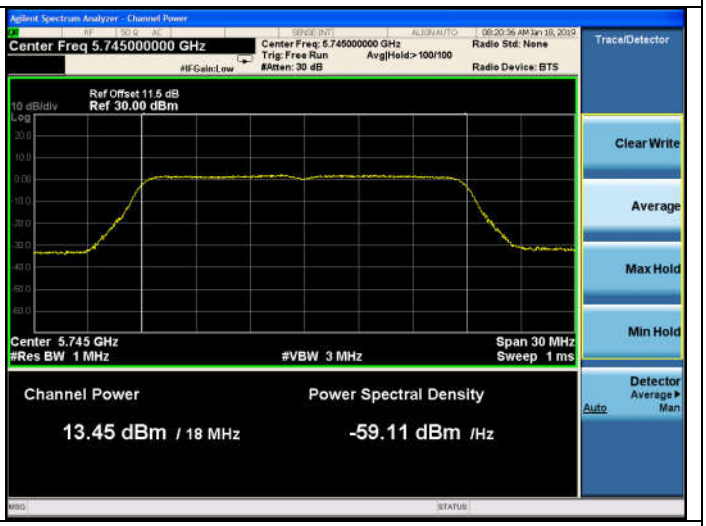
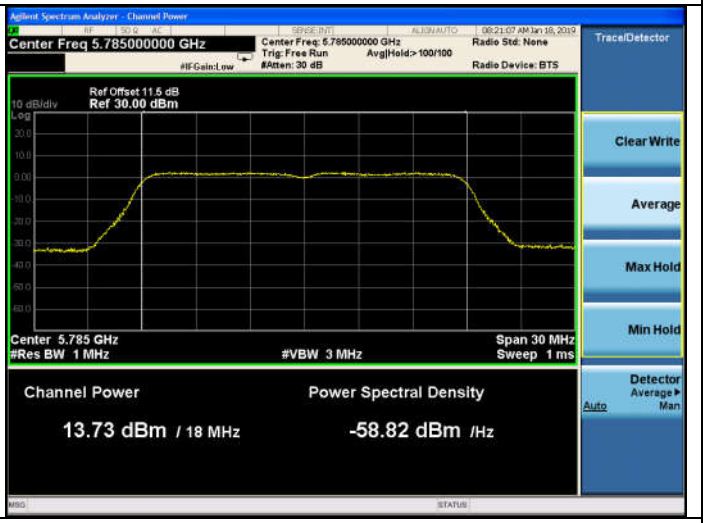
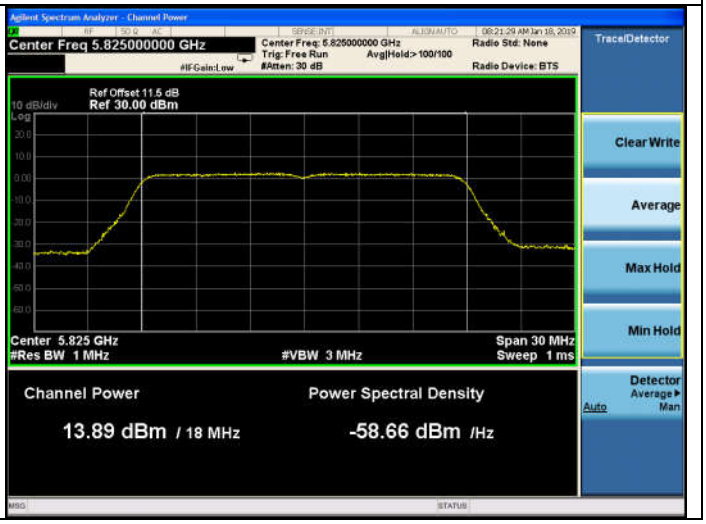
5745-5825MHz Band:

ANT 1

11a	11n HT20
5745MHz	5745MHz
	
5785MHz	5785MHz
	
5825MHz	5825MHz
	

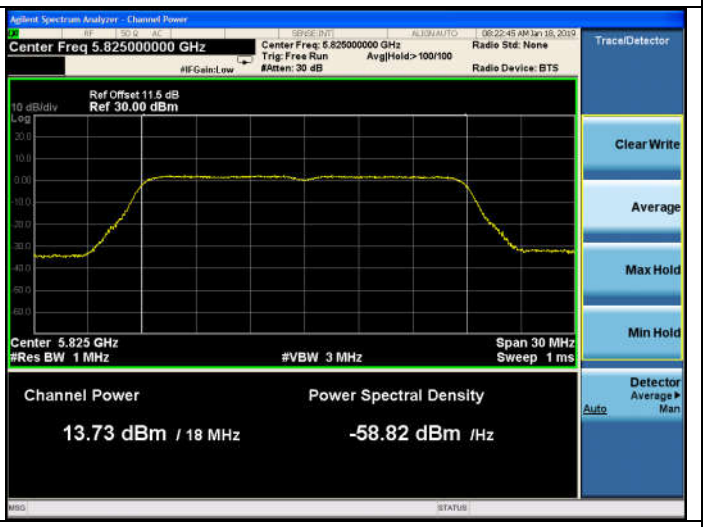
11n HT40

5755MHz

5785MHz

5795MHz

5825MHz

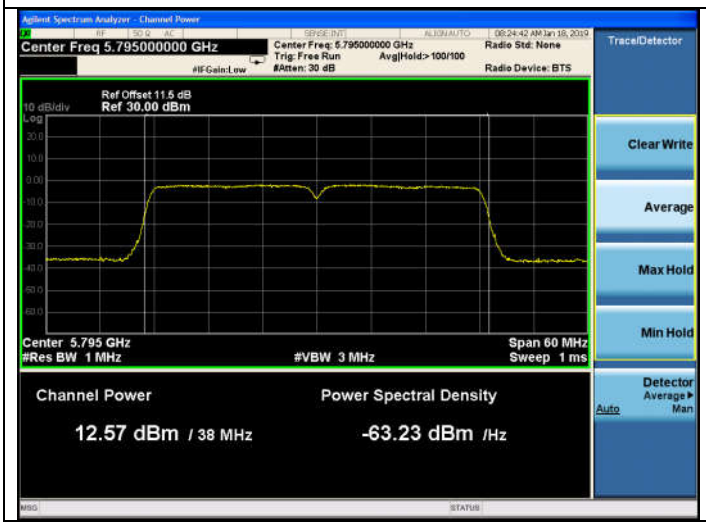
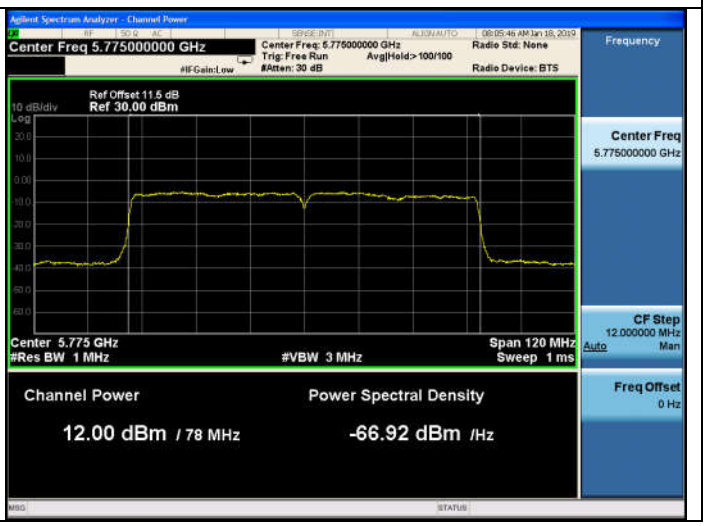


11ac VHT20

5745MHz

11ac VHT40

5755MHz

	11ac VHT80
5795MHz	5775MHz
	

8. EQUIVALENT ISOTROPIC RADIATED POWER TEST

8.1.Limit

Use the test method described in FCC Part 15.407(h) (1):

Transmit power control (TPC). U-NII devices operating in the 5.25-5.35 GHz band and the 5.47-5.725 GHz band shall employ a TPC mechanism. The U-NII device is required to have the capability to operate at least 6 dB below the mean EIRP value of 30 dBm. A TPC mechanism is not required for systems with an e.i.r.p. of less than 500 mW.

8.2.Test Procedure

Use the test method described in ANSI C63.10 Annex G :

(1) Connected the EUT's antenna port to the Spectrum Analyzer by suitable attenuator ,set the Spectrum Analyzer as below:

Span: Zero
RBW:100KHz
VBW:100KHz

Read out the duty cycle(X) of the transmitter and record as X

(2) The channel power measure function of spectrum Analyzer was used to measure out average output power of transmitter.

(3)Calculated e.i.r.p according to the formula: Read + Cable loss + Atten loss + Antenna Gain + 10log(1/x)

(4)Repeated test at the lowest, the middle, and the highest frequency of the stated frequency range.

8.3.Test Results

5180-5240MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-18	Pressure: 102.5±1.0 kpa	Humidity: 53.1±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.6±0.6 ℃

Test Mode	Frequency (MHz)	EIRP (dBm)			Limit (dBm)
		ANT0	ANT1	Total	
11a	5180	17.89	17.29	20.61	22.25
	5200	18.03	17.52	20.79	
	5240	18.66	18.23	21.46	
11n HT20	5180	17.45	16.87	20.18	22.51
	5200	17.59	17.00	20.32	
	5240	18.27	17.77	21.04	
11n HT40	5190	16.91	16.14	19.55	23.01
	5230	17.43	16.76	20.12	
11ac VHT20	5180	17.52	17.03	20.29	22.51
	5200	17.67	17.08	20.40	
	5240	18.28	17.81	21.06	
11ac VHT40	5190	16.95	16.14	19.57	23.01
	5230	17.44	16.81	20.15	
11ac VHT80	5210	17.22	16.62	19.94	23.01
Conclusion: PASS					

Note: For 11a/11n HT20/11ac VHT20 Mode
Limit=10dBm + 10 log B
where B is the 99% emission bandwidth in megahertz.

For 11n HT40/11ac VHT40/ 11ac VHT80Mode
Limit= 23.01dBm

5260-5320MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-18	Pressure: 102.1±1.0 kpa	Humidity: 51.1±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.8±0.6 ℃

Test Mode	Frequency (MHz)	EIRP (dBm)			Limit (dBm)
		ANT0	ANT1	Total	
11a	5260	19.21	18.00	21.66	29.25
	5300	19.39	18.02	21.77	
	5320	19.53	18.13	21.90	
11n HT20	5260	18.56	17.38	21.02	29.52
	5300	18.93	17.57	21.31	
	5320	18.89	17.62	21.31	
11n HT40	5270	18.14	17.16	20.69	30
	5310	18.19	17.25	20.76	
11ac VHT20	5260	18.91	17.9	21.45	29.52
	5300	18.87	18.04	21.49	
	5320	18.99	17.99	21.53	
11ac VHT40	5270	18.14	17.21	20.71	30
	5310	18.42	17.2	20.86	
11ac VHT80	5290	18.38	16.51	20.56	30
Conclusion: PASS					

Note: For 11a/11n HT20/11ac VHT20 Mode
Limit=17 dBm + 10 log B
where B is the 99% emission bandwidth in megahertz.

For 11n HT40/11ac VHT40/ 11ac VHT80Mode
Limit= 30.00 dBm

5500-5700MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-06	Pressure: 102.1±1.0 kpa	Humidity: 51.1±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.8±0.6 ℃

Test Mode	Frequency (MHz)	E.I.R.P (dBm)			Limit (dBm)
		ANT0	ANT1	Total	
11a	5500	18.16	18.33	21.26	29.24
	5600	18.26	17.37	20.85	
	5700	18.29	17.01	20.71	
11n HT20	5500	17.59	17.77	20.69	29.53
	5600	17.77	16.85	20.35	
	5700	17.83	16.66	20.30	
11n HT40	5510	17.04	17.23	20.15	30
	5590	17.2	16.48	19.87	
	5670	17.06	15.72	19.45	
11ac VHT20	5500	17.61	18.18	20.92	29.52
	5600	17.86	17.1	20.51	
	5700	17.87	16.77	20.37	
11ac VHT40	5510	17.02	17.28	20.16	30
	5590	17.2	16.64	19.94	
	5670	17.09	15.99	19.59	
11ac VHT80	5530	17.1	17.03	20.08	30
	5610	17.25	16.15	19.75	
Conclusion: PASS					

Note: For 11a/11n HT20/11ac VHT20 Mode
Limit=17 dBm + 10 log B
where B is the 99% emission bandwidth in megahertz.

For 11n HT40/11ac VHT40/ 11ac VHT80Mode
Limit= 30.00 dBm

5745-5825MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-18	Pressure: 102.1±1.0 kpa	Humidity: 51.1±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.8±0.6 ℃

Test Mode	Frequency (MHz)	E.I.R.P (dBm)			Limit (dBm)
		ANT0	ANT1	Total	
11a	5745	18.53	18.04	21.30	30
	5785	18.43	18.3	21.38	
	5825	18.17	18.55	21.37	
11n HT20	5745	18.16	17.68	20.94	30
	5785	18.00	17.96	20.99	
	5825	17.83	18.12	20.99	
11n HT40	5755	17.35	16.85	20.12	30
	5795	17.29	17.44	20.38	
11ac VHT20	5745	18.24	17.57	20.93	30
	5785	18.13	17.98	21.07	
	5825	17.89	18.03	20.97	
11ac VHT40	5755	17.37	17.12	20.26	30
	5795	17.33	17.33	20.34	
11ac VHT80	5775	17.52	17.27	20.41	30
Conclusion: PASS					

9. SPECTRAL DENSITY TEST

9.1.Test Equipment

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	PXA Signal Analyzer	Agilent	N9030A	MY51380221	Sep.08,18	1Year
2.	Attenuator	Agilent	8491B	MY39269170	Oct.14,18	1 Year
3.	RF Cable	Hubersuhner	SUCOFLEX106	505239/6	Apr.23,18	1 Year

9.2.Limit

Band 5150-5250 MHz:
The power spectral density shall not exceed 11 dBm in any 1.0 MHz band.
Band 5250-5350 MHz:
The power spectral density shall not exceed 11 dBm in any 1.0 MHz band.
Band 5470-5725 MHz:
The power spectral density shall not exceed 11 dBm in any 1.0 MHz band.
Band 5725-5850 MHz:
The power spectral density shall not exceed 30 dBm in any 500 KHz band.

9.3.Test Procedure

For the Band 5.15-5.35GHz; 5.47-5.725 GHz:
The transmitter output was connected to a spectrum analyzer. Power density was measured by spectrum analyzer with 1MHz RBW and 3MHz VBW; Detector: RMS mode.

For the band 5.725-5.85 GHz:
The transmitter output was connected to a spectrum analyzer. Power density was measured by spectrum analyzer with 1MHz RBW and 3MHz VBW,RMS Detector.
So use the test method described in KDB789033 clause E

1) Set the RBW=100kHz and VBW =3MHz
2) Number of points in sweep ≥ 2 Span / RBW.(This ensures that bin-to-bin spacing is ≤ RBW/2, so that narrowband signals are not lost between frequency bins.)
3) Sweep time = auto
4) Detector = RMS (i.e., power averaging), if available. Otherwise, use sample detector mode.
5) Use the "peak search" function of spectrum analyzer find the max value, then add 10log (500kHz/RBW) to the measured result.

Note: The cable loss and attenuator loss were offset into measure device as an amplitude offset.

9.4.Test Results

5180-5240MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-16	Pressure: 102.5±1.0 kpa	Humidity: 53.1±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.6±0.6 ℃

Test Mode	Frequency (MHz)	Power density (dBm/MHz)			Limit (dBm/MHz)
		ANT0	ANT1	Total	
11a	5180	1.920	2.912	5.45	10.04
	5200	2.304	3.422	5.91	
	5240	2.686	3.132	5.93	
11n HT20	5180	1.368	2.838	5.18	10.04
	5200	1.455	2.724	5.15	
	5240	2.140	2.386	5.28	
11n HT40	5190	-2.800	-1.292	1.03	10.04
	5230	-2.460	-1.990	0.79	
11ac VHT20	5180	1.547	2.848	5.26	10.04
	5200	1.696	3.172	5.51	
	5240	2.271	2.547	5.42	
11ac VHT40	5190	-2.675	-1.779	0.81	10.04
	5230	-2.235	-1.605	1.10	
11ac VHT80	5210	-5.579	-4.748	-2.13	10.04
Conclusion:PASS					

Note: 1. Directional Gain= $10 \log[(10^{4.1/20}+10^{3.8/20})^2/2]$dBi

= 6.96dBi>6dBi.

2. The transmit signals are correlated.

5260-5320MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-16	Pressure: 102.3±1.0 kpa	Humidity: 51.6±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.5±0.6 ℃

Test Mode	Frequency (MHz)	Power density (dBm/MHz)			Limit (dBm/MHz)
		ANT0	ANT1	Total	
11a	5260	3.244	2.567	5.93	10.04
	5300	3.554	2.602	6.11	
	5320	3.637	2.178	5.98	
11n HT20	5260	2.814	1.985	5.43	10.04
	5300	3.203	1.915	5.62	
	5320	3.239	1.448	5.45	
11n HT40	5270	-1.499	-2.247	1.15	10.04
	5310	-1.336	-2.817	1.00	
11ac VHT20	5260	2.820	2.299	5.58	10.04
	5300	2.981	2.074	5.56	
	5320	3.270	1.787	5.60	
11ac VHT40	5270	-1.331	-2.566	1.11	10.04
	5310	-1.351	-2.763	1.01	
11ac VHT80	5290	-4.286	-5.765	-1.95	10.04
Conclusion: PASS					

Note: 1. Directional Gain= $10 \log[(10^{4.1/20}+10^{3.8/20})^2/2]$dBi
= 6.96dBi>6dBi.
2. The transmit signals are correlated.

5500-5700MHz Band:

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-16	Pressure: 102.8±1.0 kpa	Humidity: 51.8±3.0%
Tested by: Garry	Test site: RF site	Temperature:23.2±0.6 ℃

Test Mode	Frequency (MHz)	Power density (dBm/MHz)			Limit (dBm/MHz)
		ANT0	ANT1	Total	
11a	5500	3.367	3.680	6.54	10.04
	5600	2.981	2.843	5.92	
	5700	2.411	2.392	5.41	
11n HT20	5500	2.875	3.060	5.98	10.04
	5600	2.259	2.507	5.40	
	5700	1.961	2.034	5.01	
11n HT40	5510	-2.019	-1.612	1.20	10.04
	5590	-2.524	-2.407	0.55	
	5670	-2.683	-2.866	0.24	
11ac VHT20	5500	2.928	3.046	6.00	10.04
	5600	1.780	2.263	5.04	
	5700	1.673	2.321	5.02	
11ac VHT40	5510	-1.757	-1.809	1.23	10.04
	5590	-1.989	-1.868	1.08	
	5670	-2.400	-2.551	0.54	
11ac VHT80	5530	-5.189	-5.264	-2.22	10.04
	5610	-4.696	-4.694	-1.68	
Conclusion: PASS					

Note: 1. Directional Gain= $10 \log[(10^{4.1/20}+10^{3.8/20})^2/2]$dBi

= 6.96dBi>6dBi.

