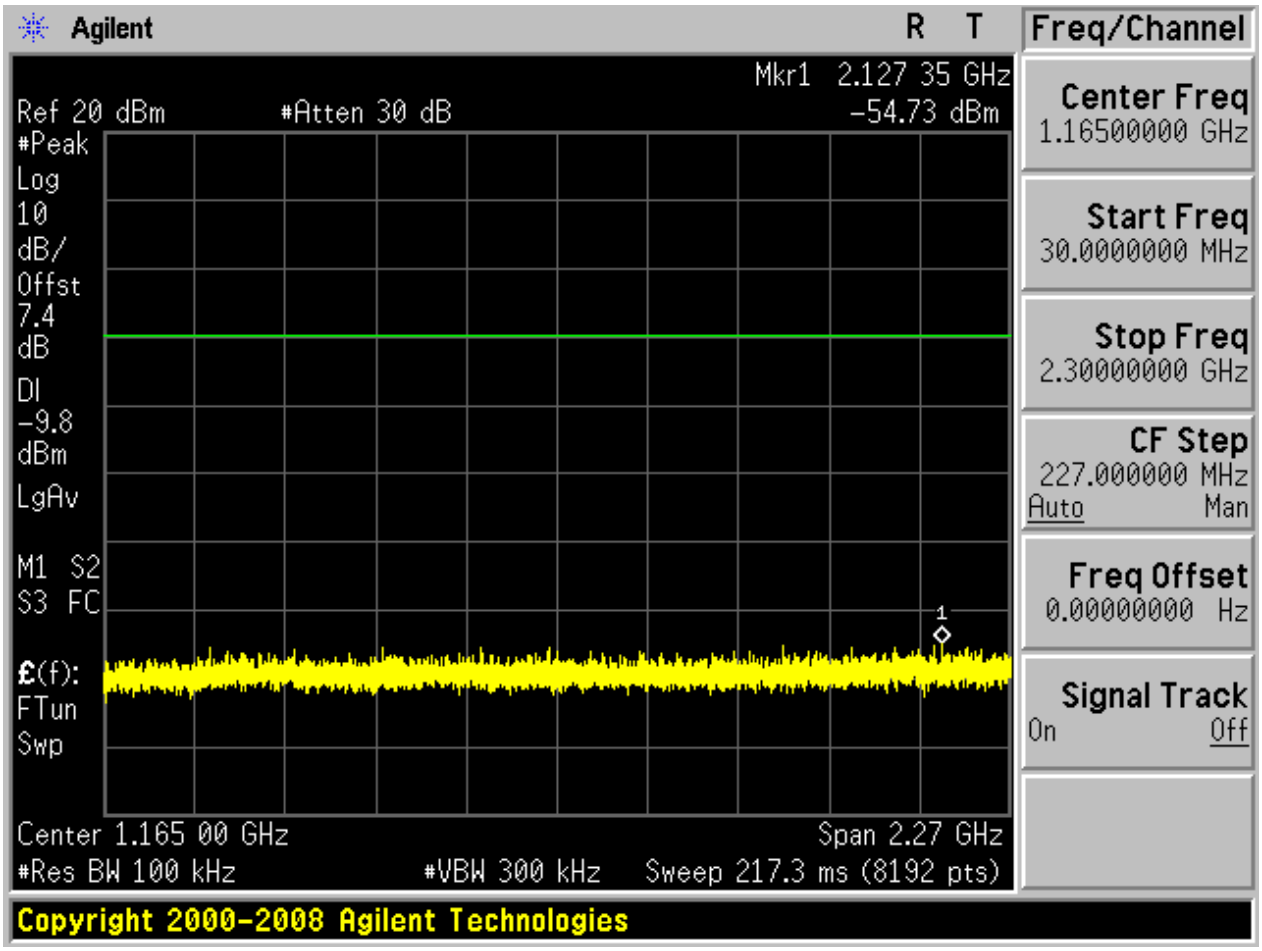
2.2.1 Pref

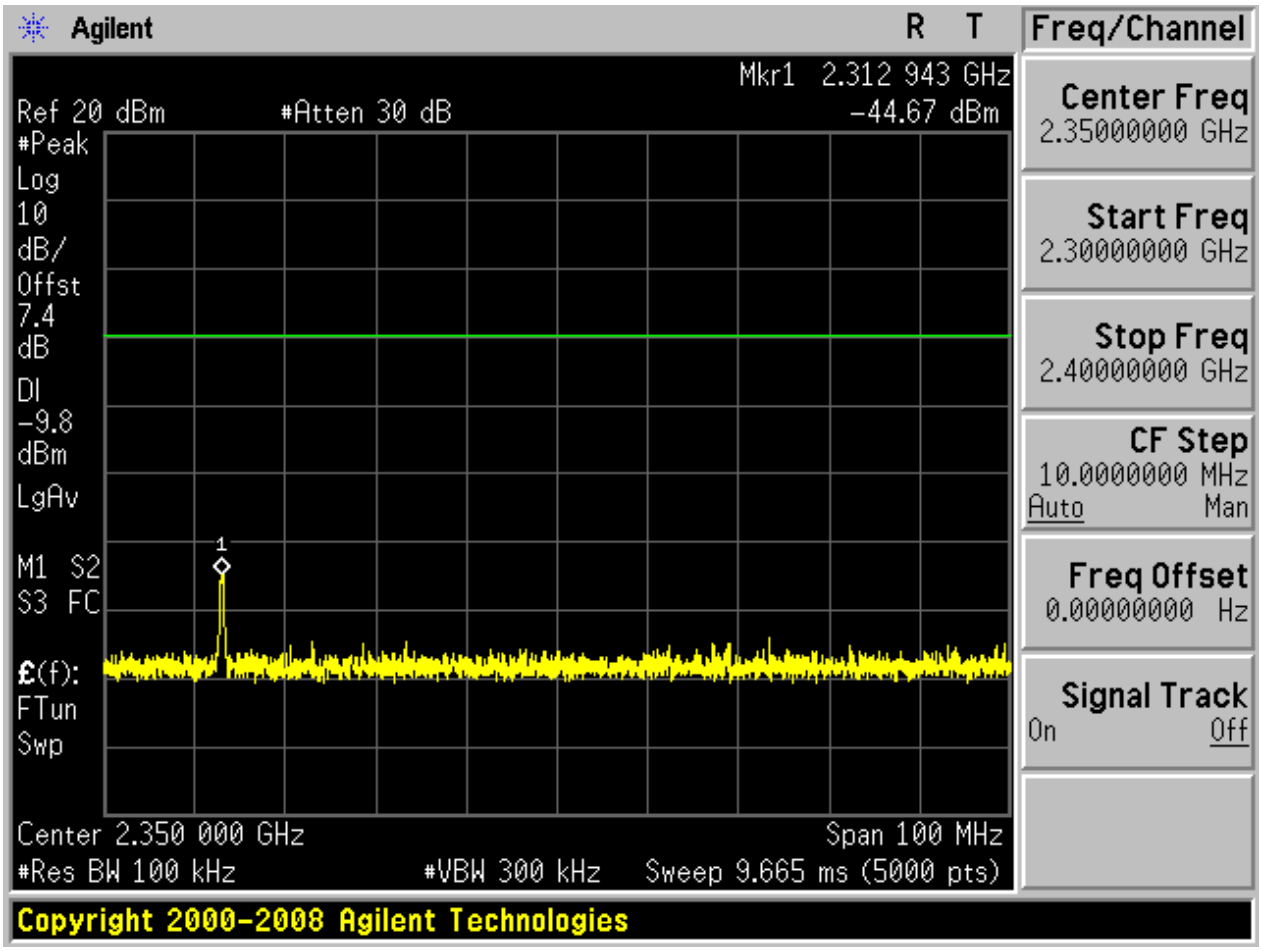


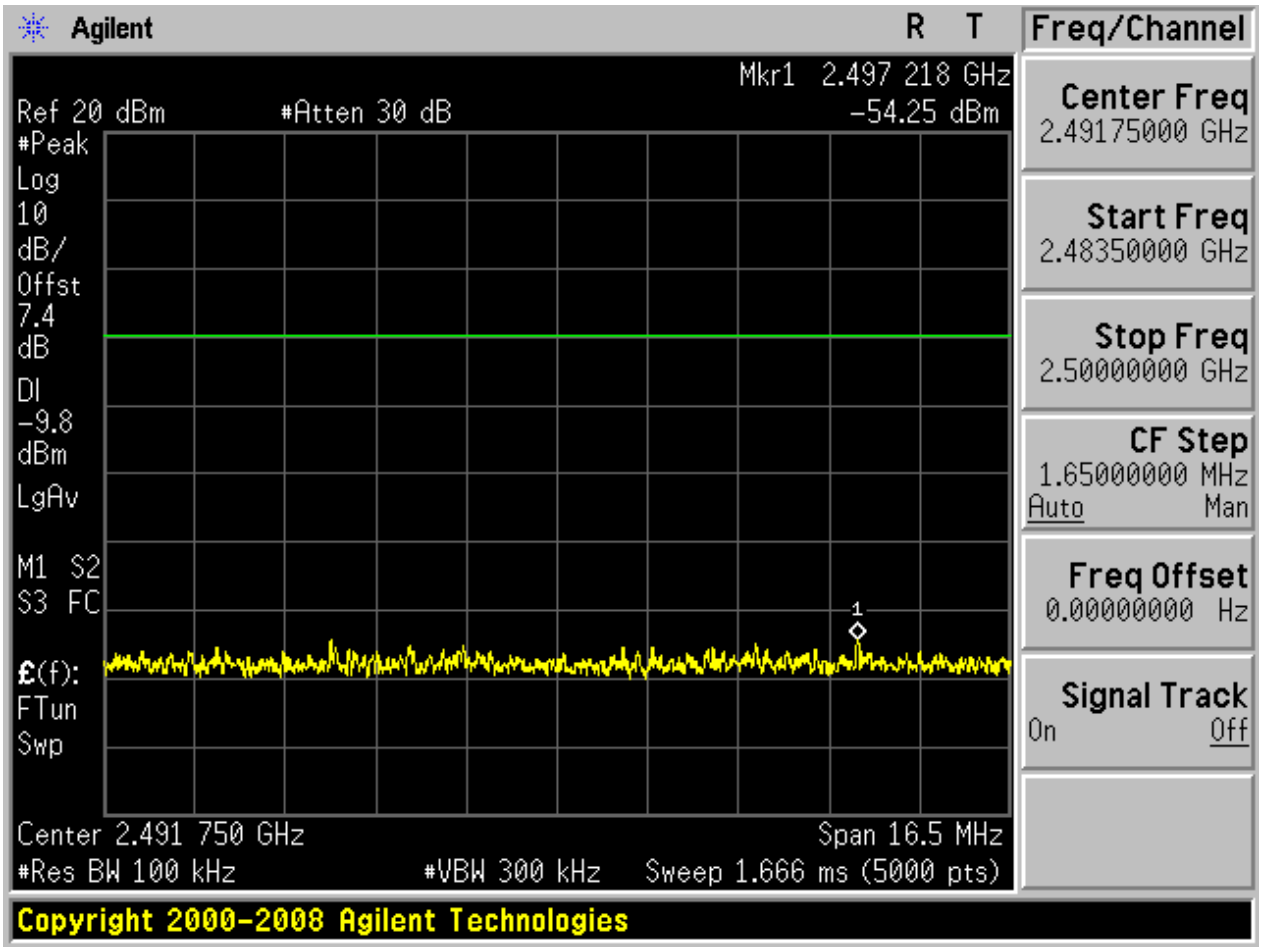
2.2.2 Puw

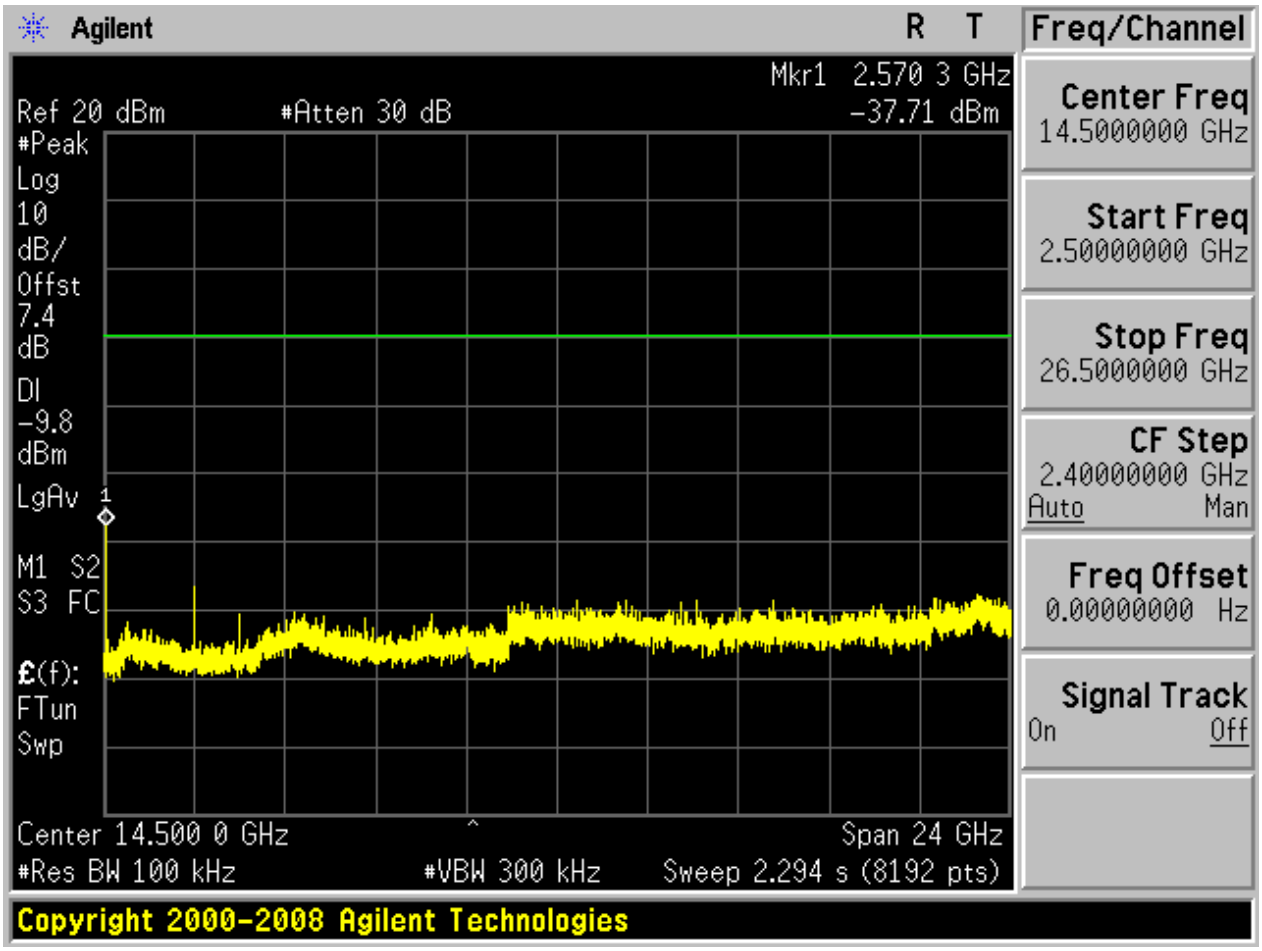






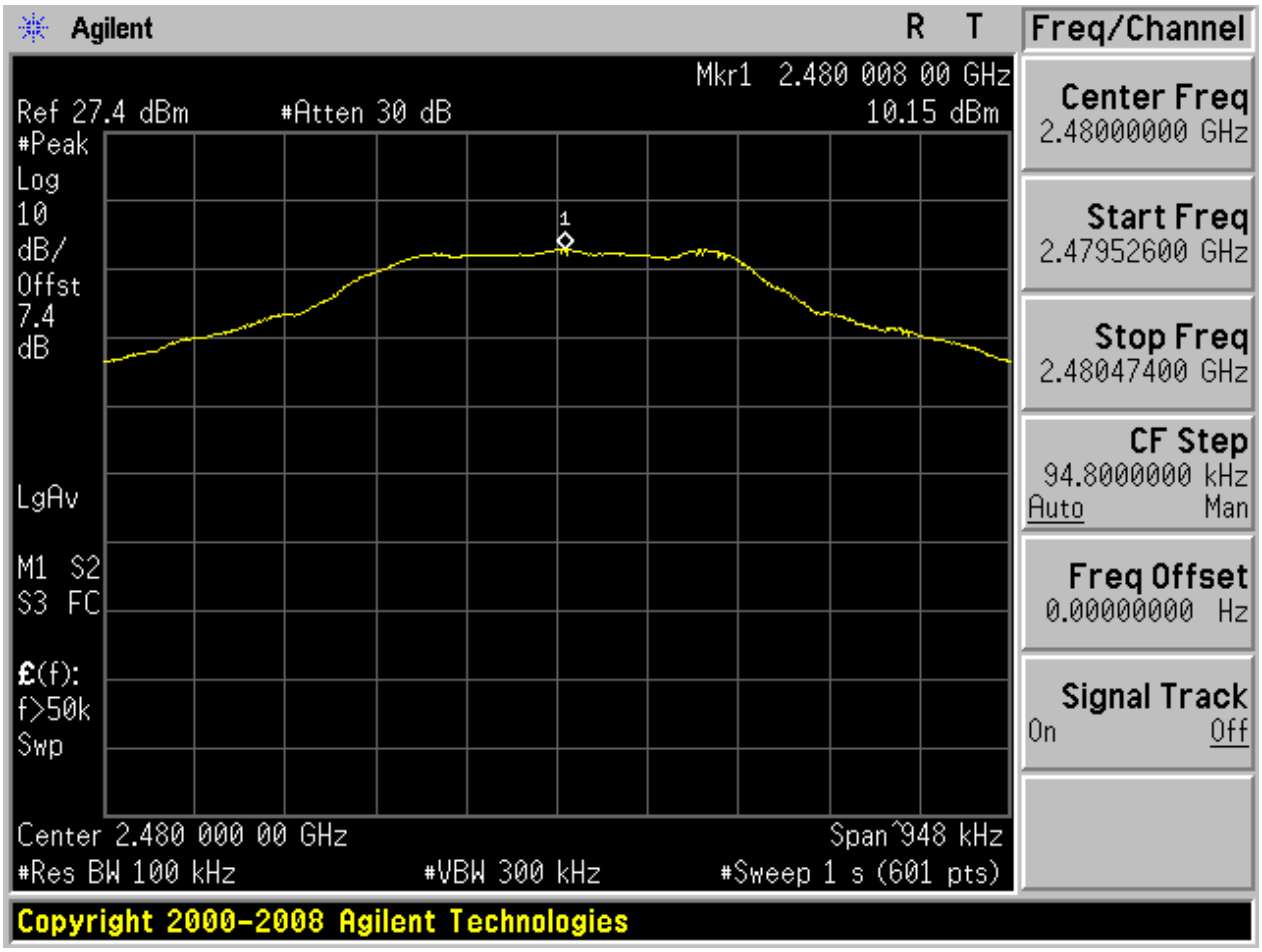




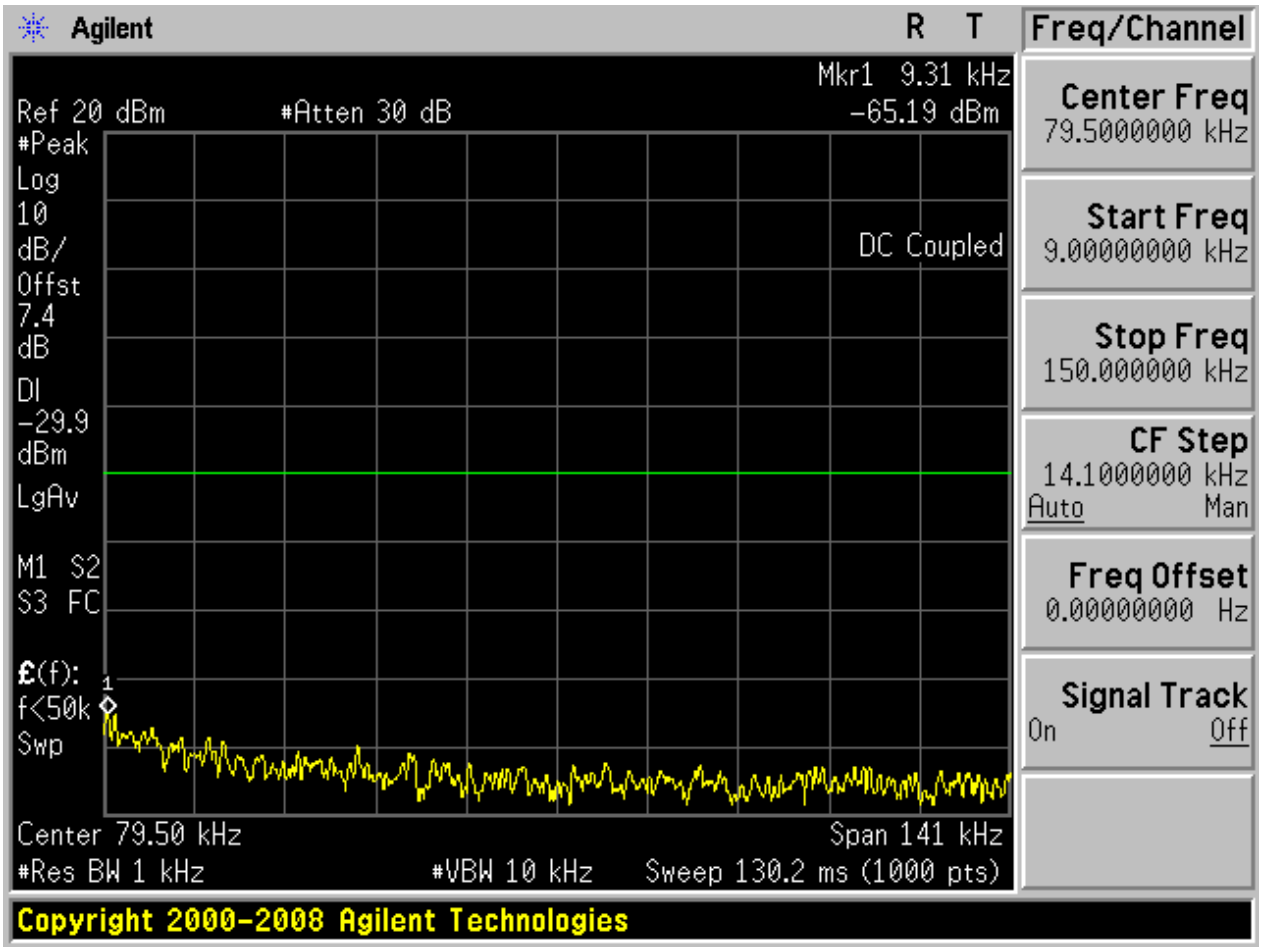


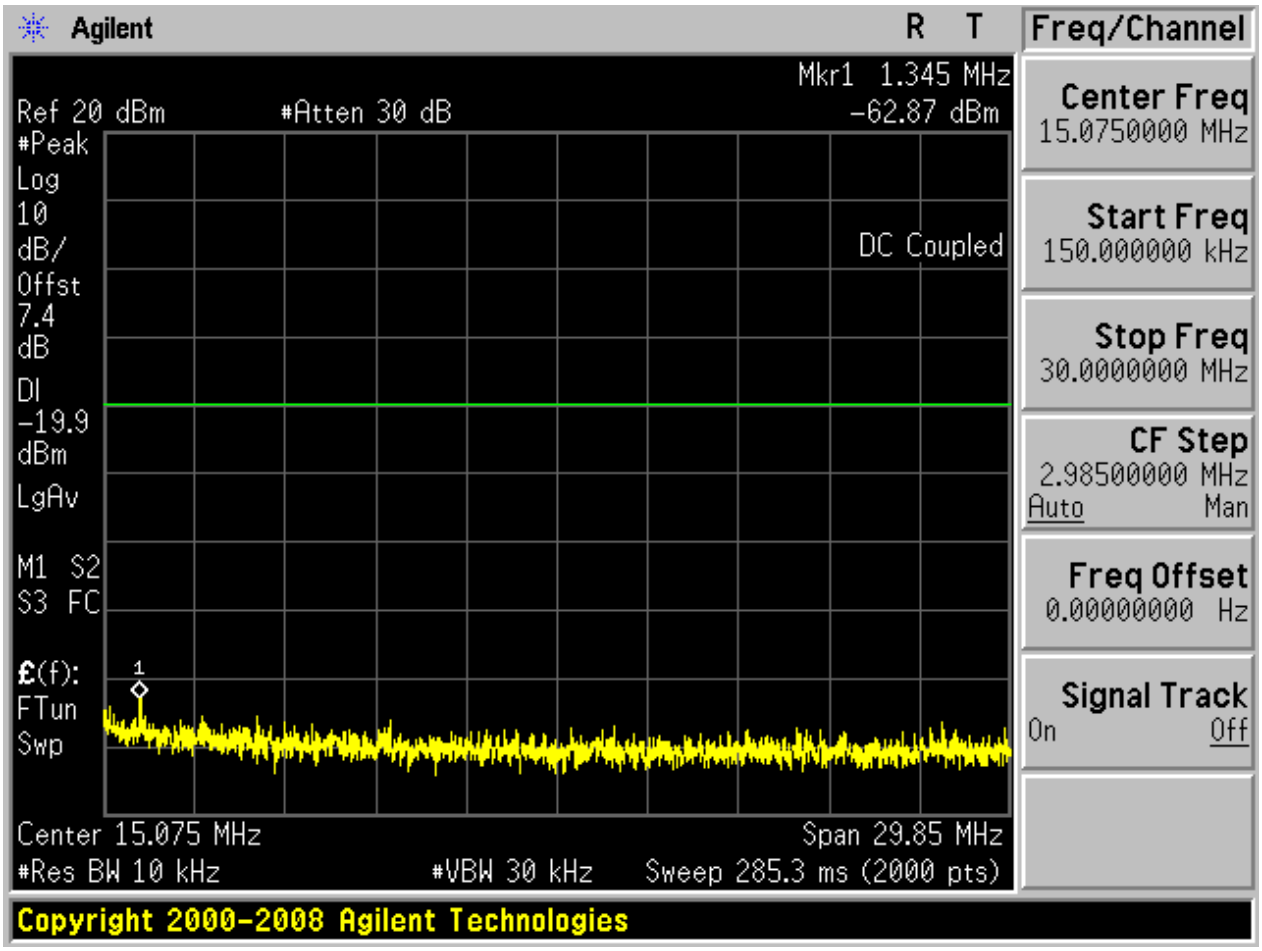
2.3 TM1_DH5_Ch78

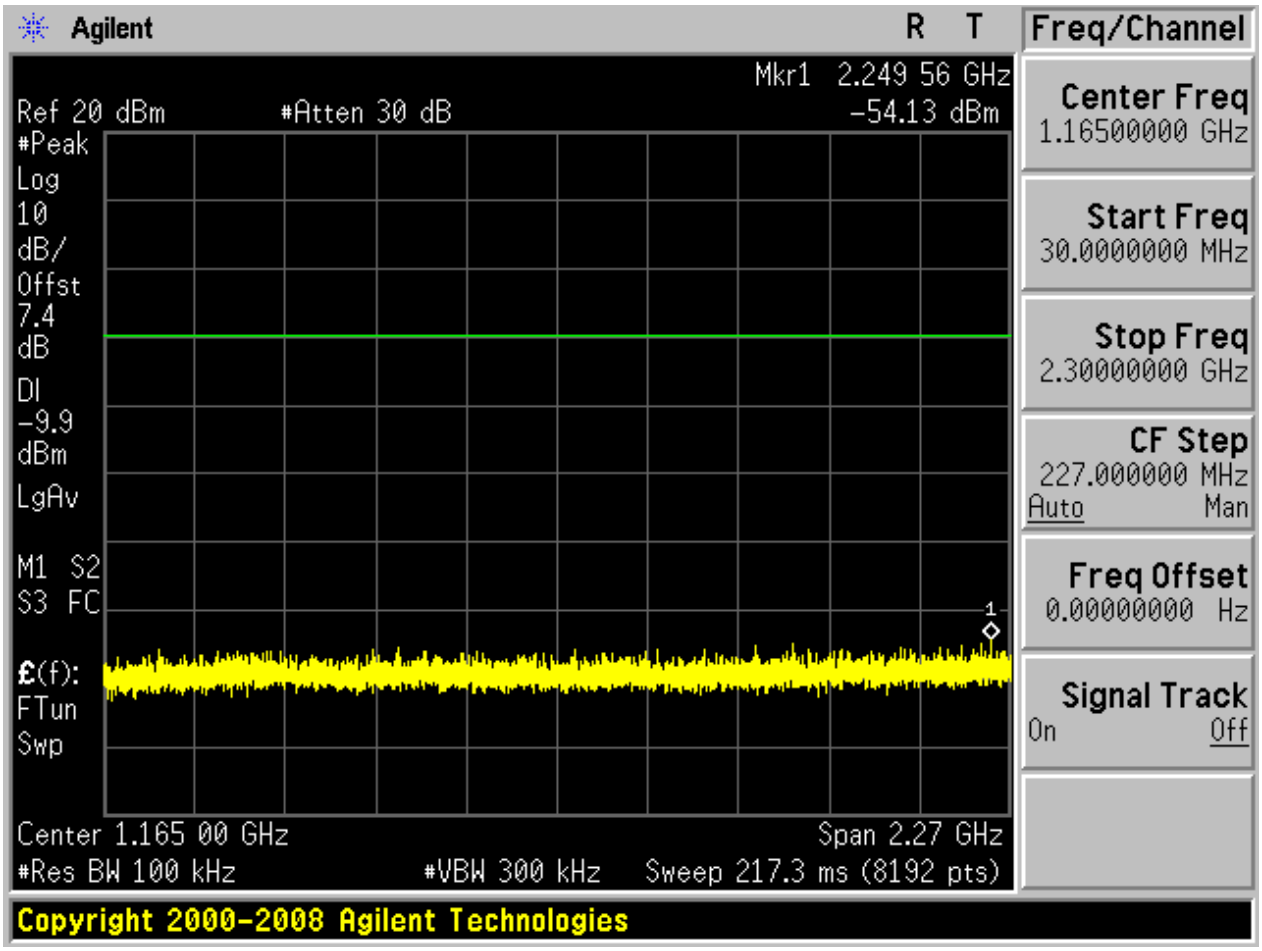
2.3.1 Pref

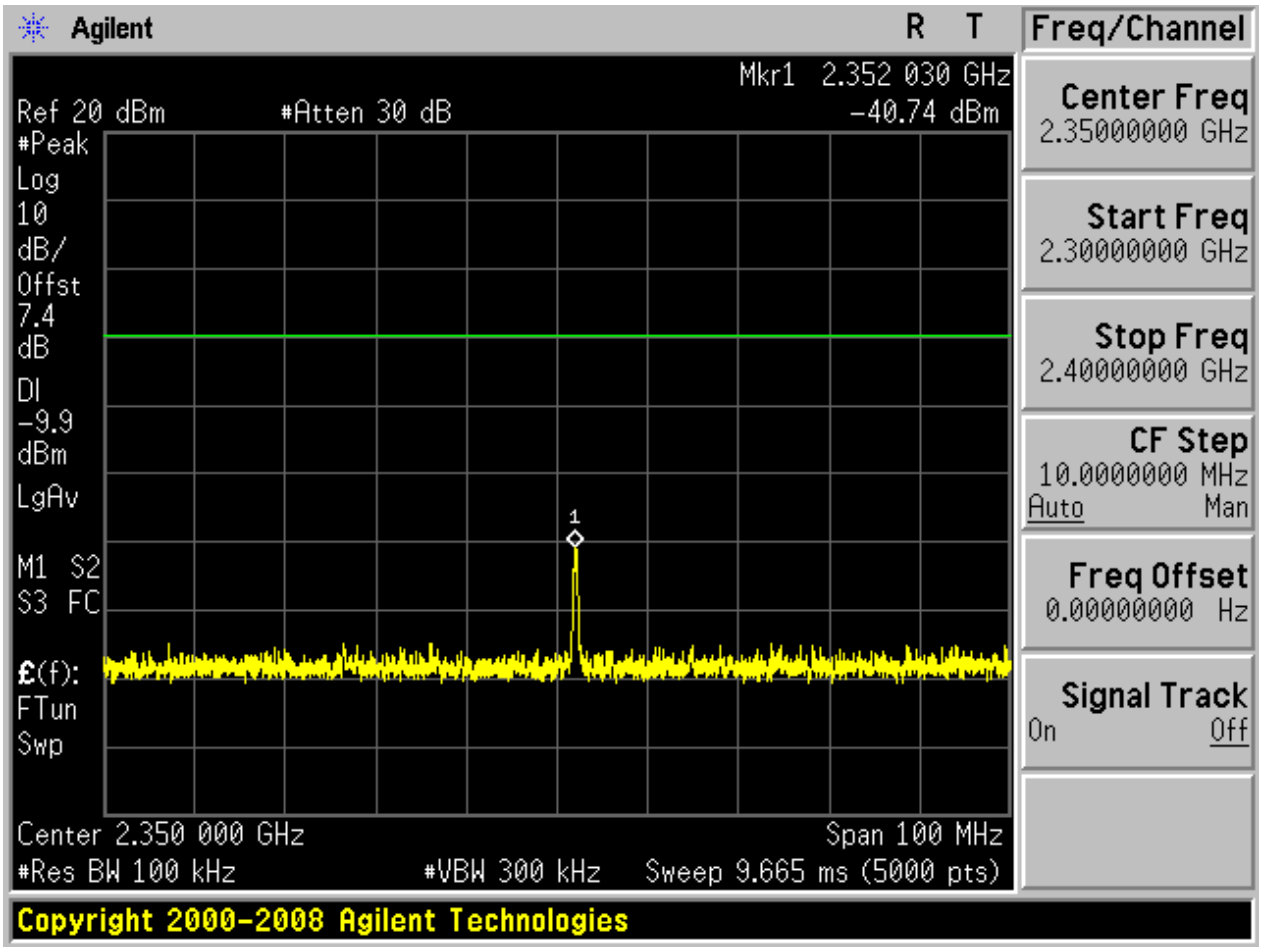


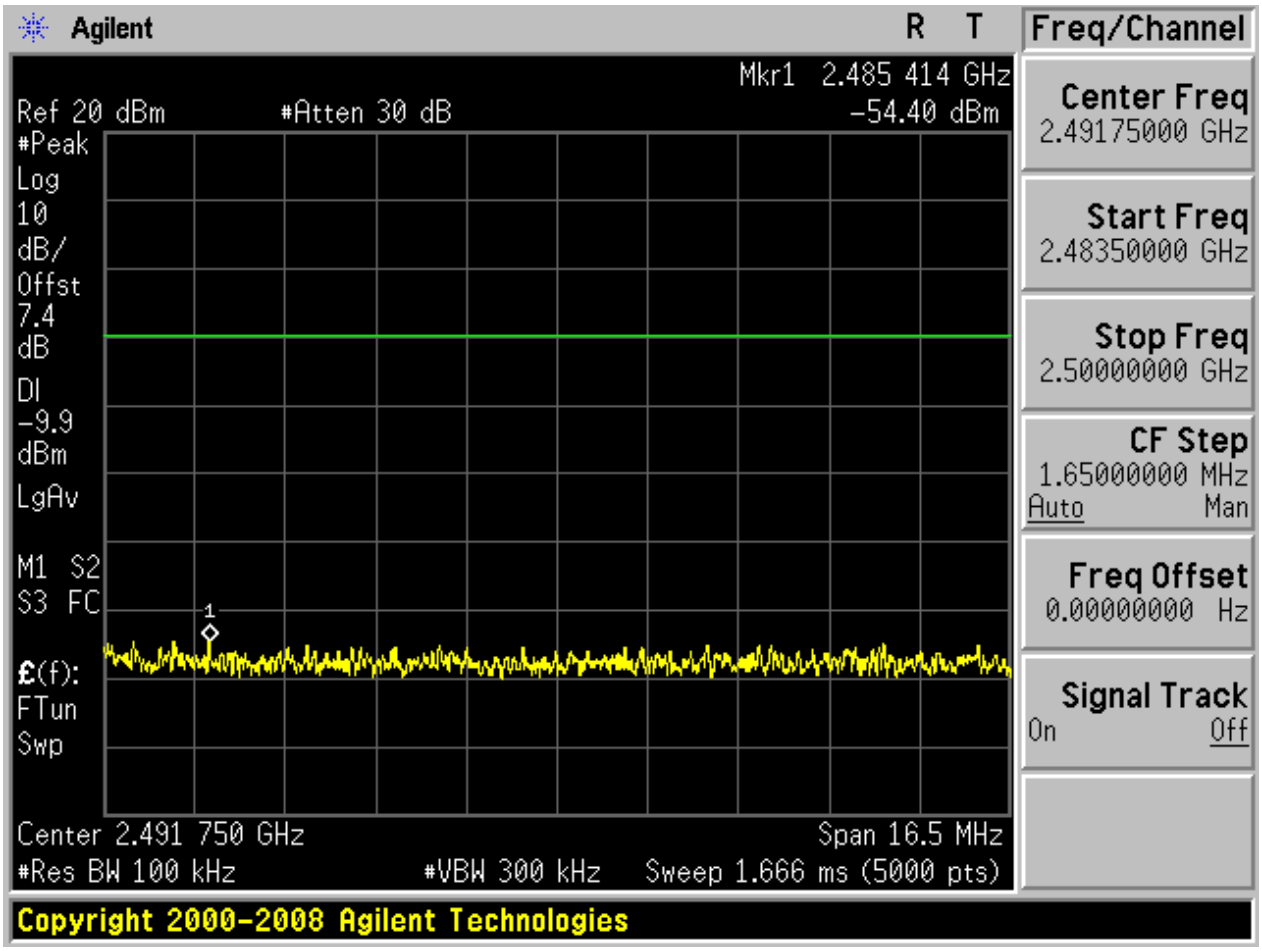
2.3.2 Puw

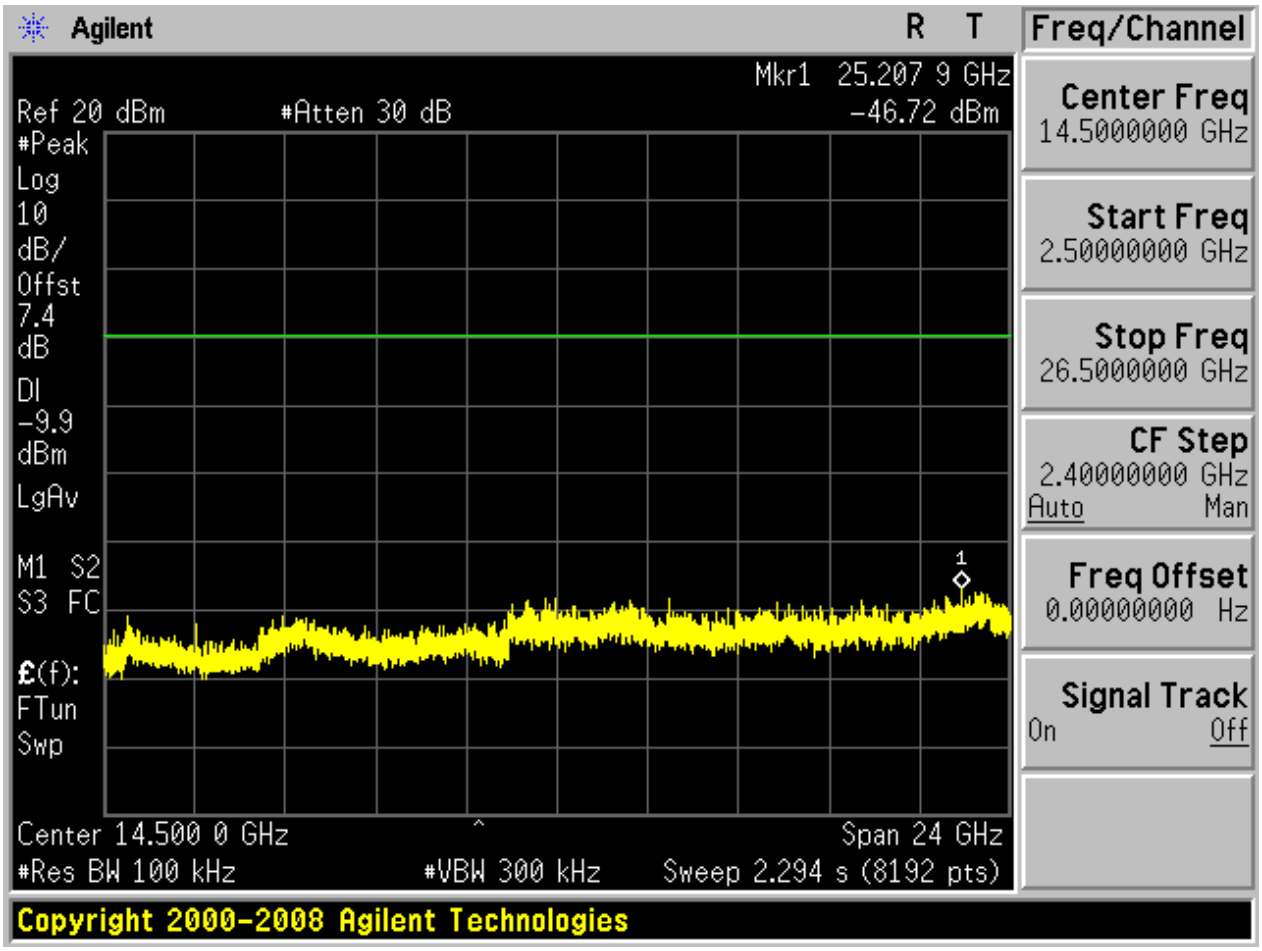






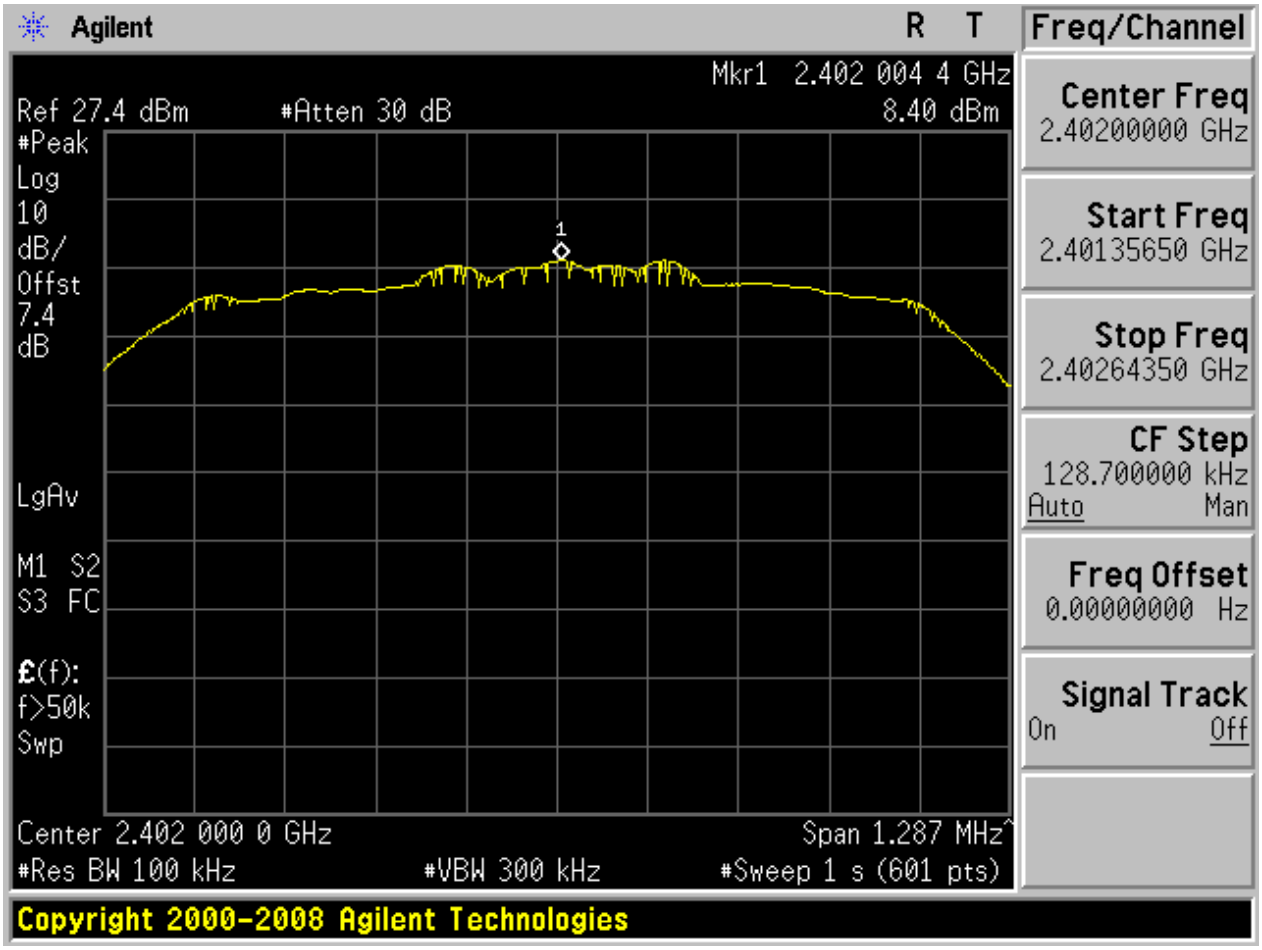




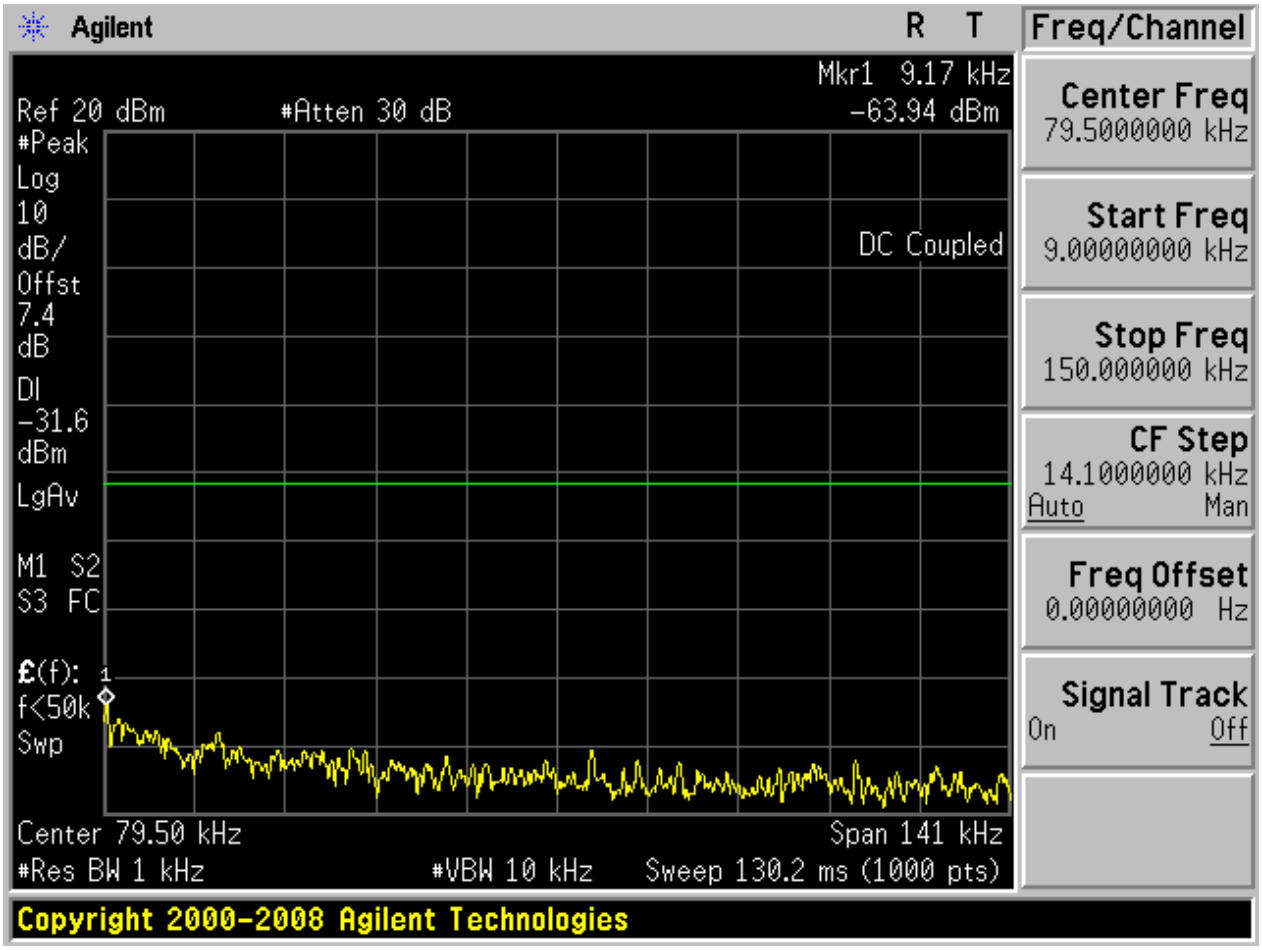


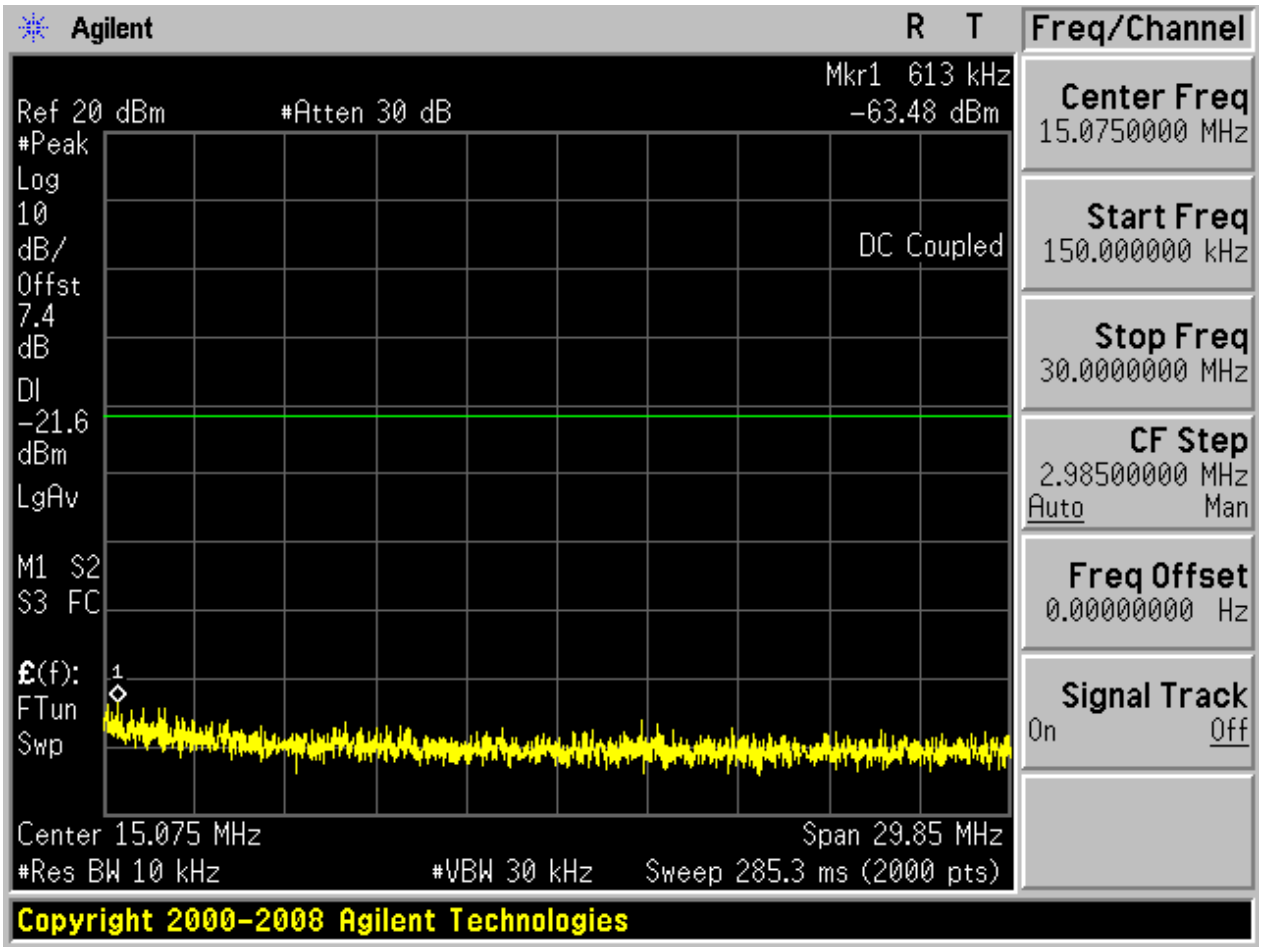
2.4 TM2_2DH5_Ch0

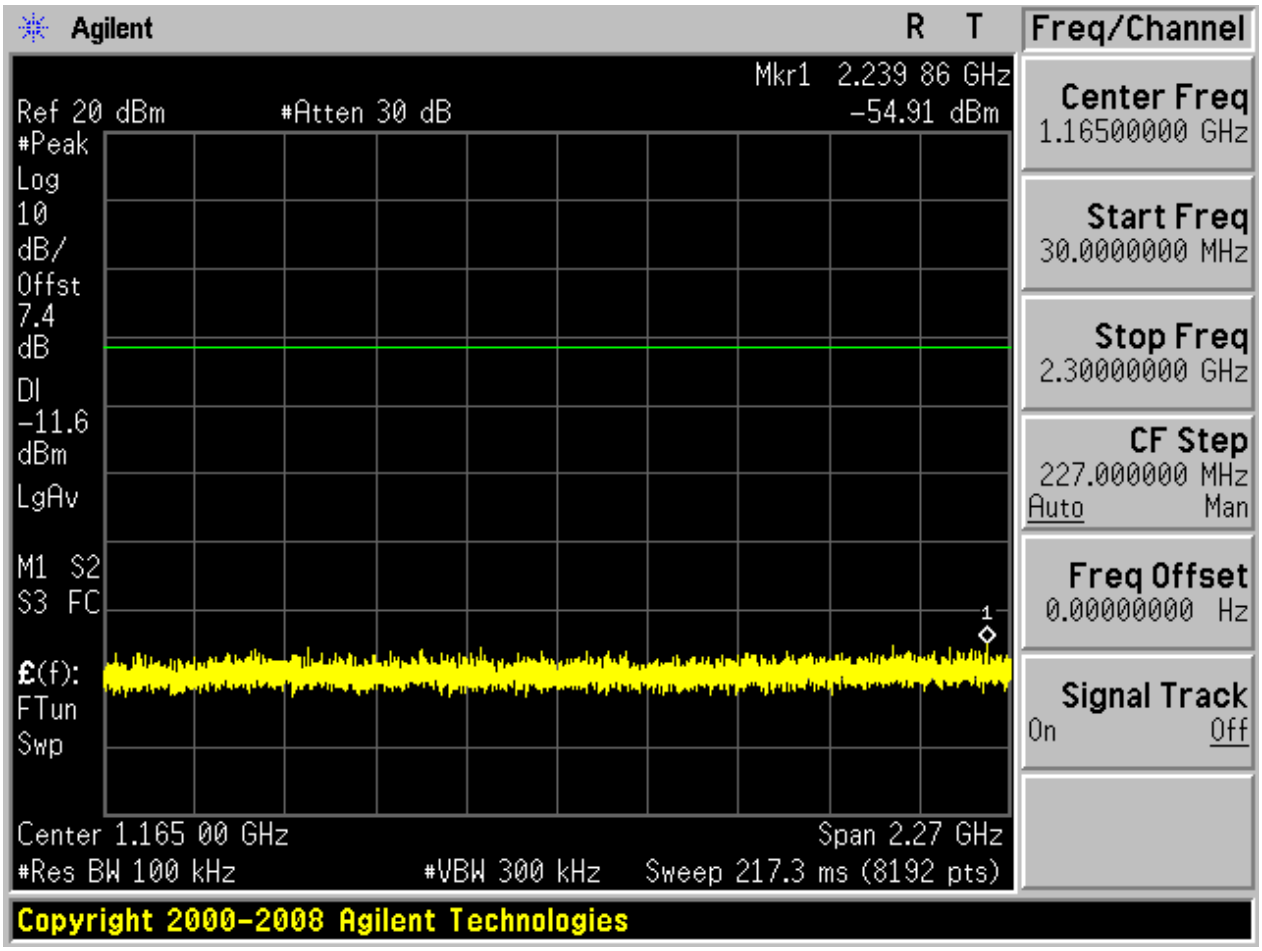
2.4.1 Pref

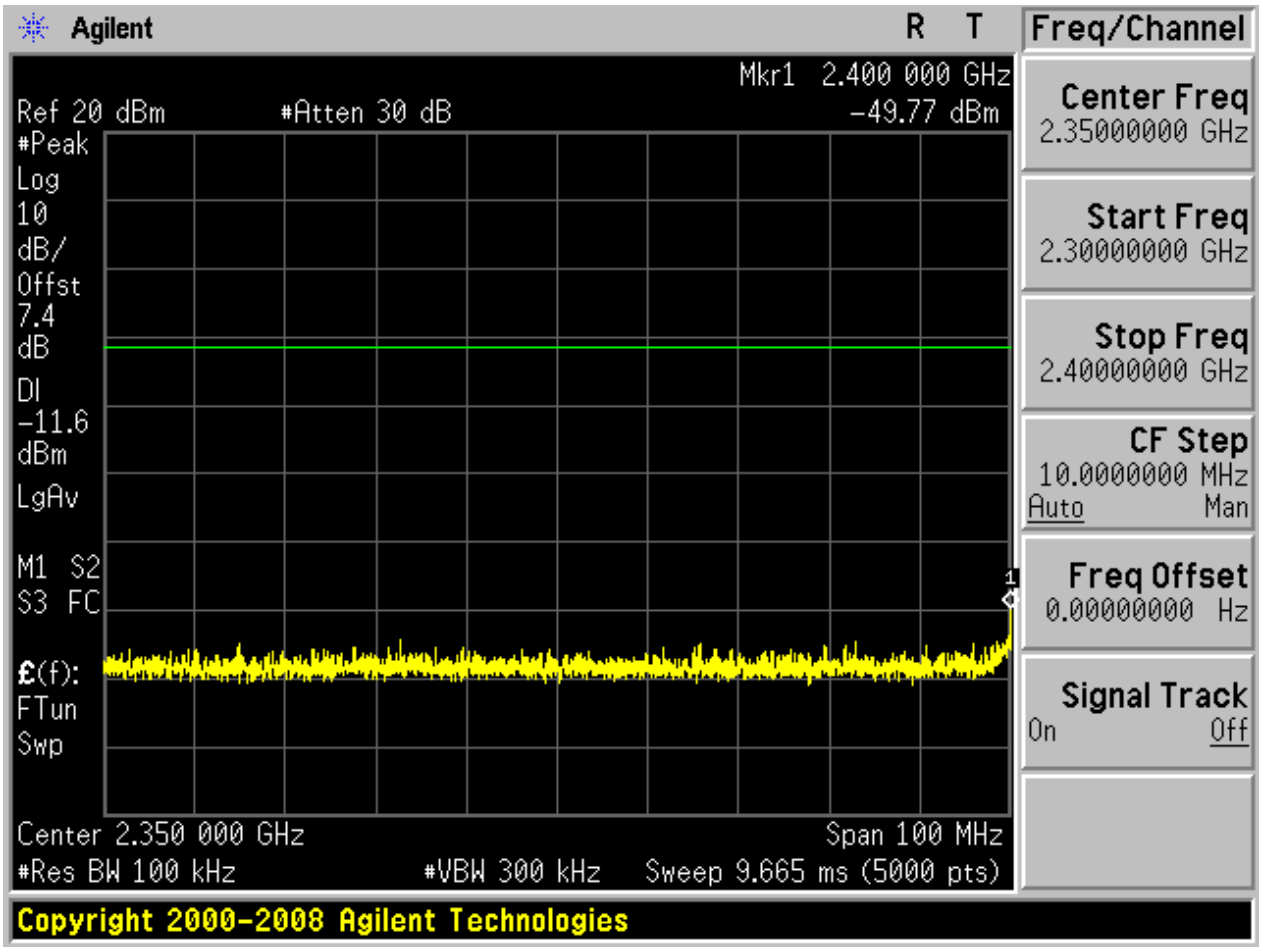


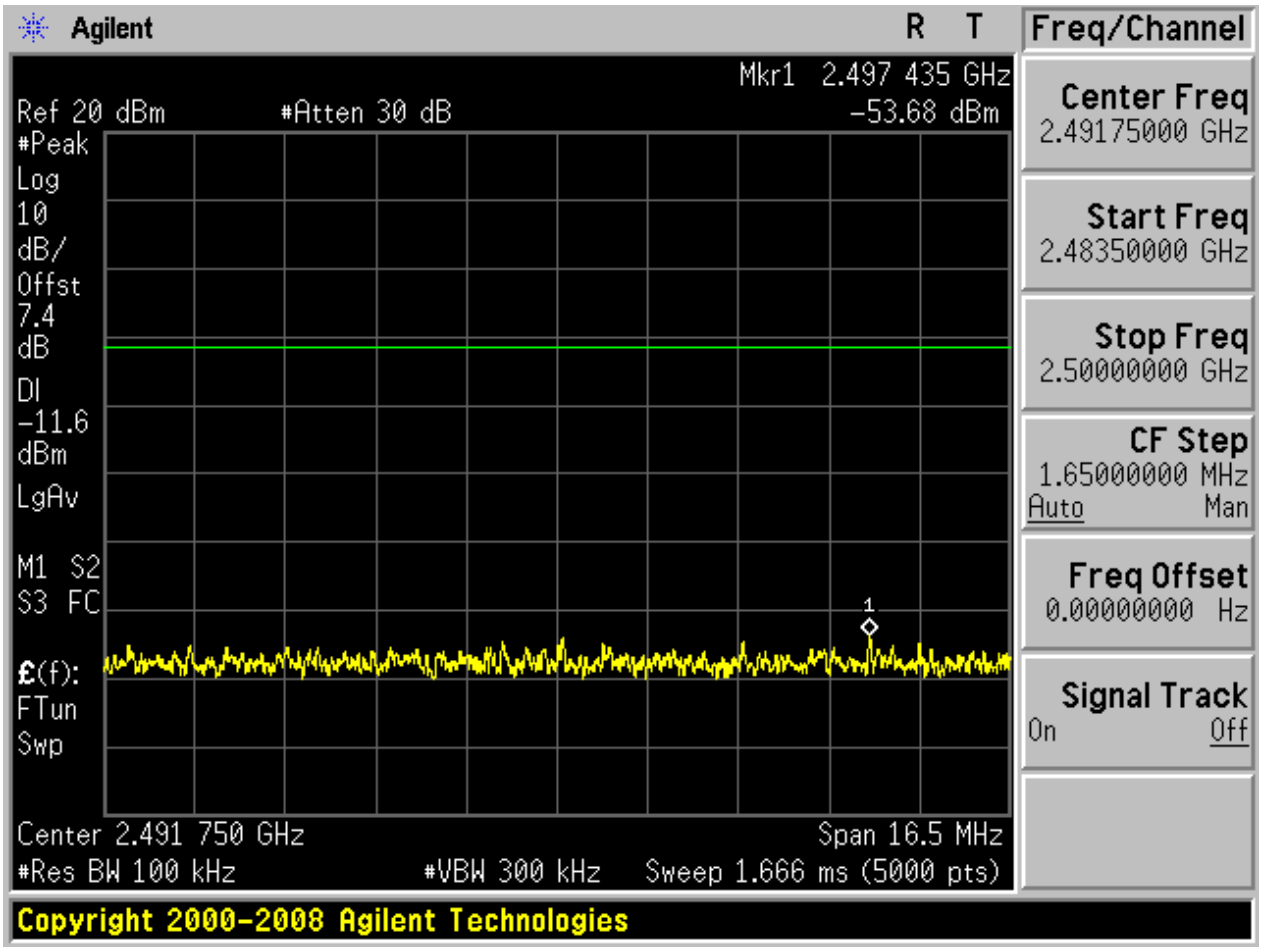
2.4.2 Puw

