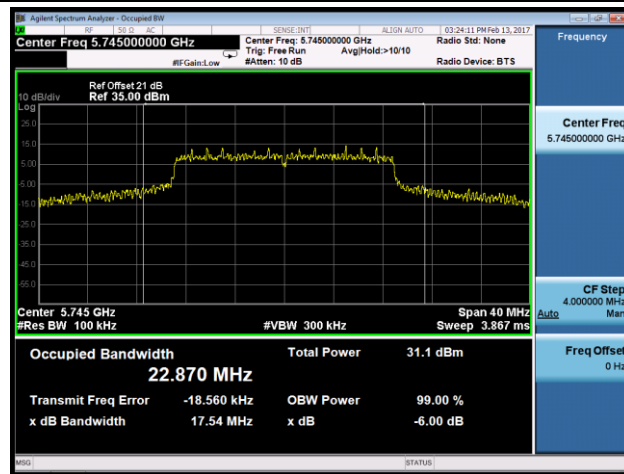
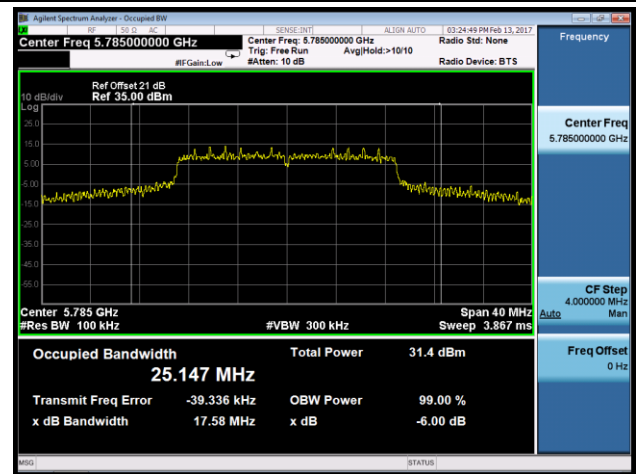


802.11n-HT20 6dB Bandwidth - Ant 0 / Ant 0 + 1

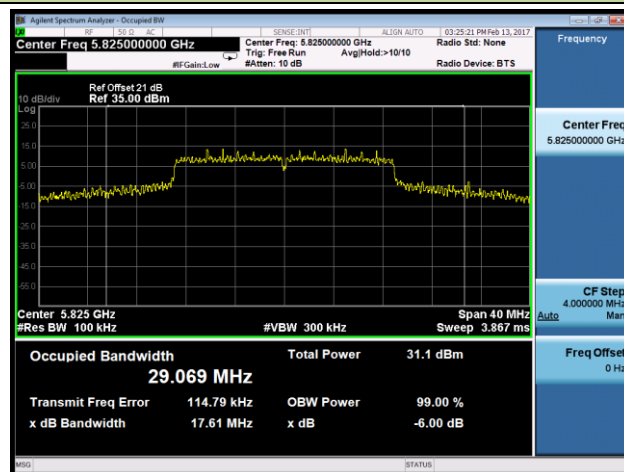
Channel 149 (5745MHz)



Channel 157 (5785MHz)

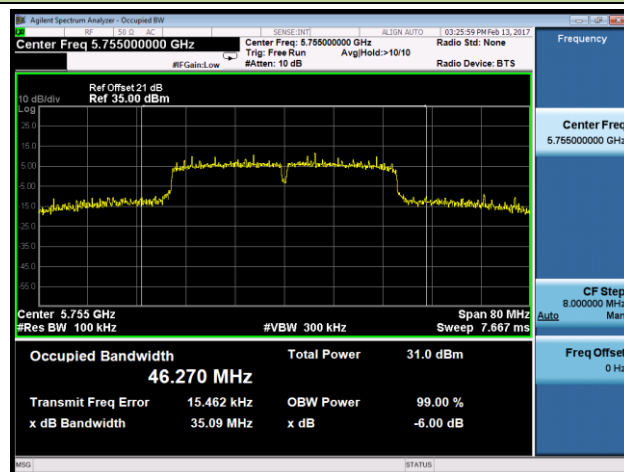


Channel 165 (5825MHz)

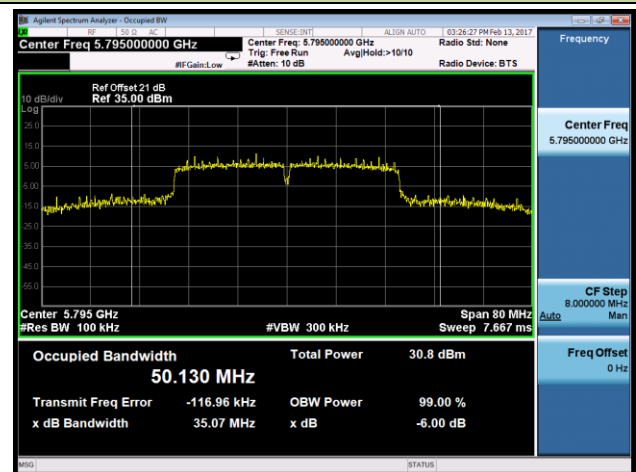


802.11n-HT40 6dB Bandwidth - Ant 0 / Ant 0 + 1

Channel 151 (5755MHz)

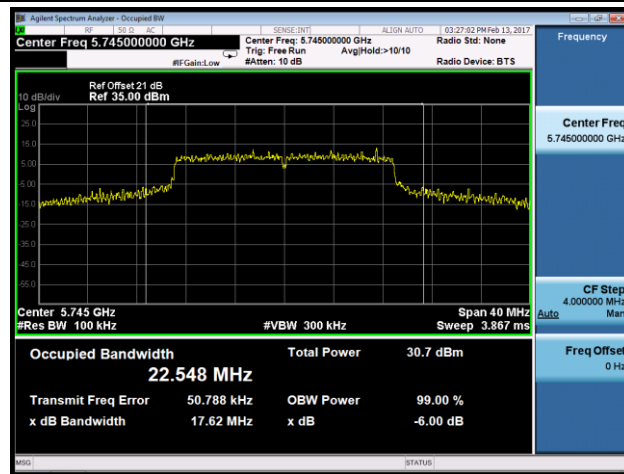


Channel 159 (5795MHz)

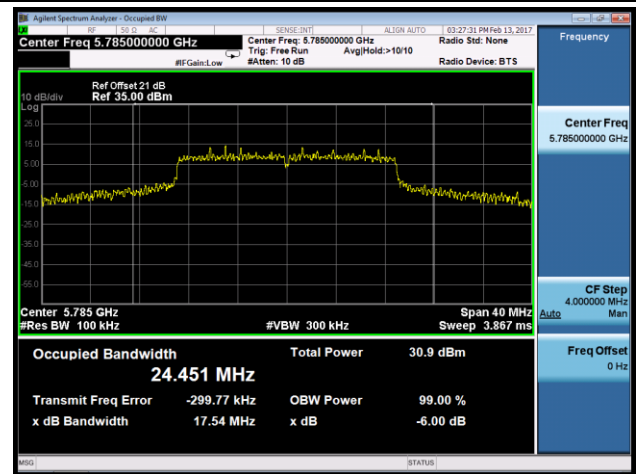


802.11ac-VHT20 6dB Bandwidth - Ant 0 / Ant 0 + 1

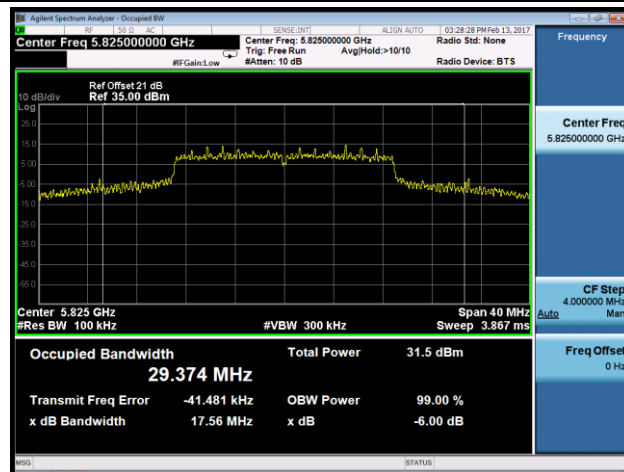
Channel 149 (5745MHz)