2. The transmit signals are correlated.

5745-5825MHz Band:

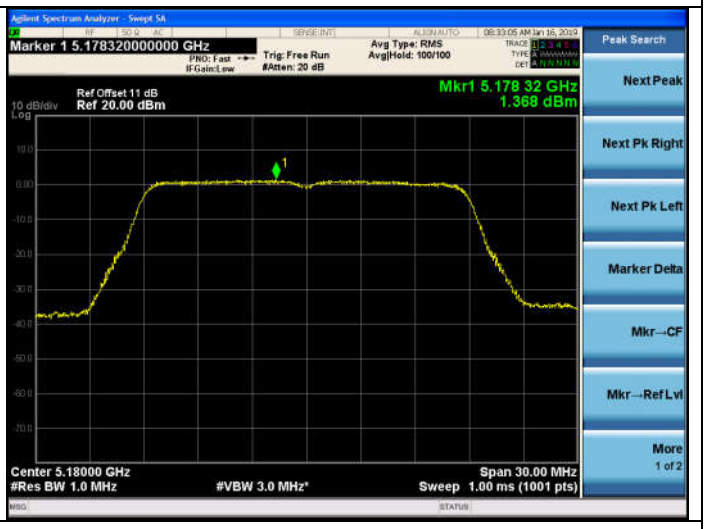
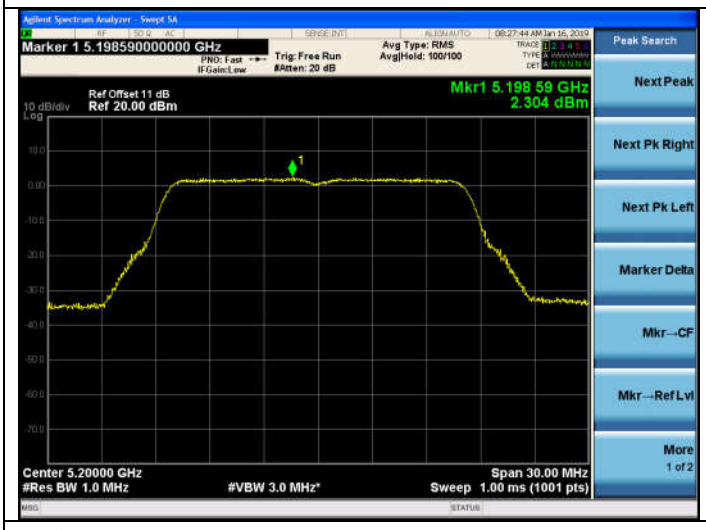
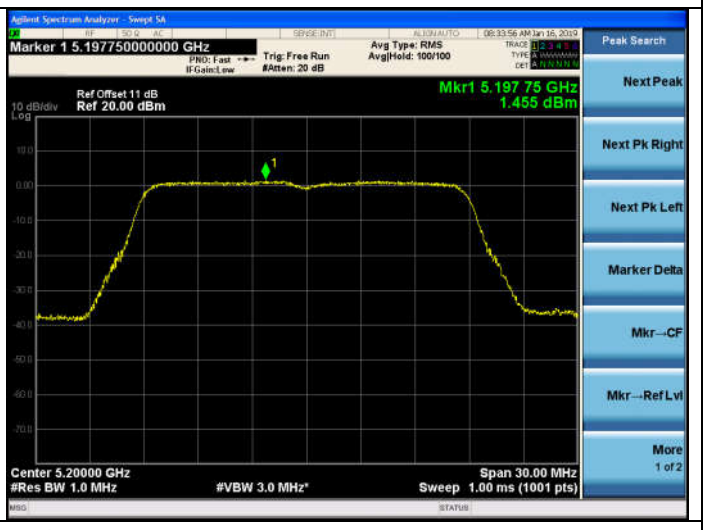
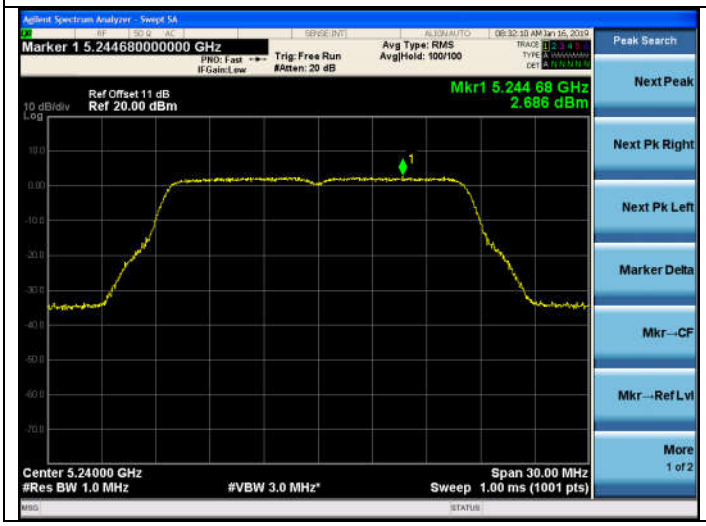
EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-02-12	Pressure: 102.7±1.0 kpa	Humidity: 54.1±3.0%
Tested by: Garry	Test site: RF site	Temperature:23.4±0.6 ℃

Test Mode	Frequency (MHz)	Power density (dBm/500KHz)			Limit (dBm/500KHz)
		ANT0	ANT1	Total	
11a	5745	-0.114	-0.395	3.71	29.04
	5785	0.030	0.353	4.45	
	5825	-0.831	0.150	4.25	
11n HT20	5745	-0.563	-0.201	3.90	29.04
	5785	-0.412	0.186	4.29	
	5825	-0.838	0.202	4.30	
11n HT40	5755	-4.632	-4.455	-0.36	29.04
	5795	-3.964	-3.858	0.24	
11ac VHT20	5745	-0.116	-0.596	3.50	29.04
	5785	-0.027	-0.266	3.83	
	5825	-0.571	-0.314	3.79	
11ac VHT40	5755	-4.211	-4.653	-0.55	29.04
	5795	-4.270	-4.144	-0.04	
11ac VHT80	5775	-8.168	-7.511	-3.41	29.04
Conclusion: PASS					

Note: 1. Directional Gain= $10 \log[(10^{4.1/20}+10^{3.8/20})^2/2]$dBi
= 6.96dBi>6dBi.
2. The transmit signals are correlated.
3. The total result = Reading + $10\log$(500kHz/100kHz)

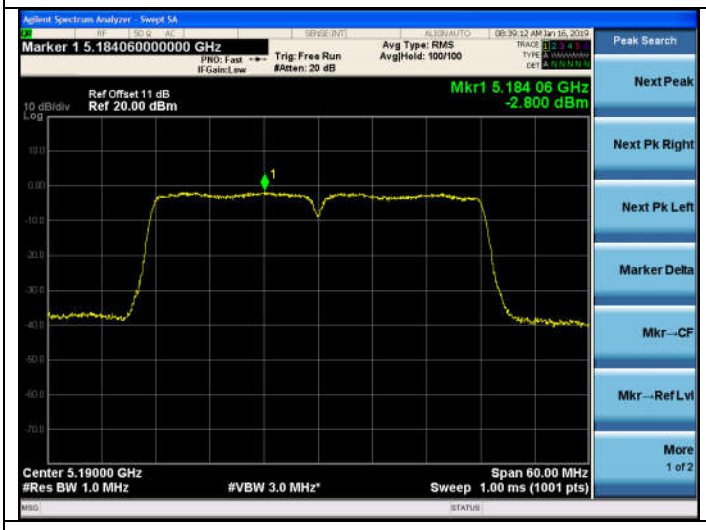
5180-5240MHz Band:

ANT 0

11a	11n HT20
5180MHz	5180MHz
	
5200MHz	5200MHz
	
5240MHz	5240MHz
	

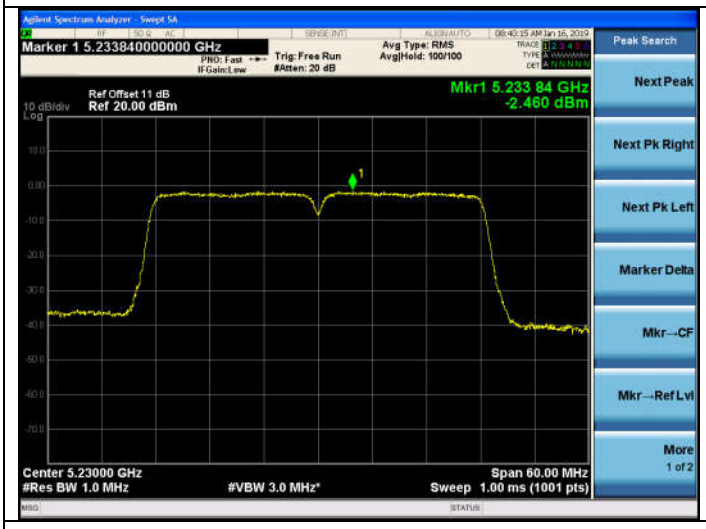
11n HT40

5190MHz

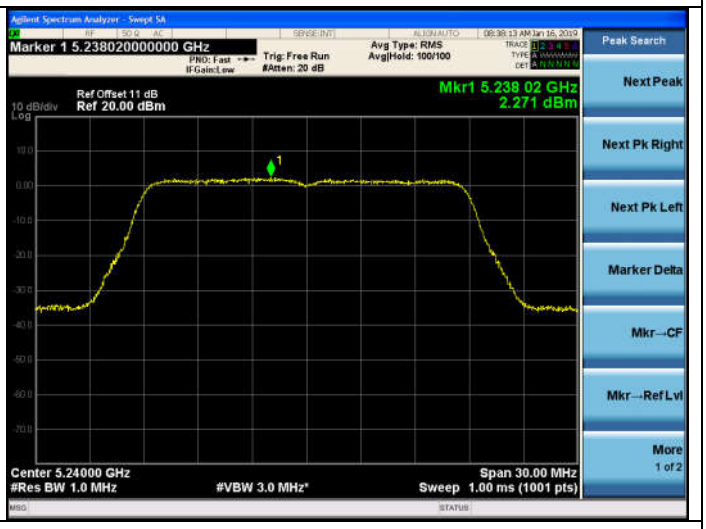


5200MHz

5230MHz

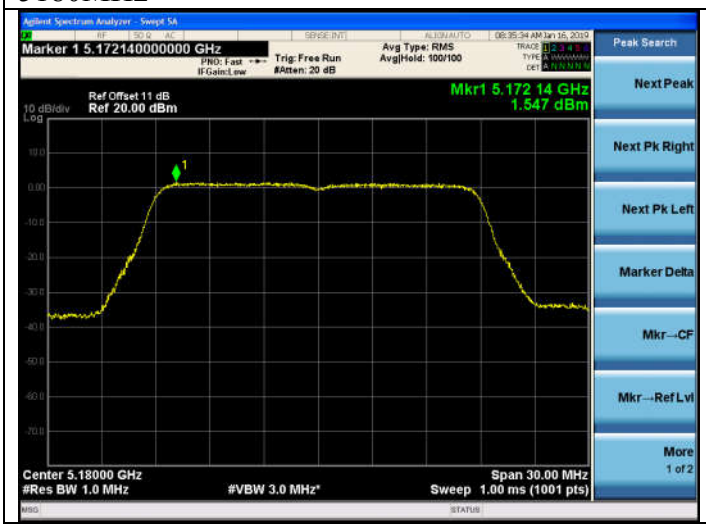


5240MHz



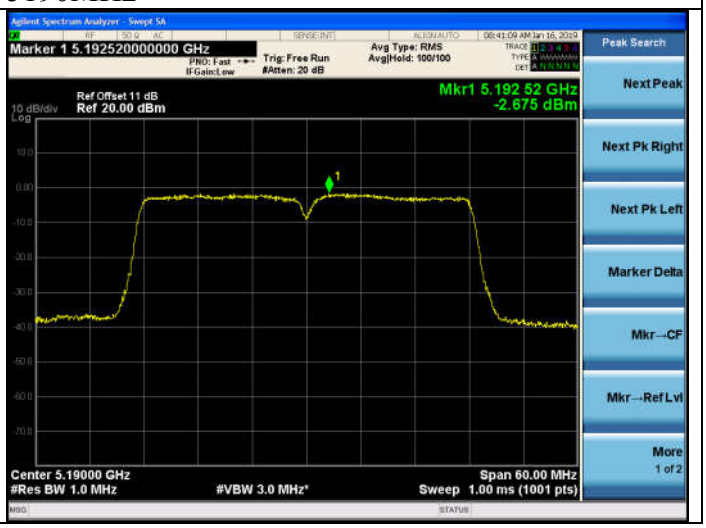
11ac VHT20

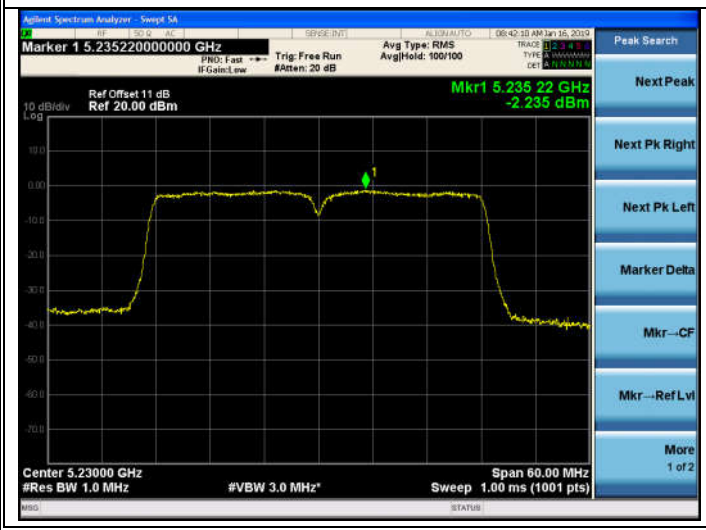
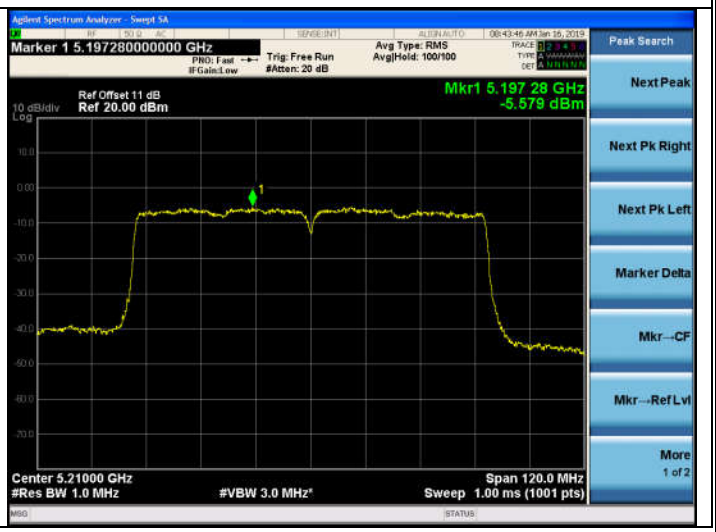
5180MHz



11ac VHT40

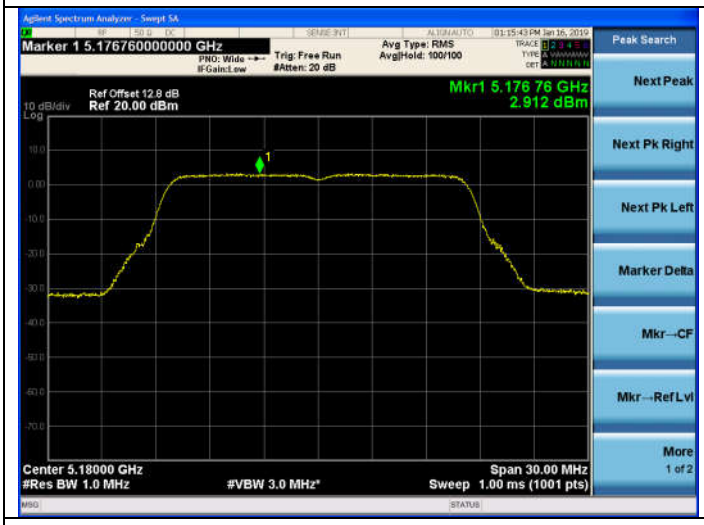
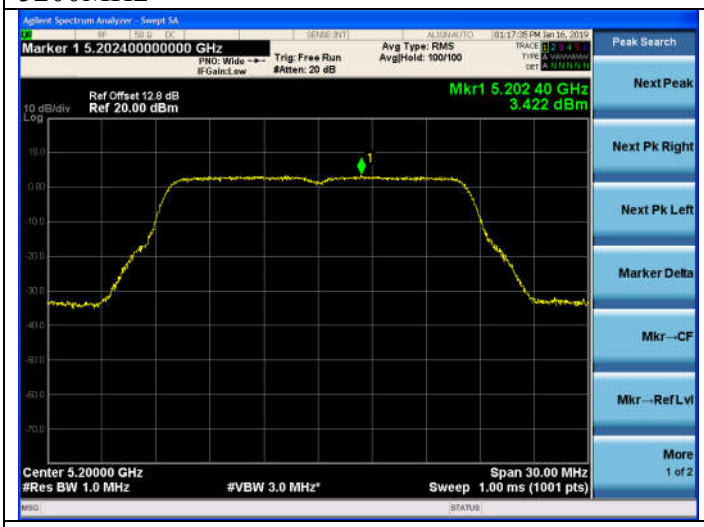
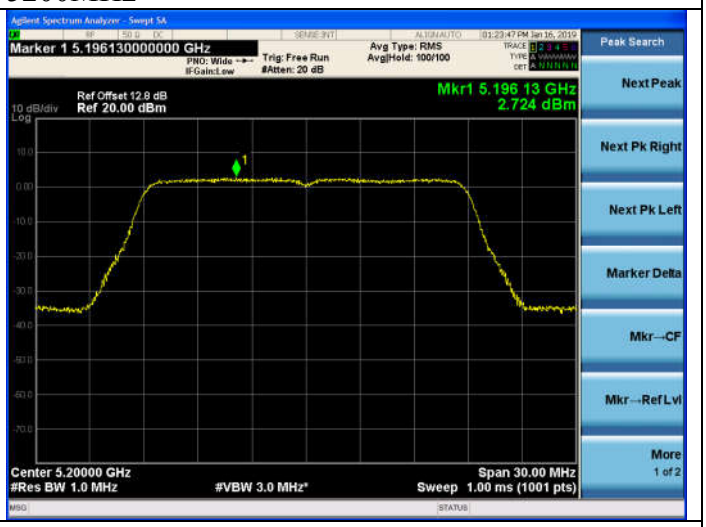
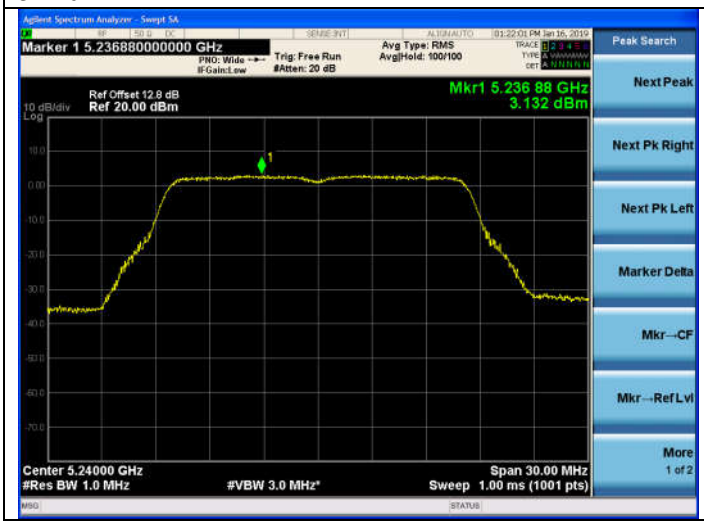
5190MHz