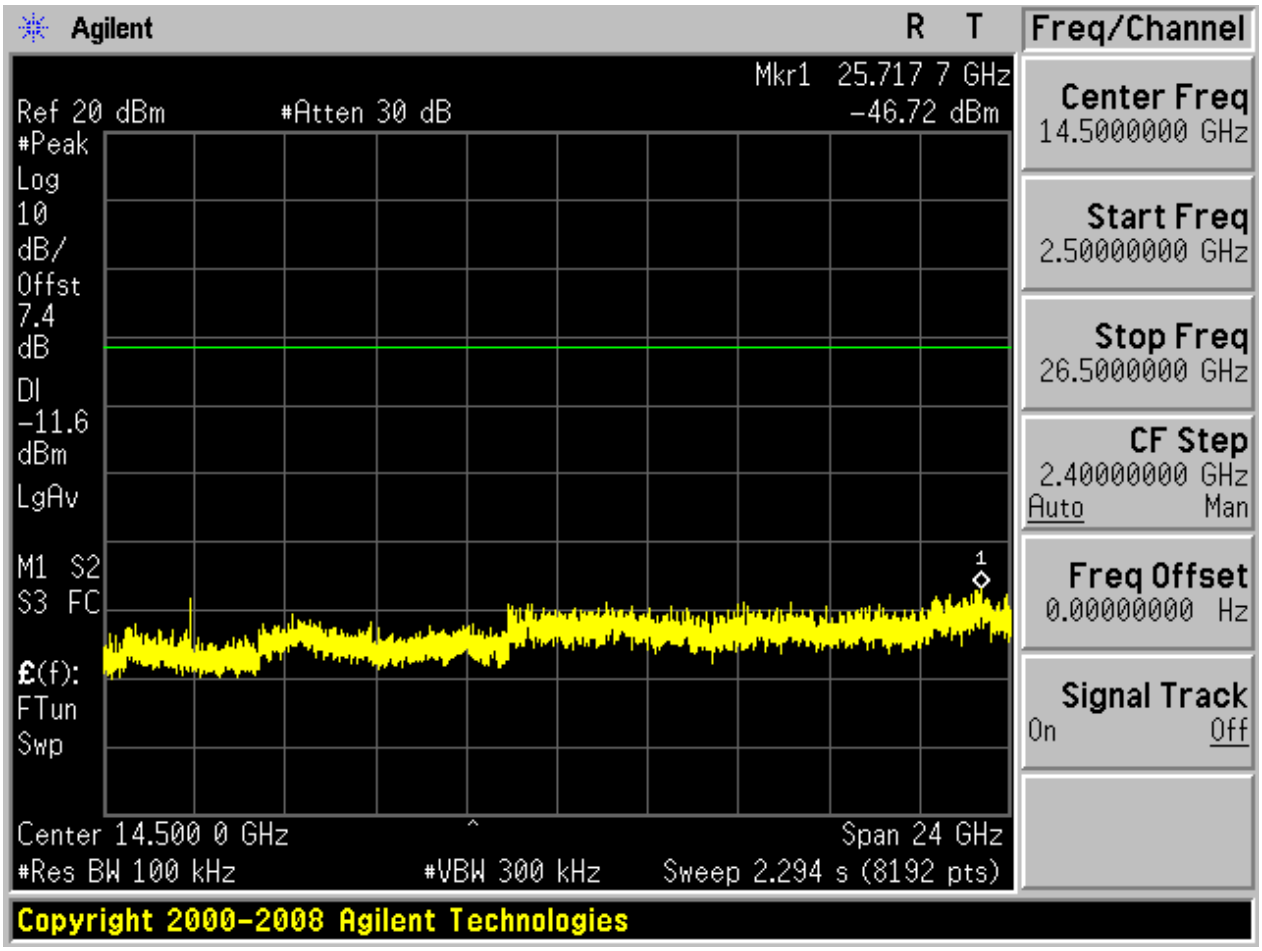






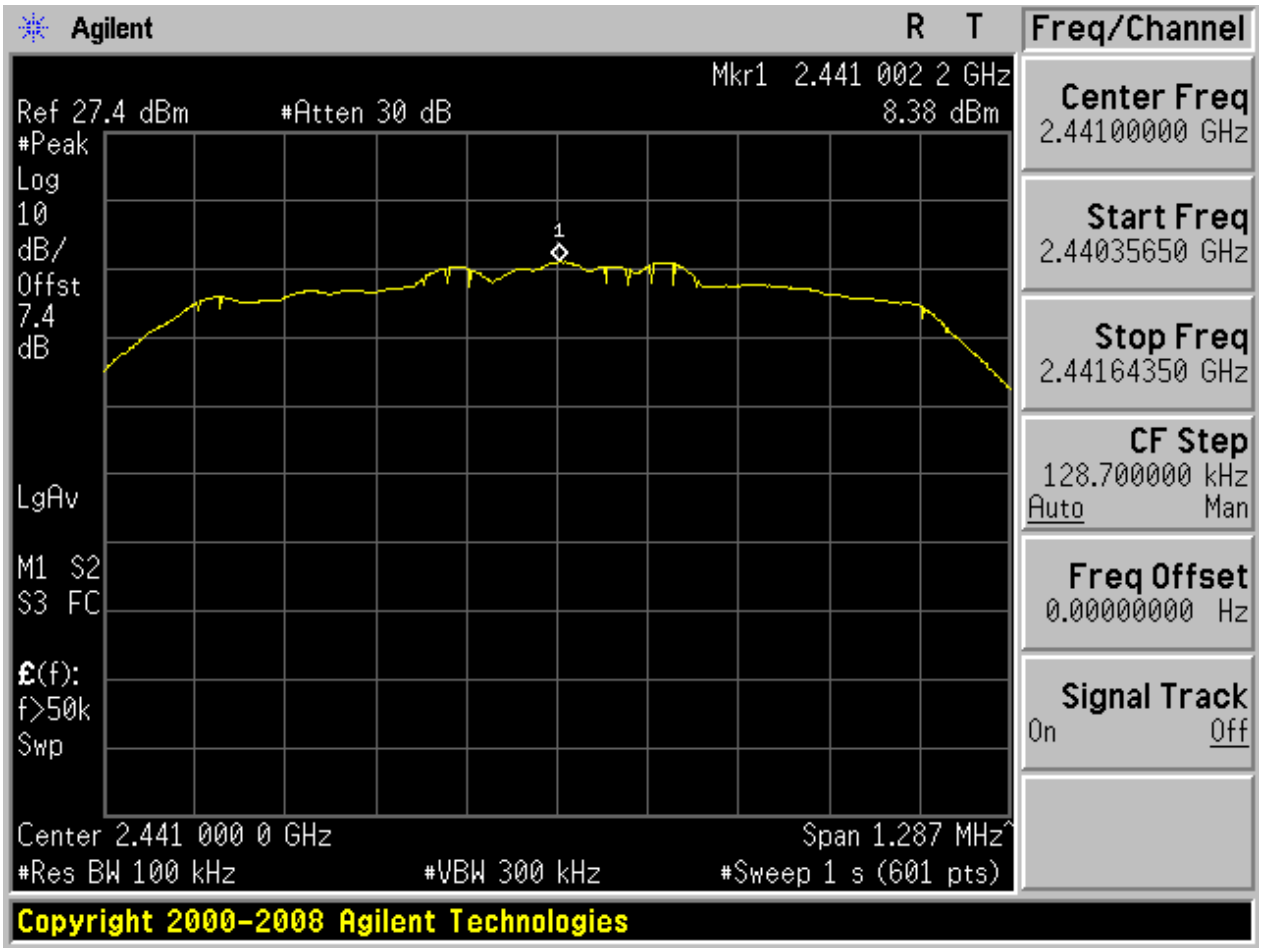




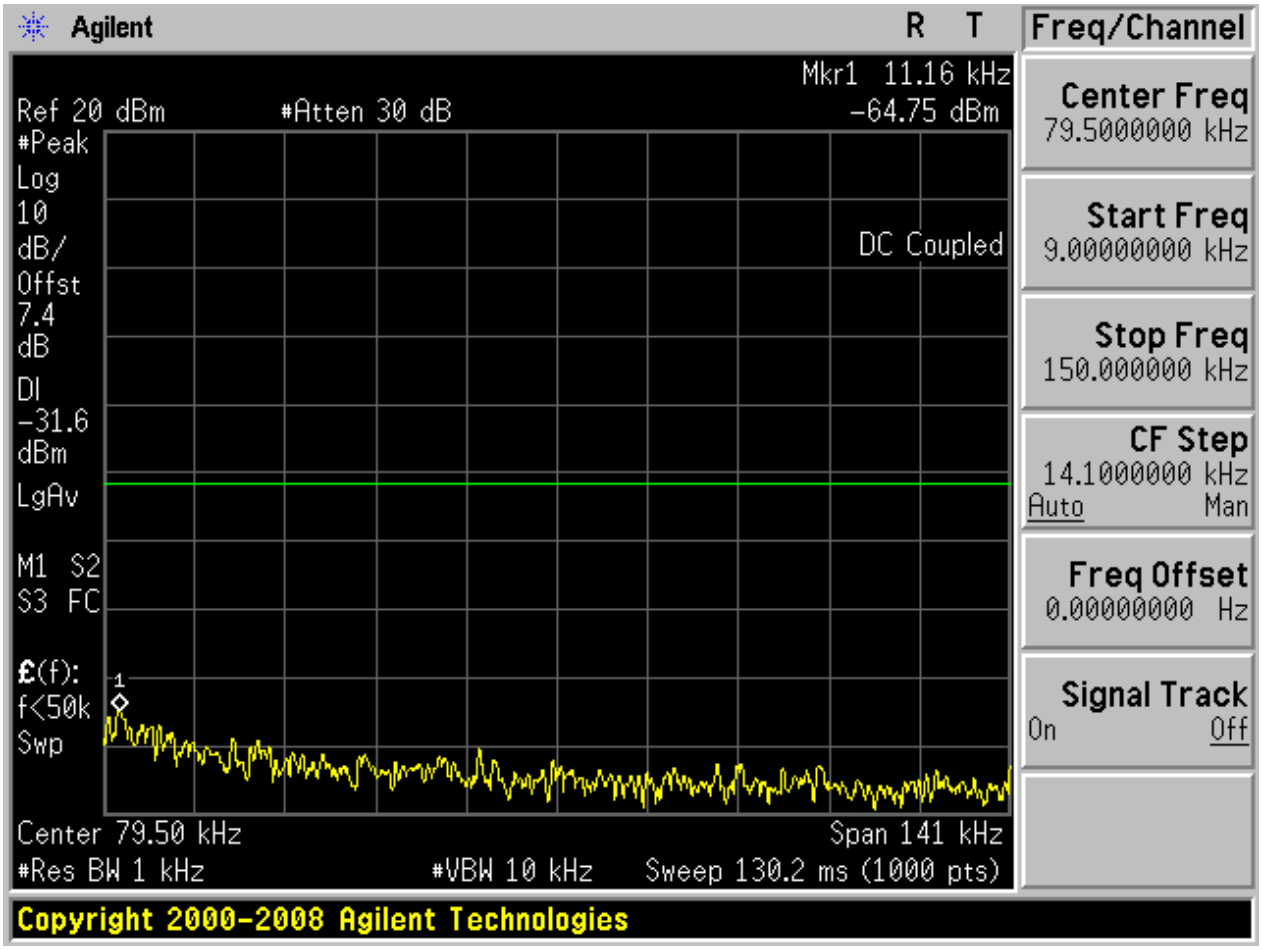


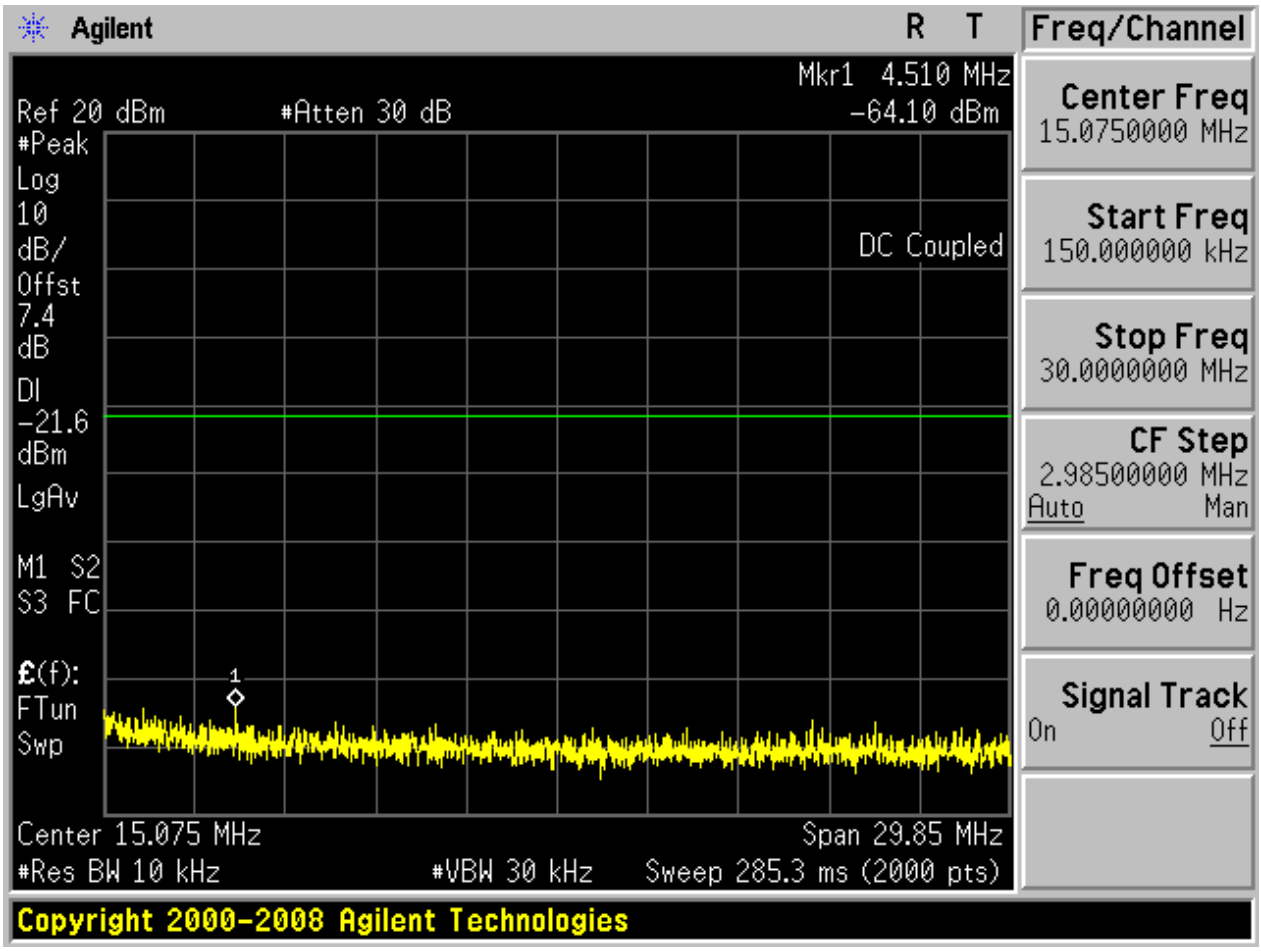
2.5 TM2_2DH5_Ch39

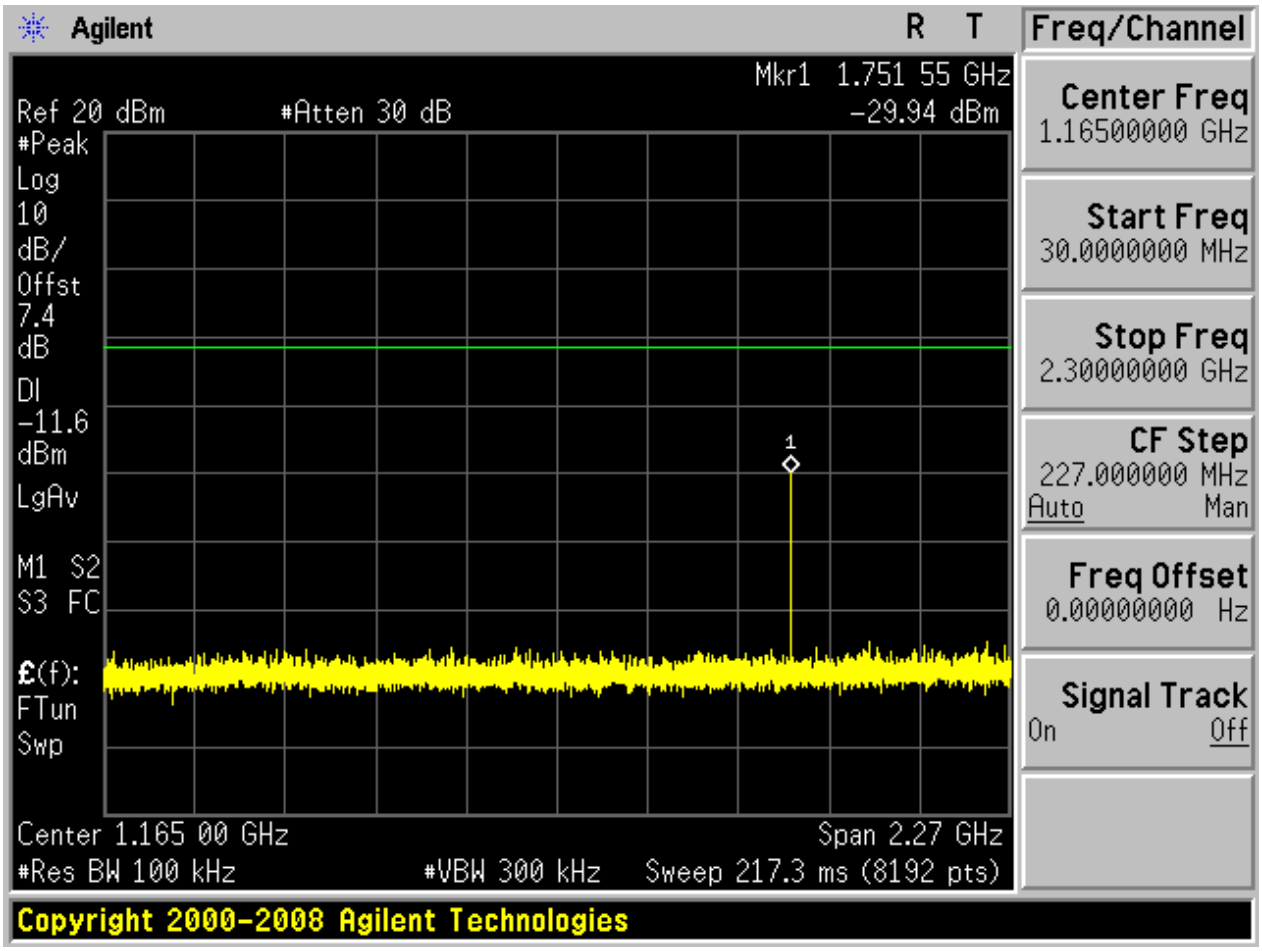
2.5.1 Pref

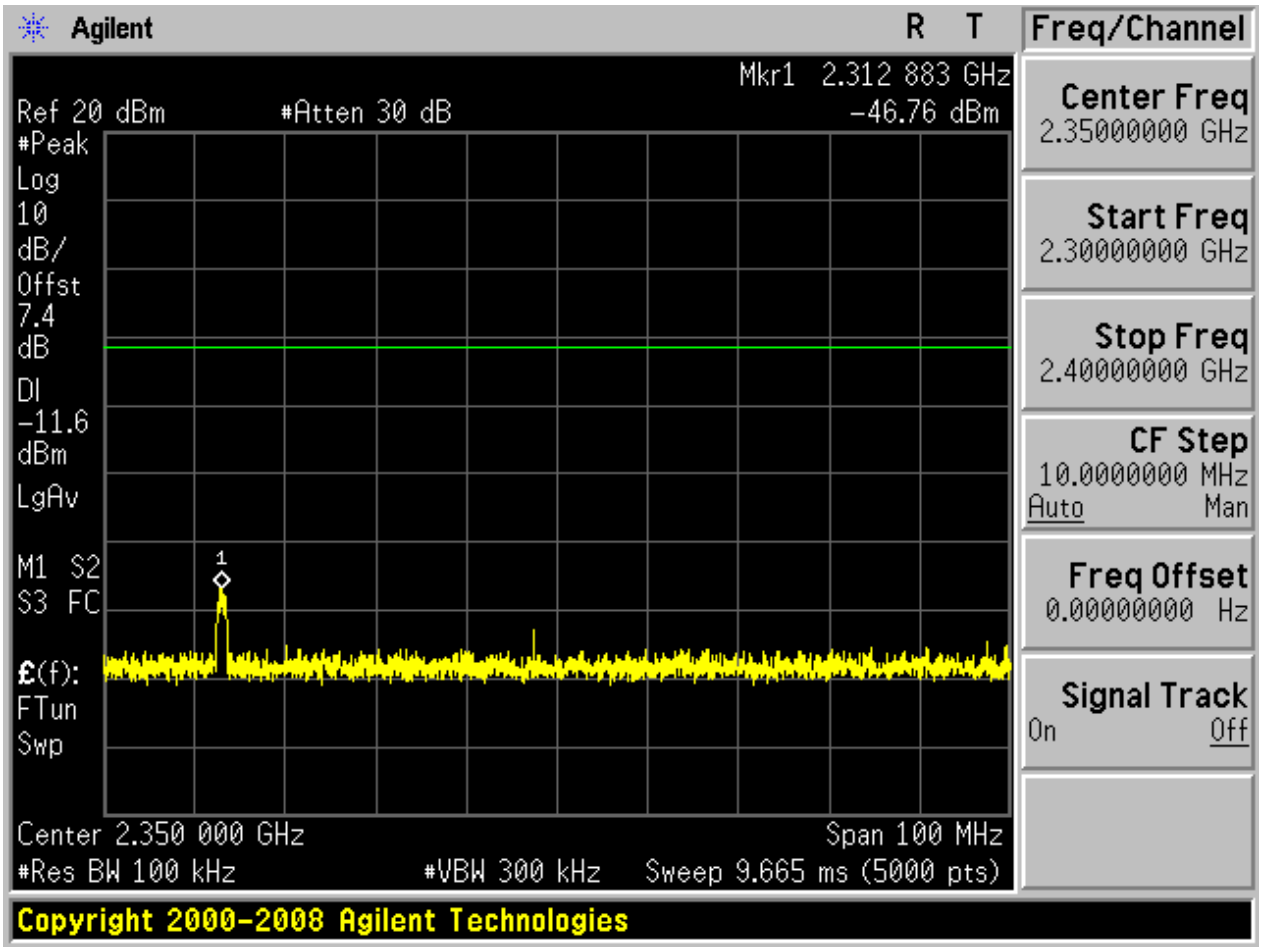


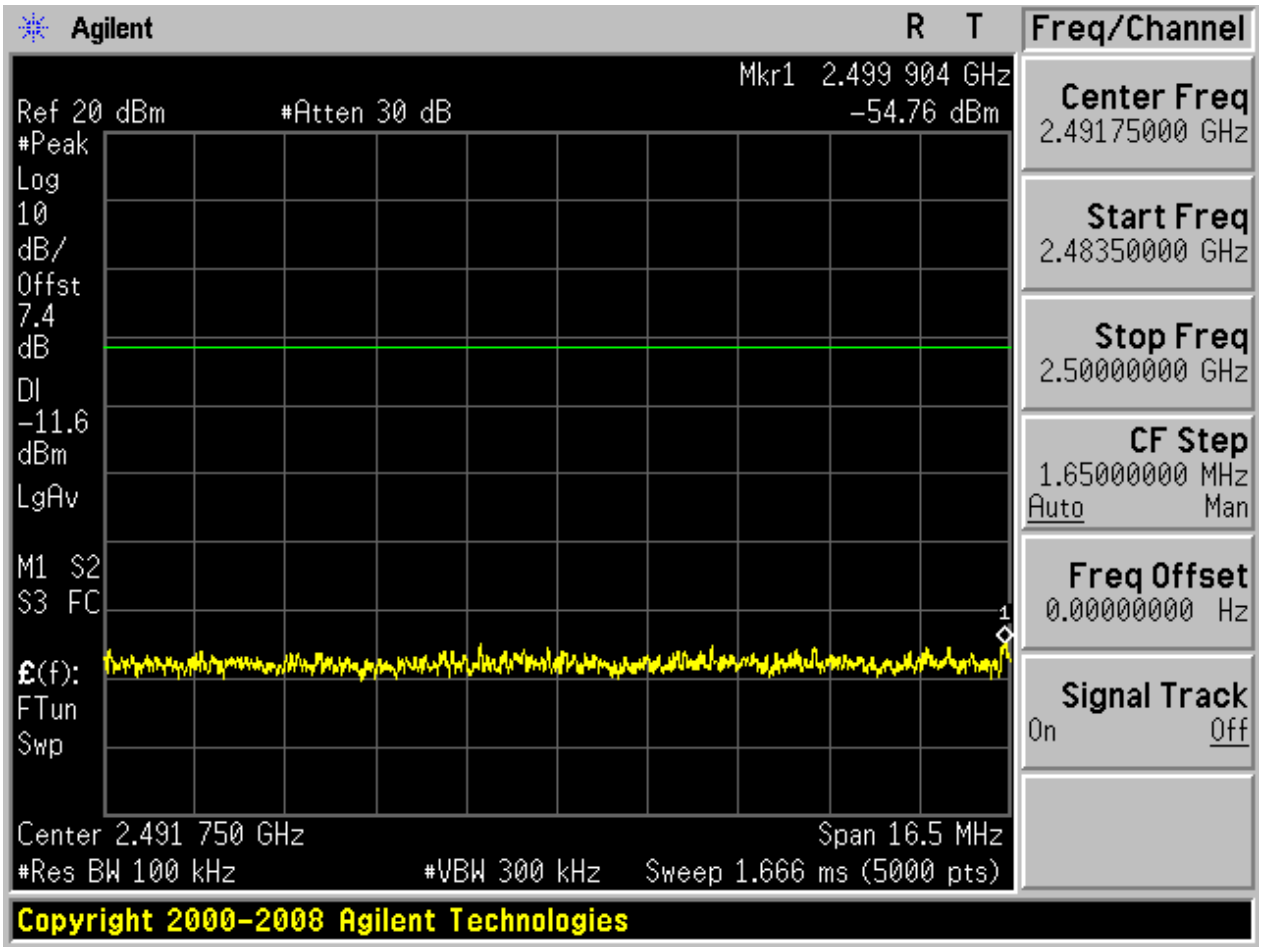
2.5.2 Puw

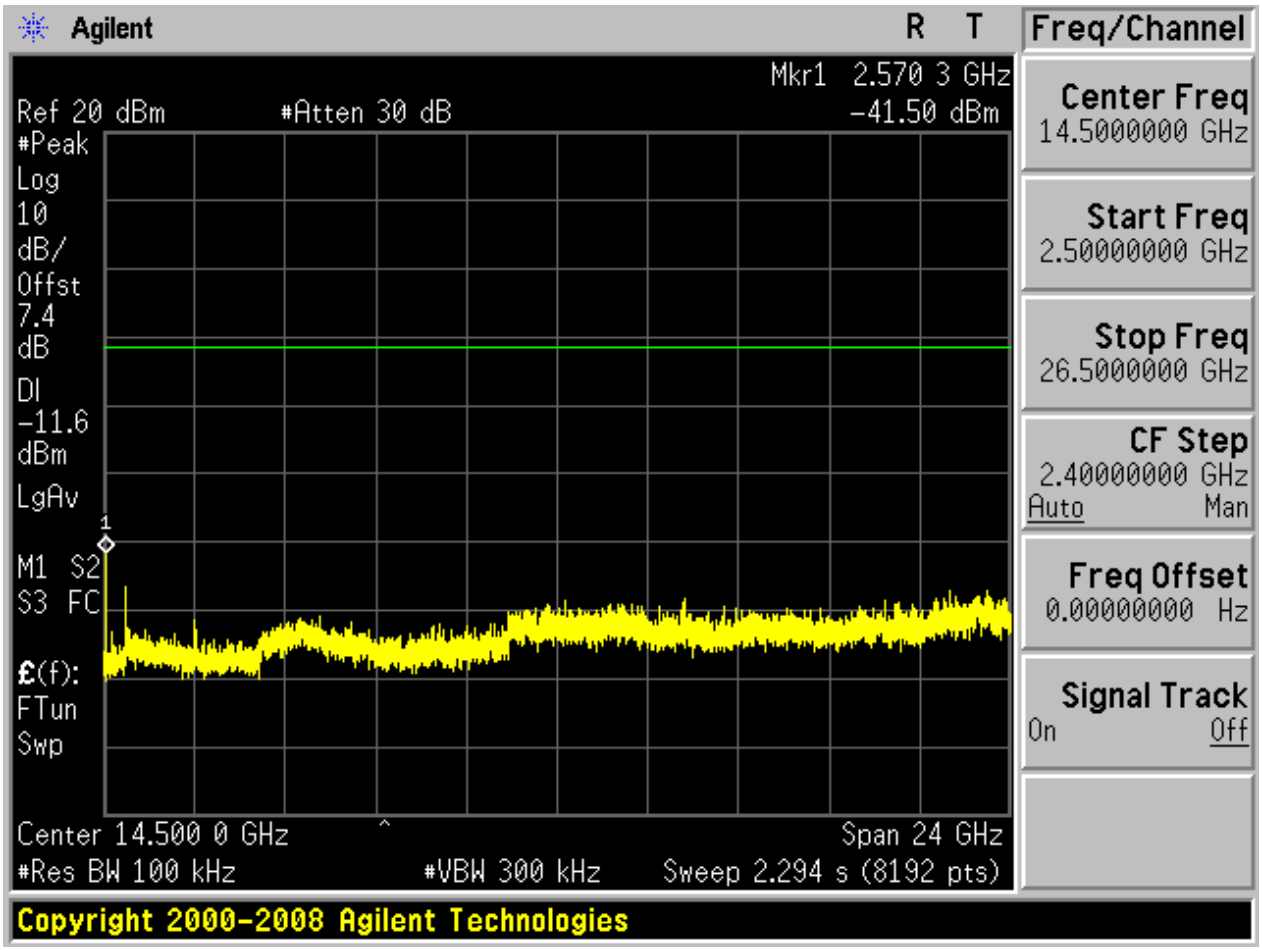






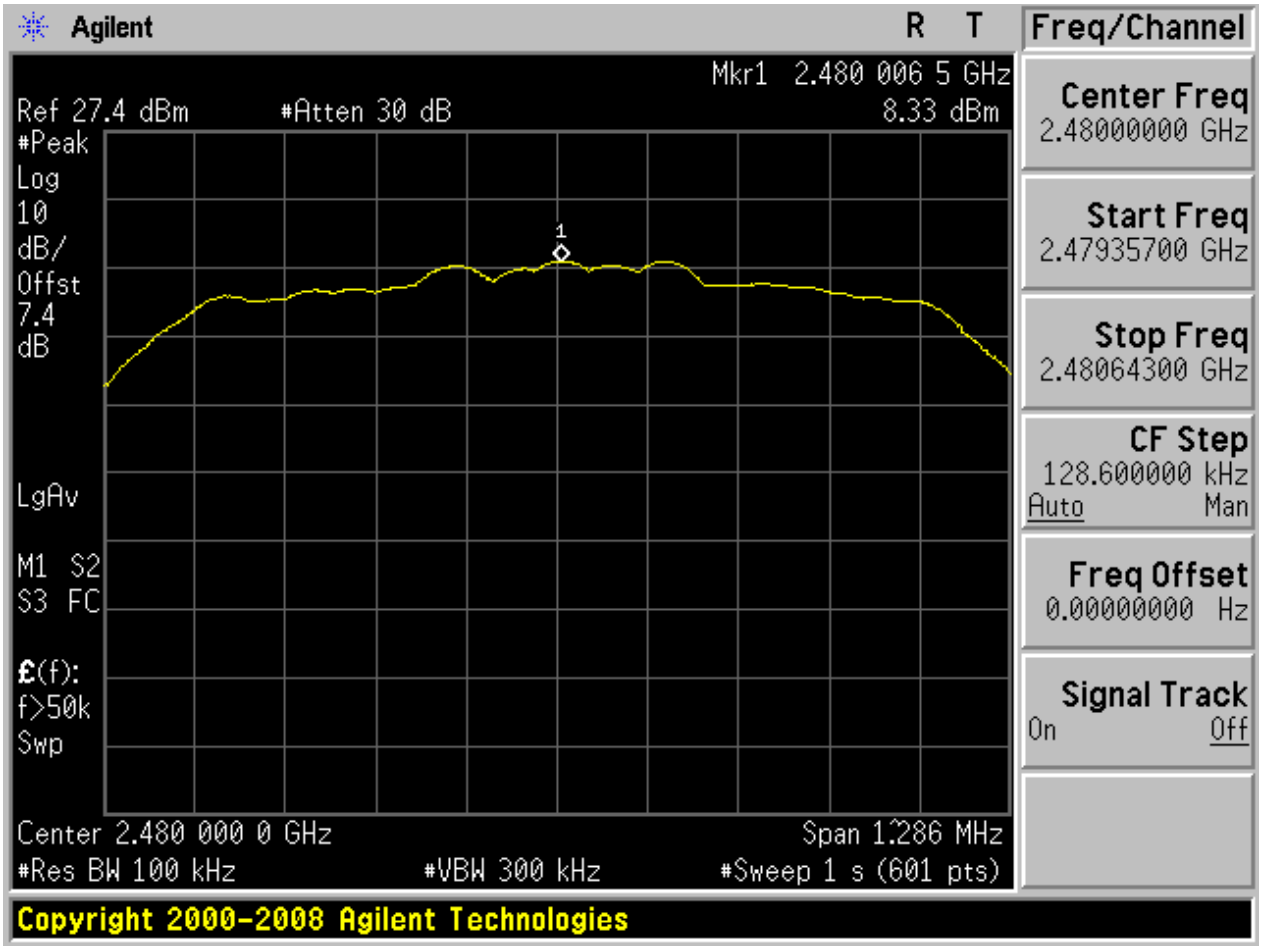




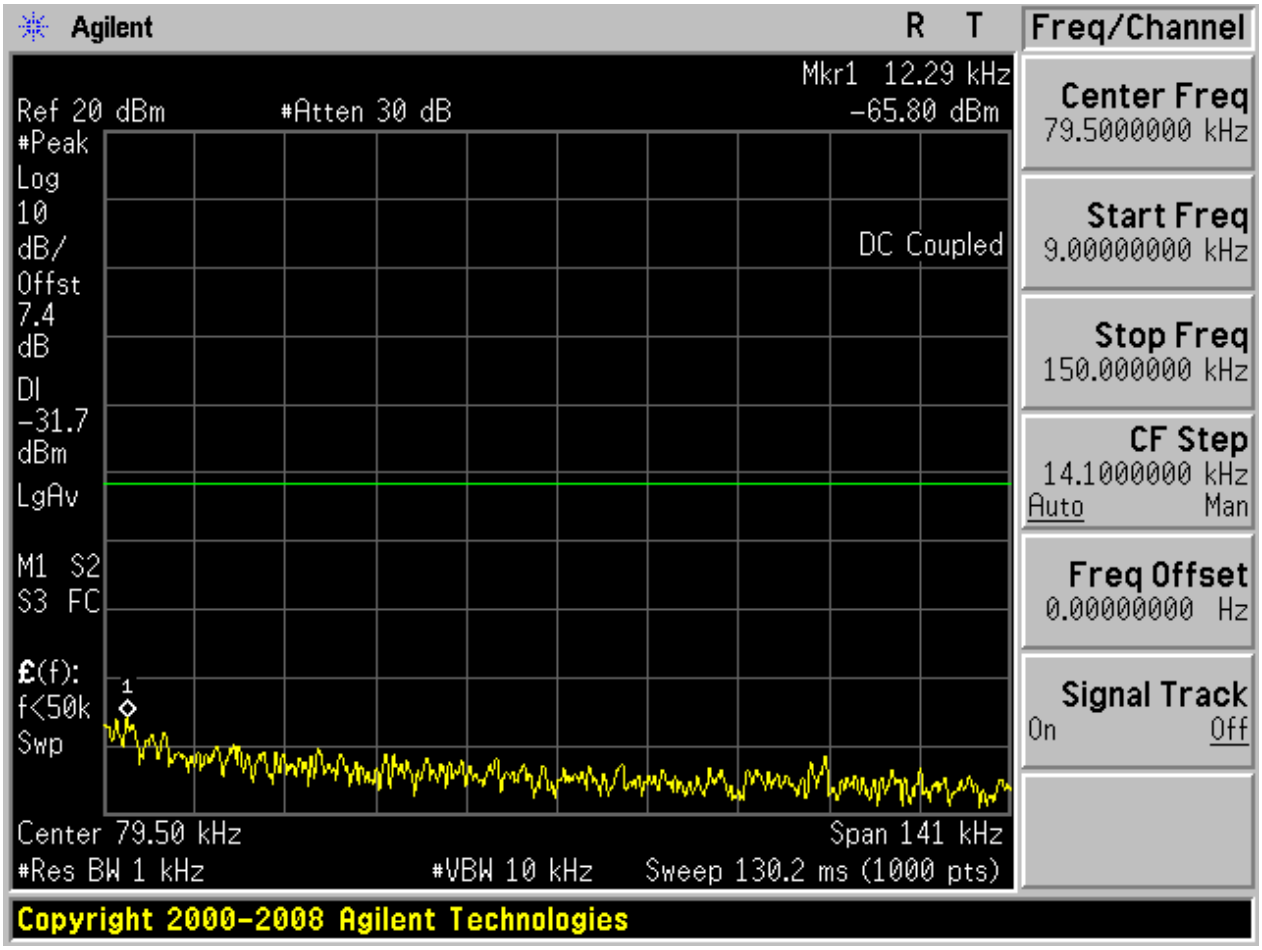


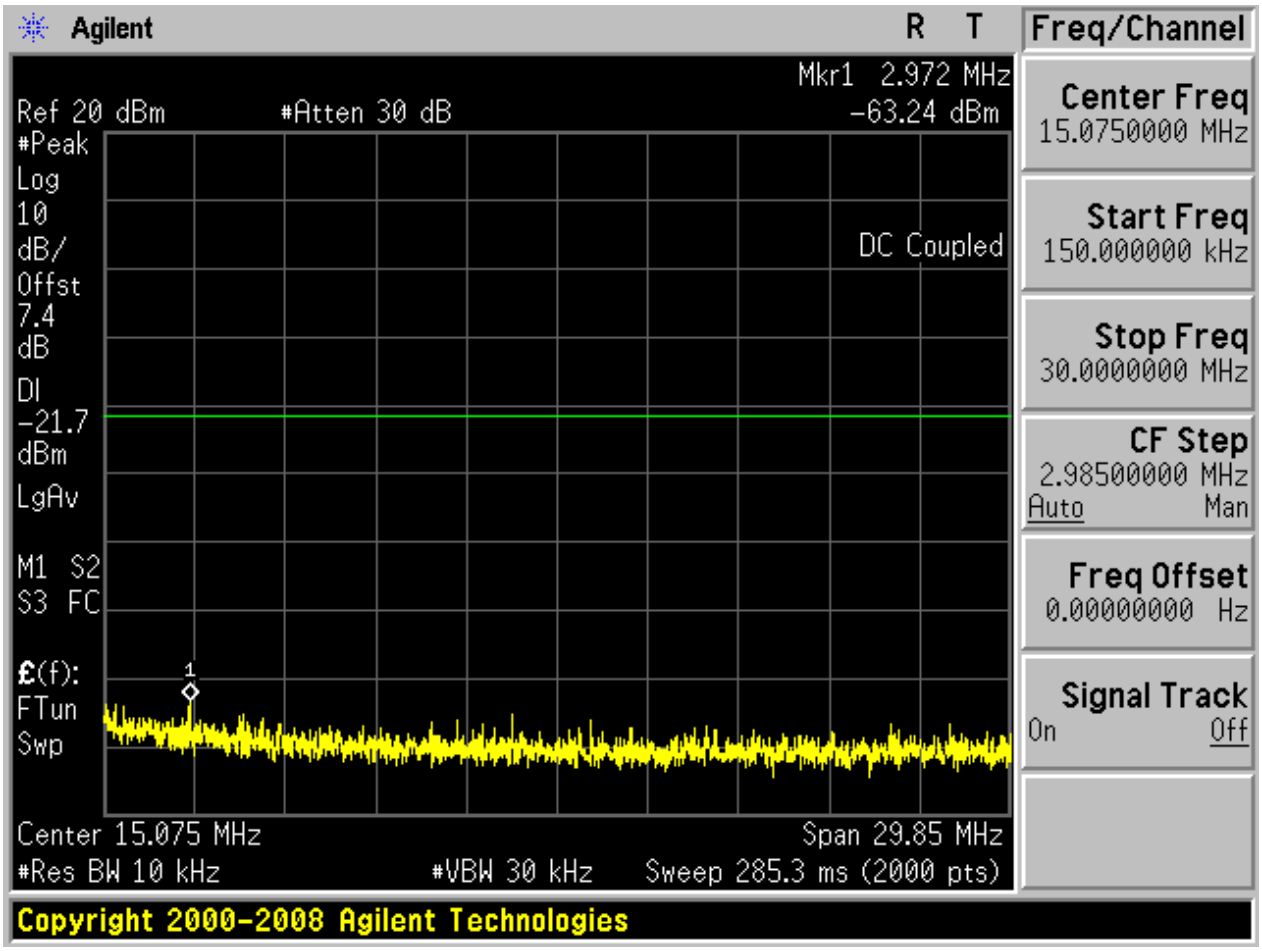
2.6 TM2_2DH5_Ch78

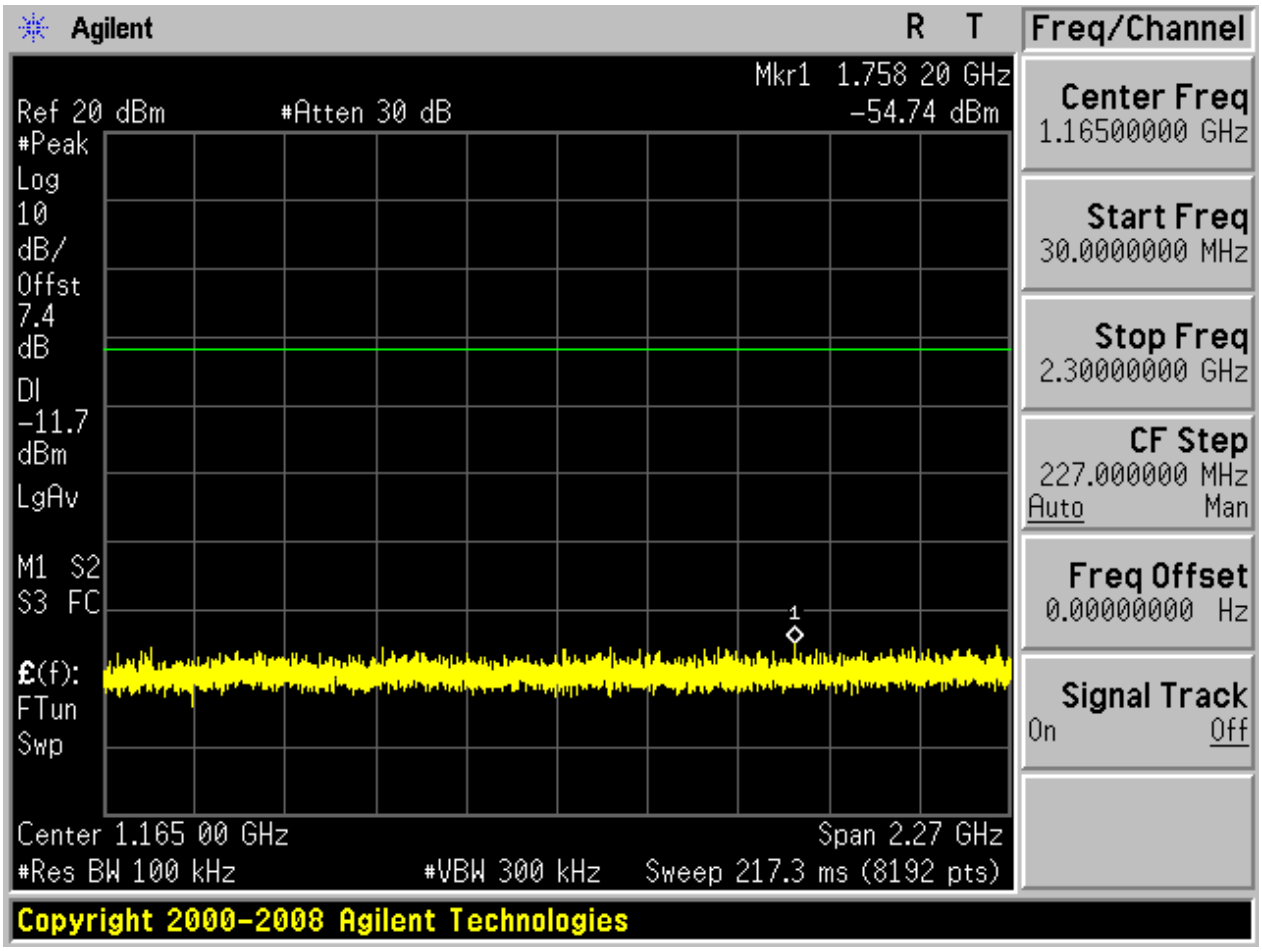
2.6.1 Pref

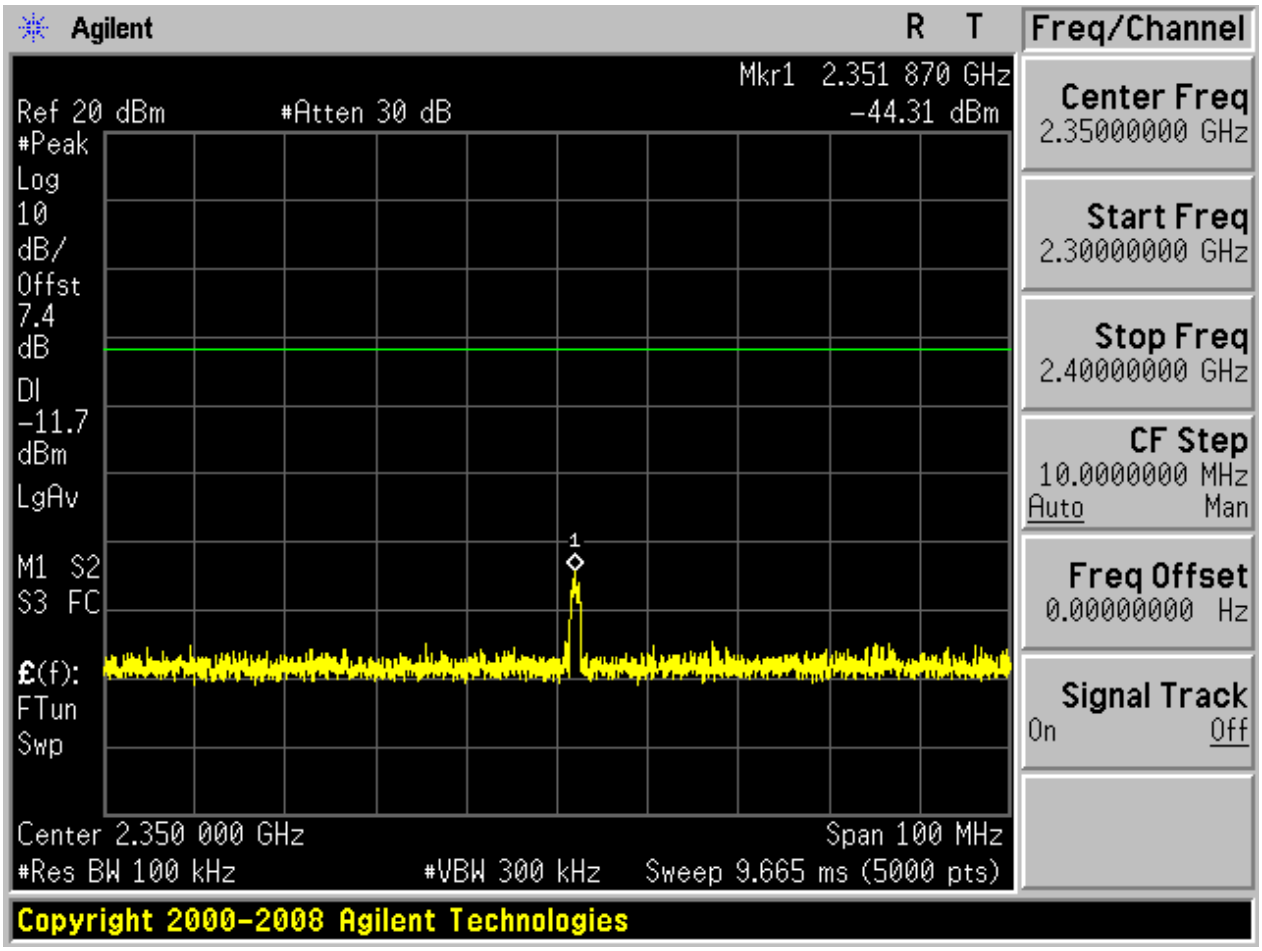


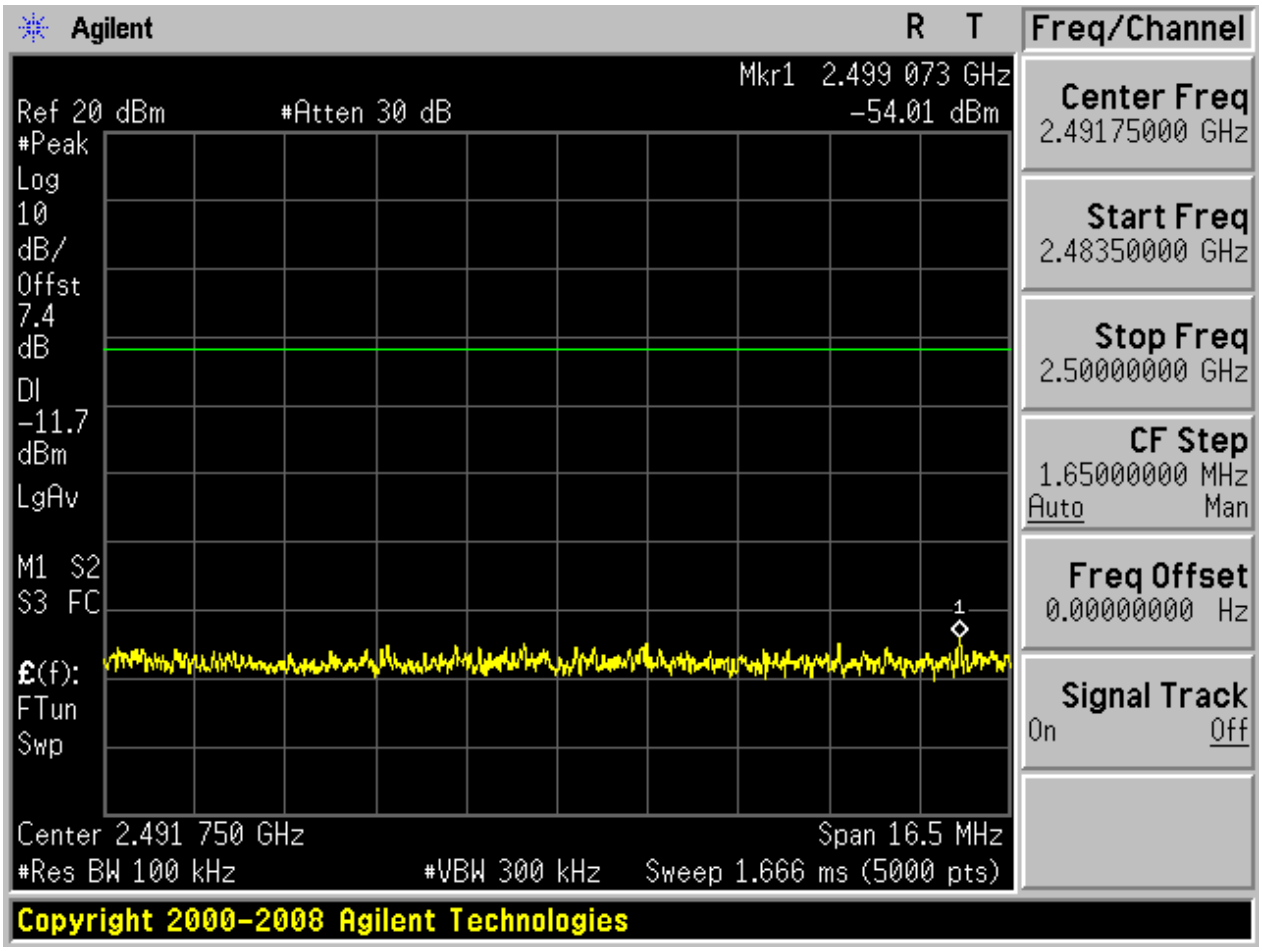
2.6.2 Puw

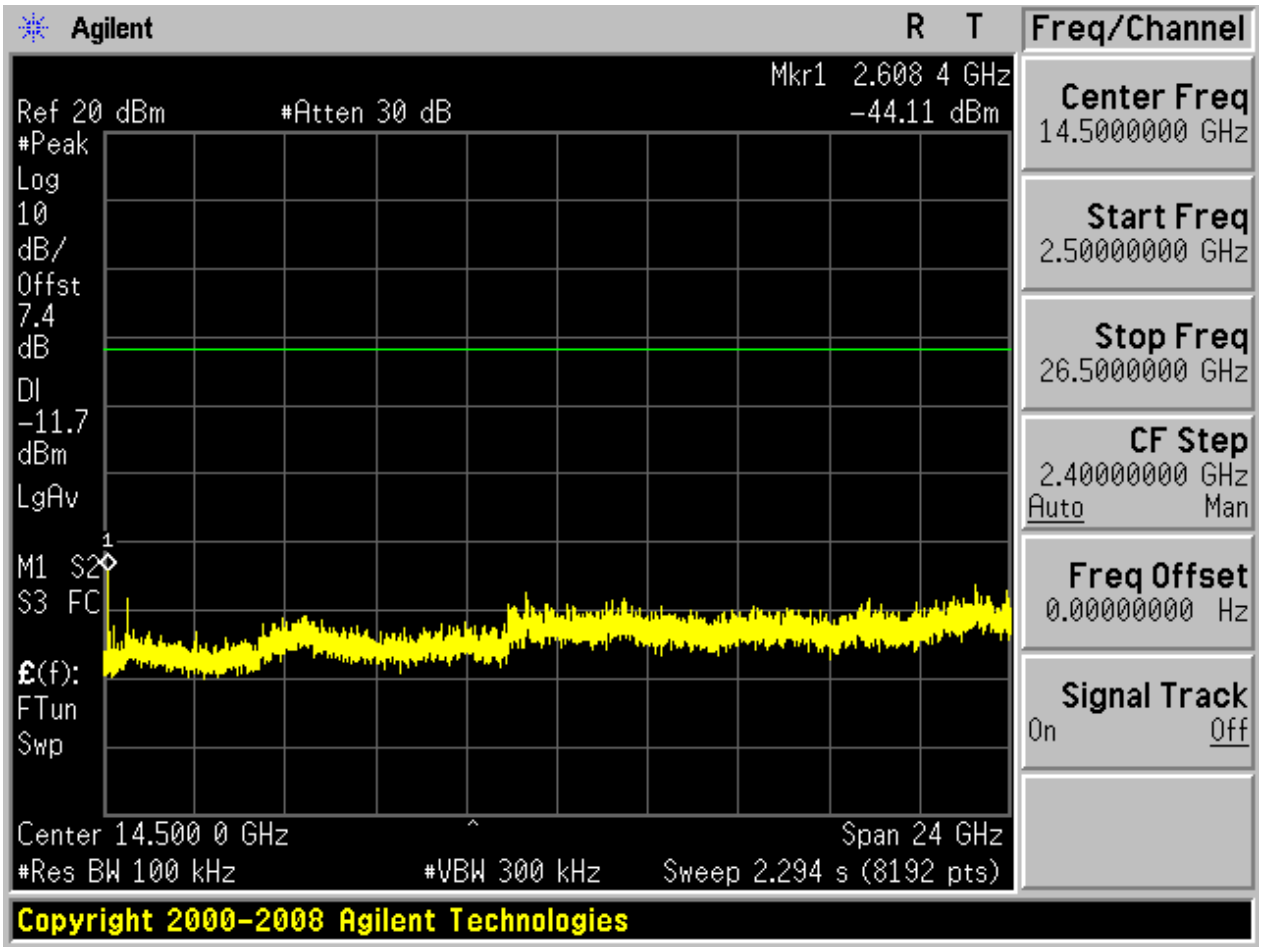






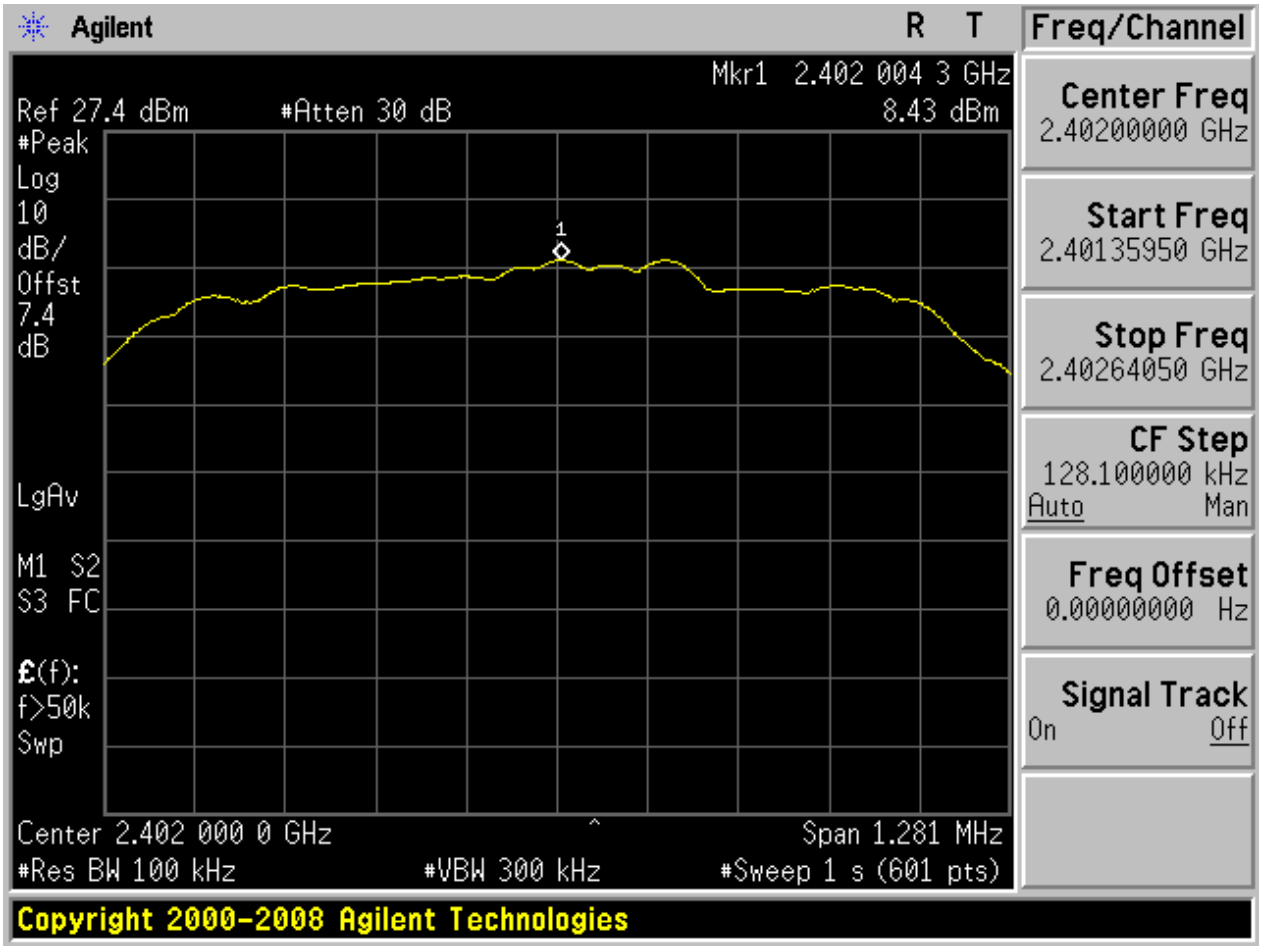




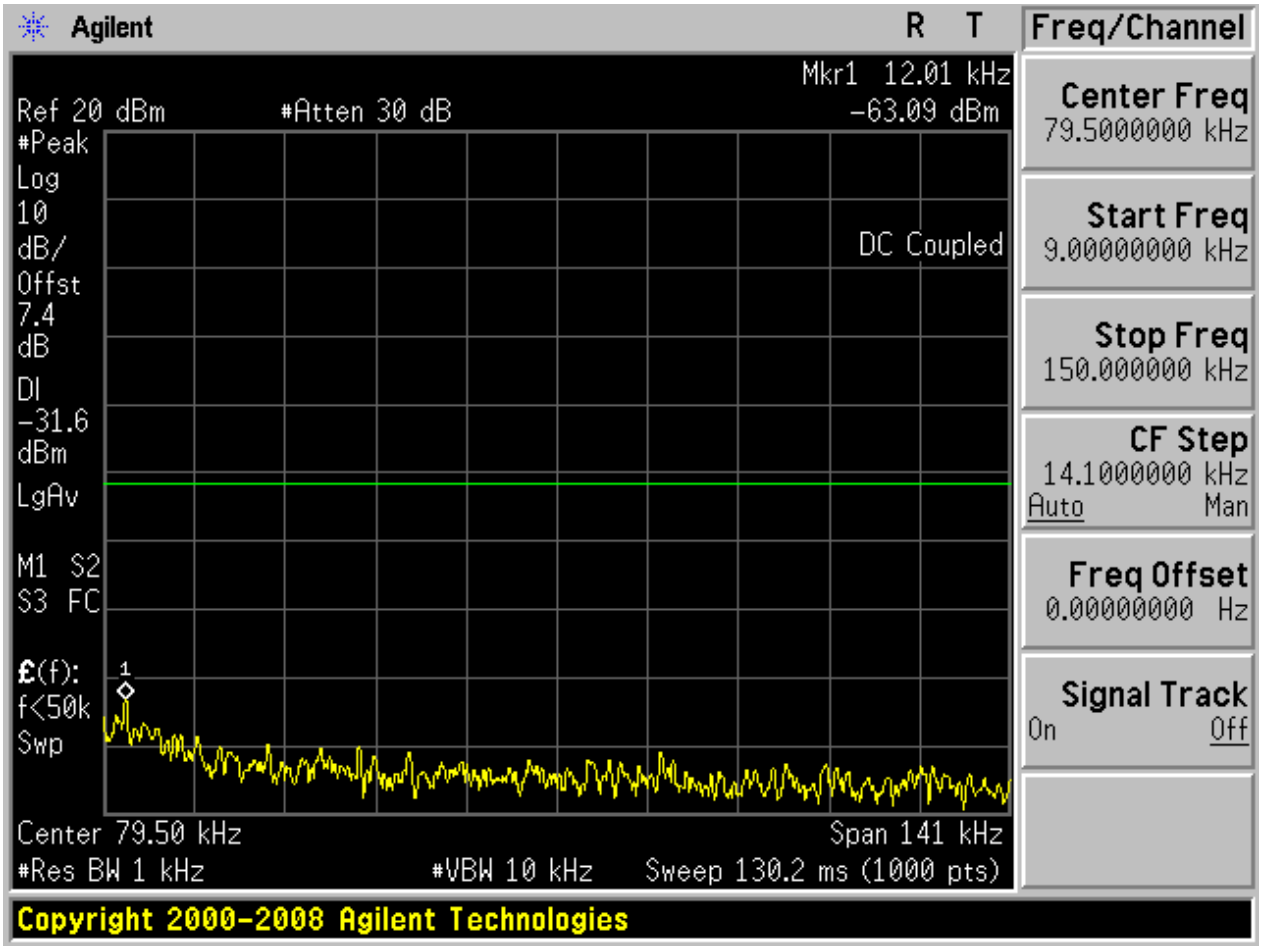


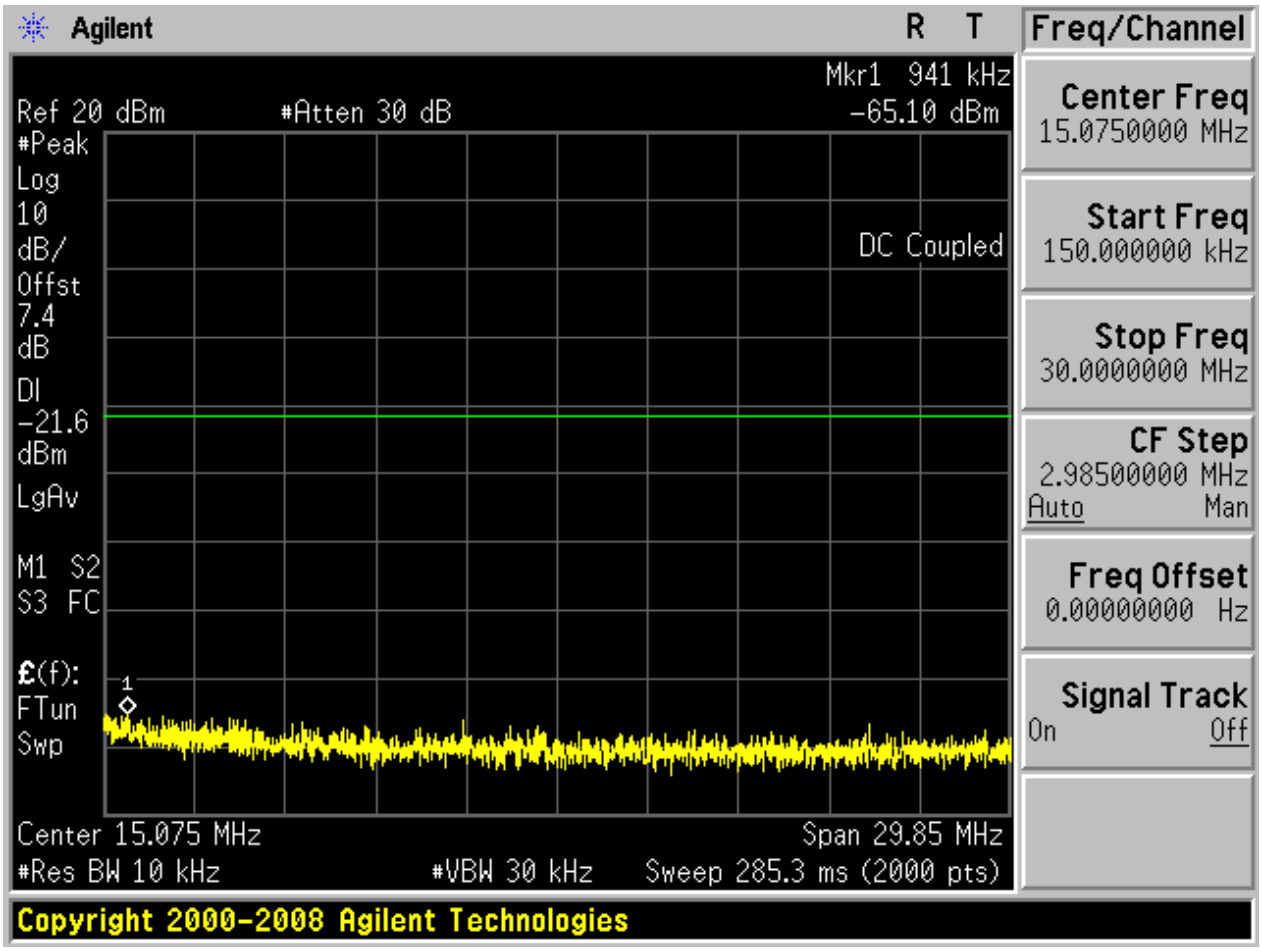