Channel 157 (5785MHz)

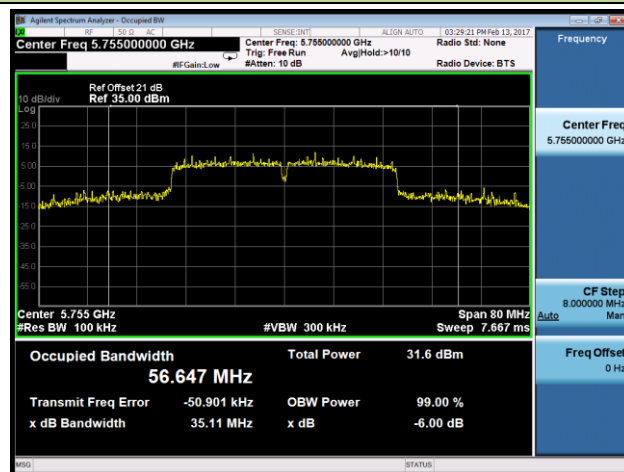


Channel 165 (5825MHz)

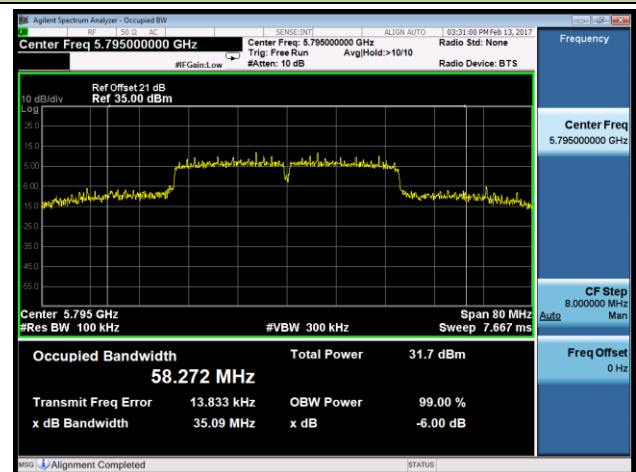


802.11ac-VHT40 6dB Bandwidth - Ant 0 / Ant 0 + 1

Channel 151 (5755MHz)

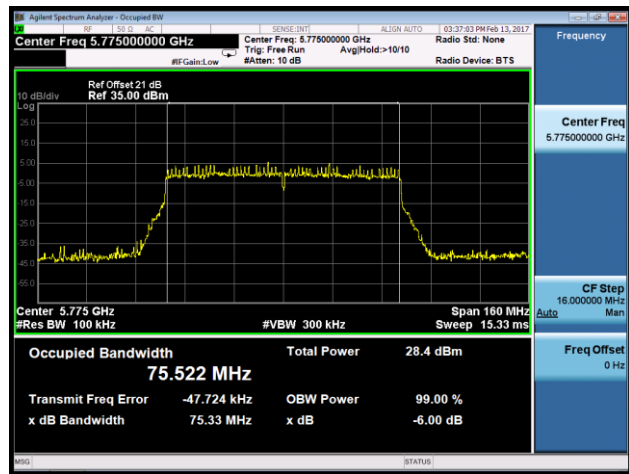


Channel 159 (5795MHz)



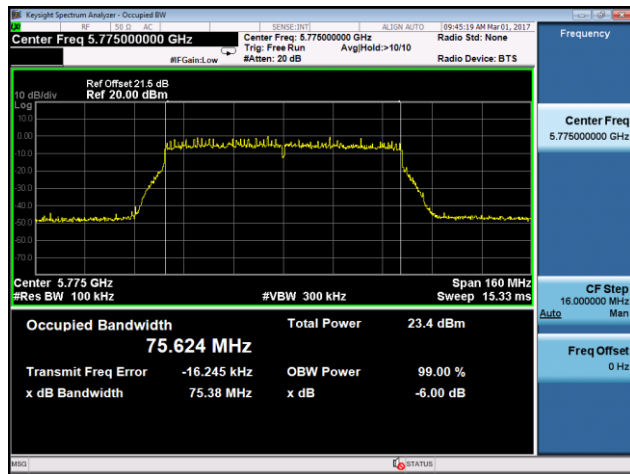
802.11ac-VHT80 6dB Bandwidth - Ant 0 / Ant 0 + 1

Channel 155 (5775MHz)

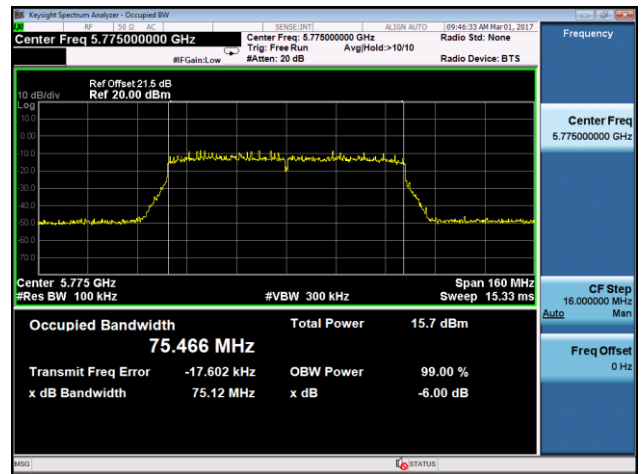


802.11ac-VHT80+80 6dB Bandwidth - Ant 1 / Ant 0 + 1

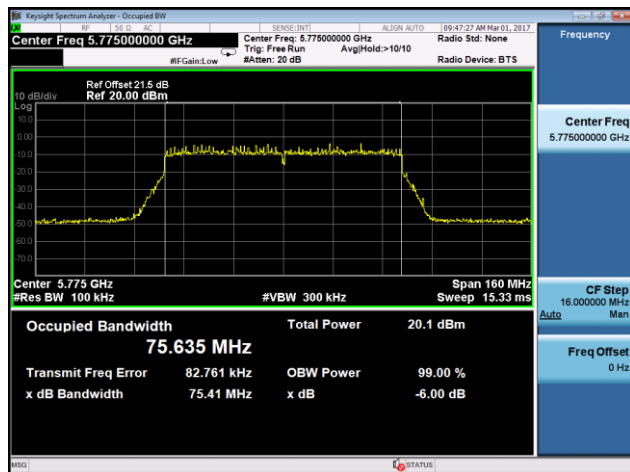
Channel 42+155 (5775MHz)



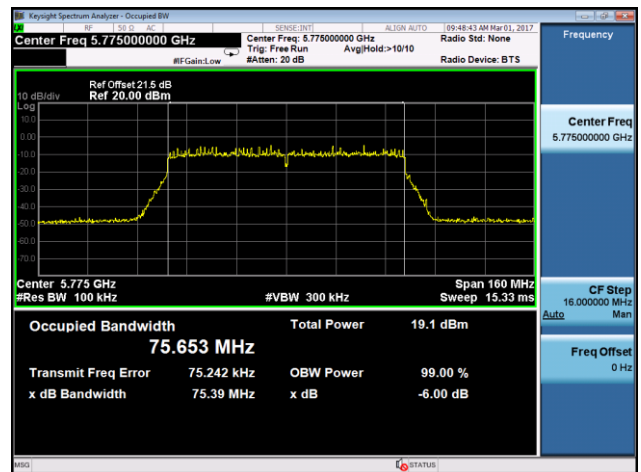
Channel 58+155 (5775MHz)