	11ac VHT80
5230MHz	5210MHz
	

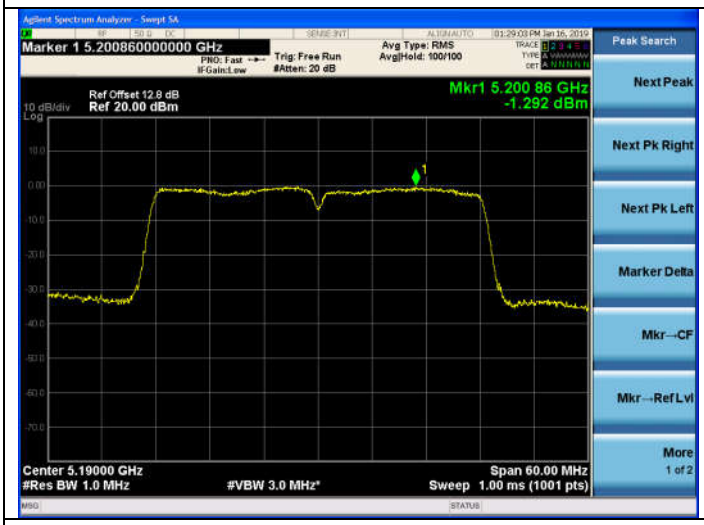
5180-5240MHz Band:

ANT 1

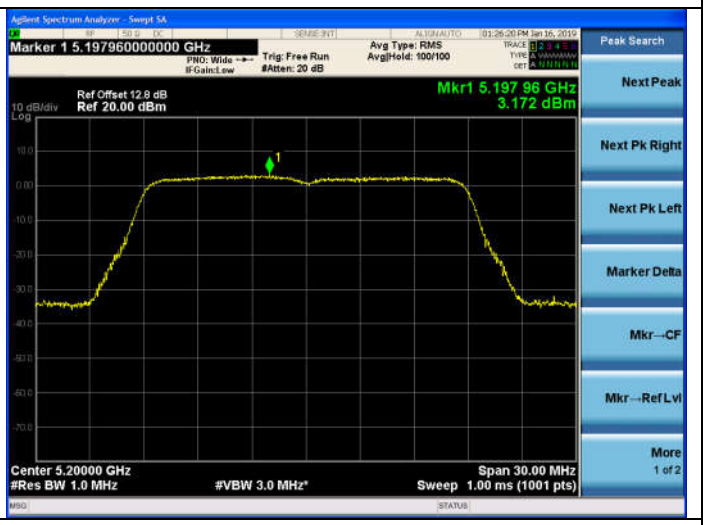
11a	11n HT20
5180MHz	5180MHz
	
5200MHz	5200MHz
	
5240MHz	5240MHz
	

11n HT40

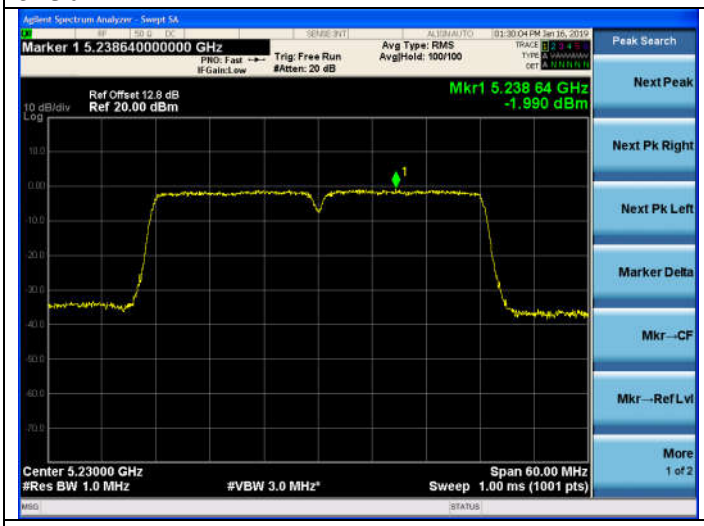
5190MHz



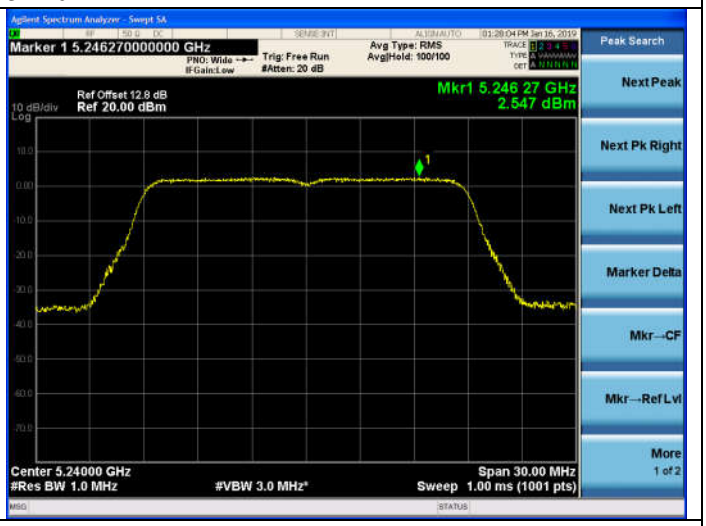
5200MHz



5230MHz

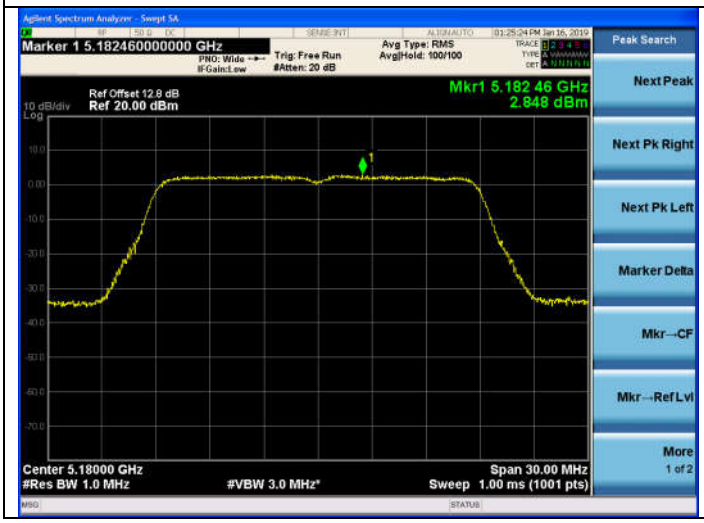


5240MHz



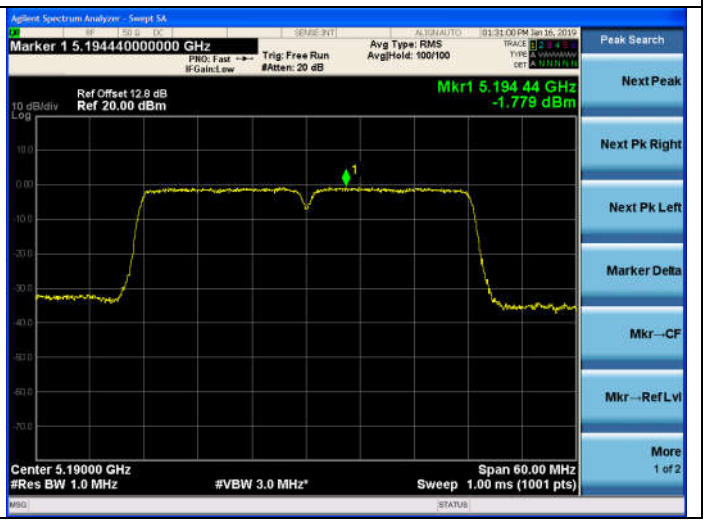
11ac VHT20

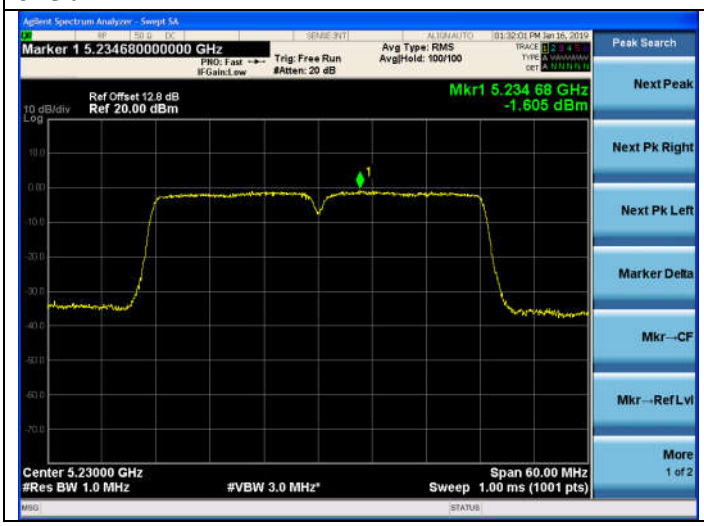
5180MHz



11ac VHT40

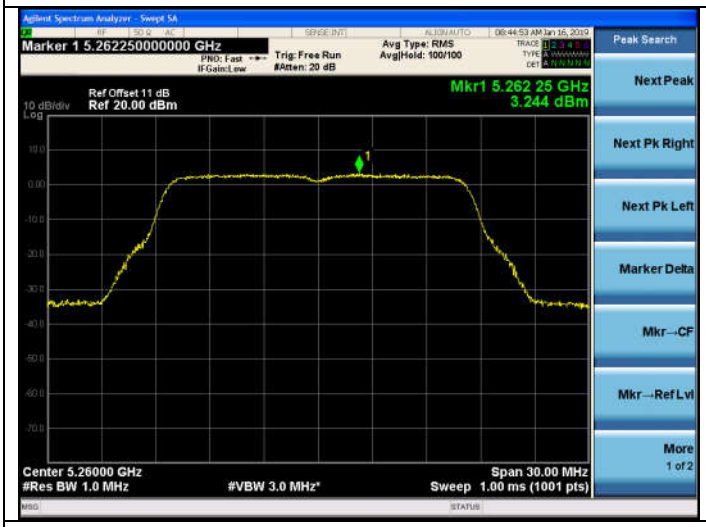
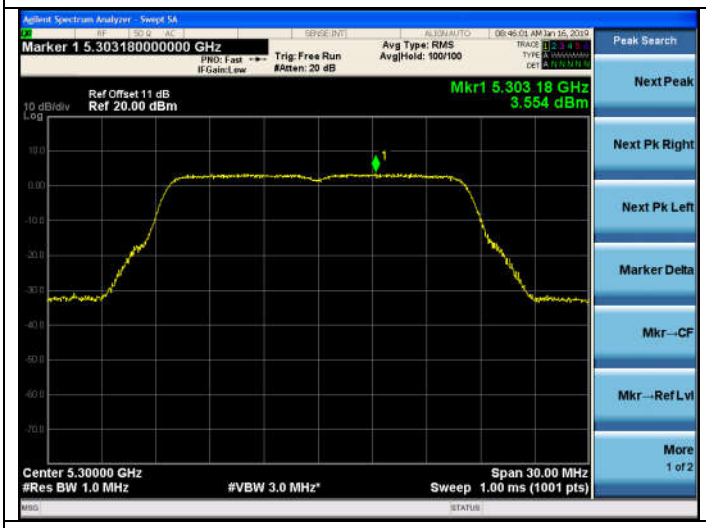
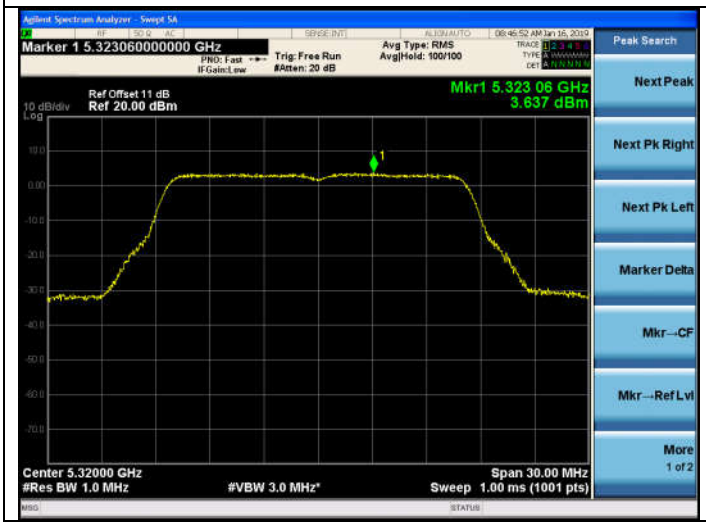
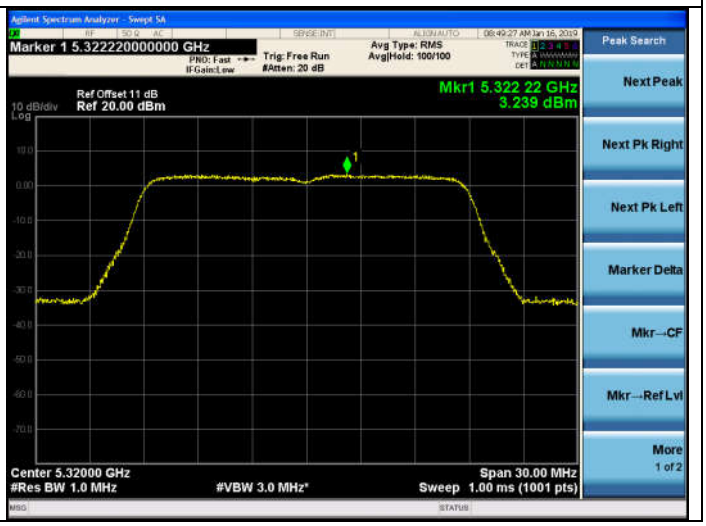
5190MHz



	11ac VHT80
5230MHz	5210MHz
	

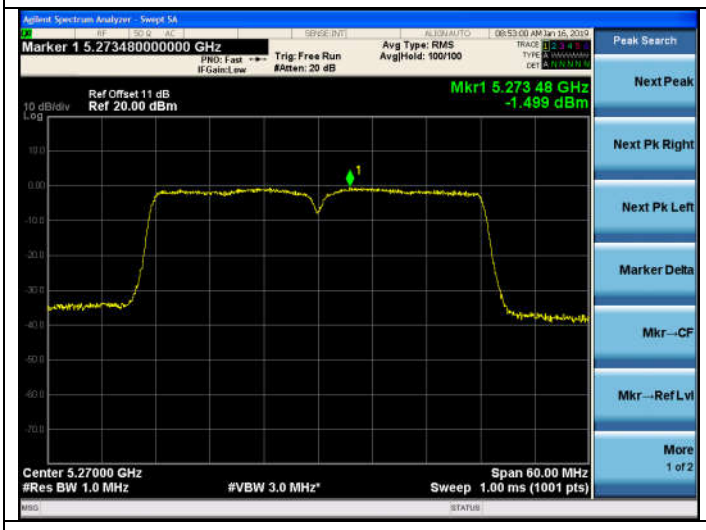
5260-5320MHz Band:

ANT 0

11a	**11n HT20**
5260MHz	5260MHz
	
5300MHz	5300MHz
	
5320MHz	5320MHz
	

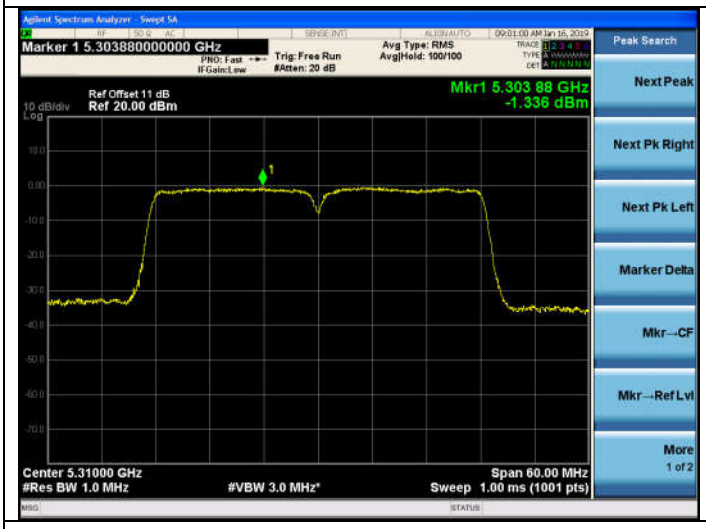
11n HT40

5270MHz

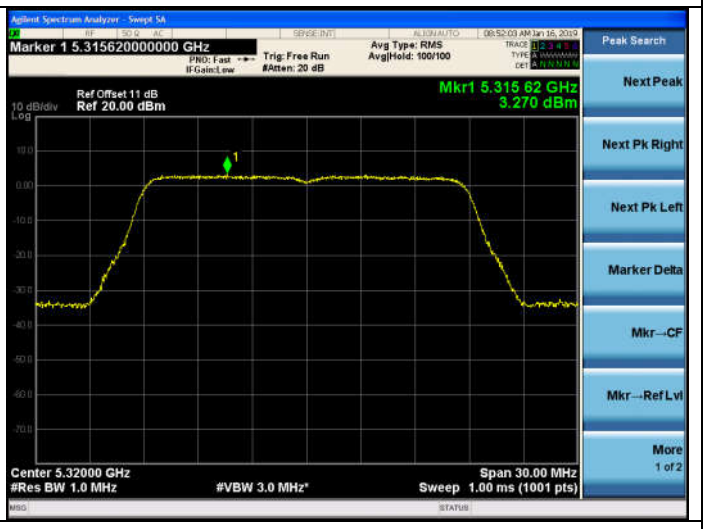


5300MHz

5310MHz

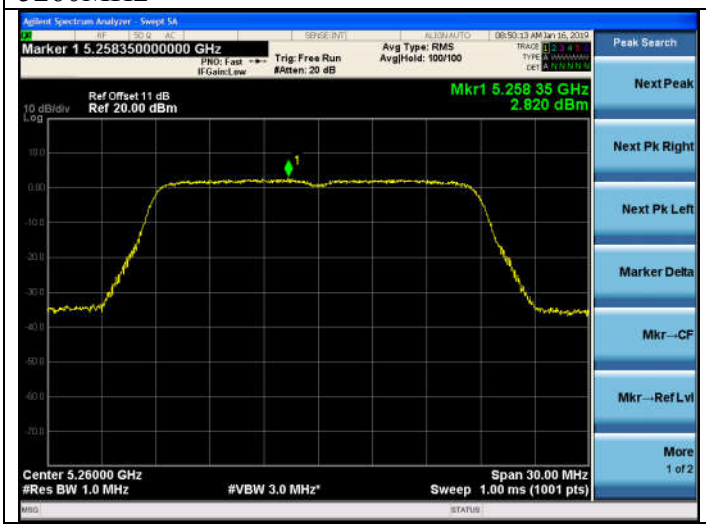


5320MHz



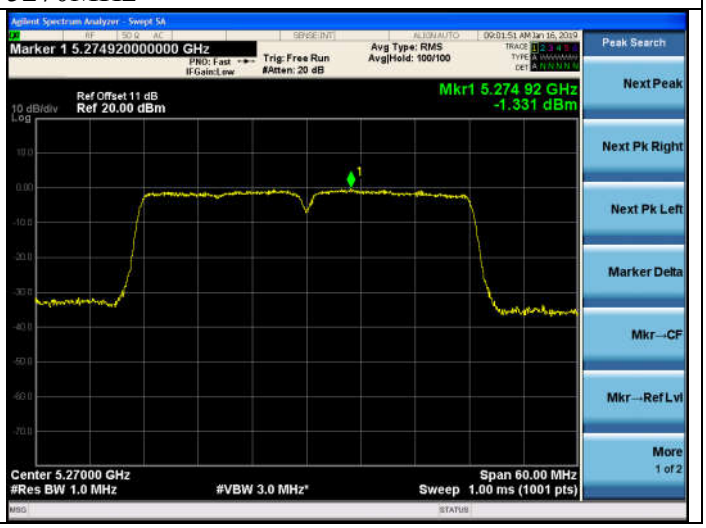
11ac VHT20

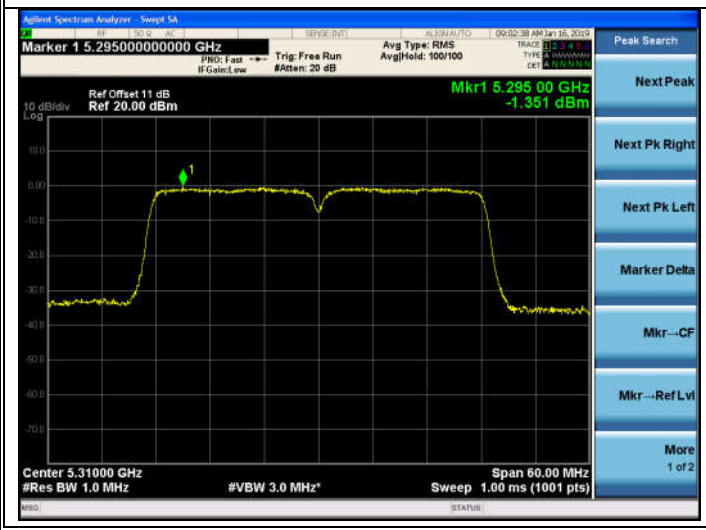
5260MHz



11ac VHT40

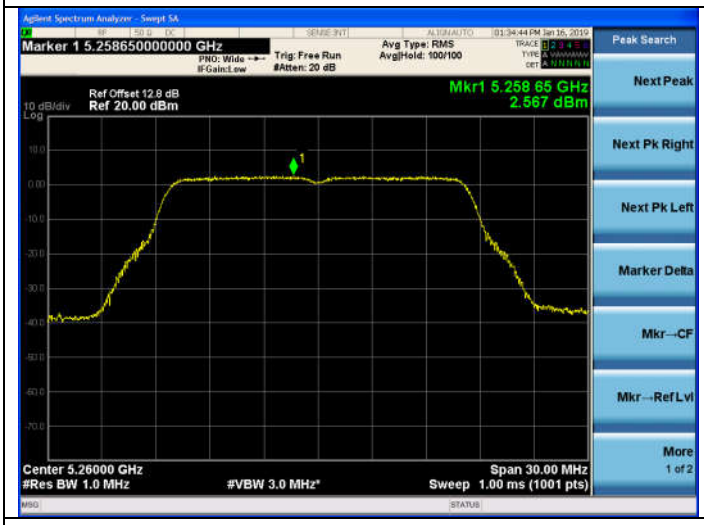
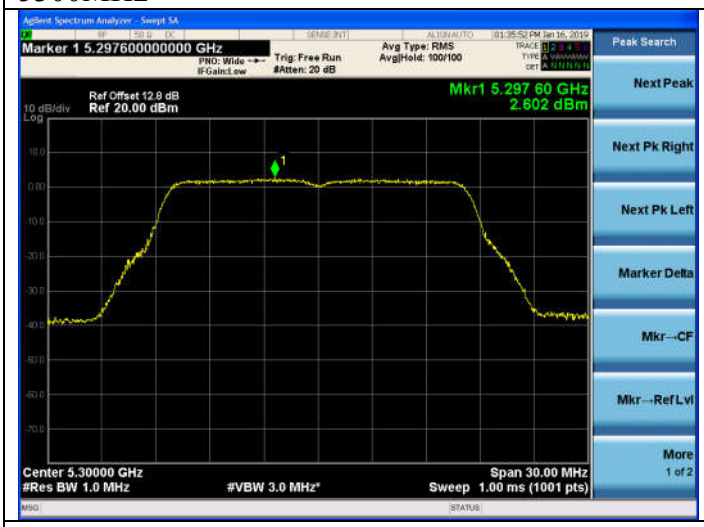
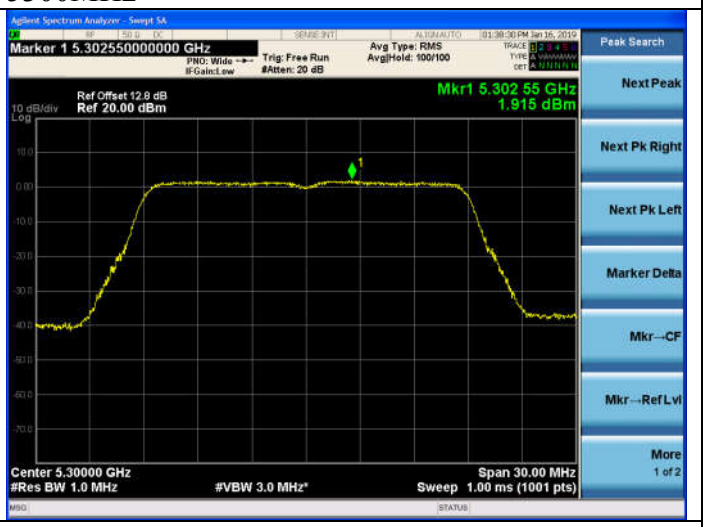
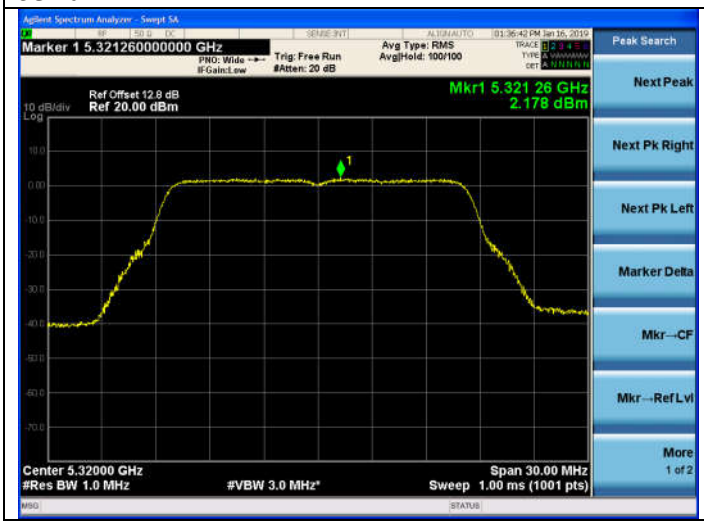
5270MHz



	11ac VHT80
5310MHz	5290MHz
	

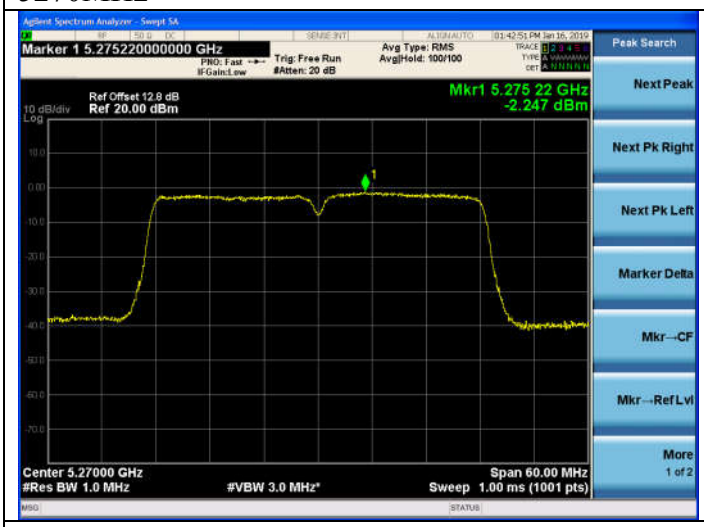
5260-5320MHz Band:

ANT 1

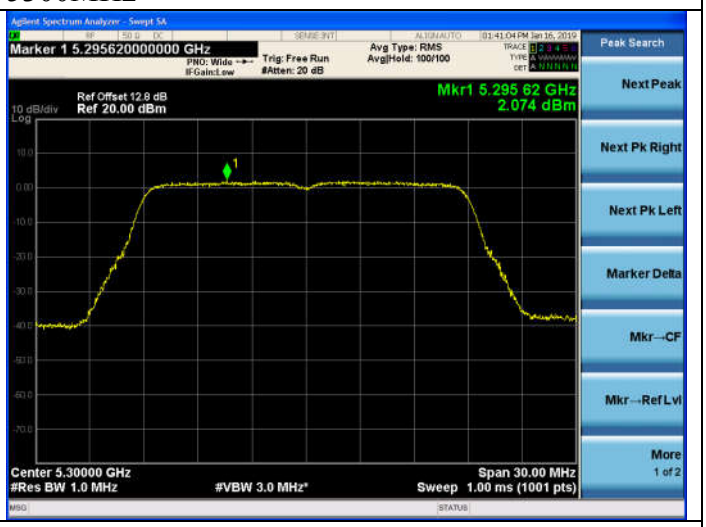
11a	11n HT20
5260MHz	5260MHz
	
5300MHz	5300MHz
	
5320MHz	5320MHz
	

11n HT40

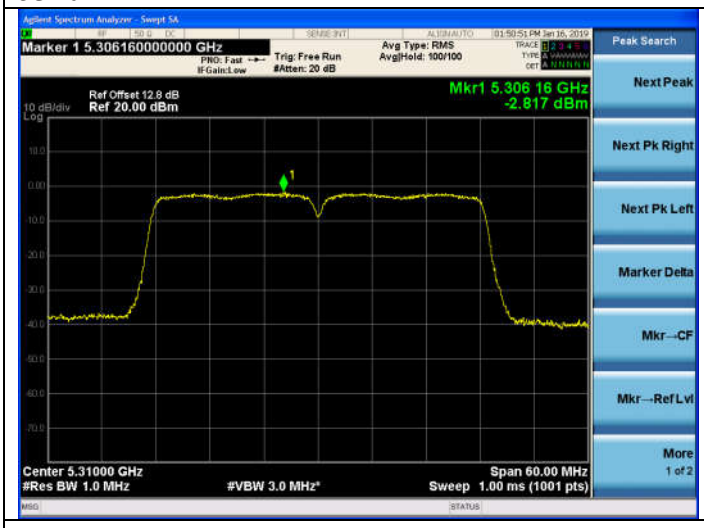
5270MHz



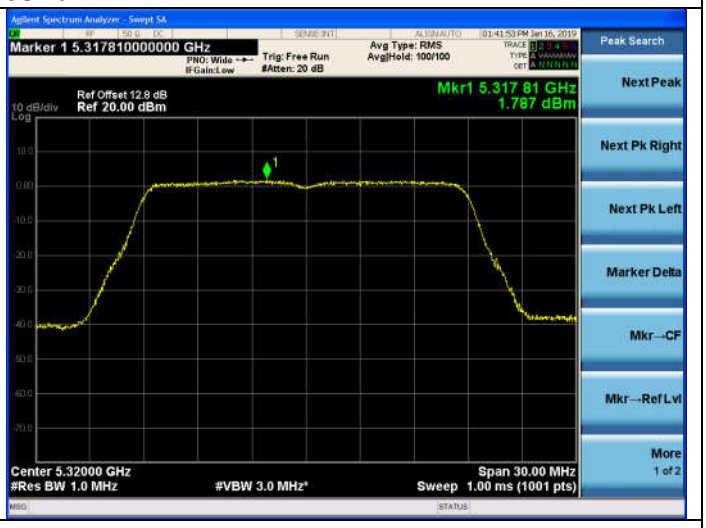
5300MHz



5310MHz

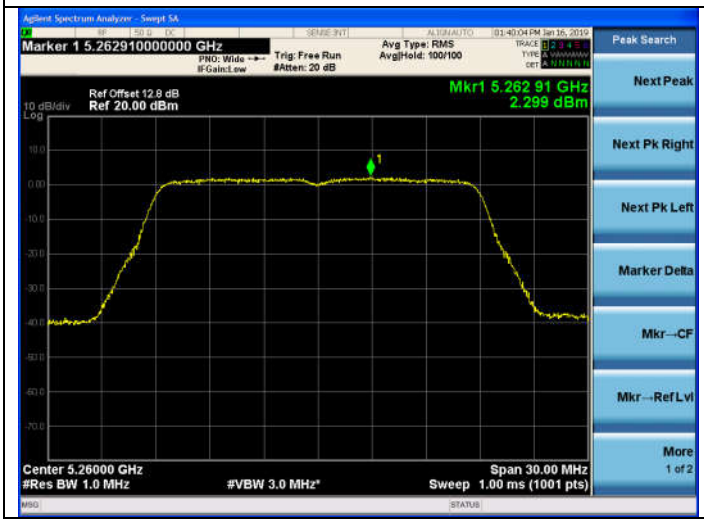


5320MHz



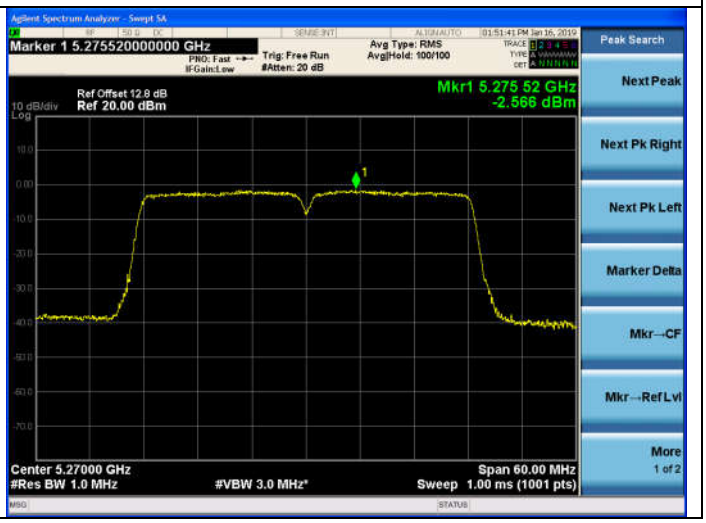
11ac VHT20

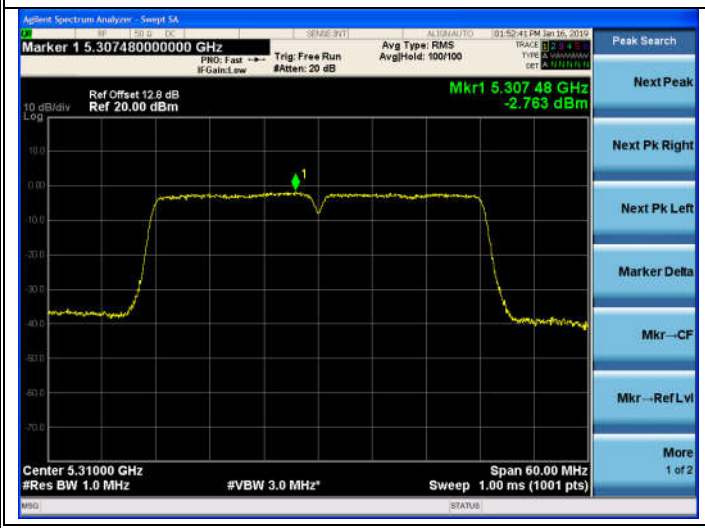
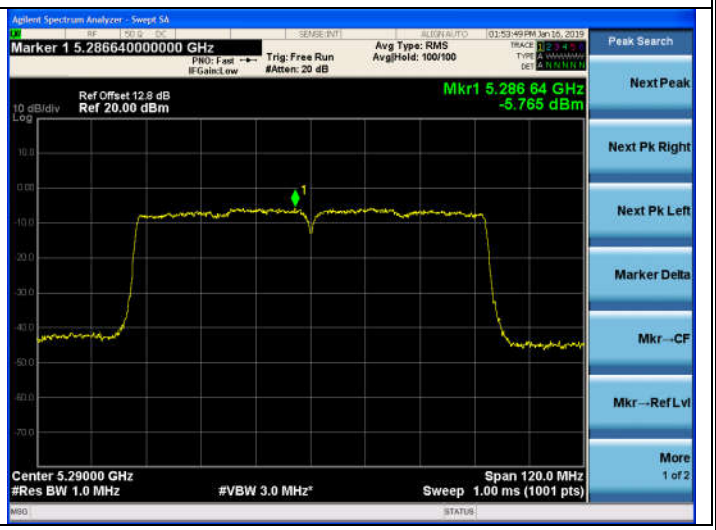
5260MHz