2.7 TM3_3DH5_Ch0

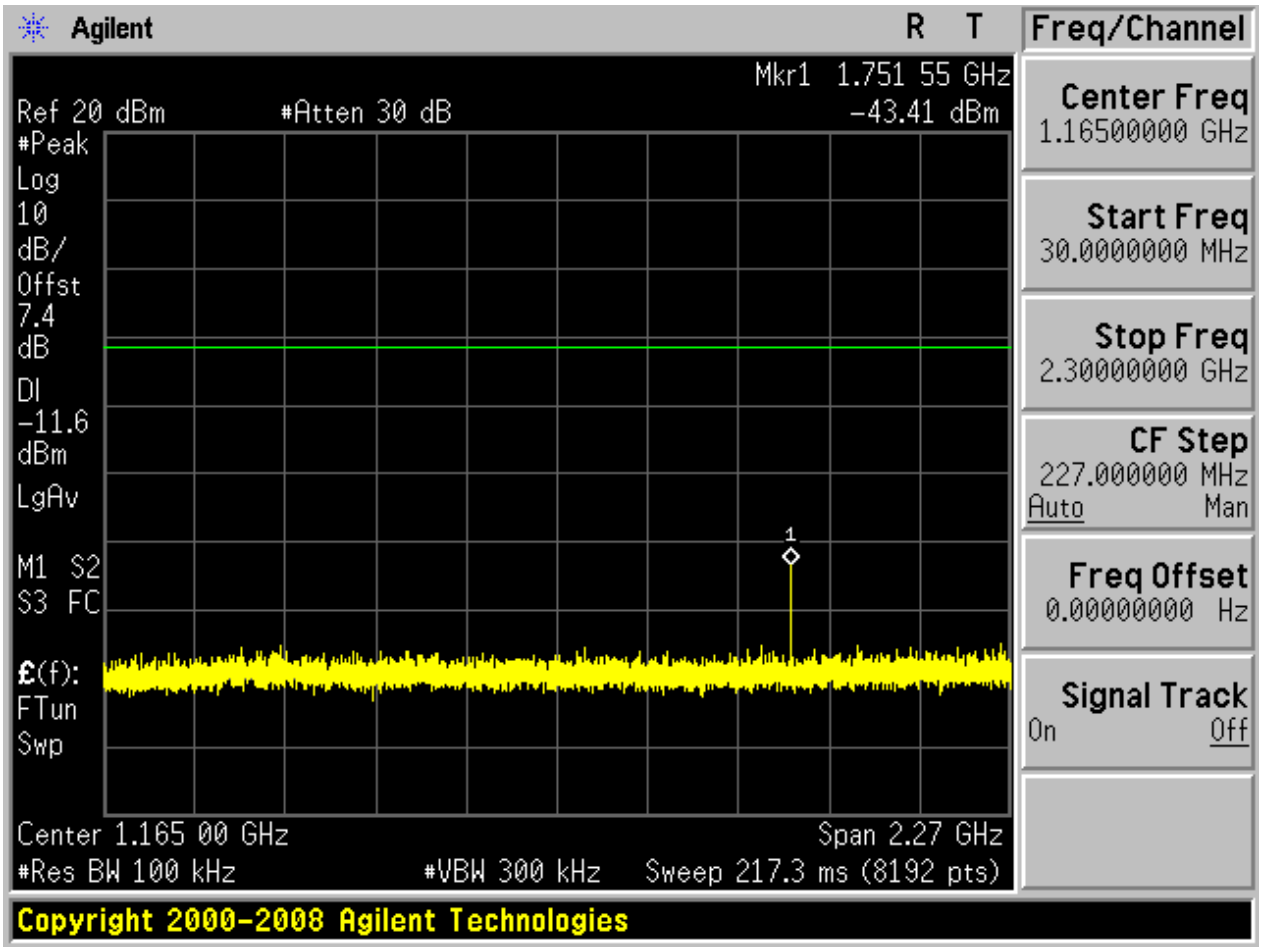
2.7.1 Pref

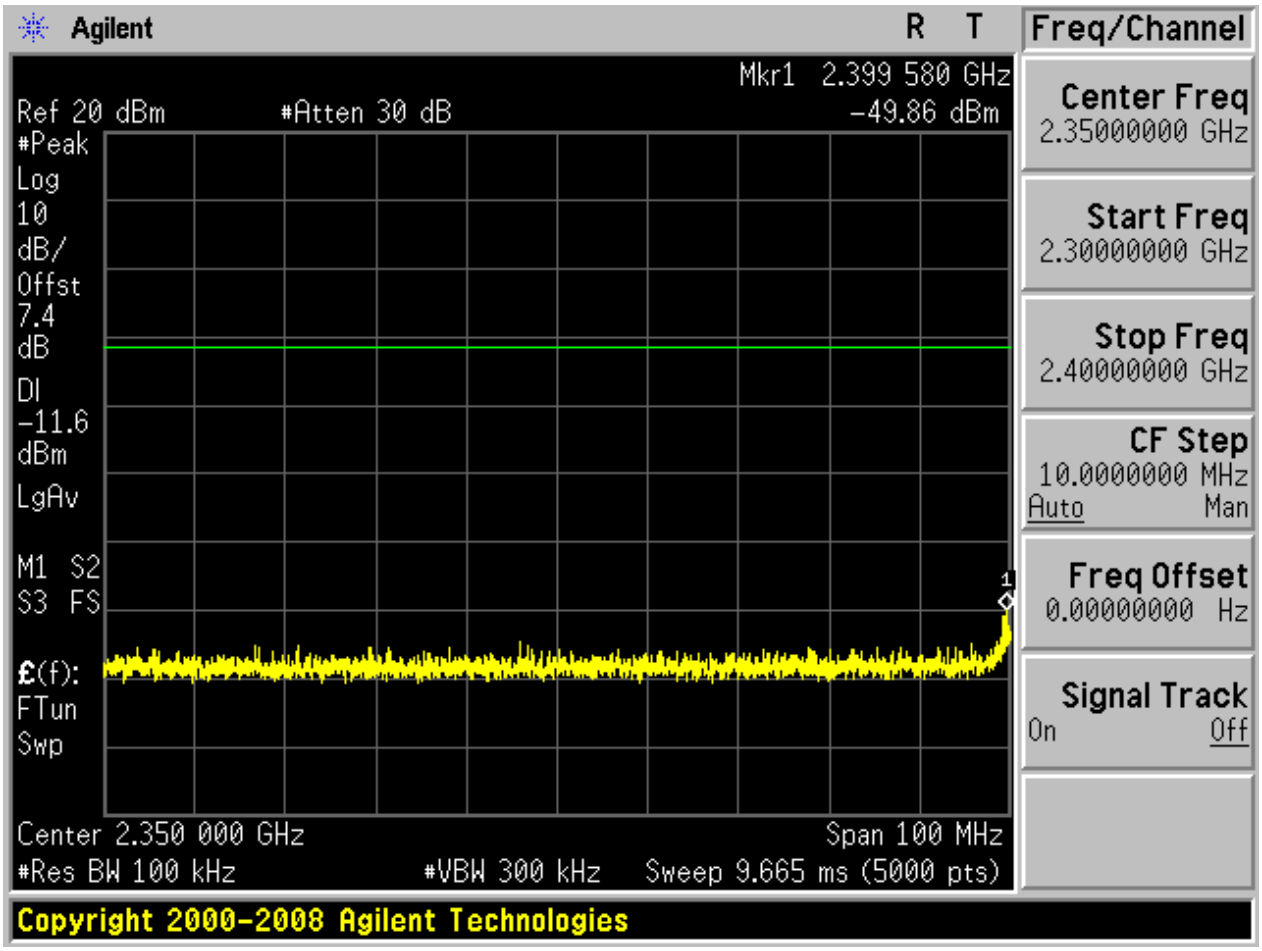


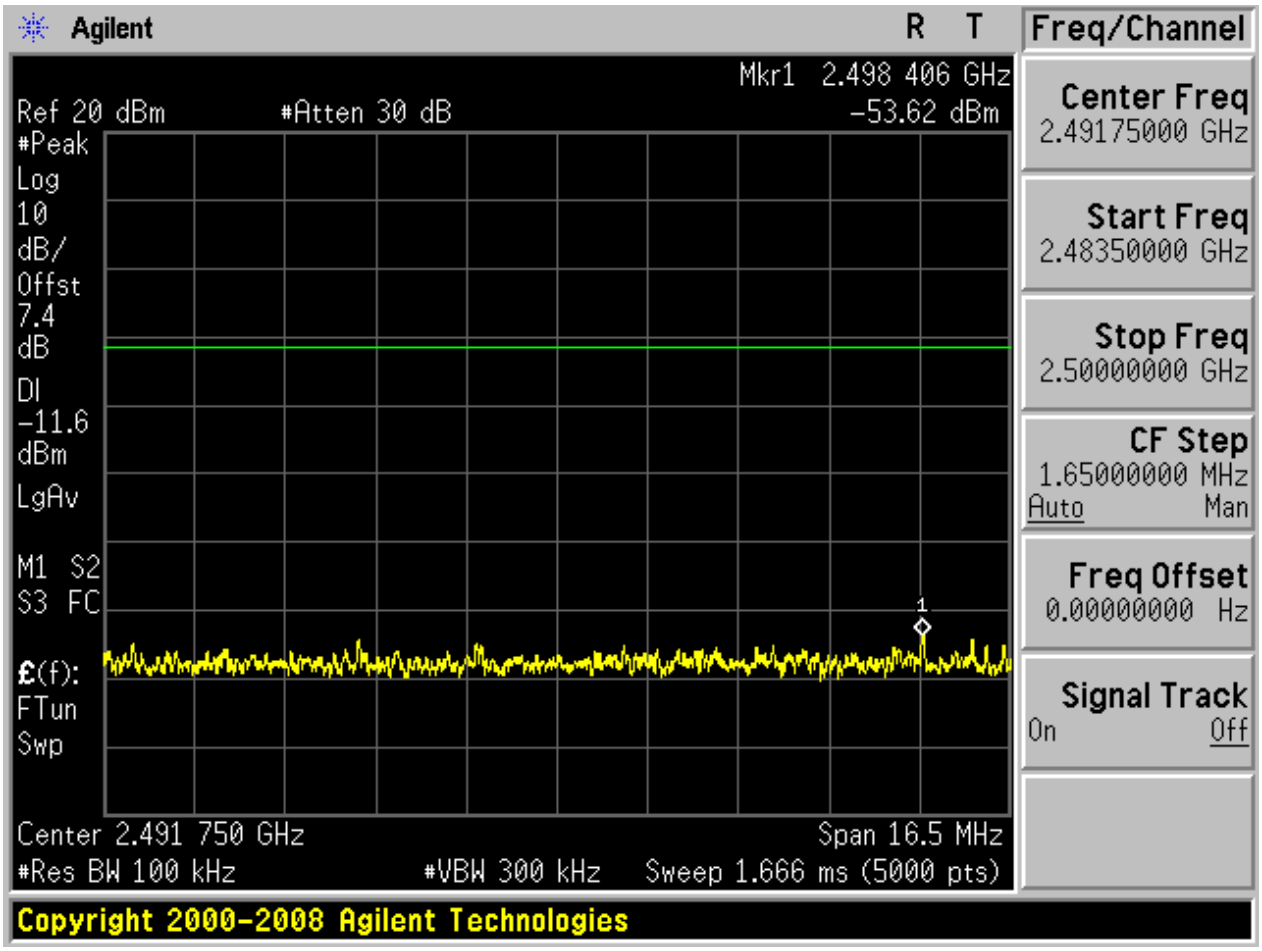
2.7.2 Puw

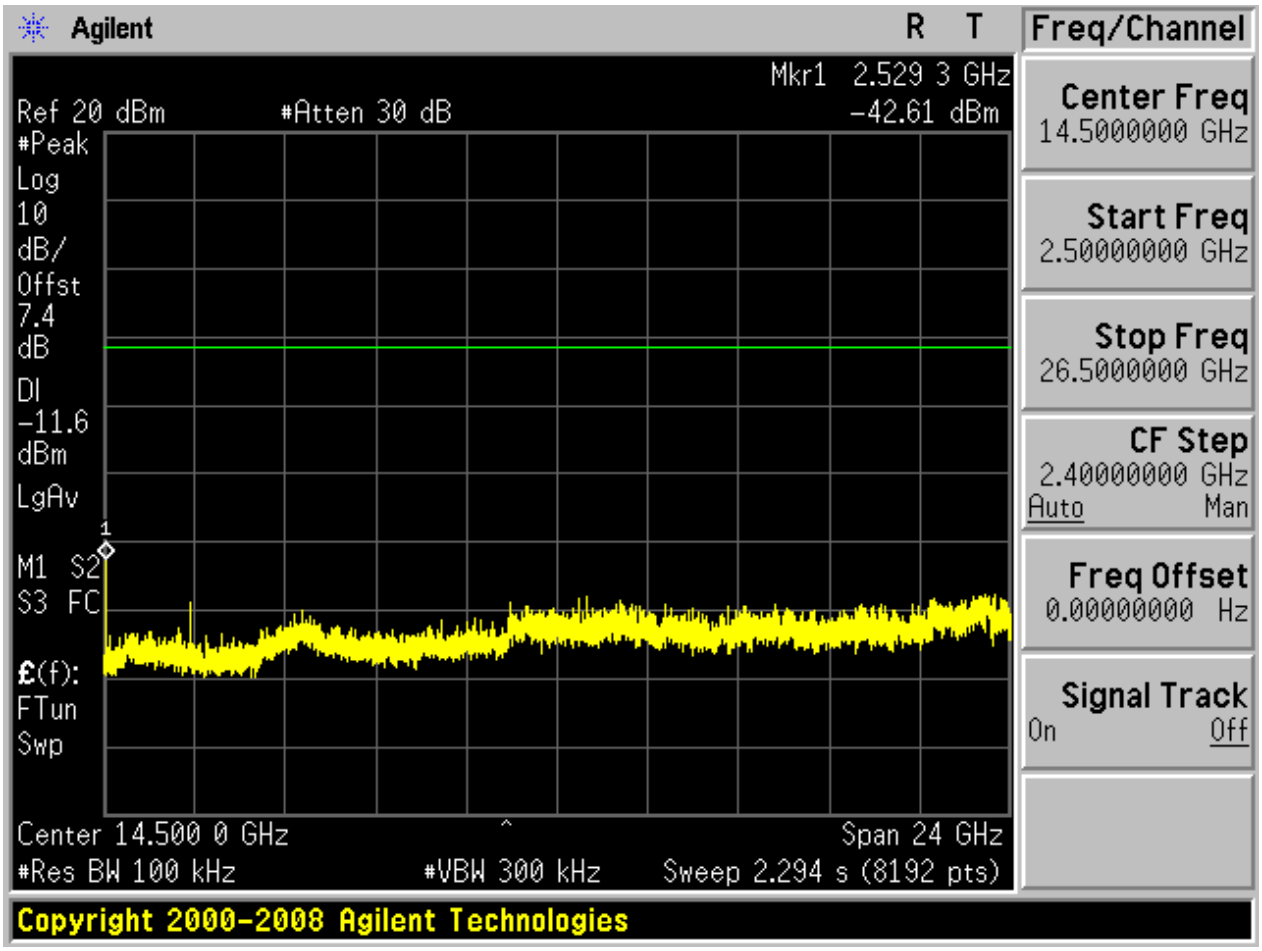






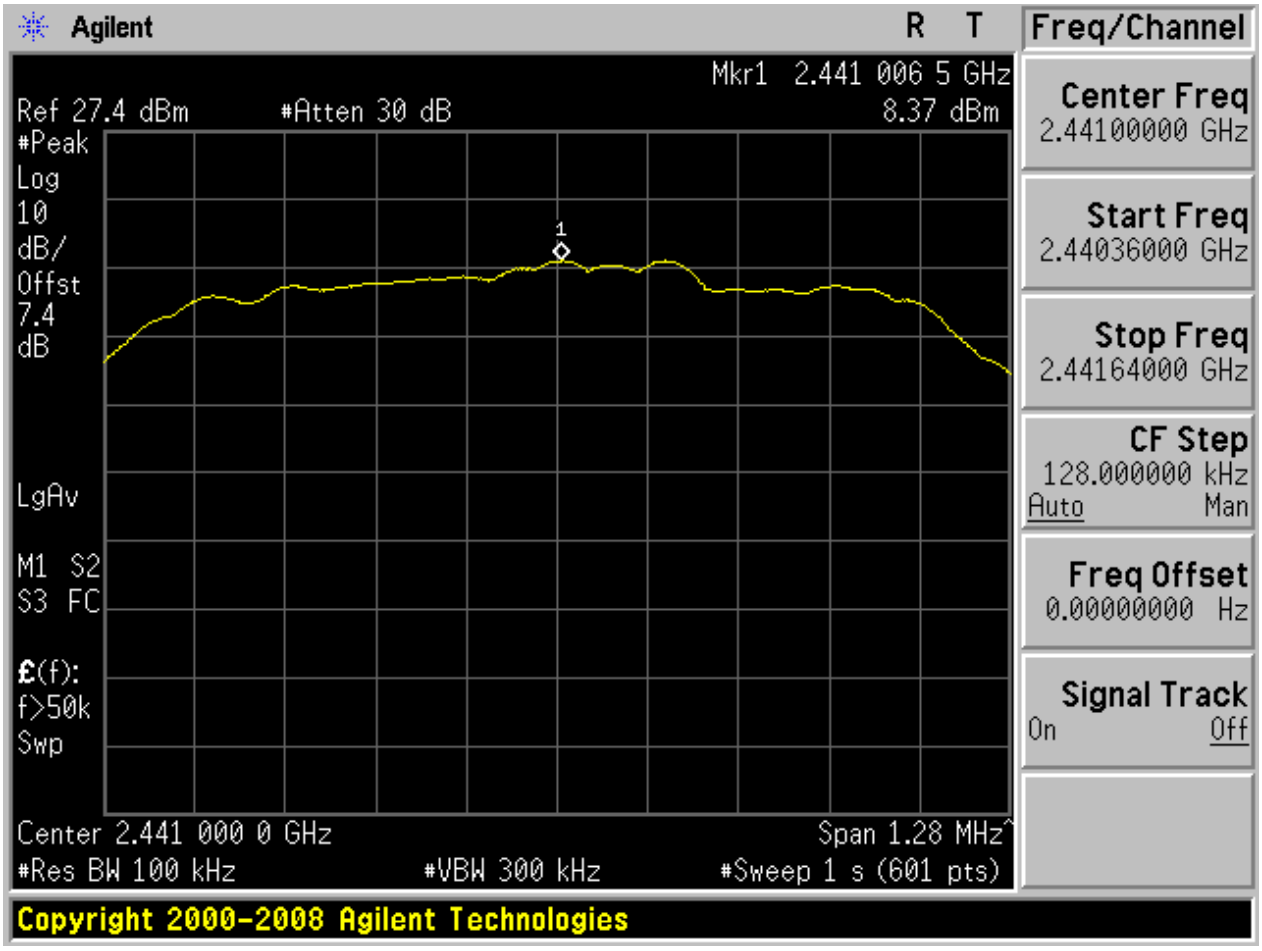




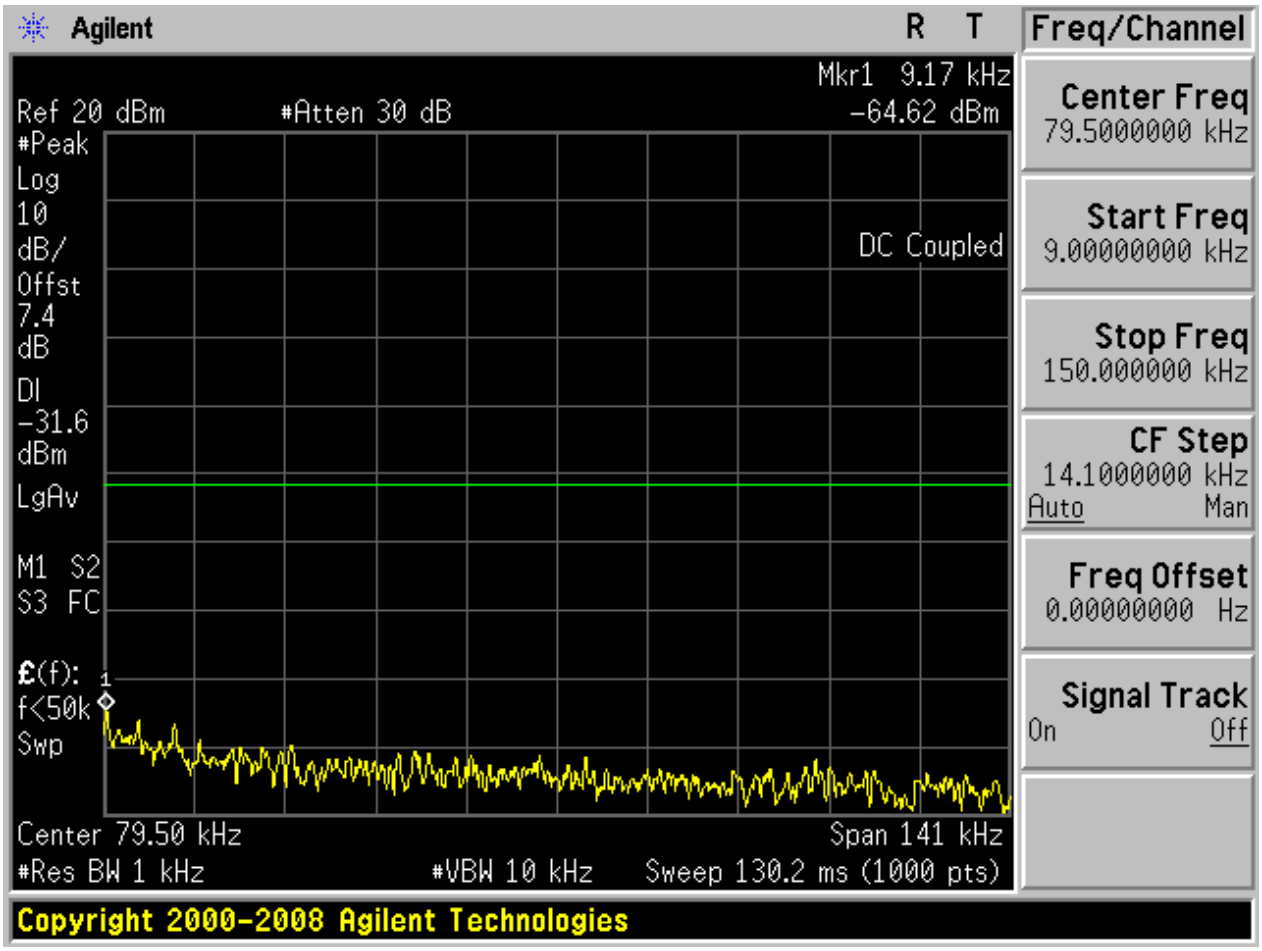


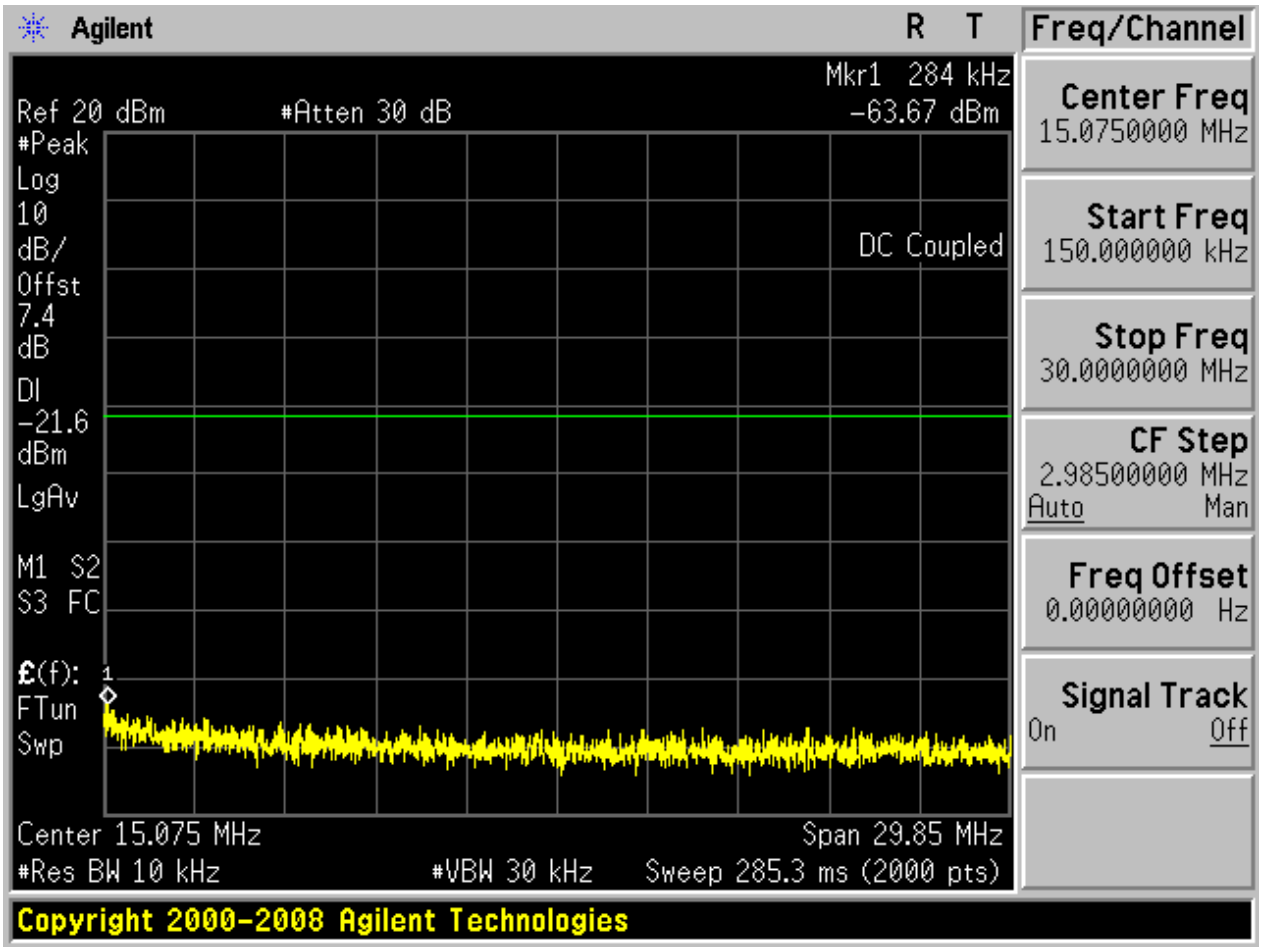
2.8 TM3_3DH5_Ch39

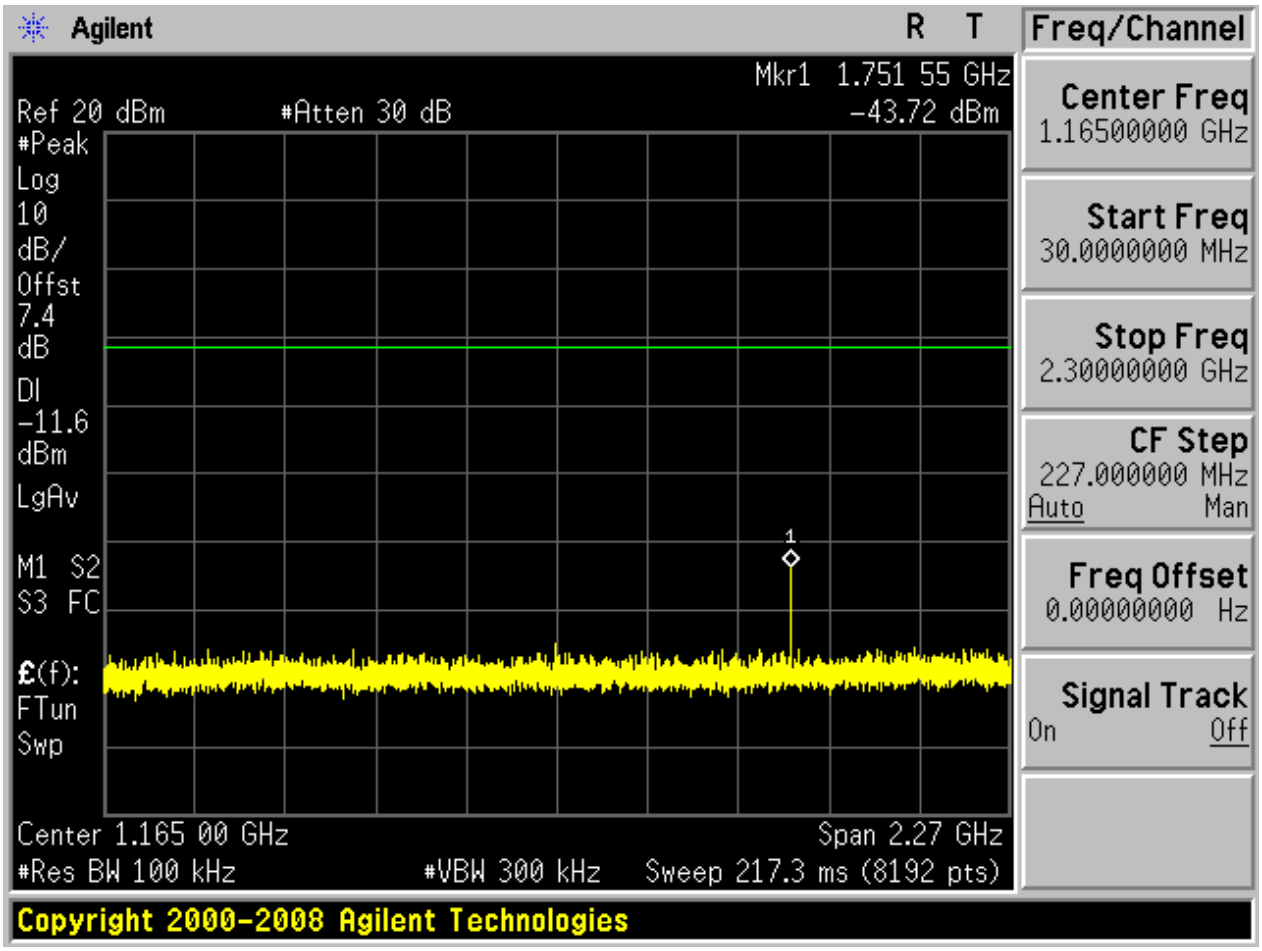
2.8.1 Pref

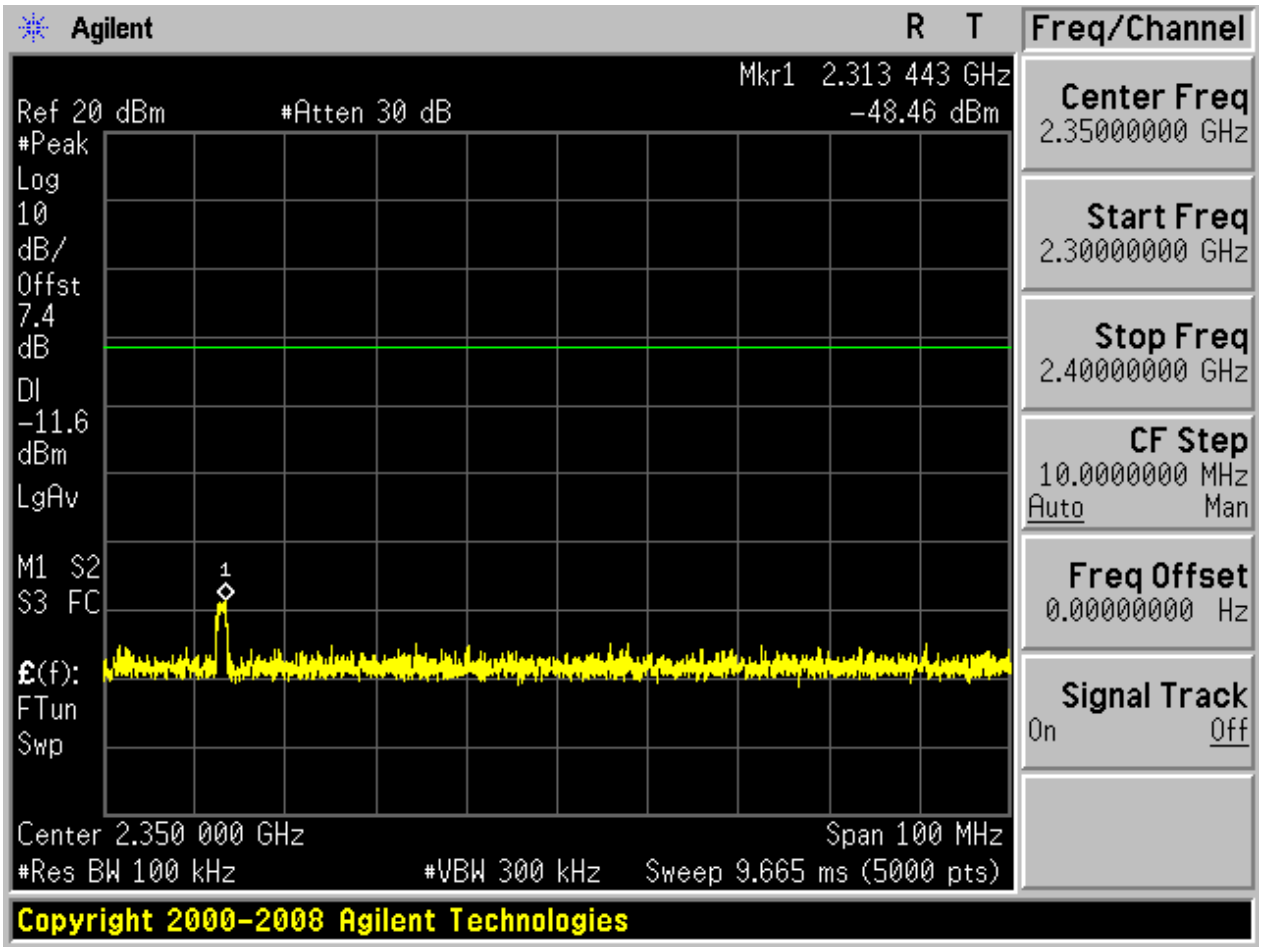


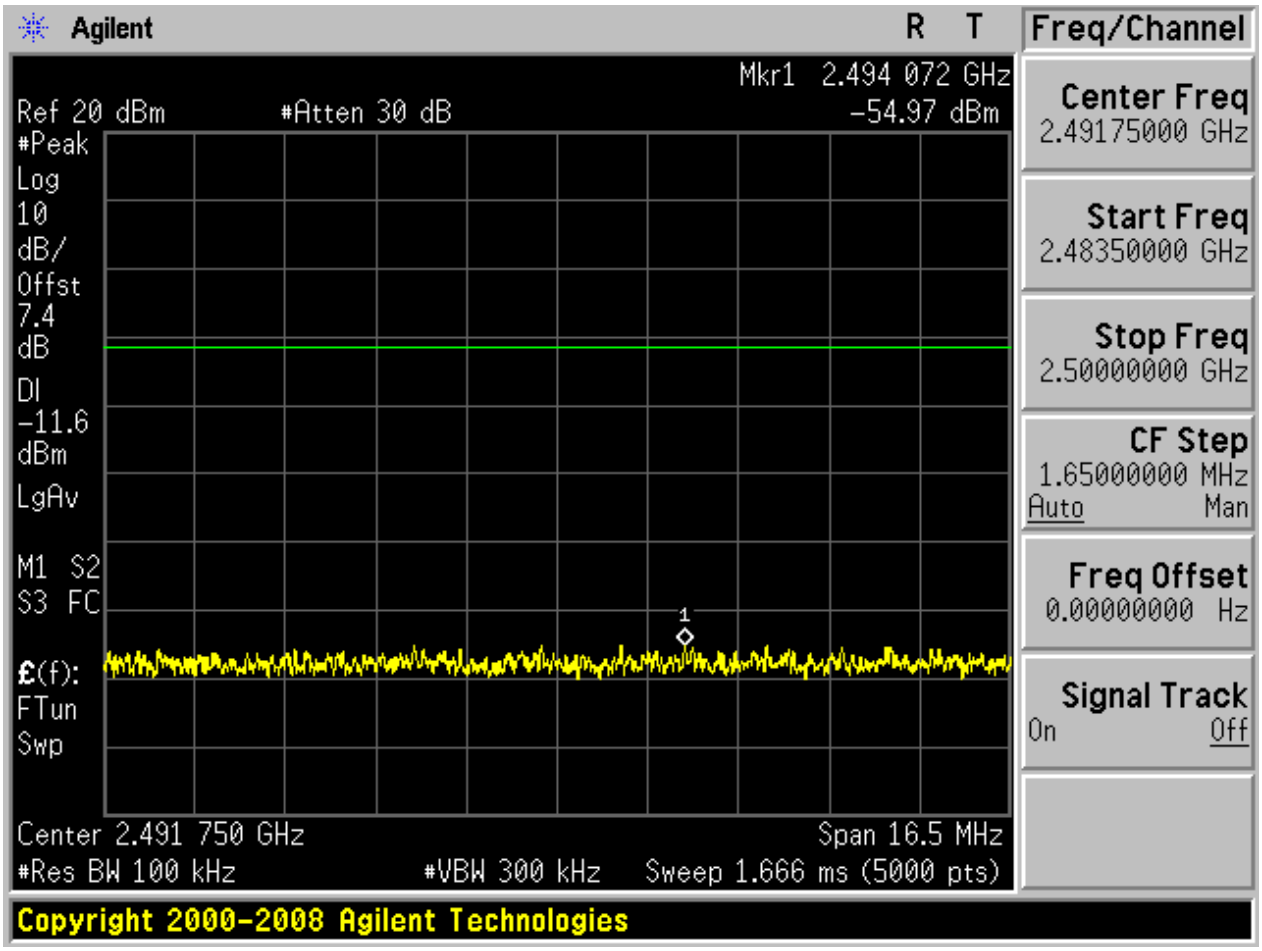
2.8.2 Puw

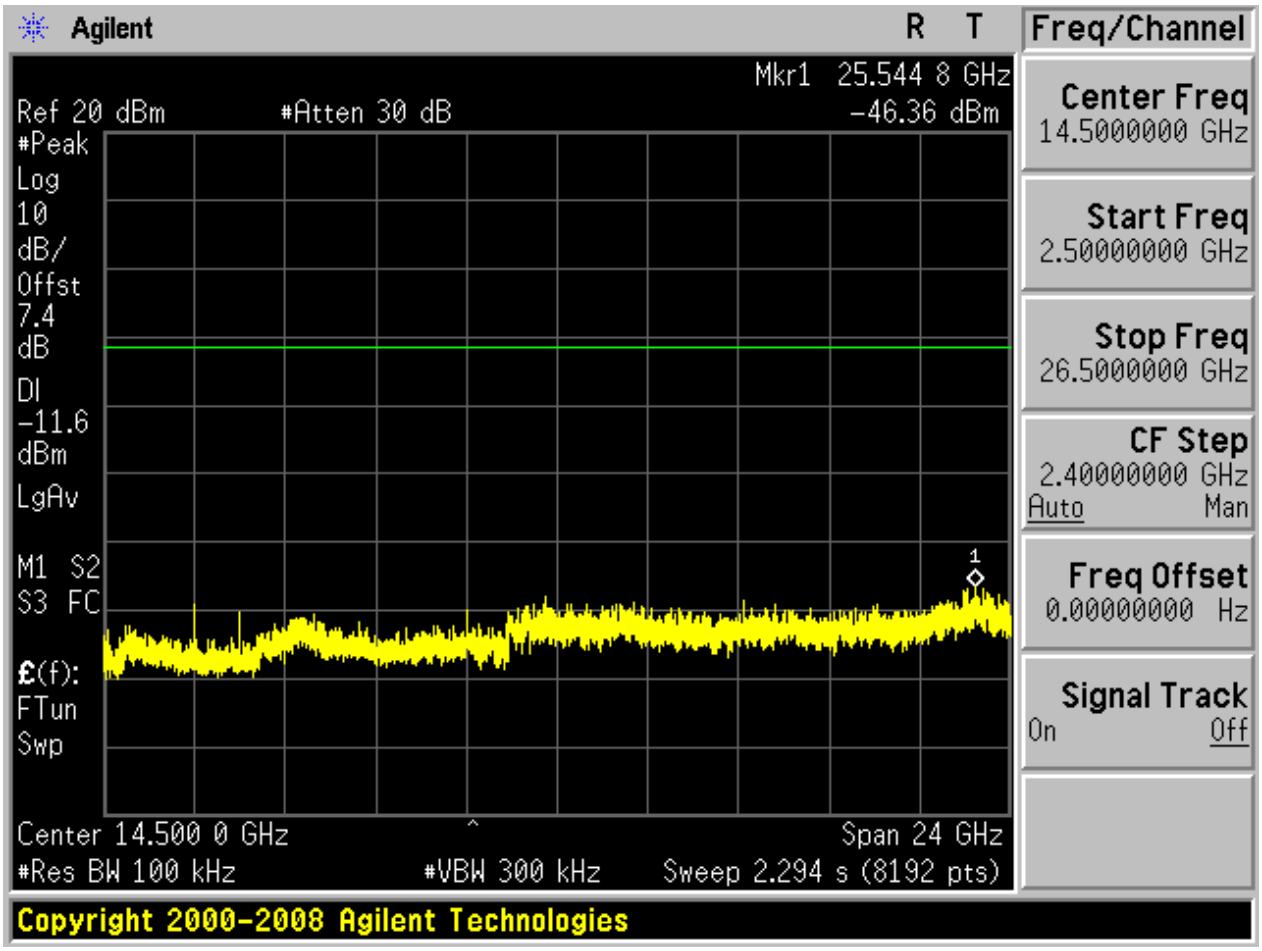






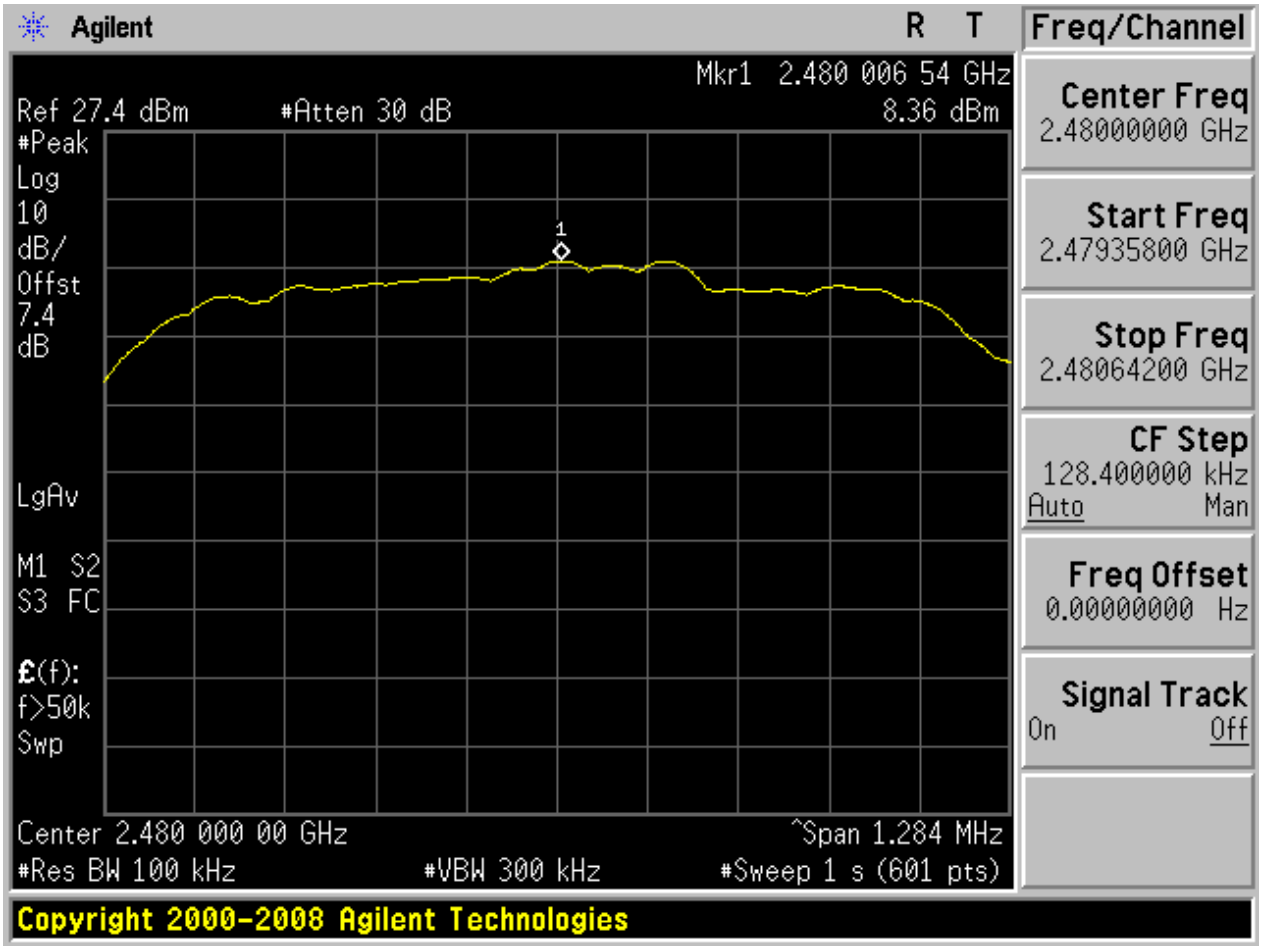




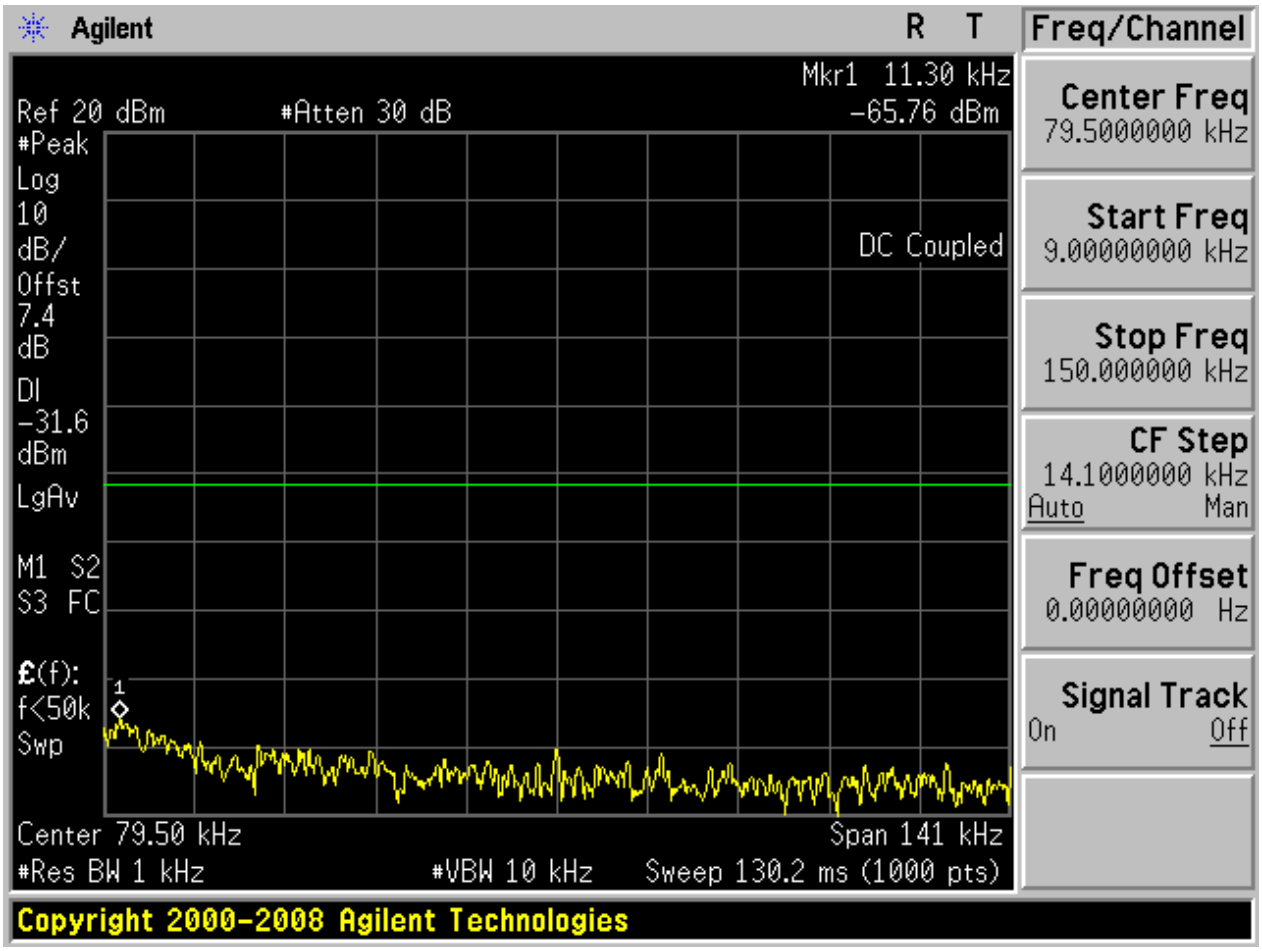


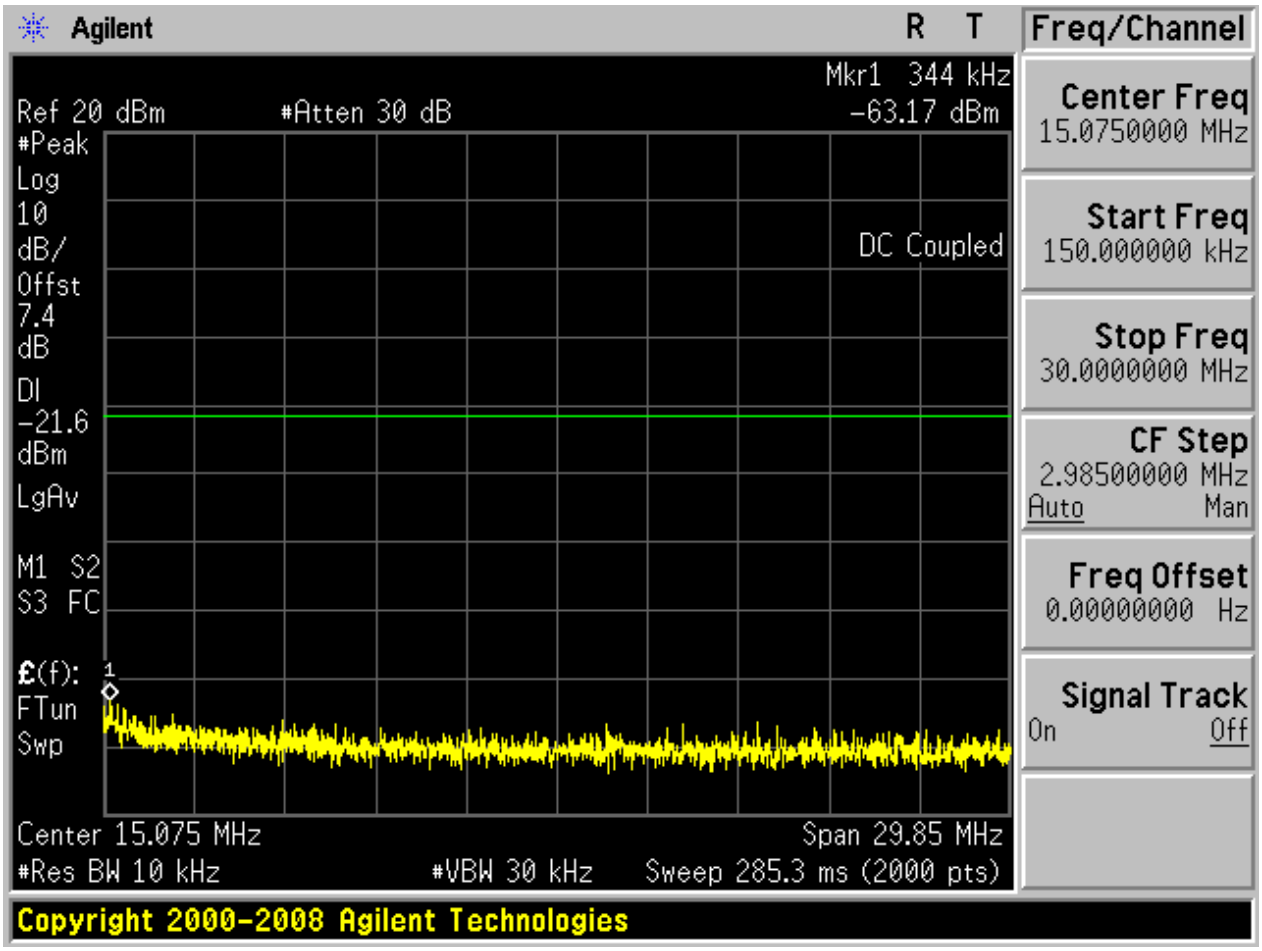
2.9 TM3_3DH5_Ch78

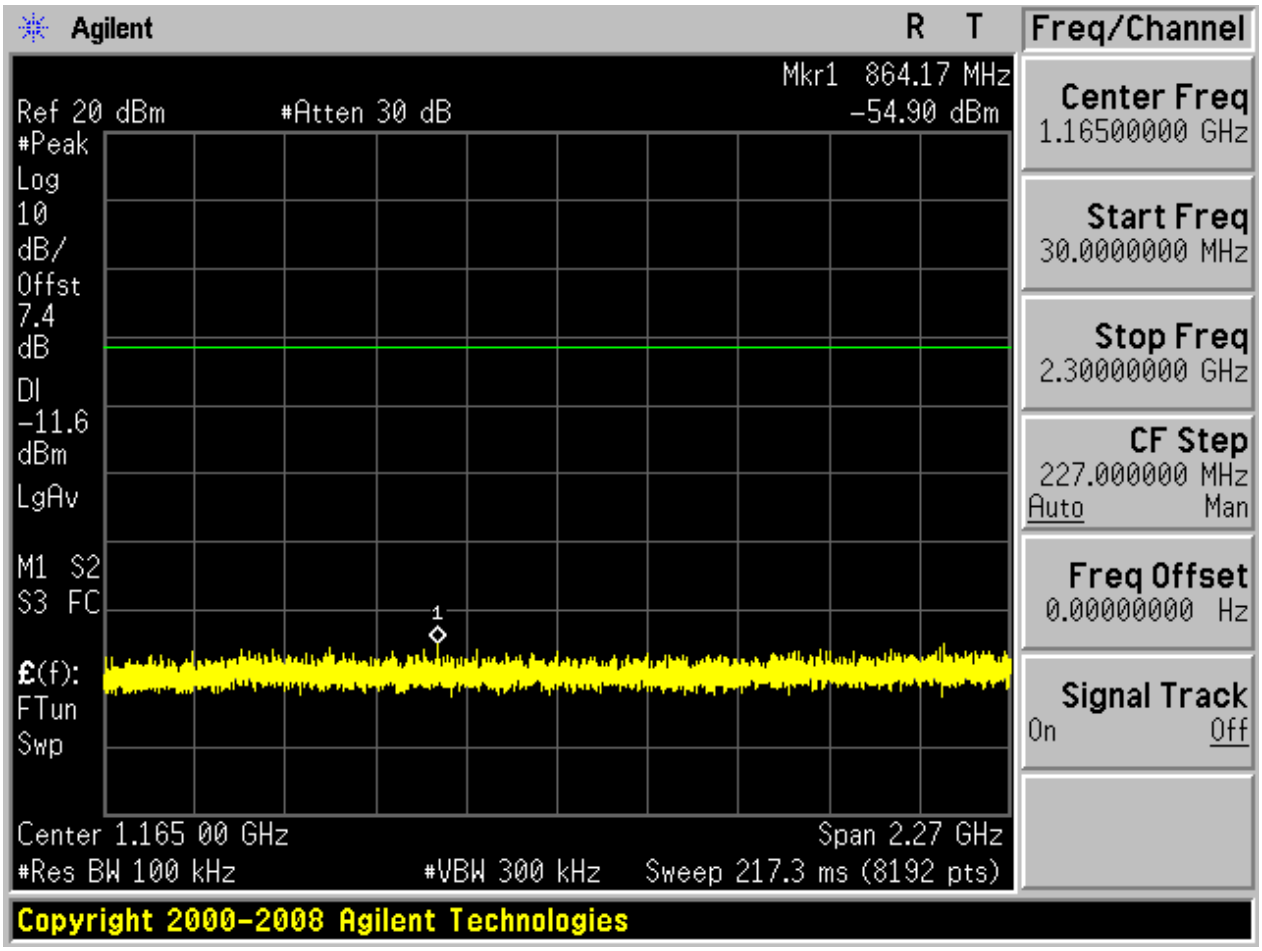
2.9.1 Pref

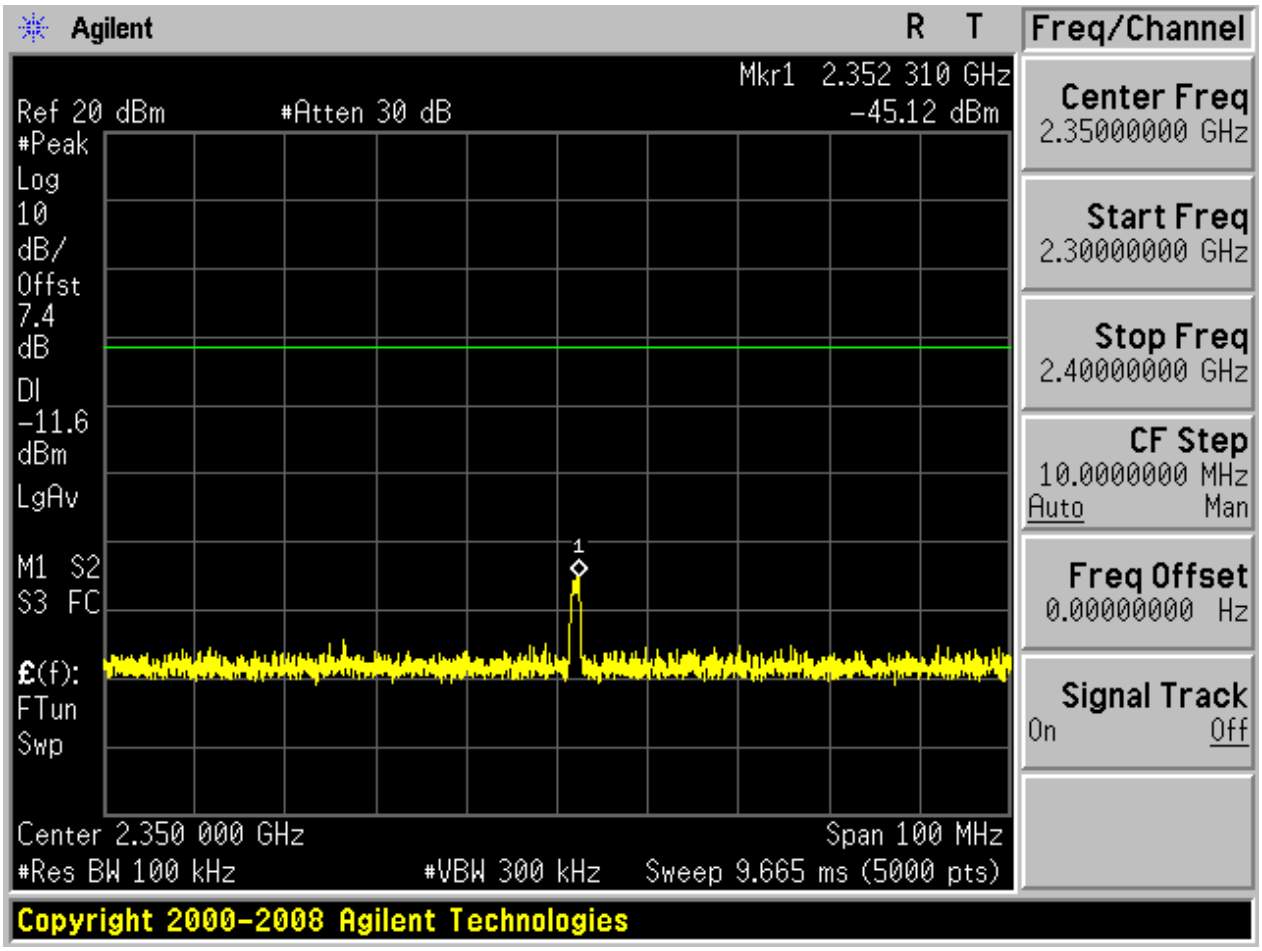


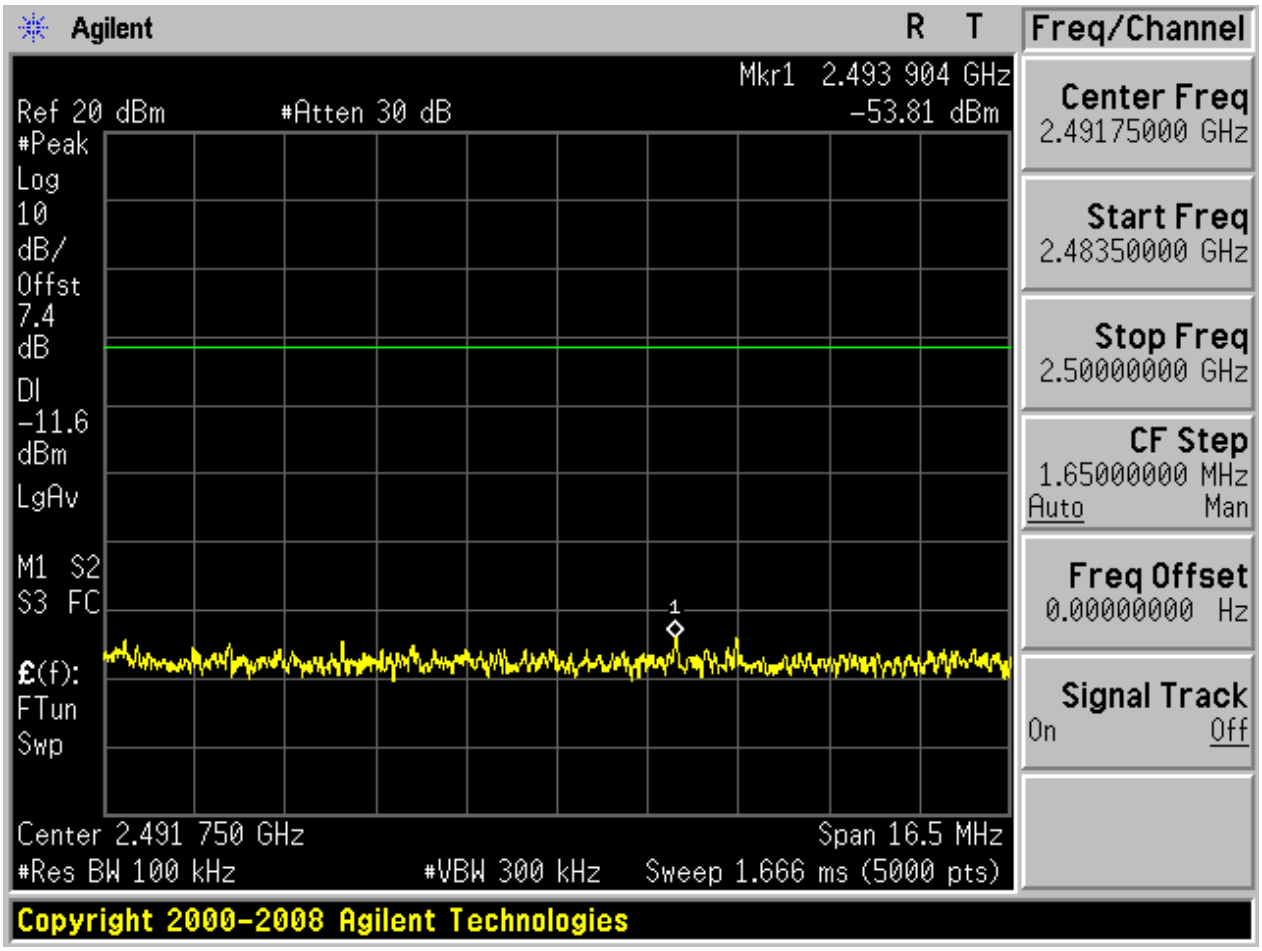
2.9.2 Puw