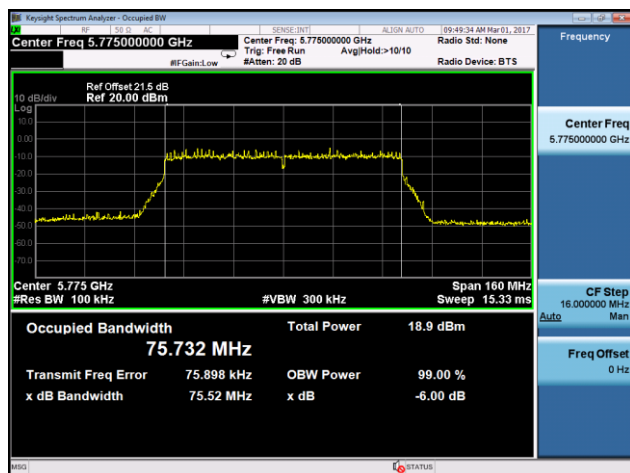
Channel 106+155 (5775MHz)



Channel 122+155 (5775MHz)



Channel 138+155 (5775MHz)



Radio C 6dB Bandwidth Test Result

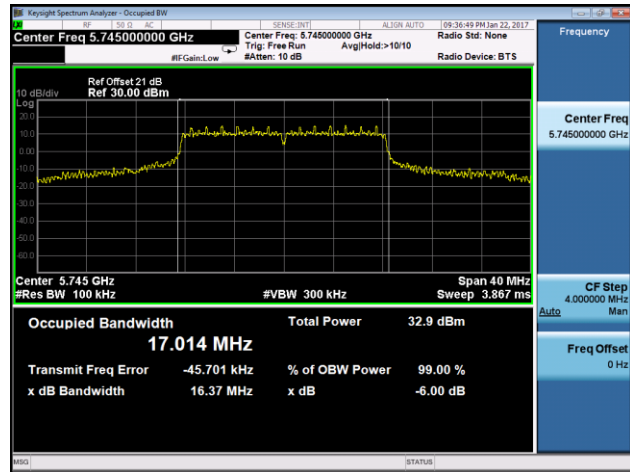
Test Mode	Data Rate (Mbps)	Channel No.	Frequency (MHz)	6dB Bandwidth (MHz)	Limit (MHz)	Result
Ant 0 / Ant 0 + 1						
802.11a	6	149	5745	16.37	≥ 0.5	Pass
802.11a	6	157	5785	16.37	≥ 0.5	Pass
802.11a	6	165	5825	16.37	≥ 0.5	Pass
802.11n-HT20	13	149	5745	17.59	≥ 0.5	Pass
802.11n-HT20	13	157	5785	17.61	≥ 0.5	Pass
802.11n-HT20	13	165	5825	17.59	≥ 0.5	Pass
802.11n-HT40	27	151	5755	35.17	≥ 0.5	Pass
802.11n-HT40	27	159	5795	35.03	≥ 0.5	Pass
802.11ac-VHT20	13	149	5745	17.59	≥ 0.5	Pass
802.11ac-VHT20	13	157	5785	17.59	≥ 0.5	Pass
802.11ac-VHT20	13	165	5825	17.58	≥ 0.5	Pass
802.11ac-VHT40	27	151	5755	35.17	≥ 0.5	Pass
802.11ac-VHT40	27	159	5795	35.16	≥ 0.5	Pass
802.11ac-VHT80	58.6	155	5775	75.42	≥ 0.5	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Frequency (MHz)	6dB Bandwidth (MHz)	Limit (MHz)	Result
Ant 1 / Ant 0 + 1						
802.11ac-VHT80+80	29.3	42+155	5775	75.22	≥ 0.5	Pass
802.11ac-VHT80+80	29.3	58+155	5775	75.38	≥ 0.5	Pass
802.11ac-VHT80+80	29.3	106+155	5775	74.19	≥ 0.5	Pass
802.11ac-VHT80+80	29.3	122+155	5775	75.36	≥ 0.5	Pass
802.11ac-VHT80+80	29.3	138+155	5775	75.25	≥ 0.5	Pass

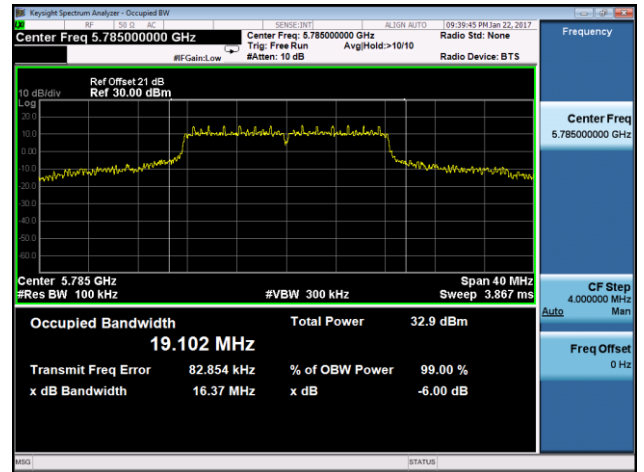
Radio C 6dB Bandwidth Test Result

802.11a 6dB Bandwidth - Ant 0 / Ant 0 + 1

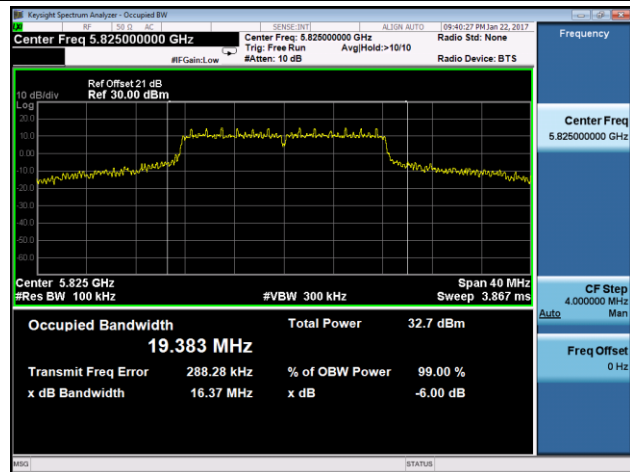
Channel 149 (5745MHz)



Channel 157 (5785MHz)

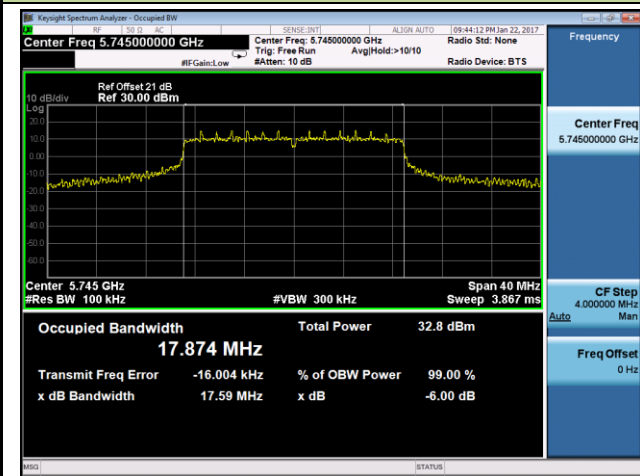


Channel 165 (5825MHz)