11ac VHT40

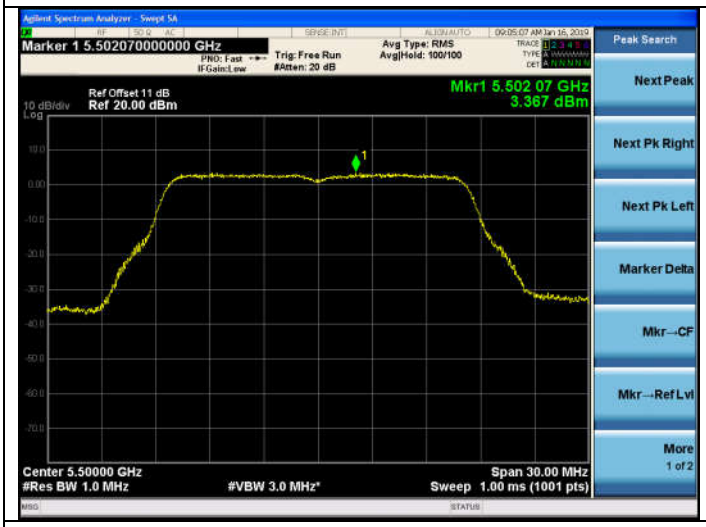
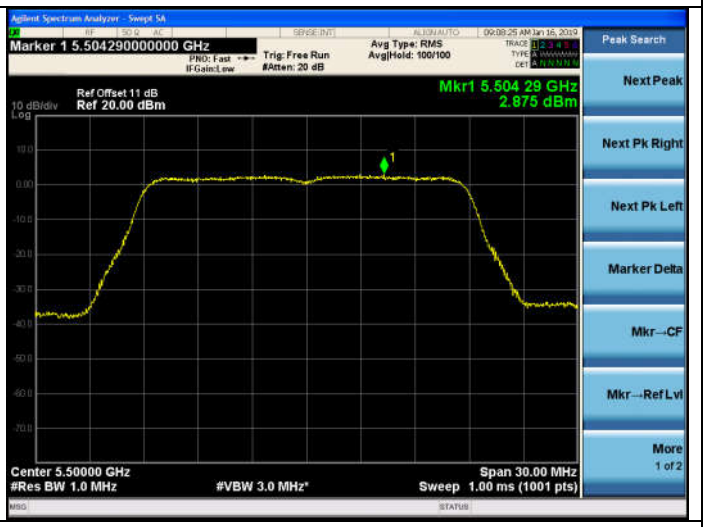
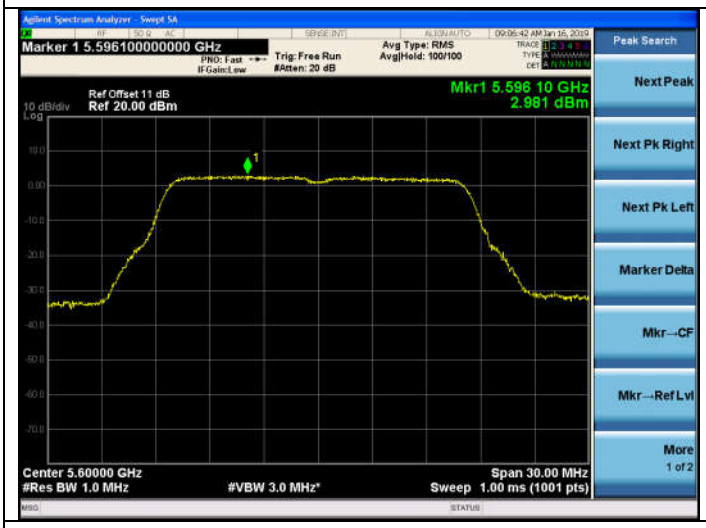
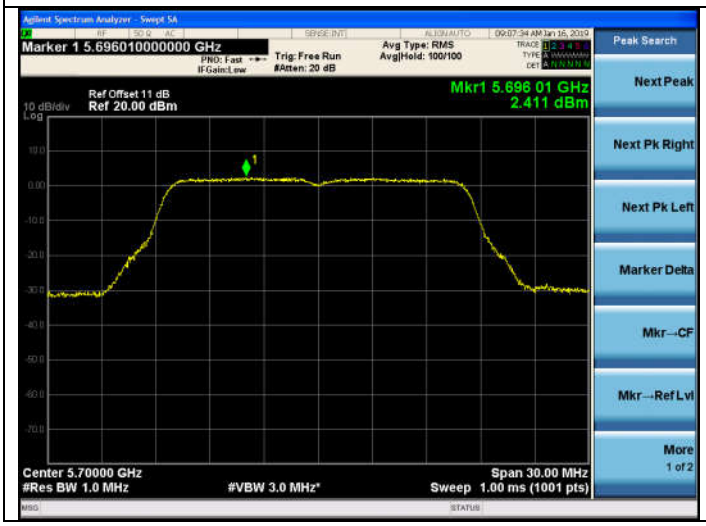
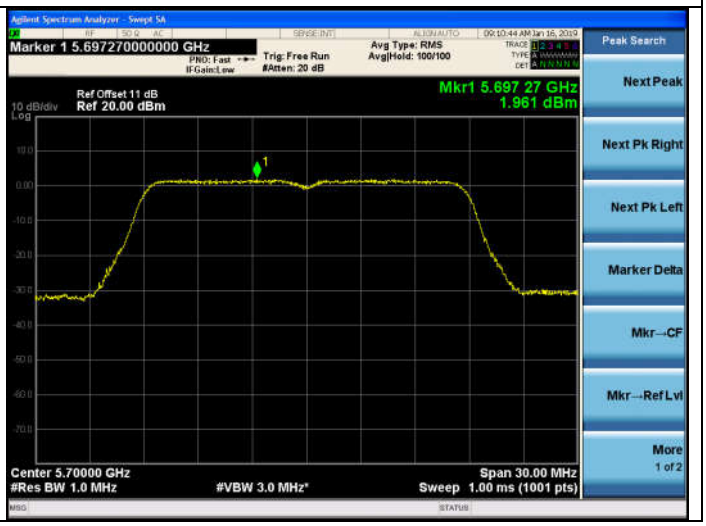
5270MHz

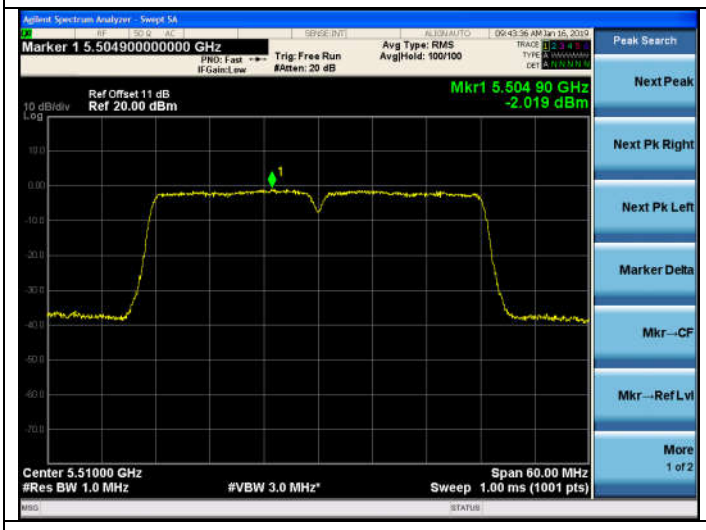
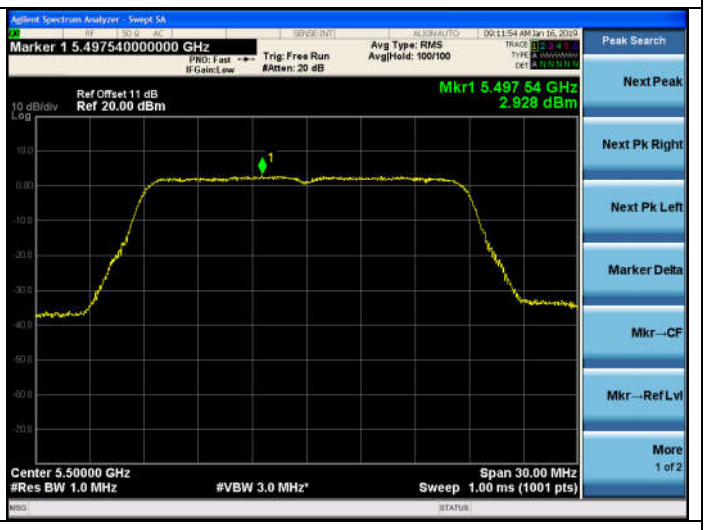
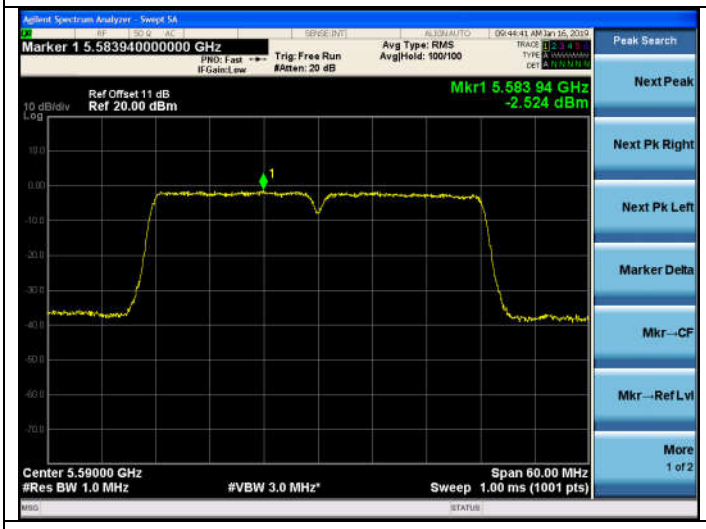
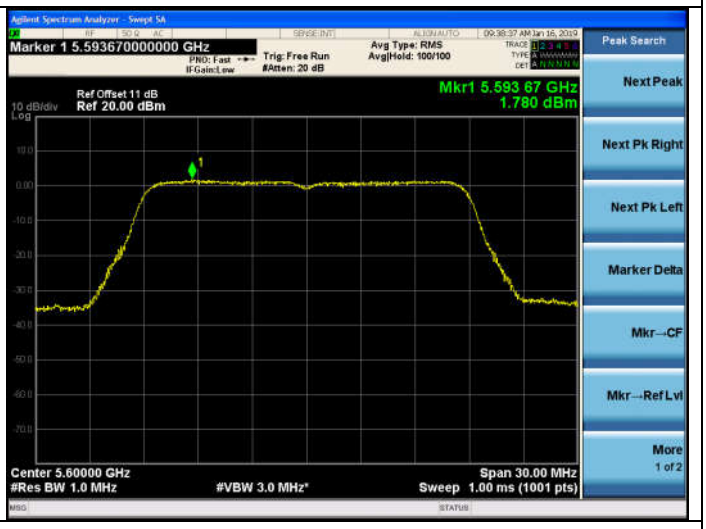
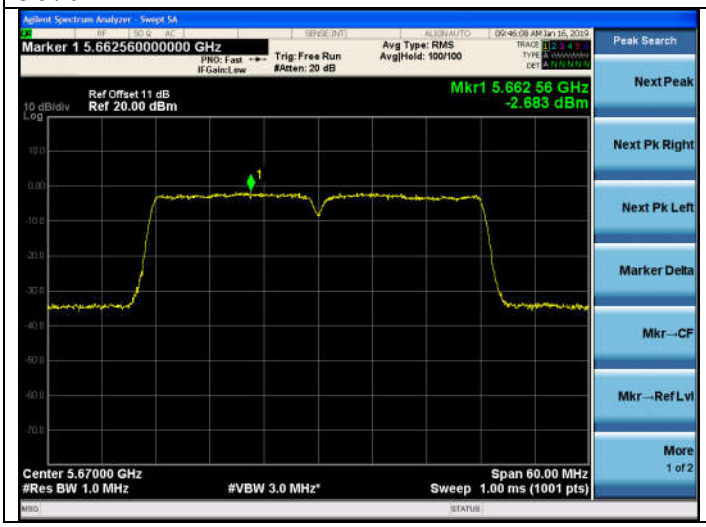
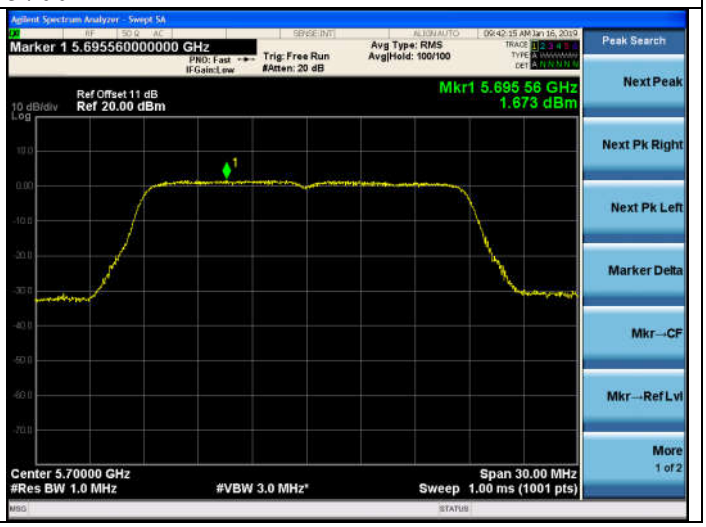


	11ac VHT80
5310MHz	5290MHz
	

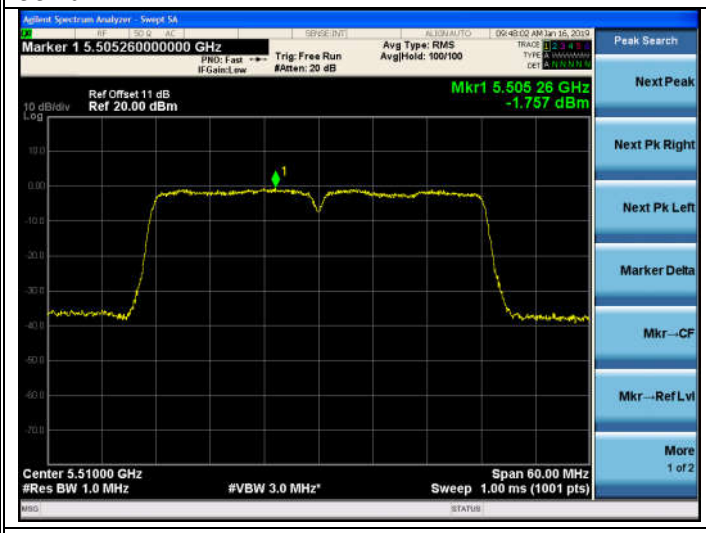
5500-5700MHz Band:

ANT 0

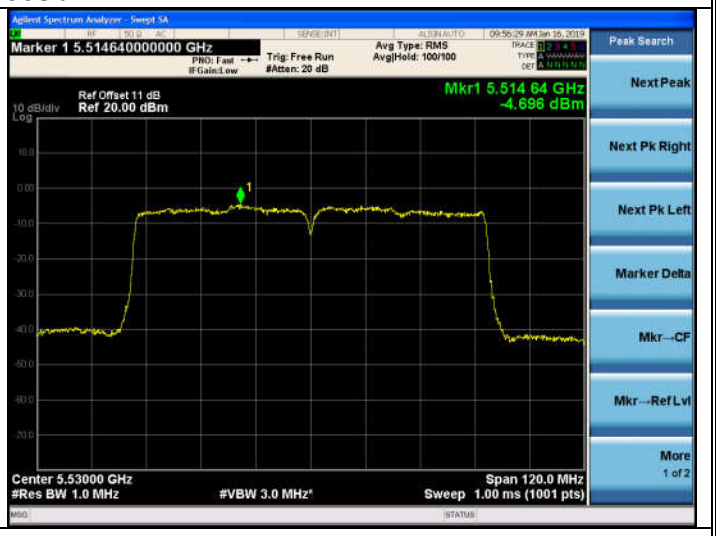
11a	11n HT20
5500MHz	5500MHz
	
5600MHz	5600MHz
	
5700MHz	5700MHz
	

11n HT40	11ac VHT20
5510MHz	5500MHz
	
5590MHz	5600MHz
	
5670MHz	5700MHz
	

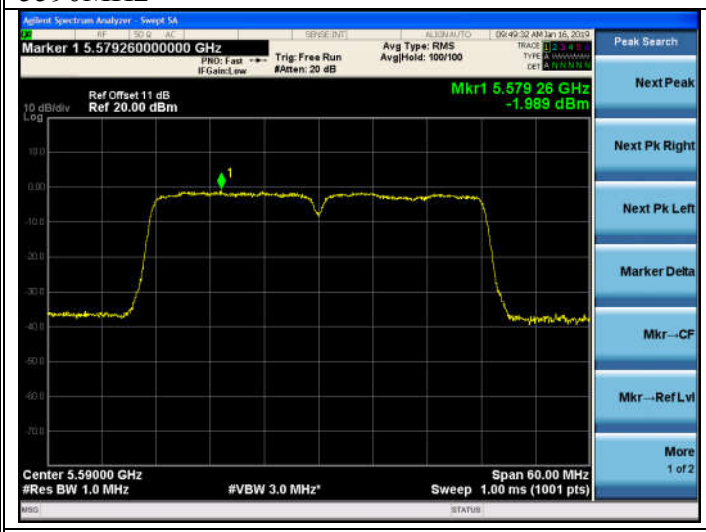
11ac VHT40
5510MHz



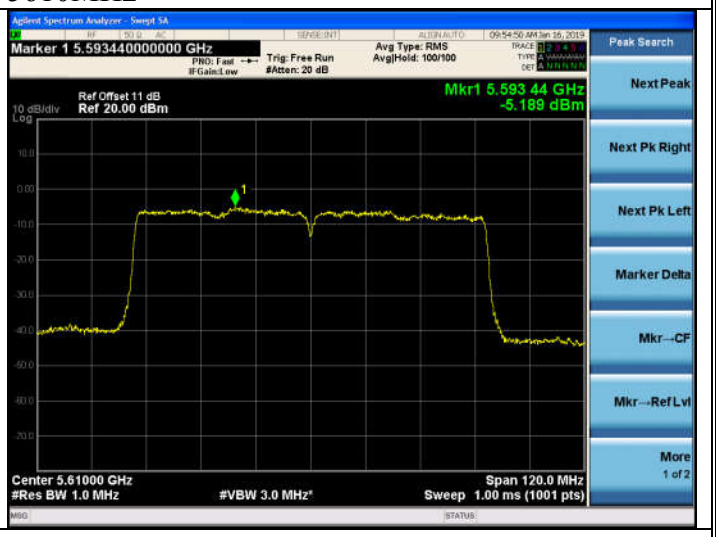
11ac VHT80
5530MHz



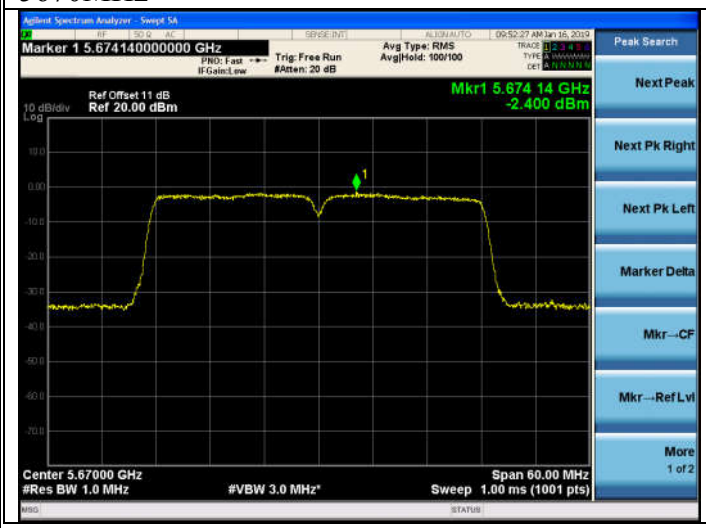
5590MHz



5610MHz

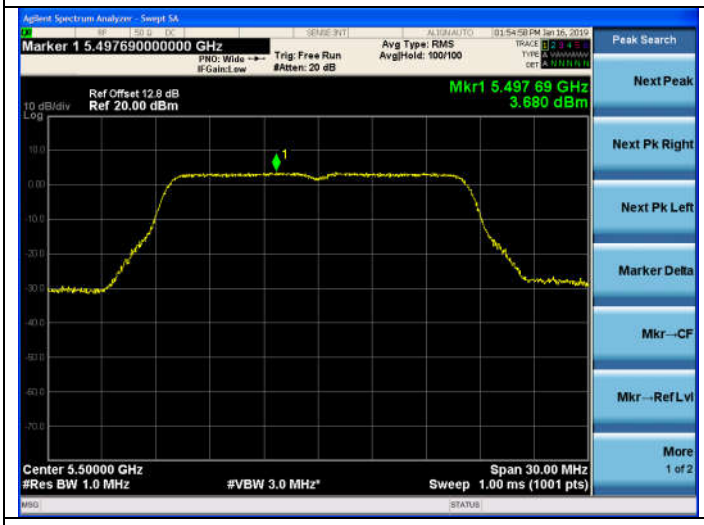
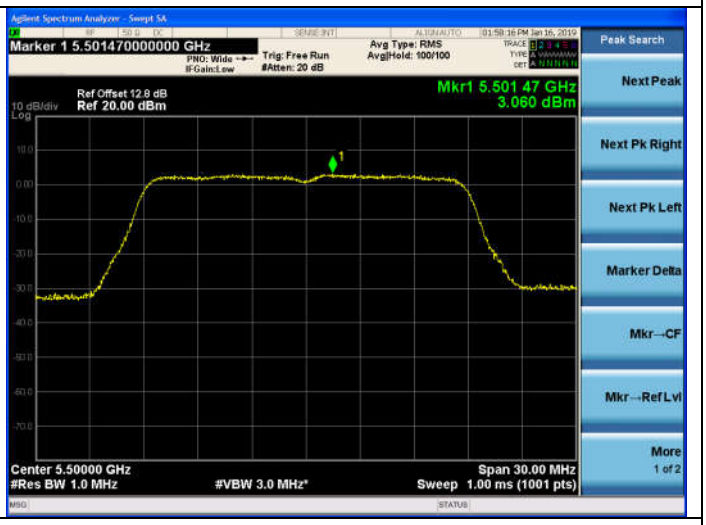
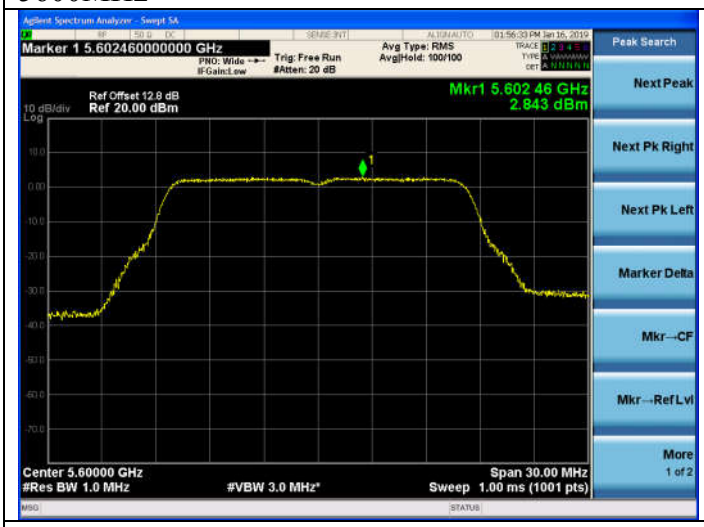
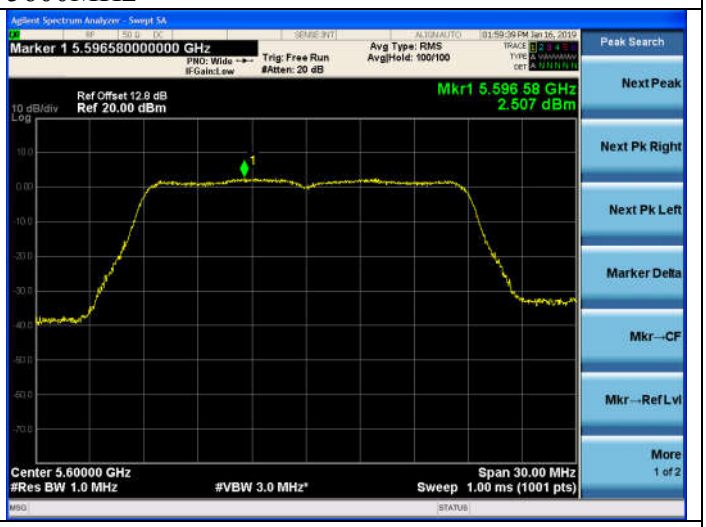
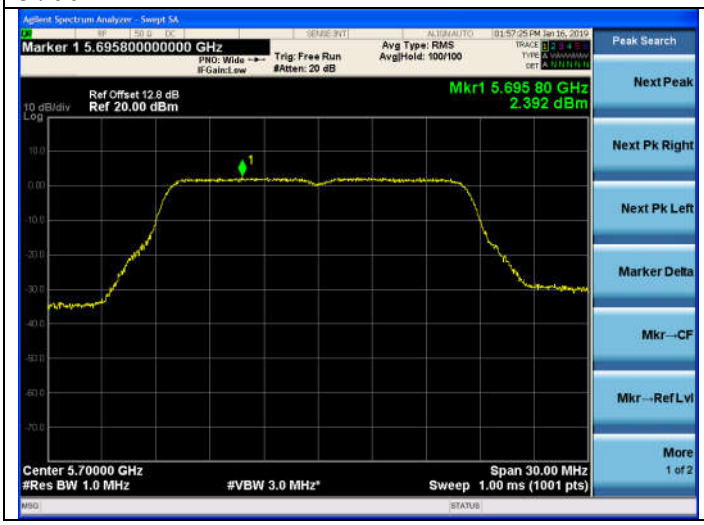
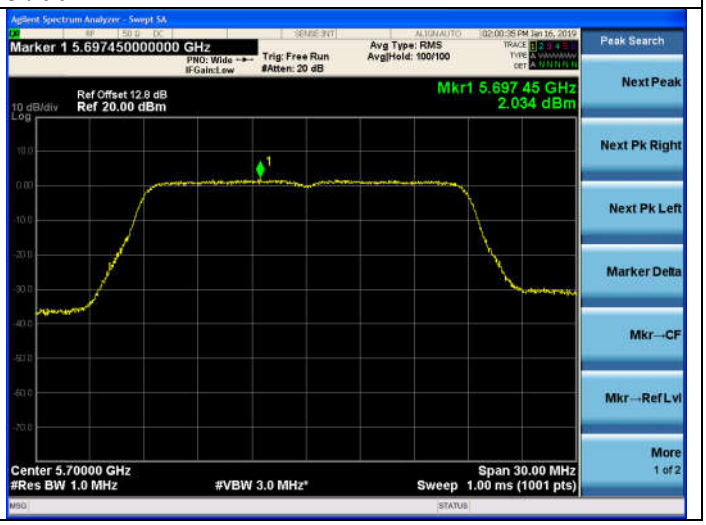


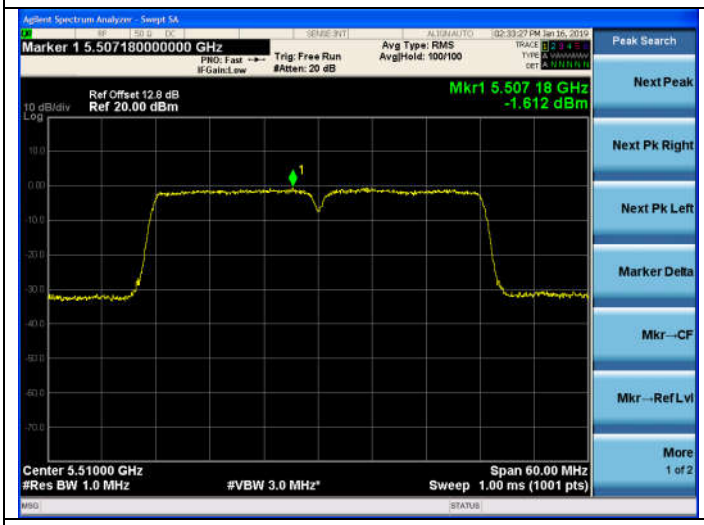
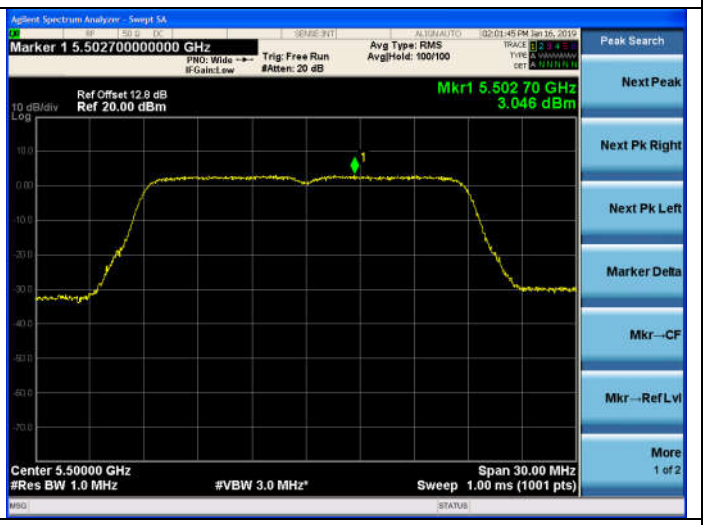
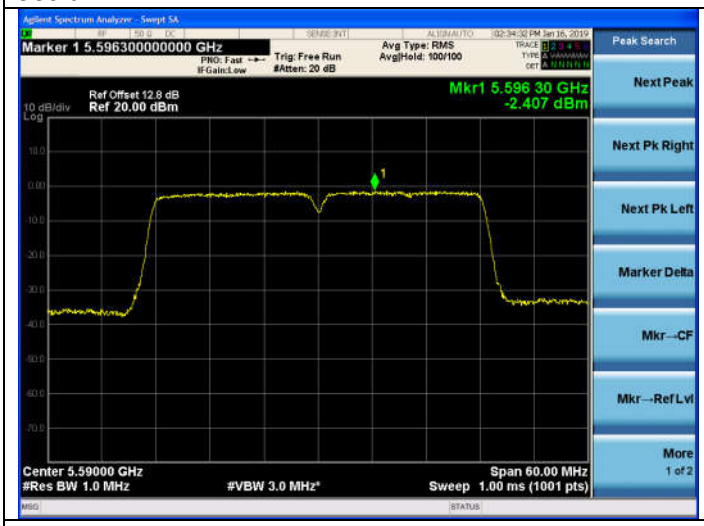
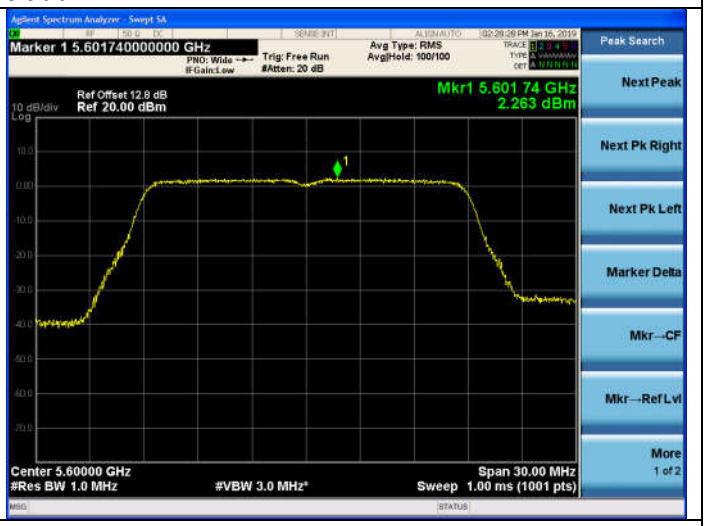
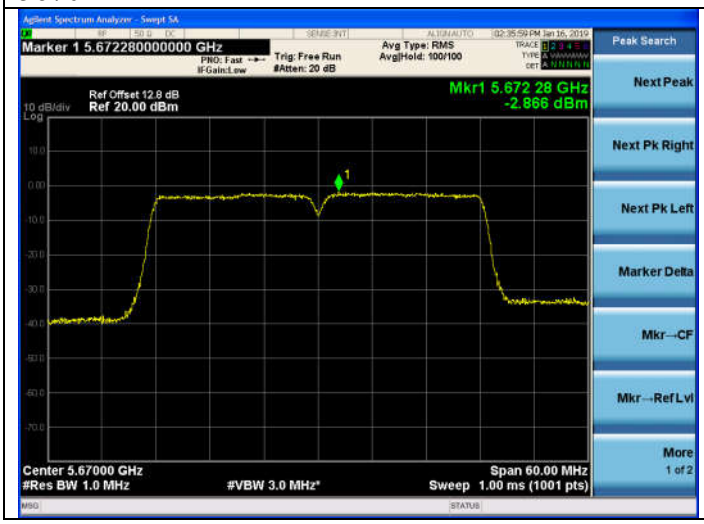
5670MHz



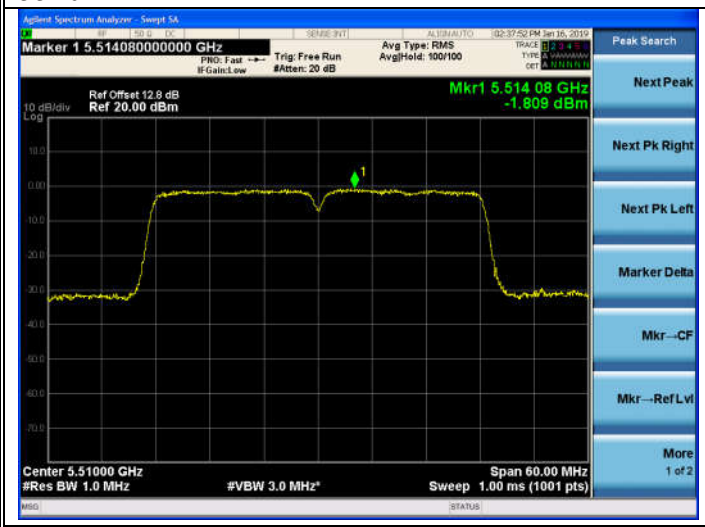
5500-5700MHz Band:

ANT 1

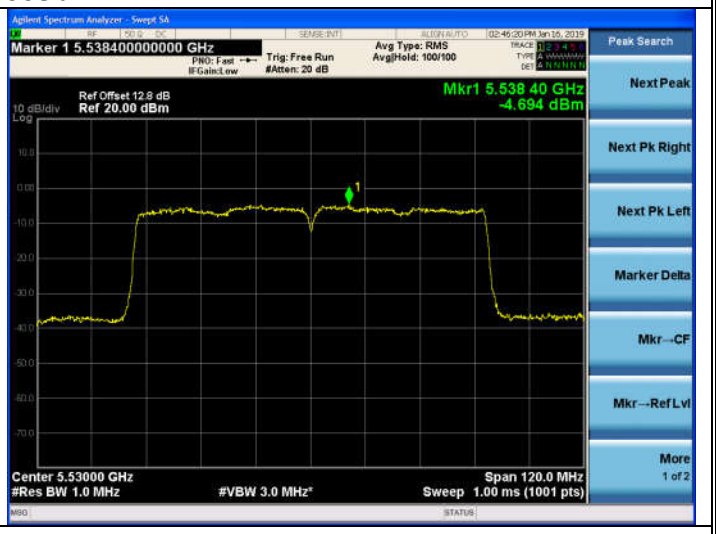
11a	11n HT20
5500MHz	5500MHz
	
5600MHz	5600MHz
	
5700MHz	5700MHz
	

11n HT40	11ac VHT20
5510MHz	5500MHz
	
5590MHz	5600MHz
	
5670MHz	5700MHz
	

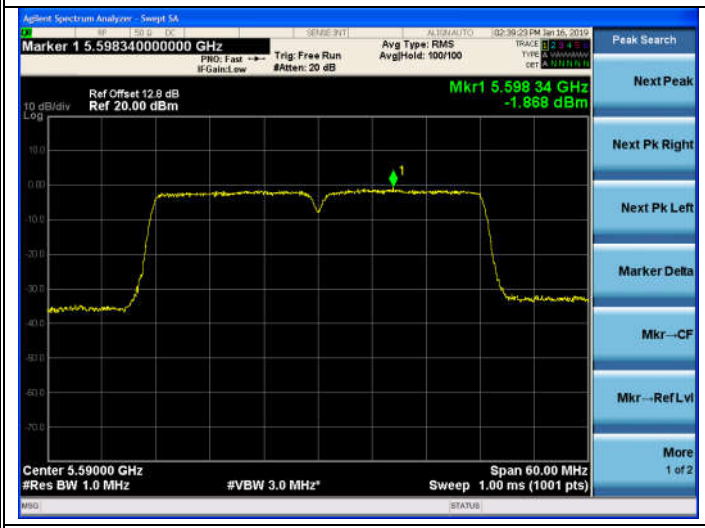
11ac VHT40
5510MHz



11ac VHT80
5530MHz

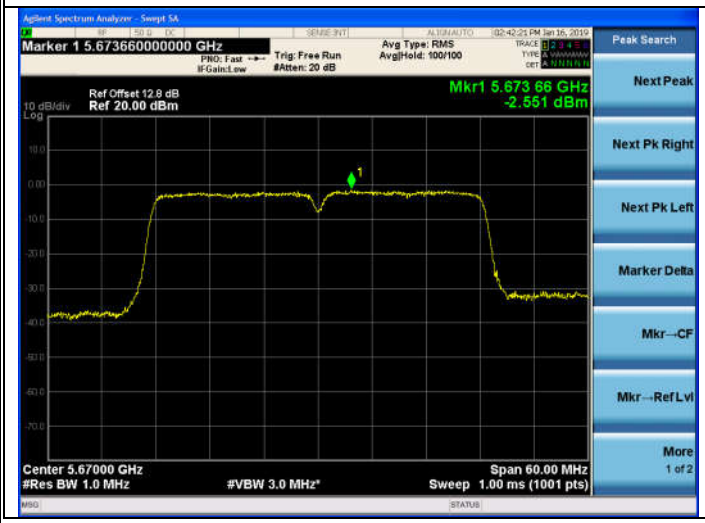


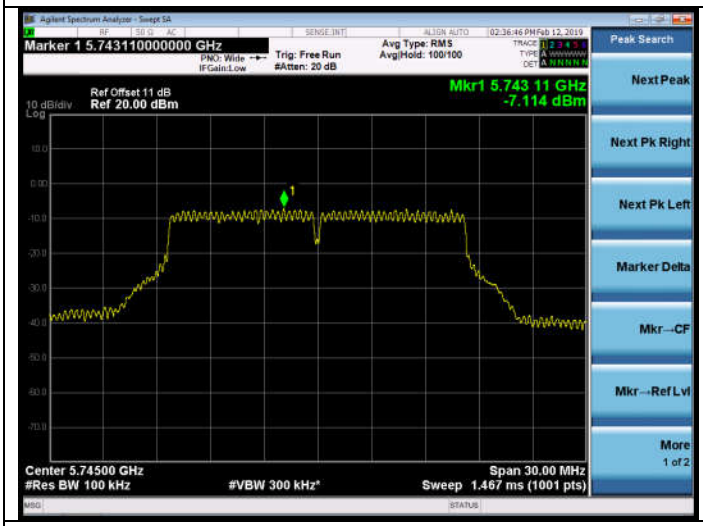
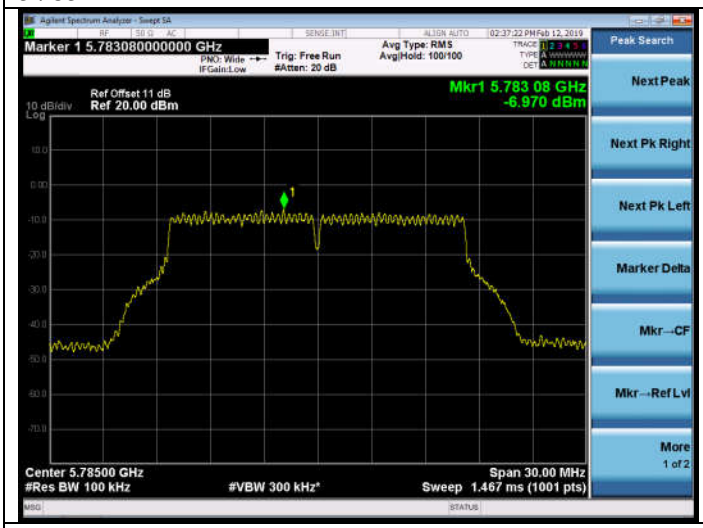
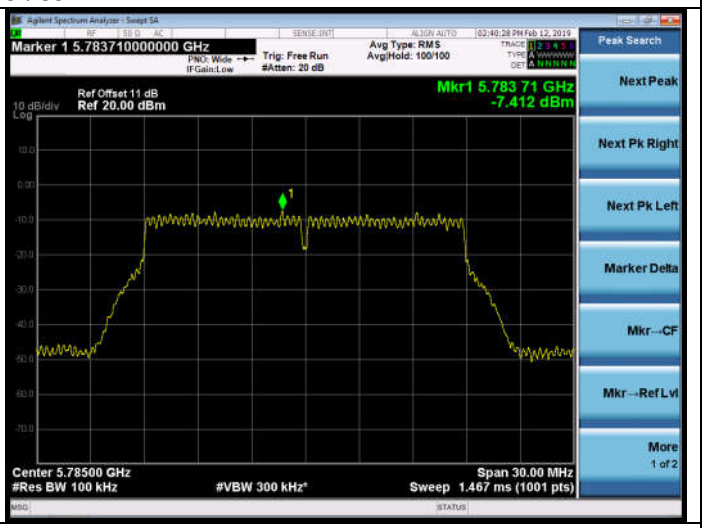
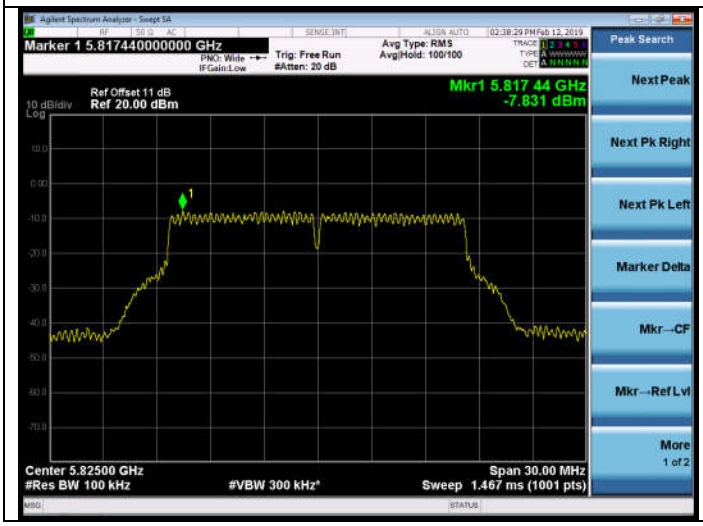
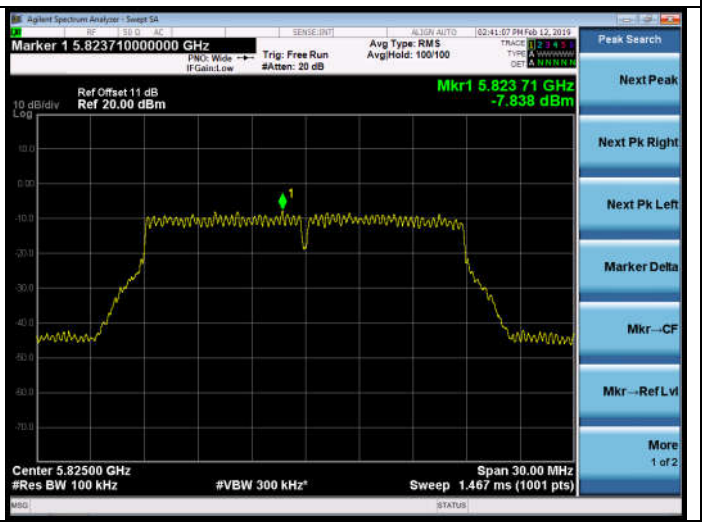
5590MHz



5610MHz

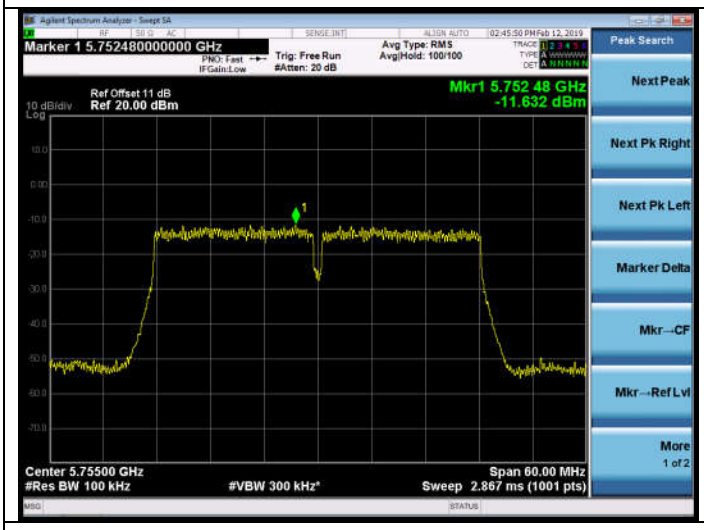
5670MHz



5745-5825MHz Band:	
ANT 0	
11a	11n HT20
5745MHz	5745MHz
	
5785MHz	5785MHz
	
5825MHz	5825MHz
	

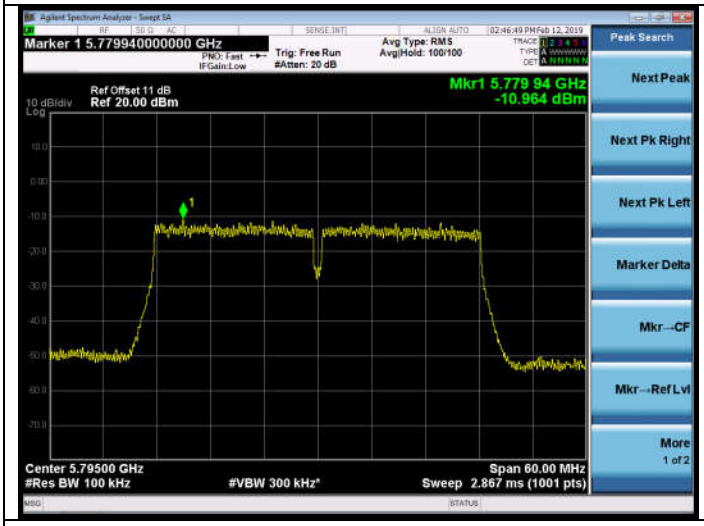
11n HT40

5755MHz



5785MHz

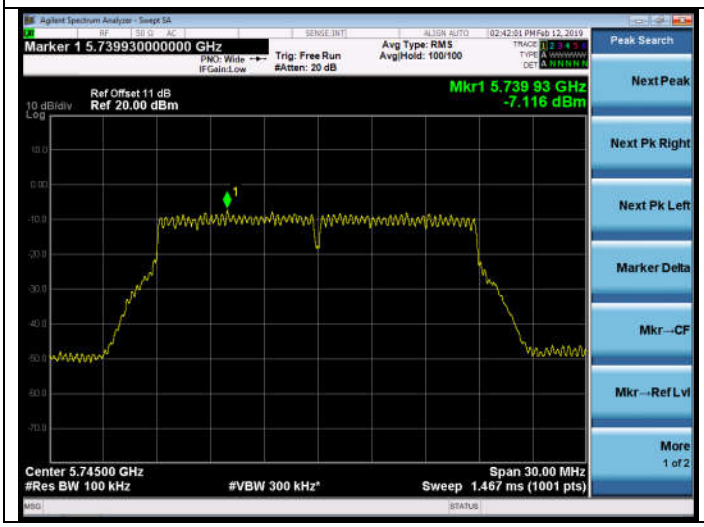
5795MHz



5825MHz

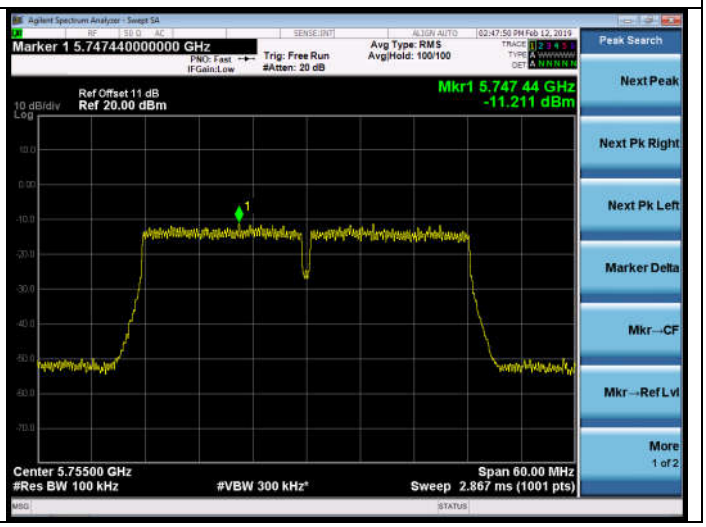
11ac VHT20

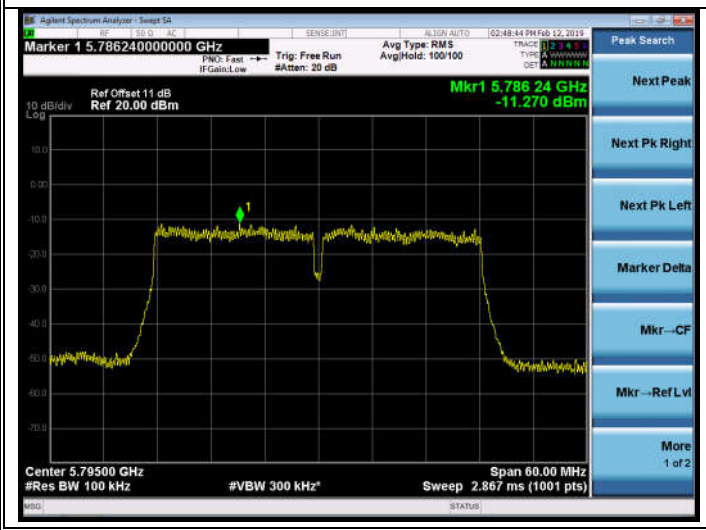
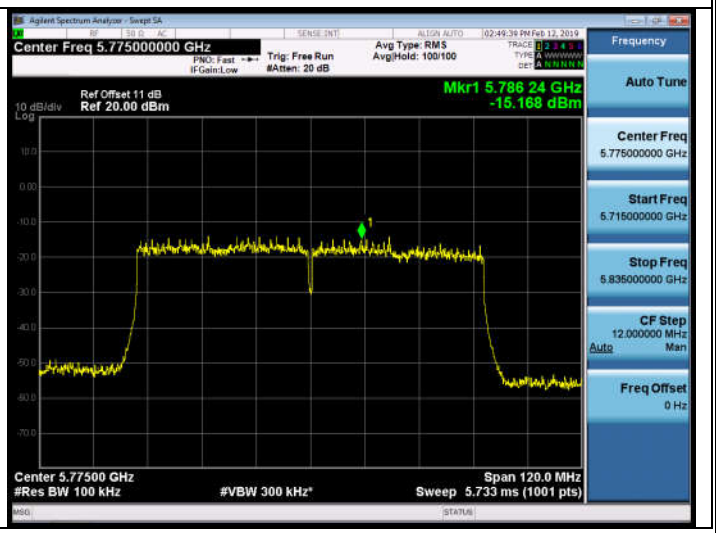
5745MHz



11ac VHT40

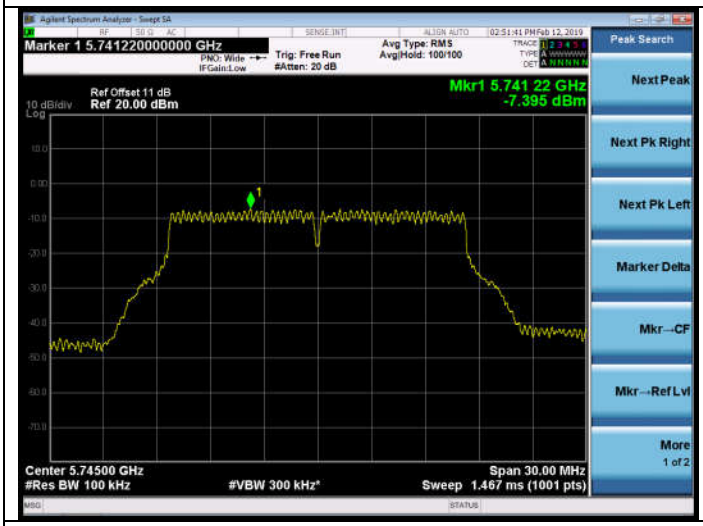
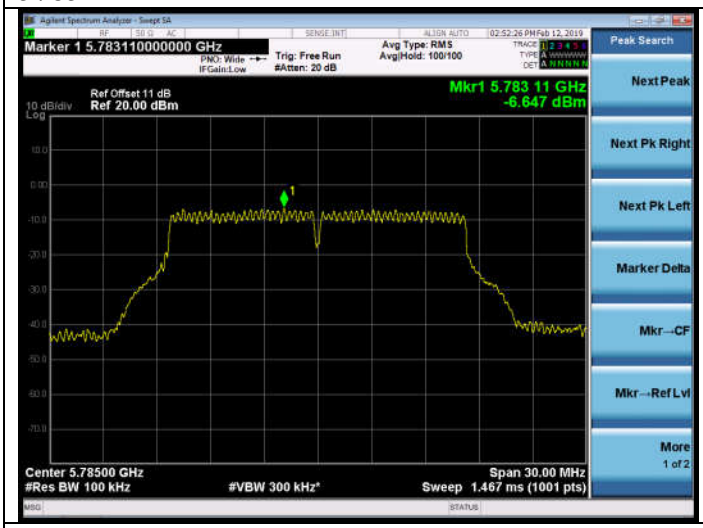
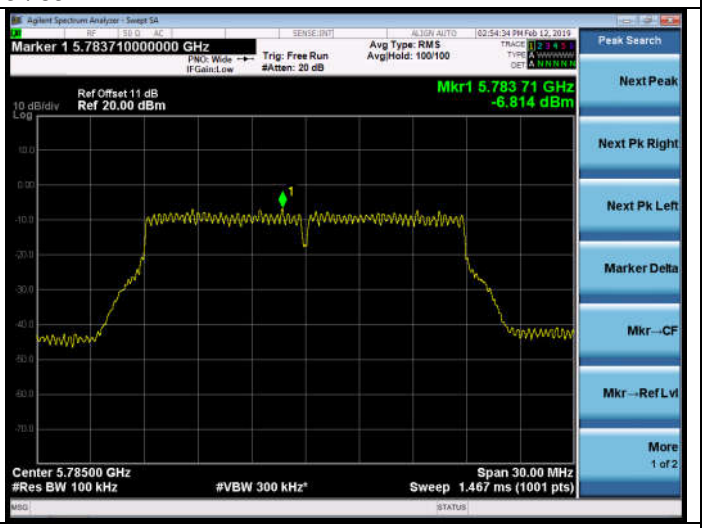
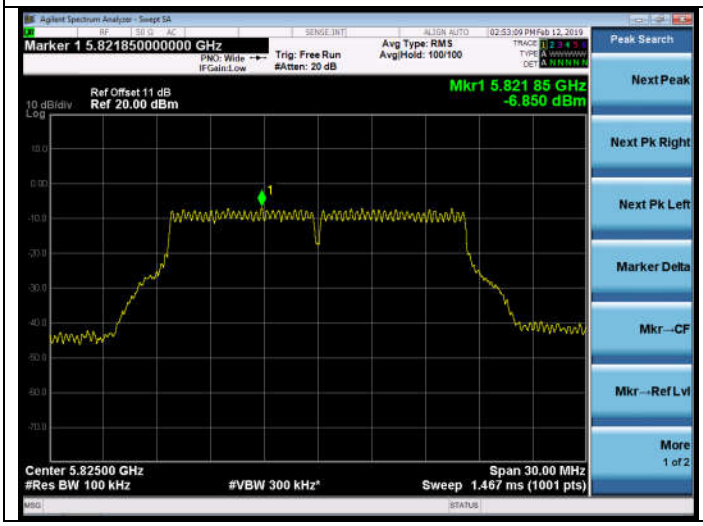
5755MHz



	11ac VHT80
5795MHz	5775MHz
	

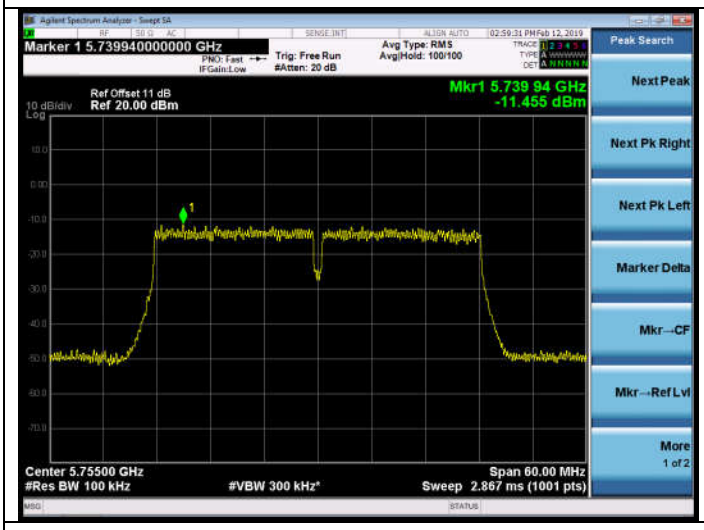
5745-5825MHz Band:

ANT 1

11a	11n HT20
5745MHz	5745MHz
	
5785MHz	5785MHz
	
5825MHz	5825MHz
	

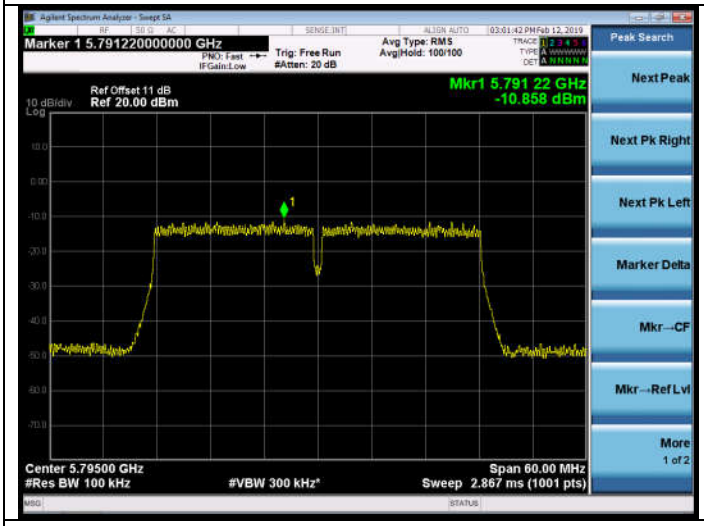
11n HT40

5755MHz

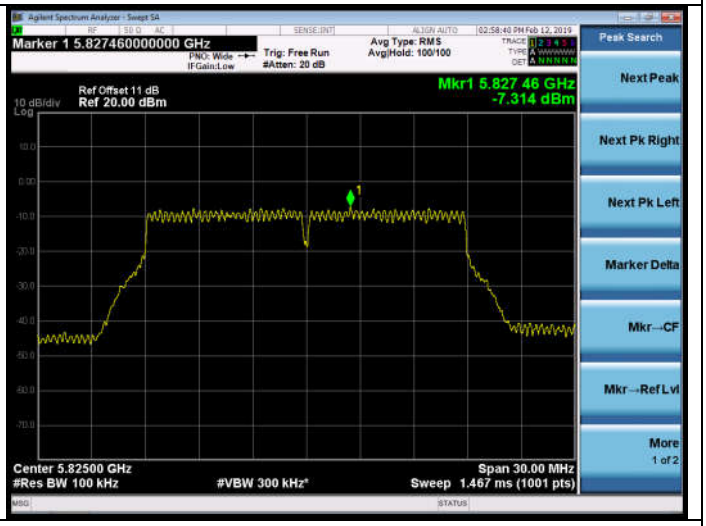


5785MHz

5795MHz

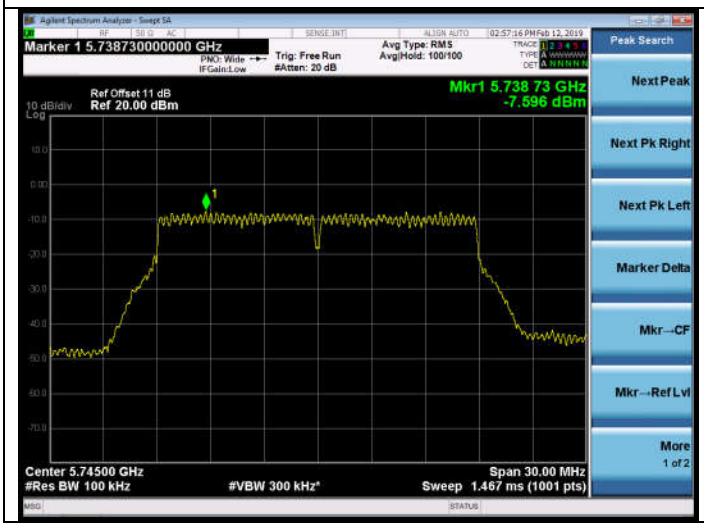


5825MHz



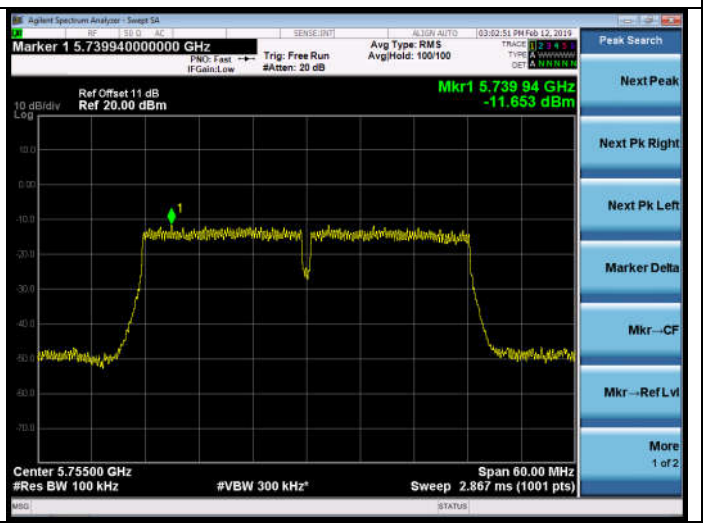
11ac VHT20

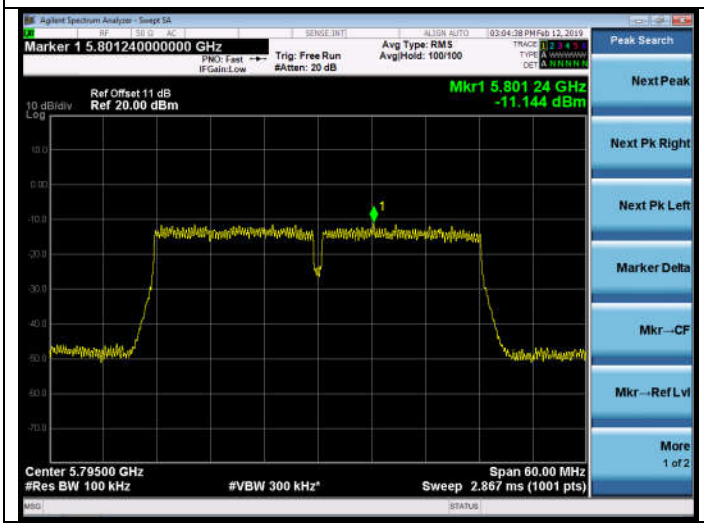
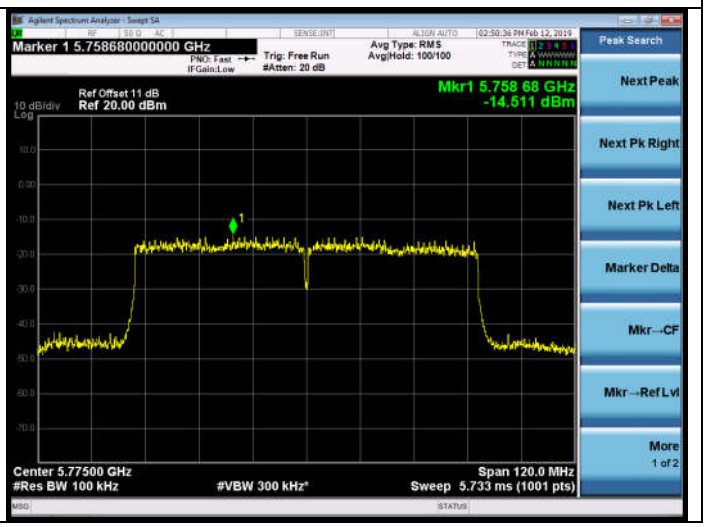
5745MHz



11ac VHT40

5755MHz



	11ac VHT80
5795MHz	5775MHz
	

10. FREQUENCY STABILITY MEASUREMENT

10.1. Test Equipment

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	PXA Signal Analyzer	Agilent	N9030A	MY51380221	Sep.08,18	1Year
2.	Amplifier	HP	8449B	3008A02495	Apr.23.18	1 Year
3.	RF Cable	Hubersuhner	SUCOFLE X106	505239/6	Apr.23,18	1 Year

10.2. Limit

Manufacturers of U-NII devices are responsible for ensuring frequency stability such that an emission is maintained within the band of operation under all conditions of normal operation as specified in the user's manual.

10.3. Test Procedure

1. The transmitter output (antenna port) was connected to the spectrum analyzer.
   EUT have transmitted absence of modulation signal and fixed channelise. Set the spectrum analyzer span to view the entire absence of modulation emissions bandwidth. Set RBW = 10 kHz, VBW = 10 kHz with peak detector and maxhold settings. fc is declaring of channel frequency. Then the frequency error formula is $(fc-f)/f \times 10^{-6}$ppm. The test extreme voltage is to change the primary supply voltage from 85 to 115 percent of the nominal value.
2. Extreme temperature rule is -30°C~50°C.

10.4.Test Result

EUT: BCM dual band 2*2 WiFi		
M/N: 50-0102-BC-22		
Test date: 2019-01-27	Pressure: 102.7±1.0 kpa	Humidity: 52.5±3.0%
Tested by: Garry	Test site: RF site	Temperature:22.7±0.6 ℃

Frequency Stability vs.Voltage:

Test Voltage	Temperature	CH	Max. Reading（MHz）	Target Frequency (MHz)	Result (ppm)
AC 102V	20℃	CH36	5179.9675	5180	-6.27
		CH38	5189.9705	5190	-5.68
		CH40	5199.9805	5200	-3.75
		CH42	5209.968	5210	-6.14
		CH46	5229.970	5230	-5.74
		CH48	5239.964	5240	-6.87
		CH52	5259.962	5260	-7.22
		CH54	5269.9835	5270	-3.13
		CH58	5289.975	5290	-4.73
		CH60	5299.9845	5300	-2.92
		CH62	5309.9755	5310	-4.61
		CH64	5319.9845	5320	-2.91
		CH100	5499.978	5500	-4.00
		CH102	5509.986	5510	-2.54
		CH106	5529.9725	5530	-4.97
		CH118	5589.9685	5590	-5.64
		CH120	5599.975	5600	-4.46
		CH122	5609.9615	5610	-6.86
		CH134	5669.9755	5670	-4.32
		CH140	5699.971	5700	-5.09
		CH149	5744.9715	5745	-4.96
		CH151	5754.983	5755	-2.95
		CH155	5774.9735	5775	-4.59
		CH157	5784.9655	5785	-5.96
		CH159	5794.9875	5795	-2.16
		CH165	5824.9865	5825	-2.32

Test Voltage	Temperature	CH	Max. Reading（MHz）	Target Frequency (MHz)	Result (ppm)
AC 120V	20℃	CH36	5179.981	5180	-3.67
		CH38	5189.9635	5190	-7.03
		CH40	5199.9665	5200	-6.44
		CH42	5209.966	5210	-6.53
		CH46	5229.9685	5230	-6.02
		CH48	5239.9715	5240	-5.44
		CH52	5259.971	5260	-5.51
		CH54	5269.962	5270	-7.21
		CH58	5289.964	5290	-6.81
		CH60	5299.984	5300	-3.02
		CH62	5309.9535	5310	-8.76
		CH64	5319.97	5320	-5.64
		CH100	5499.9675	5500	-5.91
		CH102	5509.976	5510	-4.36
		CH106	5529.9615	5530	-6.96
		CH118	5589.9665	5590	-5.99
		CH120	5599.975	5600	-4.46
		CH122	5609.9675	5610	-5.79
		CH134	5669.974	5670	-4.59
		CH140	5699.9705	5700	-5.18
		CH149	5744.9715	5745	-4.96
		CH151	5754.9812	5755	-3.27
		CH155	5774.962	5775	-6.58
		CH157	5784.9635	5785	-6.31
		CH159	5794.987	5795	−2.24
		CH165	5824.9965	5825	−0. 60

Test Voltage	Temperature	CH	Max. Reading (MHz)	Target Frequency (MHz)	Result (ppm)
AC 138V	20℃	CH36	5179.962	5180	-7.34
		CH38	5189.9655	5190	-6.65
		CH40	5199.9765	5200	-4.52
		CH42	5209.97	5210	-5.76
		CH46	5229.9695	5230	-5.83
		CH48	5239.9615	5240	-7.35
		CH52	5259.973	5260	-5.13
		CH54	5269.9635	5270	-6.93
		CH58	5289.9655	5290	-6.52
		CH60	5299.955	5300	-8.49
		CH62	5309.9565	5310	-8.19
		CH64	5319.9745	5320	-4.79
		CH100	5499.965	5500	-6.36
		CH102	5509.9765	5510	-4.26
		CH106	5529.9625	5530	-6.78
		CH118	5589.971	5590	-5.19
		CH120	5599.9655	5600	-6.16
		CH122	5609.971	5610	-5.17
		CH134	5669.977	5670	-4.06
		CH140	5699.9615	5700	-6.75
		CH149	5744.971	5745	-5.05
		CH151	5754.964	5755	-6.26
		CH155	5774.955	5775	-7.79
		CH157	5784.967	5785	-5.70
		CH159	5794.9775	5795	-3.88
		CH165	5824.967	5825	-5.67

Frequency Stability vs.Temperature:

Test Voltage	Temperature	CH	Max. Reading (MHz)	Target Frequency (MHz)	Result (ppm)
AC 120V	0℃	CH36	5179.9715	5180	-5.50
		CH38	5189.9645	5190	-6.84
		CH40	5199.969	5200	-5.96
		CH42	5209.968	5210	-6.14
		CH46	5229.969	5230	-5.93
		CH48	5239.972	5240	-5.34
		CH52	5259.981	5260	-3.61
		CH54	5269.963	5270	-7.02
		CH58	5289.964	5290	-6.81
		CH60	5299.9645	5300	-6.70
		CH62	5309.9555	5310	-8.38
		CH64	5319.9735	5320	-4.98
		CH100	5499.9775	5500	-4.09
		CH102	5509.9665	5510	-6.08
		CH106	5529.9515	5530	-8.77
		CH118	5589.9585	5590	-7.42
		CH120	5599.9755	5600	-4.38
		CH122	5609.9605	5610	-7.04
		CH134	5669.986	5670	-2.47
		CH140	5699.961	5700	-6.84
		CH149	5744.972	5745	-4.87
		CH151	5754.962	5755	-6.60
		CH155	5774.9735	5775	-4.59
		CH157	5784.9635	5785	-6.31
		CH159	5794.967	5795	-5.69
		CH165	5824.976	5825	-4.12

Test Voltage	Temperature	CH	Max. Reading (MHz)	Target Frequency (MHz)	Result (ppm)
AC 120V	10℃	CH36	5179.9515	5180	-9.36
		CH38	5189.964	5190	-6.94
		CH40	5199.967	5200	-6.35
		CH42	5209.966	5210	-6.53
		CH46	5229.9695	5230	-5.83
		CH48	5239.9515	5240	-9.26
		CH52	5259.9715	5260	-5.42
		CH54	5269.974	5270	-4.93
		CH58	5289.964	5290	-6.81
		CH60	5299.9745	5300	-4.81
		CH62	5309.9555	5310	-8.38
		CH64	5319.953	5320	-8.83
		CH100	5499.968	5500	-5.82
		CH102	5509.978	5510	-3.99
		CH106	5529.9615	5530	-6.96
		CH118	5589.977	5590	-4.11
		CH120	5599.965	5600	-6.25
		CH122	5609.9605	5610	-7.04
		CH134	5669.966	5670	-6.00
		CH140	5699.971	5700	-5.09
		CH149	5744.9715	5745	-4.96
		CH151	5754.964	5755	-6.26
		CH155	5774.9625	5775	-6.49
		CH157	5784.9555	5785	-7.69
		CH159	5794.9775	5795	-3.88
		CH165	5824.963	5825	-6.35

Test Voltage	Temperature	CH	Max. Reading (MHz)	Target Frequency (MHz)	Result (ppm)
AC 120V	20℃	CH36	5179.981	5180	-3.67
		CH38	5189.9635	5190	-7.03
		CH40	5199.9665	5200	-6.44
		CH42	5209.966	5210	-6.53
		CH46	5229.9685	5230	-6.02
		CH48	5239.9715	5240	-5.44
		CH52	5259.971	5260	-5.51
		CH54	5269.962	5270	-7.21
		CH58	5289.964	5290	-6.81
		CH60	5299.984	5300	-3.02
		CH62	5309.9535	5310	-8.76
		CH64	5319.97	5320	-5.64
		CH100	5499.9675	5500	-5.91
		CH102	5509.976	5510	-4.36
		CH106	5529.9615	5530	-6.96
		CH118	5589.9665	5590	-5.99
		CH120	5599.975	5600	-4.46
		CH122	5609.9675	5610	-5.79
		CH134	5669.974	5670	-4.59
		CH140	5699.9705	5700	-5.18
		CH149	5744.9715	5745	-4.96
		CH151	5754.9812	5755	-3.27
		CH155	5774.962	5775	-6.58
		CH157	5784.9635	5785	-6.31
		CH159	5794.987	5795	−2.24
		CH165	5824.9965	5825	−0. 60

Test Voltage	Temperature	CH	Max. Reading (MHz)	Target Frequency (MHz)	Result (ppm)
AC 120V	30℃	CH36	5179.972	5180	-5.41
		CH38	5189.964	5190	-6.94
		CH40	5199.968	5200	-6.15
		CH42	5209.9765	5210	-4.51
		CH46	5229.9715	5230	-5.45
		CH48	5239.962	5240	-7.25
		CH52	5259.9635	5260	-6.94
		CH54	5269.974	5270	-4.93
		CH58	5289.9645	5290	-6.71
		CH60	5299.985	5300	-2.83
		CH62	5309.9675	5310	-6.12
		CH64	5319.983	5320	-3.20
		CH100	5499.9785	5500	-3.91
		CH102	5509.974	5510	-4.72
		CH106	5529.9615	5530	-6.96
		CH118	5589.979	5590	-3.76
		CH120	5599.986	5600	-2.50
		CH122	5609.9705	5610	-5.26
		CH134	5669.9665	5670	-5.91
		CH140	5699.973	5700	-4.74
		CH149	5744.972	5745	-4.87
		CH151	5754.966	5755	-5.91
		CH155	5774.9625	5775	-6.49
		CH157	5784.986	5785	-2.42
		CH159	5794.9795	5795	-3.54
		CH165	5824.977	5825	-3.95

Test Voltage	Temperature	CH	Max. Reading (MHz)	Target Frequency (MHz)	Result (ppm)
AC 120V	40℃	CH36	5179.9525	5180	-9.17
		CH38	5189.966	5190	-6.55
		CH40	5199.9685	5200	-6.06
		CH42	5209.9685	5210	-6.05
		CH46	5229.9735	5230	-5.07
		CH48	5239.9525	5240	-9.06
		CH52	5259.9855	5260	-2.76
		CH54	5269.964	5270	-6.83
		CH58	5289.965	5290	-6.62
		CH60	5299.967	5300	-6.23
		CH62	5309.9775	5310	-4.24
		CH64	5319.9535	5320	-8.74
		CH100	5499.9685	5500	-5.73
		CH102	5509.9505	5510	-8.98
		CH106	5529.972	5530	-5.06
		CH118	5589.9695	5590	-5.46
		CH120	5599.978	5600	-3.93
		CH122	5609.9605	5610	-7.04
		CH134	5669.977	5670	-4.06
		CH140	5699.985	5700	-2.63
		CH149	5744.972	5745	-4.87
		CH151	5754.9865	5755	-2.35
		CH155	5774.9745	5775	-4.42
		CH157	5784.9685	5785	-5.45
		CH159	5794.9595	5795	-6.99
		CH165	5824.961	5825	-6.70

11. ANTENNA REQUIREMENT

11.1. Standard Applicable

For intentional device, according to FCC 47 CFR Section 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. And according to FCC 47 CFR Section 15.407 (a), if transmitting antennas of directional gain greater than 6dBi are used, the power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

11.2. Antenna Connected Construction

The antennas used for this product are PCB antenna that no antenna other than that furnished by the responsible party shall be used with the device, the maximum peak gain of the transmit antenna is ANT 0:4.1dBi & ANT 1: 3.8dBi.

12. DEVIATION TO TEST SPECIFICATIONS

[NONE]