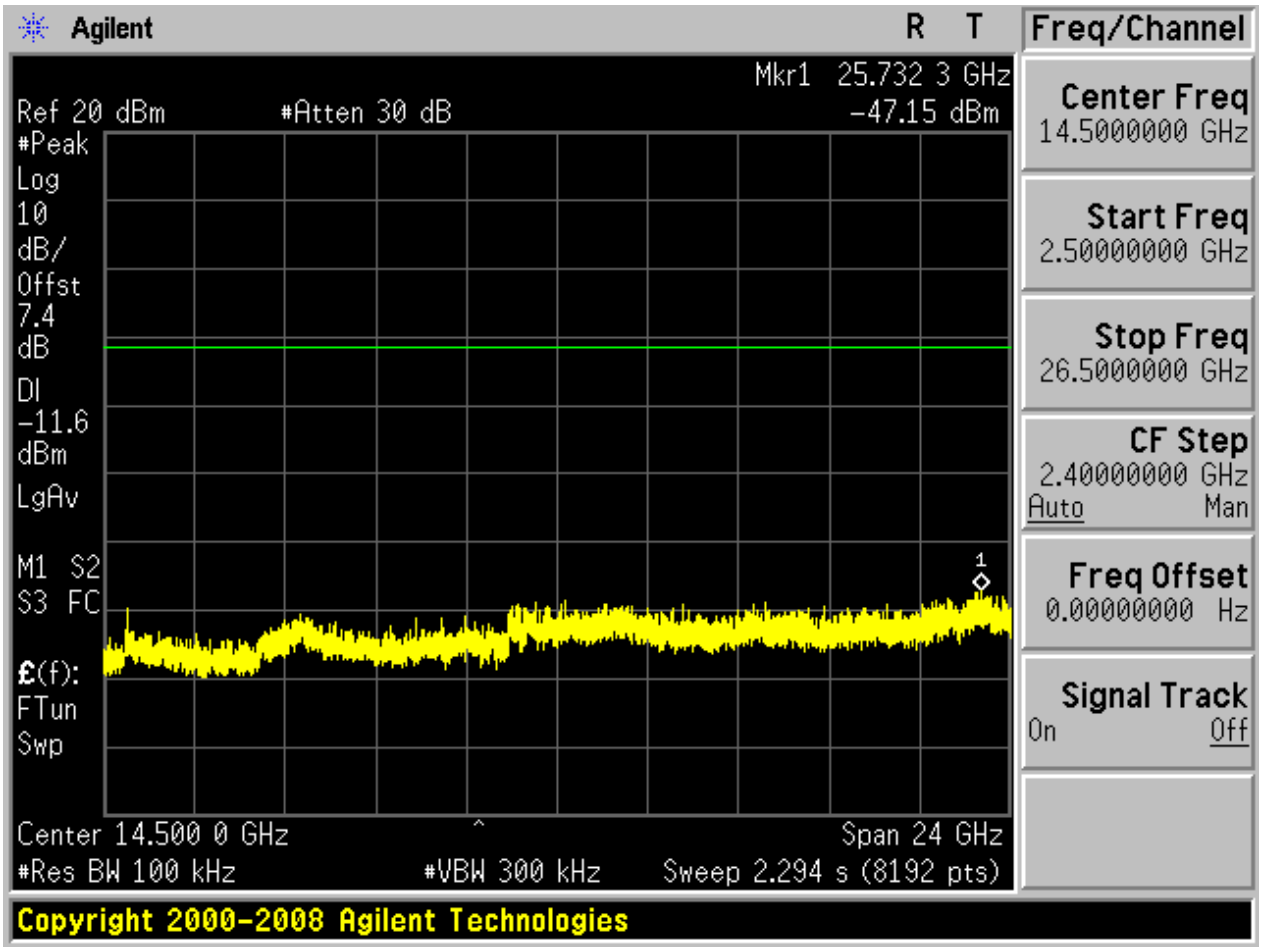












Appendix H

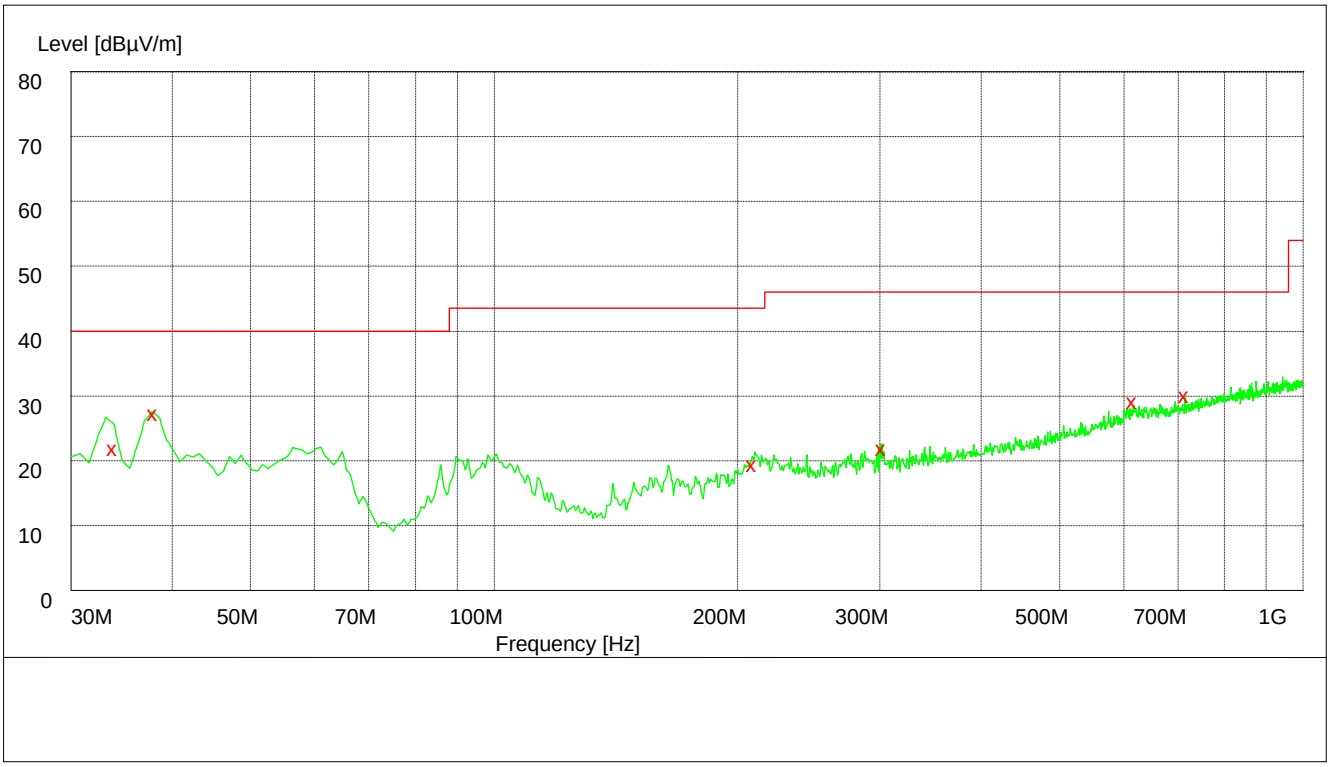
Radiated spurious emission

According to FCC Part 15.247 (d) & 15.205 & 15.209

Part 1: Testing Range of "30 MHz to 1 GHz"

Note 1: The test results and plot for testing range of "30 MHz to 1 GHz" showed as below is the WORST case for all Test Modes and Channels. This range will not be presented for each Test Mode and each Channel.

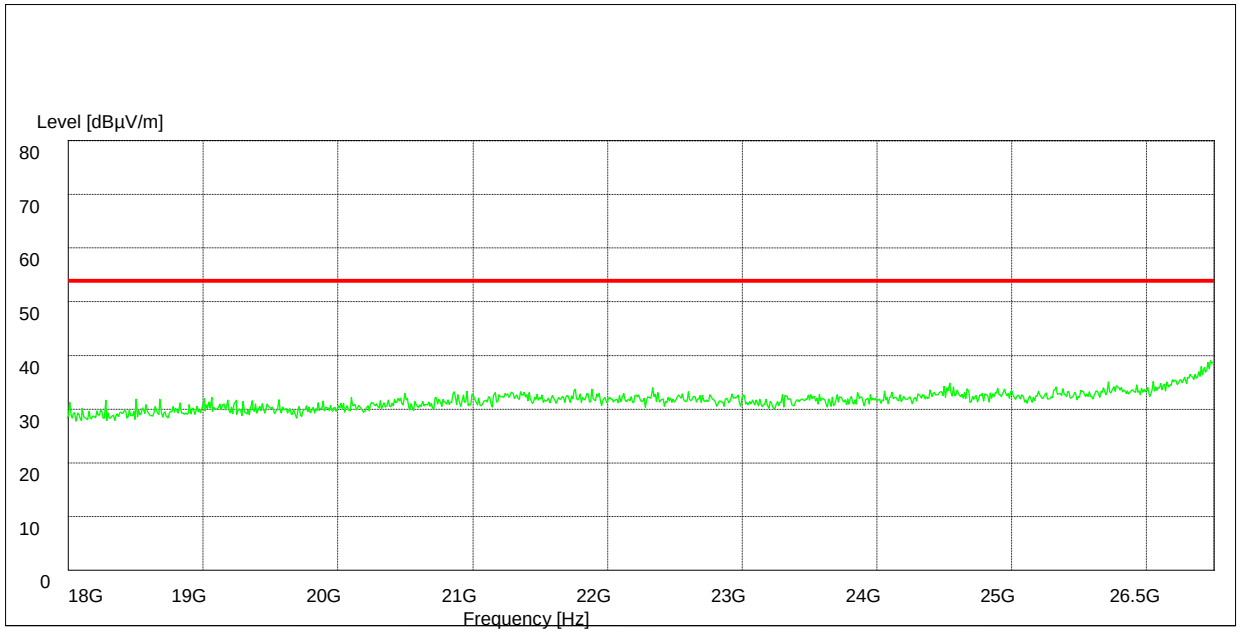
Note 2: The emissions in this range are mainly from the Platform Device (Notepad PC and its ancillary components).



Frequency MHz	Level dBµV/m	Transd dB	Limit dBµV/m	Margin dB	Height cm	Azimuth deg	Plarization
33.960000	23.40	11.8	40.0	16.6	100.0	123.00	VERTICAL
38.100000	28.80	12.6	40.0	11.2	100.0	123.00	VERTICAL
209.580000	20.90	12.6	43.5	22.6	107.0	330.00	HORIZONTAL