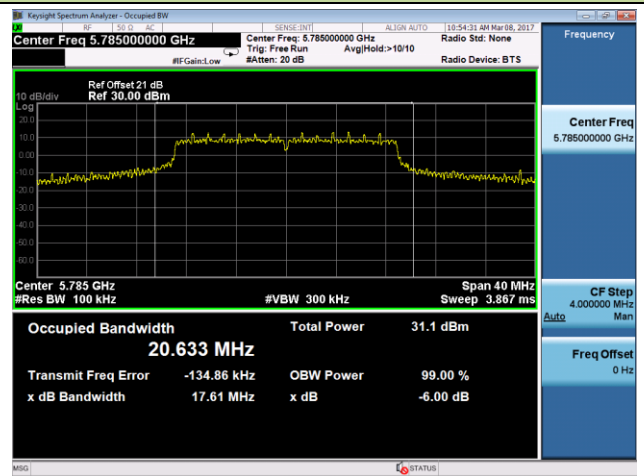


802.11n-HT20 6dB Bandwidth - Ant 0 / Ant 0 + 1

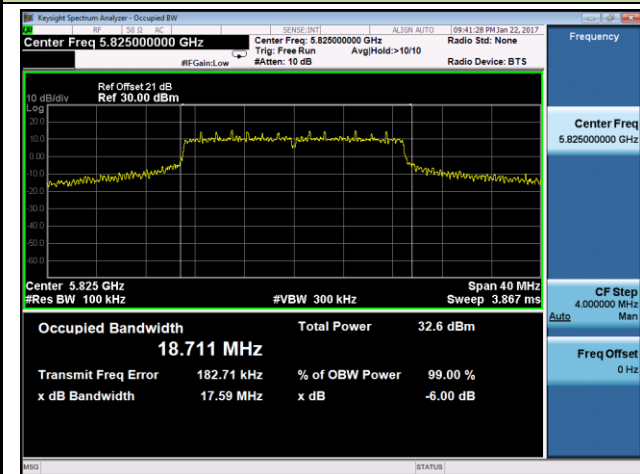
Channel 149 (5745MHz)



Channel 157 (5785MHz)

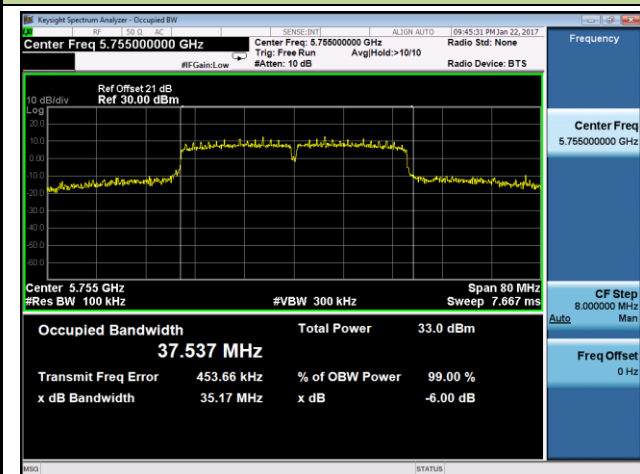


Channel 165 (5825MHz)

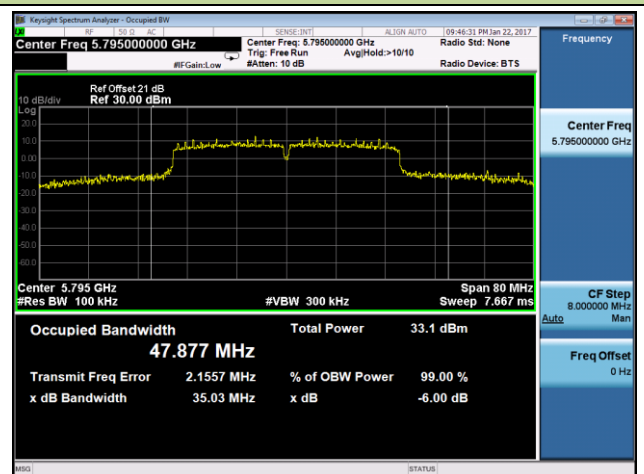


802.11n-HT40 6dB Bandwidth - Ant 0 / Ant 0 + 1

Channel 151 (5755MHz)

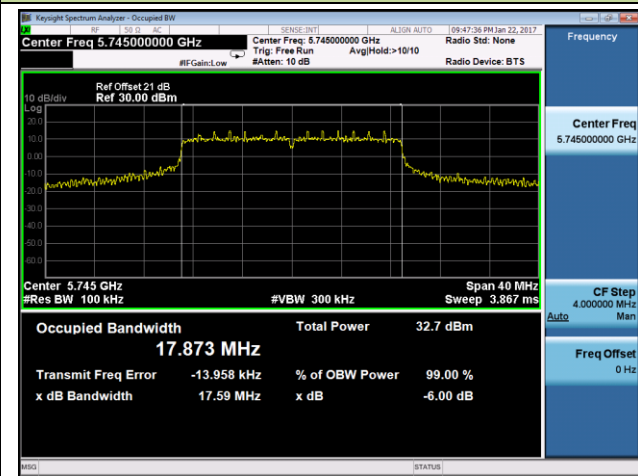


Channel 159 (5795MHz)

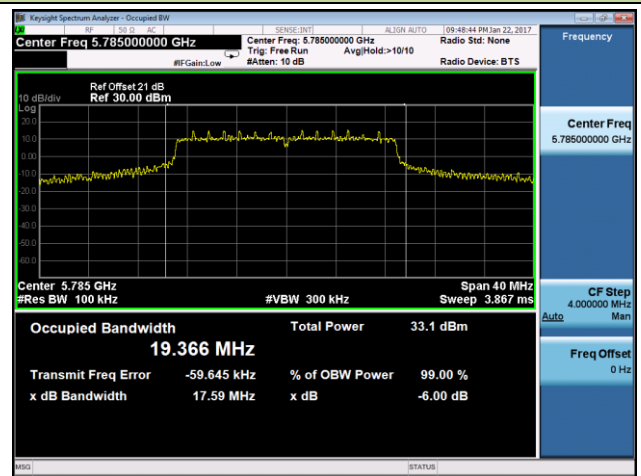


802.11ac-VHT20 6dB Bandwidth - Ant 0 / Ant 0 + 1

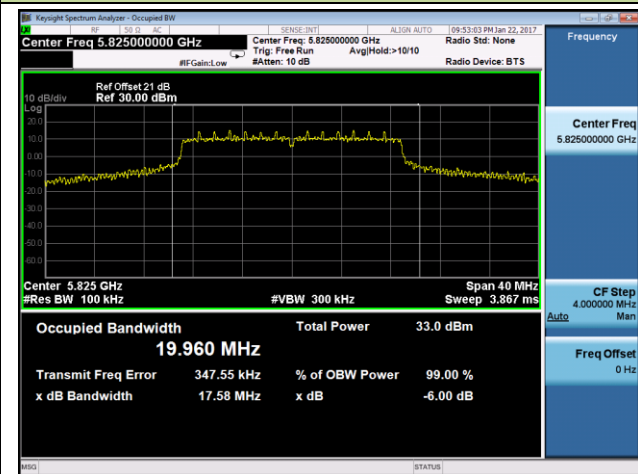
Channel 149 (5745MHz)



Channel 157 (5785MHz)

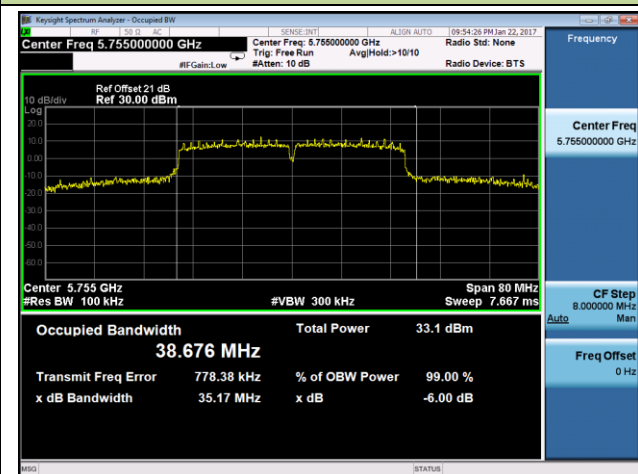


Channel 165 (5825MHz)