302.400000	23.40	15.7	46.0	22.6	100.0	103.00	HORIZONTAL
617.820000	30.70	22.8	46.0	15.3	167.0	262.00	VERTICAL
716.040000	31.50	23.7	46.0	14.5	186.0	360.00	HORIZONTAL

Part 2: Testing Range of “18 GHz to 26.5 GHz”

Note: No peak found in pre- test.



Part 3: Testing Range of "2.3GHz to 2.5GHz"

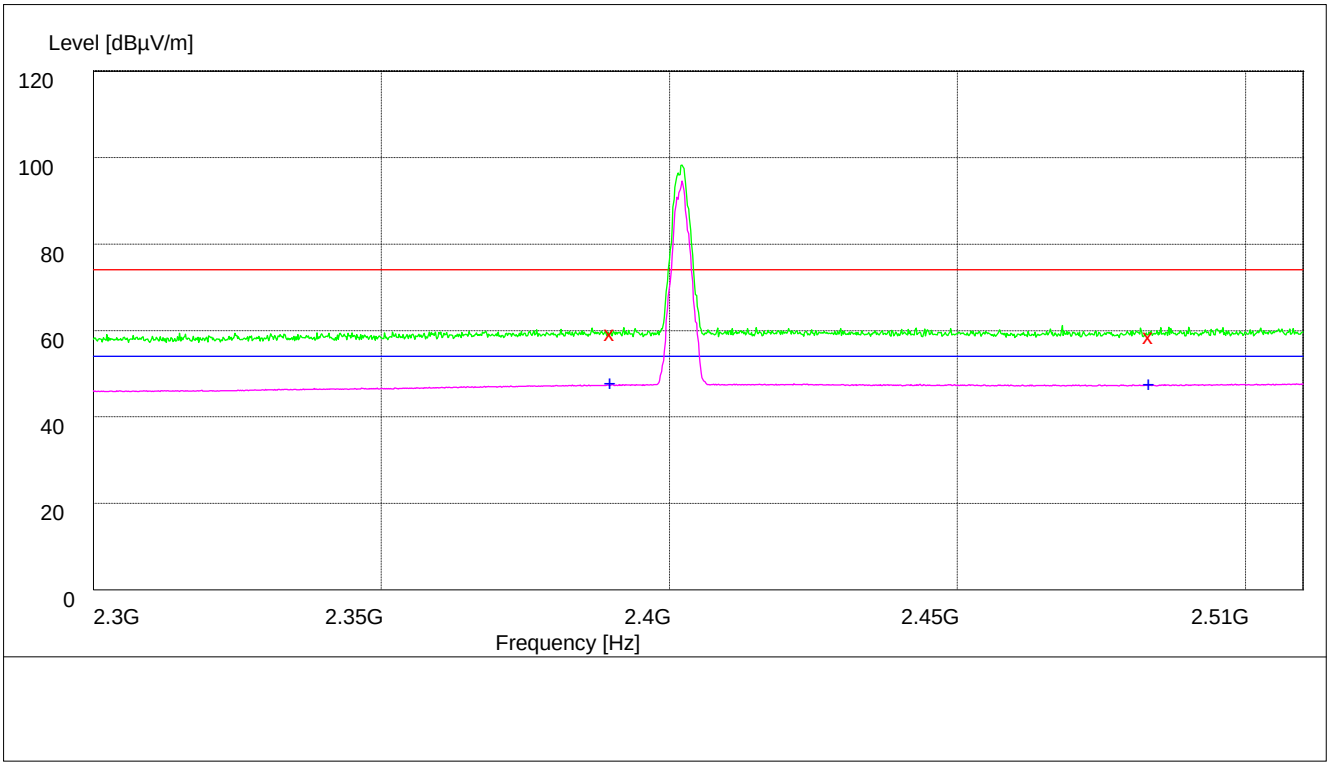
Note 1: The testing range of "2.3 GHz to 2.5 GHz" is for checking radiated emissions located in restricted bands near the EUT operating bands.

Note 2: Two limits are required in the testing range above 1 GHz, that is Peak limit (74 dBμV/m) and Average Limit (54 dBμV/m).

Note 3: The peak spike exceeds the limit line is EUT's operating frequency.

3 Test Mode:

3.1 Channel 00



Note: The peak exceeds the limit line is carrier frequency.

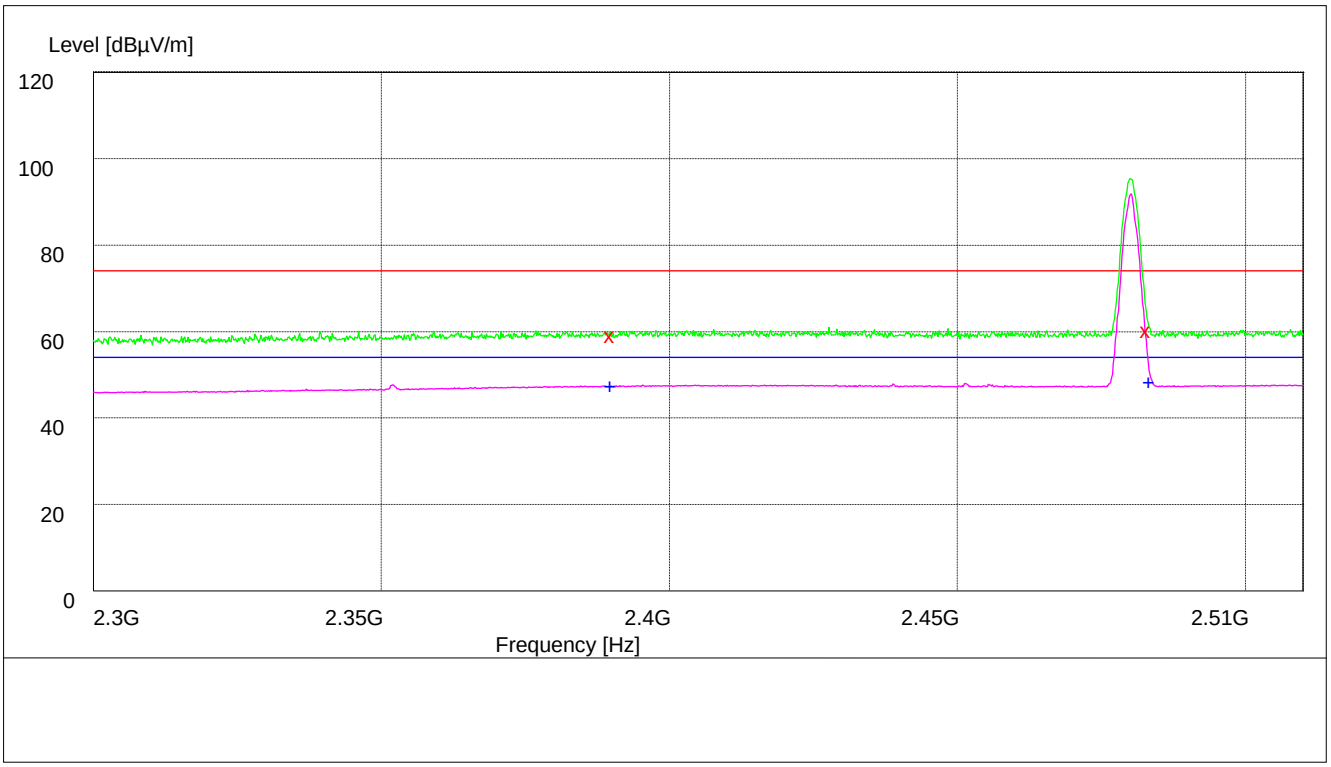
MEASUREMENT RESULT: PK Detector