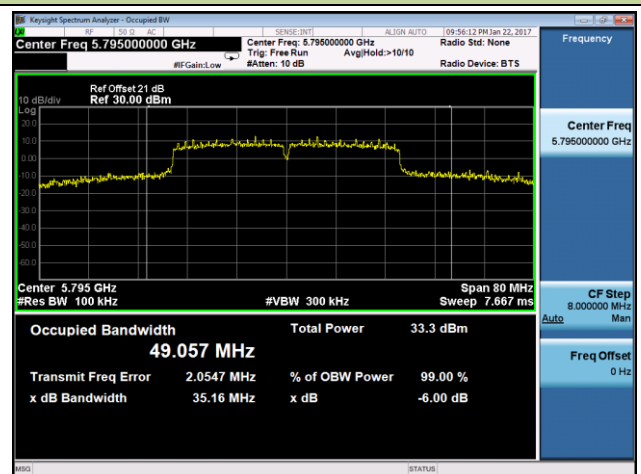


802.11ac-VHT40 6dB Bandwidth - Ant 0 / Ant 0 + 1

Channel 151 (5755MHz)

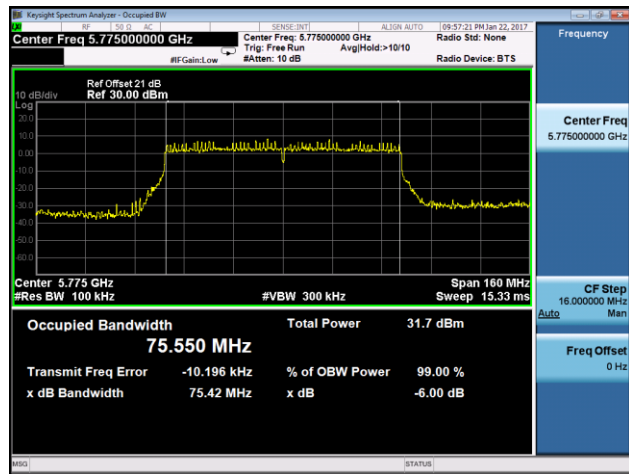


Channel 159 (5795MHz)



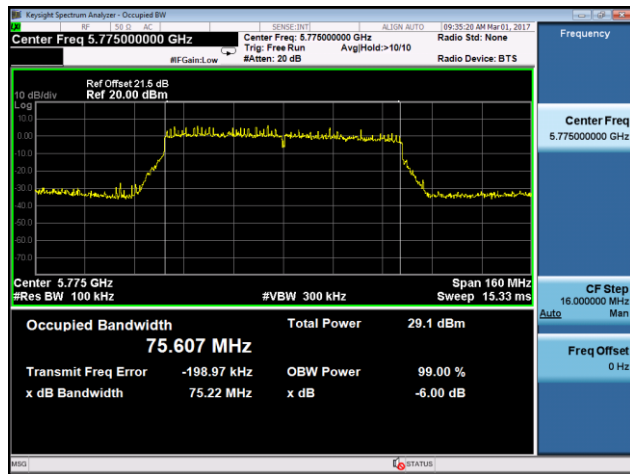
802.11ac-VHT80 6dB Bandwidth - Ant 0 / Ant 0 + 1

Channel 155 (5775MHz)

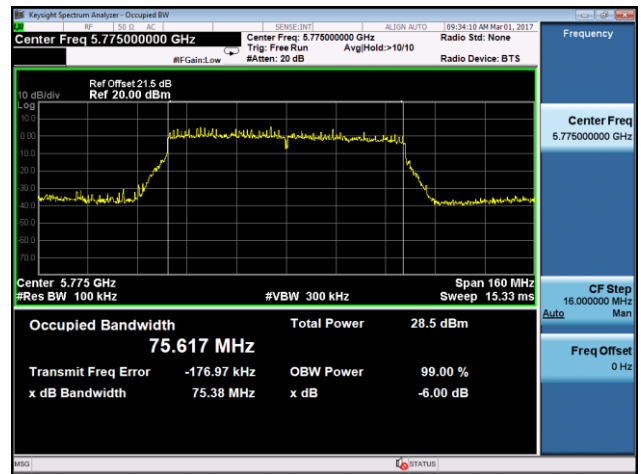


802.11ac-VHT80+80 6dB Bandwidth - Ant 1 / Ant 0 + 1

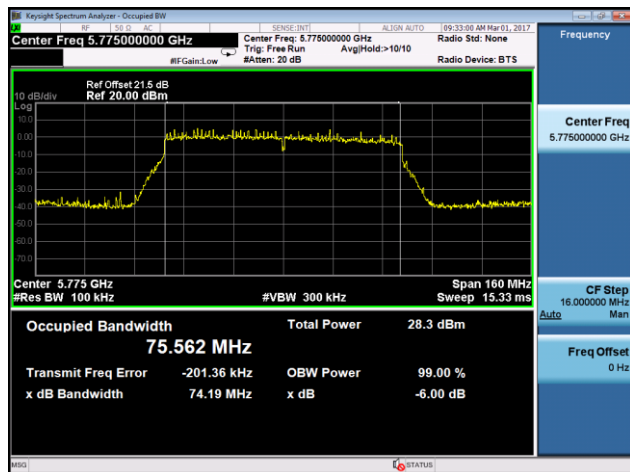
Channel 42+155 (5775MHz)



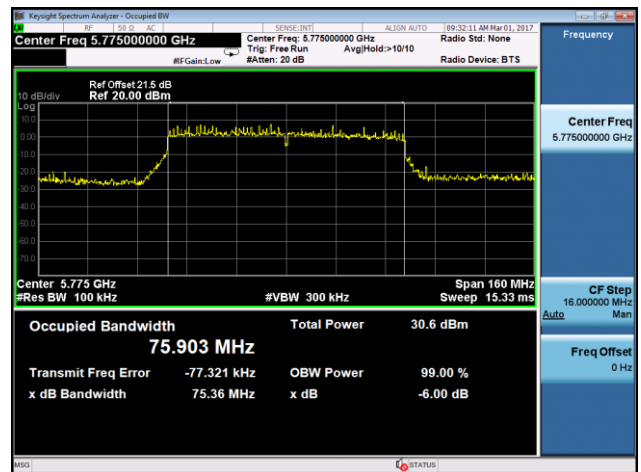
Channel 58+155 (5775MHz)



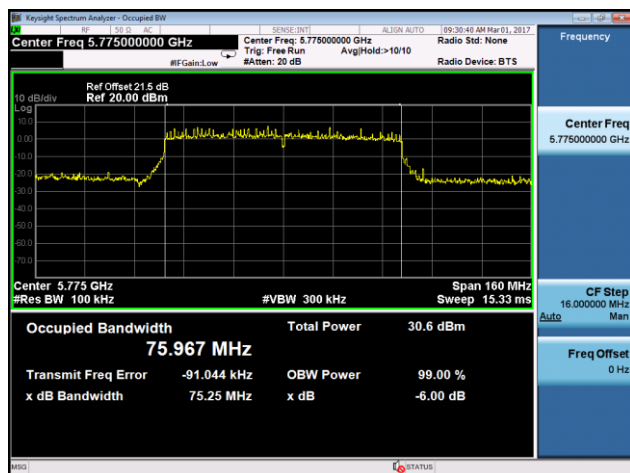
Channel 106+155 (5775MHz)



Channel 122+155 (5775MHz)



Channel 138+155 (5775MHz)



7.4. Output Power Measurement

7.4.1. Test Limit

For fixed point-to-point access points in the band 5.15-5.25 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W. For fixed point-to-point transmitters that employ a directional antenna gain greater than 23 dBi, a 1 dB reduction in maximum conducted output power and maximum power spectral density is required for each 1 dB of antenna gain in excess of 23 dBi.

For the 5.25-5.35 GHz and 5.47-5.725 GHz bands, the maximum conducted output power over the frequency bands of operation shall not exceed the lesser of 250 mW (23.98dBm) or 11dBm +10 log (26dB BW).

If transmitting antennas of directional gain greater than 6dBi are used, the maximum conducted output power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

For the band 5.725-5.85 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W (30dBm).

If transmitting antennas of directional gain greater than 6dBi are used, the maximum conducted output power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi. However, fixed point-to-point U-NII devices operating in this band may employ transmitting antennas with directional gain greater than 6 dBi without any corresponding reduction in transmitter conducted power.

Radio Type	Mode	Frequency Range (MHz)	Limit of Output Power
Radio A	802.11a	5150 ~ 5250 MHz	30.00 dBm
		5250 ~ 5350 MHz	7.78 dBm
		5470 ~ 5725 MHz	7.78 dBm
		5725 ~ 5850 MHz	30.00 dBm
	802.11n/ac	5150 ~ 5250 MHz	27.79 dBm
		5250 ~ 5350 MHz	4.77 dBm
		5470 ~ 5725 MHz	4.77 dBm
		5725 ~ 5850 MHz	30.00 dBm
Radio B	802.11a	5150 ~ 5250 MHz	30.00 dBm
		5250 ~ 5350 MHz	9.98 dBm
		5470 ~ 5725 MHz	9.98 dBm
		5725 ~ 5850 MHz	30.00 dBm
	802.11n/ac	5150 ~ 5250 MHz	29.99 dBm
		5250 ~ 5350 MHz	6.97 dBm
		5470 ~ 5725 MHz	6.97 dBm
		5725 ~ 5850 MHz	30.00 dBm
Radio C	802.11a	5150 ~ 5250 MHz	29.00 dBm
		5250 ~ 5350 MHz	22.98 dBm
		5470 ~ 5725 MHz	22.98 dBm
		5725 ~ 5850 MHz	29.00 dBm
	802.11n/ac	5150 ~ 5250 MHz	25.99 dBm
		5250 ~ 5350 MHz	19.97 dBm
		5470 ~ 5725 MHz	19.97 dBm
		5725 ~ 5850 MHz	25.99 dBm

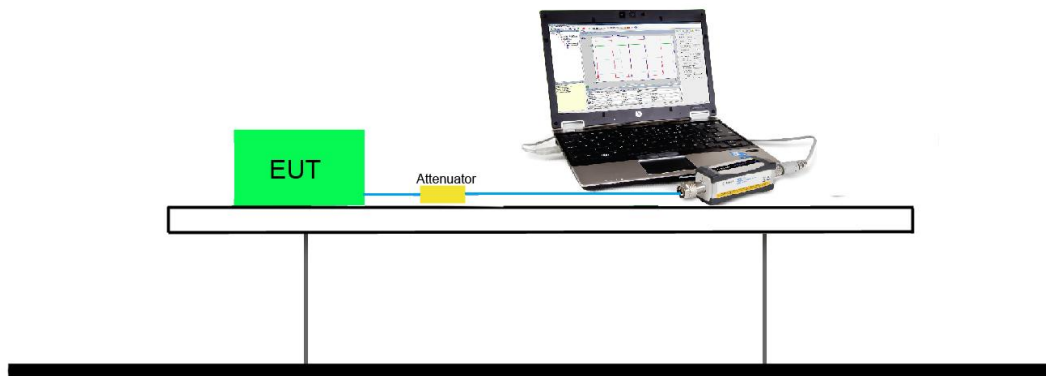
7.4.2.Test Procedure Used

KDB 789033 D02v01 - Section E) 3) b) Method PM-G

7.4.3.Test Setting

Average power measurements were performed only when the EUT was transmitting at its maximum power control level using a broadband power meter with a pulse sensor. The power meter implemented triggering and gating capabilities which were set up such that power measurements were recorded only during the ON time of the transmitter. The trace was averaged over 100 traces to obtain the final measured average power.

7.4.4. Test Setup



7.4.5. Test Result

Power output test was verified over all data rates of each mode shown as below, and then choose the maximum power output (yellow marker) for final test of each channel.

N _{Tx}	802.11a	MCS Index for 802.11n	Data Rate (Mbps)			
			20MHz Bandwidth		40MHz Bandwidth	
			800ns GI	400ns GI	800ns GI	400ns GI
2	6	8	13.0	14.4	27.0	30.0
2	9	9	26.0	28.9	54.0	60.0
2	12	10	39.0	43.3	81.0	90.0
2	18	11	52.0	57.8	108.0	120.0
2	24	12	78.0	86.7	162.0	180.0
2	36	13	104.0	115.6	216.0	240.0
2	48	14	117.0	130.0	243.0	270.0
2	54	15	130.0	144.0	270.0	300.0

N _{Tx}	MCS Index for 802.11ac	Data Rate (Mbps)							
		20MHz Bandwidth		40MHz Bandwidth		80MHz Bandwidth		160MHz Bandwidth	
		800ns GI	400ns GI	800ns GI	400ns GI	800ns GI	400ns GI	800ns GI	400ns GI
2	0	13.0	14.4	27.0	30.0	58.6	65.0	117.0	130.0
2	1	26.0	28.8	54.0	60.0	117.0	130.0	234.0	260.0
2	2	39.0	43.4	81.0	90.0	175.6	195.0	351.0	390.0
2	3	52.0	57.8	108.0	120.0	234.0	260.0	468.0	520.0
2	4	78.0	86.6	162.0	180.0	351.0	390.0	702.0	780.0
2	5	104.0	115.6	216.0	240.0	468.0	520.0	936.0	1040.0
2	6	117.0	130.0	243.0	270.0	526.6	585.0	1053.0	1170.0
2	7	130.0	144.4	270.0	300.0	585.0	650.0	1170.0	1300.0
2	8	156.0	173.4	324.0	360.0	702.0	780.0	1404.0	1560.0
2	9	--	--	360.0	400.0	780.0	866.6	1560.0	1733.4

Note: Power output test was verified over all data rates of each mode shown as above, and then choose the maximum power output (yellow marker) for final test of each channel.

Output power at various data rates for Ant 0 / Ant 0 + 1 (Radio A):

Test Mode	Bandwidth (MHz)	Channel	Frequency (MHz)	Data Rate (Mbps)	Average Power (dBm)
802.11a	20	60	5300	6	1.25
				24	1.16
				54	1.06
802.11n	20	60	5300	13.0	1.43
				52.0	1.03
				130.0	0.68
802.11n	40	62	5310	27.0	1.13
				108.0	0.89
				270.0	0.53
802.11ac	20	60	5300	13.0	1.52
				78.0	1.14
				156.0	0.86
802.11ac	40	62	5310	27.0	1.03
				216.0	0.68
				360.0	0.26
802.11ac	80	58	5290	58.6	1.03
				468.0	0.68
				780.0	0.43
802.11ac	160	50	5250	117.0	1.35
				702.0	1.13
				1560.0	1.02