Frequency MHz	Level dBμV/m	Transd dB	Limit dBμV/m	Margin dB	Height cm	Azimuth deg	Polarization
2390.000000	59.60	34.8	74.0	14.4	117.0	141.00	VERTICAL
2483.500000	58.70	35.1	74.0	15.3	106.0	200.00	HORIZONTAL

MEASUREMENT RESULT: AVDetector

Frequency MHz	Level dBμV/m	Transd dB	Limit dBμV/m	Margin dB	Height cm	Azimuth deg	Polarization
2390.000000	47.90	34.8	54.0	6.1	168.0	41.00	HORIZONTAL
2483.500000	47.70	35.1	54.0	6.3	190.0	315.00	HORIZONTAL

3.2 Channel 78



Note: The peak exceeds the limit line is carrier frequency.

MEASUREMENT RESULT: PK Detector

Frequency MHz	Level dBµV/m	Transd dB	Limit dBµV/m	Margin dB	Height cm	Azimuth deg	Polarization
2390.000000	59.70	34.8	74.0	14.3	200.0	54.00	HORIZONTAL
2483.000000	60.90	35.1	74.0	13.1	171.0	229.00	HORIZONTAL

MEASUREMENT RESULT: AVDetector

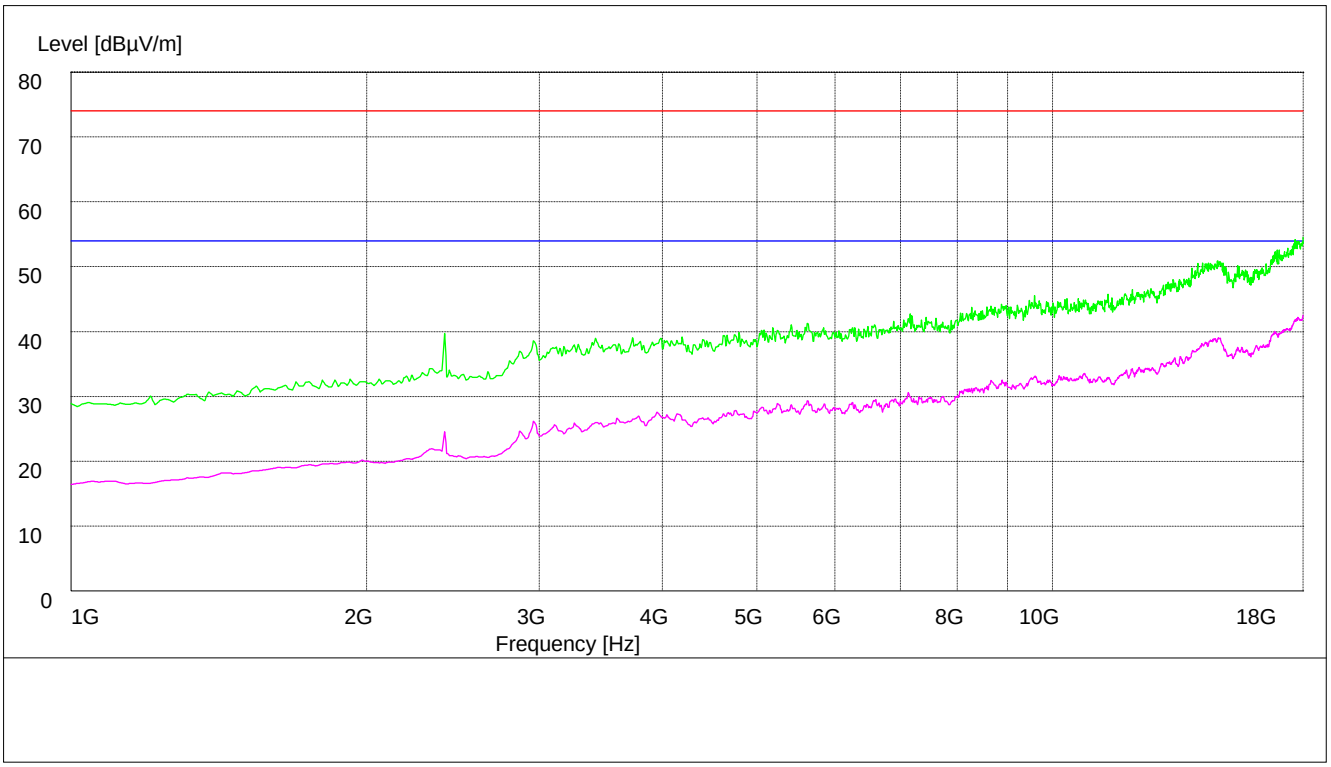