For Radio A Output Power Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11a	6	36	5180	12.50	13.46	16.02	≤ 30.00	Pass
802.11a	6	44	5220	24.52	24.65	27.60	≤ 30.00	Pass
802.11a	6	48	5240	23.74	23.89	26.83	≤ 30.00	Pass
802.11a	6	52	5260	1.62	1.53	4.59	≤ 7.78	Pass
802.11a	6	60	5300	1.25	1.39	4.33	≤ 7.78	Pass
802.11a	6	64	5320	1.11	1.98	4.58	≤ 7.78	Pass
802.11a	6	100	5500	0.96	1.70	4.36	≤ 7.78	Pass
802.11a	6	120	5600	1.13	1.53	4.34	≤ 7.78	Pass
802.11a	6	140	5700	1.33	1.42	4.39	≤ 7.78	Pass
802.11a	6	149	5745	23.15	23.65	26.42	≤ 30.00	Pass
802.11a	6	157	5785	23.32	24.43	26.92	≤ 30.00	Pass
802.11a	6	165	5825	23.37	24.49	26.98	≤ 30.00	Pass
802.11n-HT20	13	36	5180	11.82	12.74	15.31	≤ 27.79	Pass
802.11n-HT20	13	44	5220	24.42	24.50	27.47	≤ 27.79	Pass
802.11n-HT20	13	48	5240	23.58	23.84	26.72	≤ 27.79	Pass
802.11n-HT20	13	52	5260	1.32	1.85	4.60	≤ 4.77	Pass
802.11n-HT20	13	60	5300	1.43	1.55	4.50	≤ 4.77	Pass
802.11n-HT20	13	64	5320	1.26	2.03	4.67	≤ 4.77	Pass
802.11n-HT20	13	100	5500	1.15	1.44	4.31	≤ 4.47	Pass
802.11n-HT20	13	120	5600	1.11	1.34	4.24	≤ 4.47	Pass
802.11n-HT20	13	140	5700	1.03	1.64	4.36	≤ 4.47	Pass
802.11n-HT20	13	149	5745	22.85	23.56	26.23	≤ 30.00	Pass
802.11n-HT20	13	157	5785	23.14	24.41	26.83	≤ 30.00	Pass
802.11n-HT20	13	165	5825	23.32	24.30	26.85	≤ 30.00	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11n-HT40	27	38	5190	9.32	9.45	12.40	≤ 27.79	Pass
802.11n-HT40	27	46	5230	24.27	24.29	27.29	≤ 27.79	Pass
802.11n-HT40	27	54	5270	1.01	1.63	4.34	≤ 4.77	Pass
802.11n-HT40	27	62	5310	1.13	1.81	4.49	≤ 4.77	Pass
802.11n-HT40	27	102	5510	1.29	1.55	4.43	≤ 4.47	Pass
802.11n-HT40	27	118	5590	0.99	1.54	4.28	≤ 4.47	Pass
802.11n-HT40	27	134	5670	1.24	1.62	4.44	≤ 4.47	Pass
802.11n-HT40	27	151	5755	20.11	21.19	23.69	≤ 30.00	Pass
802.11n-HT40	27	159	5795	20.08	21.17	23.67	≤ 30.00	Pass
802.11ac-VHT20	13	36	5180	11.80	12.80	15.34	≤ 27.79	Pass
802.11ac-VHT20	13	44	5220	24.57	24.35	27.47	≤ 27.79	Pass
802.11ac-VHT20	13	48	5240	23.57	23.84	26.72	≤ 27.79	Pass
802.11ac-VHT20	13	52	5260	1.11	1.66	4.40	≤ 4.77	Pass
802.11ac-VHT20	13	60	5300	1.52	1.66	4.60	≤ 4.77	Pass
802.11ac-VHT20	13	64	5320	1.29	2.02	4.68	≤ 4.77	Pass
802.11ac-VHT20	13	100	5500	1.02	1.66	4.36	≤ 4.47	Pass
802.11ac-VHT20	13	120	5600	0.78	1.64	4.24	≤ 4.47	Pass
802.11ac-VHT20	13	140	5700	0.97	1.66	4.34	≤ 4.47	Pass
802.11ac-VHT20	13	144	5720	0.88	1.69	4.31	≤ 4.47	Pass
802.11ac-VHT20	13	149	5745	22.84	23.58	26.24	≤ 30.00	Pass
802.11ac-VHT20	13	157	5785	23.14	24.39	26.82	≤ 30.00	Pass
802.11ac-VHT20	13	165	5825	23.24	23.14	26.20	≤ 30.00	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11ac-VHT40	27	38	5190	9.11	9.76	12.46	≤ 27.79	Pass
802.11ac-VHT40	27	46	5230	24.21	24.33	27.28	≤ 27.79	Pass
802.11ac-VHT40	27	54	5270	1.16	1.76	4.48	≤ 4.77	Pass
802.11ac-VHT40	27	62	5310	1.03	2.14	4.63	≤ 4.77	Pass
802.11ac-VHT40	27	102	5510	1.03	1.45	4.26	≤ 4.47	Pass
802.11ac-VHT40	27	118	5590	1.03	1.58	4.32	≤ 4.47	Pass
802.11ac-VHT40	27	134	5670	1.11	1.53	4.34	≤ 4.47	Pass
802.11ac-VHT40	27	142	5710	0.96	1.86	4.44	≤ 4.47	Pass
802.11ac-VHT40	27	151	5755	19.94	21.17	23.61	≤ 30.00	Pass
802.11ac-VHT40	27	159	5795	22.13	22.95	25.57	≤ 30.00	Pass
802.11ac-VHT80	58.6	42	5210	8.93	9.31	12.13	≤ 27.79	Pass
802.11ac-VHT80	58.6	58	5290	1.03	1.86	4.48	≤ 4.77	Pass
802.11ac-VHT80	58.6	106	5530	1.03	1.65	4.36	≤ 4.47	Pass
802.11ac-VHT80	58.6	122	5610	0.86	1.69	4.31	≤ 4.47	Pass
802.11ac-VHT80	58.6	138	5690	1.24	1.47	4.37	≤ 4.47	Pass
802.11ac-VHT80	58.6	155	5775	14.89	15.90	18.43	≤ 30.00	Pass
802.11ac-VHT160	117	50	5250	1.35	1.05	4.21	≤ 4.77	Pass
802.11ac-VHT160	117	114	5570	0.86	1.15	4.02	≤ 4.77	Pass

Note: The Total Average Power (dBm) = $10 \cdot \log\{10^{(\text{Ant 0 Average Power} / 10)} + 10^{(\text{Ant 1 Average Power} / 10)}\}$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
11ac-VHT 80+80	29.3	42	5210	6.78	--	6.78	≤ 30.00	Pass
	29.3	58	5290	--	6.24	6.24	≤ 7.78	Pass
11ac-VHT 80+80	29.3	42	5210	6.82	--	6.82	≤ 30.00	Pass
	29.3	106	5530	--	6.08	6.08	≤ 7.78	Pass
11ac-VHT 80+80	29.3	58	5210	7.37	--	7.37	≤ 30.00	Pass
	29.3	122	5610	--	6.22	6.22	≤ 7.78	Pass
11ac-VHT 80+80	29.3	58	5210	6.82	--	6.82	≤ 30.00	Pass
	29.3	138	5690	--	6.07	6.07	≤ 7.78	Pass
11ac-VHT 80+80	29.3	42	5210	10.46	--	10.46	≤ 30.00	Pass
	29.3	155	5775	--	8.65	8.65	≤ 30.00	Pass
11ac-VHT 80+80	29.3	58	5290	6.28	--	8.28	≤ 7.78	Pass
	29.3	106	5530	--	5.51	5.51	≤ 7.78	Pass
11ac-VHT 80+80	29.3	58	5290	6.30	--	6.30	≤ 7.78	Pass
	29.3	122	5610	--	5.02	5.02	≤ 7.78	Pass
11ac-VHT 80+80	29.3	58	5290	6.32	--	6.32	≤ 7.78	Pass
	29.3	138	5690	--	5.37	5.37	≤ 7.78	Pass
11ac-VHT 80+80	29.3	58	5290	6.29	--	6.29	≤ 7.78	Pass
	29.3	155	5775	--	5.22	5.22	≤ 30.00	Pass
11ac-VHT 80+80	29.3	106	5530	5.04	--	5.04	≤ 7.78	Pass
	29.3	122	5610	--	5.96	5.94	≤ 7.78	Pass
11ac-VHT 80+80	29.3	106	5530	5.48	--	5.48	≤ 7.78	Pass
	29.3	138	5690	--	6.27	6.27	≤ 7.78	Pass
11ac-VHT 80+80	29.3	106	5530	6.08	--	6.08	≤ 7.78	Pass
	29.3	155	5775	--	6.25	6.25	≤ 30.00	Pass
11ac-VHT 80+80	29.3	122	5610	5.98	--	5.98	≤ 7.78	Pass
	29.3	138	5690	--	5.86	5.86	≤ 7.78	Pass
11ac-VHT 80+80	29.3	122	5610	6.11	--	6.11	≤ 7.78	Pass
	29.3	155	5775	--	5.24	5.24	≤ 30.00	Pass
11ac-VHT 80+80	29.3	138	5690	6.07	--	6.07	≤ 7.78	Pass
	29.3	155	5775	--	5.19	5.19	≤ 30.00	Pass