Frequency MHz	Level dBµV/m	Transd dB	Limit dBµV/m	Margin dB	Height cm	Azimuth deg	Polarization
2390.000000	47.80	34.8	54.0	6.2	200.0	263.00	HORIZONTAL
2483.500000	48.80	35.1	54.0	5.2	200.0	336.00	HORIZONTAL

3.3
Part 4: Testing Range of “1 GHz to 18 GHz”

Note 1: The test results and plot for testing range of “1 GHz to 18 GHz” showed as below is the WORST case for all Test Modes and Channels. This range will not be presented for each Test Mode and each Channel.

Note 2: The testing range of “1 GHz to 18 GHz” is for checking radiated emissions located in restricted bands faraway from the EUT operating bands.

Note 3: Two limits are required in the testing range above 1 GHz, that is Peak limit (74 dBμV/m) and Average Limit (54 dBμV/m).



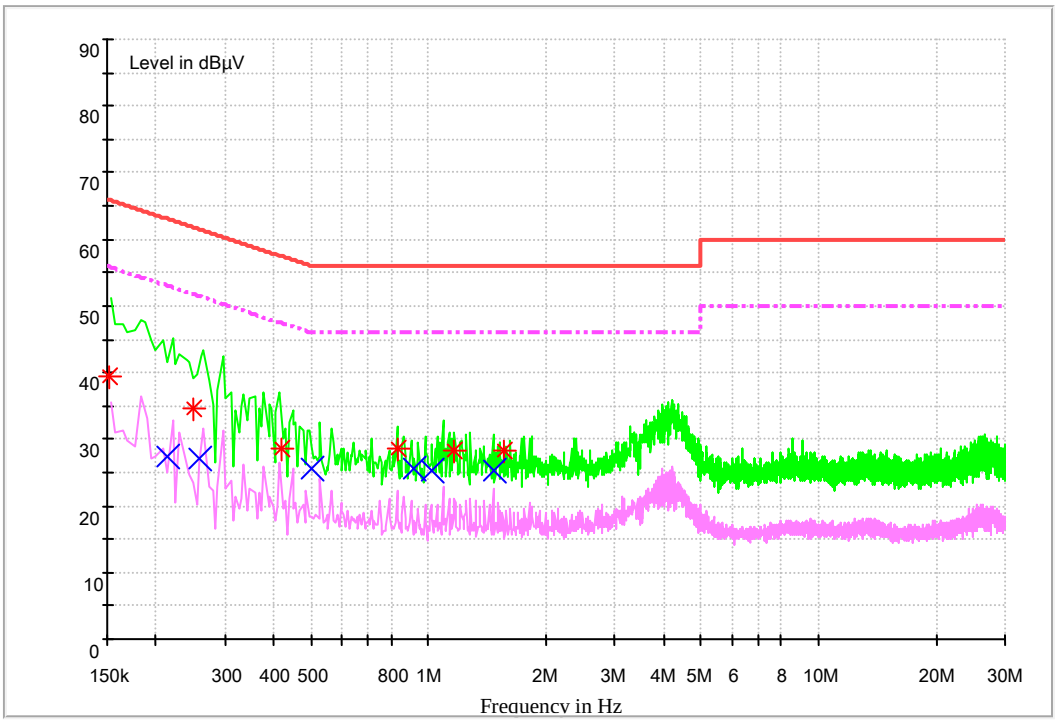
Appendix I: AC Power Line Conducted Emissions

1 Result Table

In this Appendix, only the test results and plots under the worst case can be reported.

EUT Conf.	Maximum Emissions	Verdict
TM1_DH5_Ch39	Not found obvious spikes or see marked spikes on plots and listed emissions records.	Pass

2 Result Plot



MEASUREMENT RESULT: QP Detector

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Line	PE
0.150949	39.3	9.7	65.9	26.6	N	FLO
0.248670	34.7	9.7	61.8	27.2	L1	FLO
0.420882	28.7	9.7	57.4	28.7	L1	FLO
0.836108	28.5	9.7	56.0	27.5	L1	FLO
1.155638	28.2	9.7	56.0	27.8	L1	FLO
1.554994	28.2	9.7	56.0	27.8	L1	FLO

MEASUREMENT RESULT: AV Detector

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Line	PE
0.213255	27.5	9.7	53.1	25.6	L1	FLO
0.258581	27.0	9.7	51.5	24.5	L1	FLO
0.501848	25.5	9.7	46.0	20.5	L1	FLO
0.912068	25.5	9.7	46.0	20.5	L1	FLO
1.021582	25.3	9.7	46.0	20.7	N	FLO
1.464634	25.3	9.7	46.0	20.7	L1	FLO

END