For Radio B Output Power Test Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11a	6	36	5180	15.46	16.08	18.79	≤ 30.00	Pass
802.11a	6	44	5220	24.81	25.56	28.21	≤ 30.00	Pass
802.11a	6	48	5240	25.01	25.52	28.28	≤ 30.00	Pass
802.11a	6	52	5260	2.90	3.11	6.02	≤ 9.98	Pass
802.11a	6	60	5300	3.12	3.55	6.35	≤ 9.98	Pass
802.11a	6	64	5320	2.59	3.73	6.21	≤ 9.98	Pass
802.11a	6	100	5500	2.13	2.75	5.46	≤ 9.98	Pass
802.11a	6	120	5600	1.73	1.85	4.80	≤ 9.98	Pass
802.11a	6	140	5700	2.02	2.21	5.13	≤ 9.98	Pass
802.11a	6	149	5745	24.45	23.95	27.22	≤ 30.00	Pass
802.11a	6	157	5785	24.22	24.11	27.18	≤ 30.00	Pass
802.11a	6	165	5825	24.29	23.91	27.11	≤ 30.00	Pass
802.11n-HT20	13	36	5180	17.18	17.61	20.41	≤ 29.99	Pass
802.11n-HT20	13	44	5220	22.86	23.57	26.24	≤ 29.99	Pass
802.11n-HT20	13	48	5240	22.97	23.01	26.00	≤ 29.99	Pass
802.11n-HT20	13	52	5260	2.90	3.54	6.24	≤ 6.97	Pass
802.11n-HT20	13	60	5300	3.22	3.55	6.40	≤ 6.97	Pass
802.11n-HT20	13	64	5320	3.06	3.62	6.36	≤ 6.97	Pass
802.11n-HT20	13	100	5500	2.44	2.86	5.67	≤ 6.97	Pass
802.11n-HT20	13	120	5600	2.01	2.03	5.03	≤ 6.97	Pass
802.11n-HT20	13	140	5700	3.76	3.89	6.84	≤ 6.97	Pass
802.11n-HT20	13	149	5745	24.35	23.93	27.16	≤ 30.00	Pass
802.11n-HT20	13	157	5785	23.97	24.04	27.02	≤ 30.00	Pass
802.11n-HT20	13	165	5825	25.24	24.11	27.72	≤ 30.00	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11n-HT40	27	38	5190	12.64	13.76	16.25	≤ 29.99	Pass
802.11n-HT40	27	46	5230	24.52	25.34	27.96	≤ 29.99	Pass
802.11n-HT40	27	54	5270	3.56	3.79	6.69	≤ 6.97	Pass
802.11n-HT40	27	62	5310	3.61	3.81	6.72	≤ 6.97	Pass
802.11n-HT40	27	102	5510	3.67	3.54	6.62	≤ 6.97	Pass
802.11n-HT40	27	118	5590	3.42	3.64	6.54	≤ 6.97	Pass
802.11n-HT40	27	134	5670	3.38	3.59	6.50	≤ 6.97	Pass
802.11n-HT40	27	151	5755	24.18	23.86	27.03	≤ 30.00	Pass
802.11n-HT40	27	159	5795	24.41	24.22	27.33	≤ 30.00	Pass
802.11ac-VHT20	13	36	5180	14.23	15.26	17.79	≤ 29.99	Pass
802.11ac-VHT20	13	44	5220	24.75	25.67	28.24	≤ 29.99	Pass
802.11ac-VHT20	13	48	5240	24.92	25.36	28.16	≤ 29.99	Pass
802.11ac-VHT20	13	52	5260	3.57	3.89	6.74	≤ 6.97	Pass
802.11ac-VHT20	13	60	5300	3.82	3.39	6.62	≤ 6.97	Pass
802.11ac-VHT20	13	64	5320	3.75	3.49	6.63	≤ 6.97	Pass
802.11ac-VHT20	13	100	5500	2.69	2.78	5.75	≤ 6.97	Pass
802.11ac-VHT20	13	120	5600	2.72	2.63	5.69	≤ 6.97	Pass
802.11ac-VHT20	13	140	5700	2.01	2.22	5.13	≤ 6.97	Pass
802.11ac-VHT20	13	144	5720	2.02	2.13	5.09	≤ 6.97	Pass
802.11ac-VHT20	13	149	5745	24.32	23.95	27.15	≤ 30.00	Pass
802.11ac-VHT20	13	157	5785	24.16	24.06	27.12	≤ 30.00	Pass
802.11ac-VHT20	13	165	5825	24.06	24.13	27.11	≤ 30.00	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11ac-VHT40	27	38	5190	12.67	13.51	16.12	≤ 29.99	Pass
802.11ac-VHT40	27	46	5230	24.97	25.55	28.28	≤ 29.99	Pass
802.11ac-VHT40	27	54	5270	3.70	3.56	6.64	≤ 6.97	Pass
802.11ac-VHT40	27	62	5310	3.87	3.46	6.68	≤ 6.97	Pass
802.11ac-VHT40	27	102	5510	3.56	3.44	6.51	≤ 6.97	Pass
802.11ac-VHT40	27	118	5590	3.43	3.29	6.37	≤ 6.97	Pass
802.11ac-VHT40	27	134	5670	3.26	3.46	6.37	≤ 6.97	Pass
802.11ac-VHT40	27	142	5710	3.61	3.28	6.46	≤ 6.97	Pass
802.11ac-VHT40	27	151	5755	24.75	24.16	27.48	≤ 30.00	Pass
802.11ac-VHT40	27	159	5795	24.37	24.18	27.29	≤ 30.00	Pass
802.11ac-VHT80	58.6	42	5210	13.41	14.55	17.03	≤ 29.99	Pass
802.11ac-VHT80	58.6	58	5290	3.46	4.03	6.76	≤ 6.97	Pass
802.11ac-VHT80	58.6	106	5530	3.58	3.77	6.69	≤ 6.97	Pass
802.11ac-VHT80	58.6	122	5610	3.44	3.69	6.58	≤ 6.97	Pass
802.11ac-VHT80	58.6	138	5690	3.61	3.54	6.59	≤ 6.97	Pass
802.11ac-VHT80	58.6	155	5775	20.31	20.14	23.24	≤ 30.00	Pass
802.11ac-VHT160	117	50	5250	3.42	3.68	6.56	≤ 6.97	Pass
802.11ac-VHT160	117	114	5570	3.54	2.80	6.20	≤ 6.97	Pass

Note: The Total Average Power (dBm) = $10 \cdot \log\{10^{(\text{Ant 0 Average Power} / 10)} + 10^{(\text{Ant 1 Average Power} / 10)}\}$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
11ac-VHT 80+80	29.3	42	5210	9.52	--	9.52	≤ 30.00	Pass
	29.3	58	5290	--	8.69	8.69	≤ 9.98	Pass
11ac-VHT 80+80	29.3	42	5210	9.96	--	9.96	≤ 30.00	Pass
	29.3	106	5530	--	8.82	8.82	≤ 9.98	Pass
11ac-VHT 80+80	29.3	58	5210	10.46	--	10.46	≤ 30.00	Pass
	29.3	122	5610	--	8.47	8.47	≤ 9.98	Pass
11ac-VHT 80+80	29.3	58	5210	10.54	--	10.54	≤ 30.00	Pass
	29.3	138	5690	--	8.79	8.79	≤ 9.98	Pass
11ac-VHT 80+80	29.3	42	5210	15.32	--	15.32	≤ 30.00	Pass
	29.3	155	5775	--	13.98	13.98	≤ 30.00	Pass
11ac-VHT 80+80	29.3	58	5290	8.65	--	8.65	≤ 9.98	Pass
	29.3	106	5530	--	6.72	6.72	≤ 9.98	Pass
11ac-VHT 80+80	29.3	58	5290	8.55	--	8.55	≤ 9.98	Pass
	29.3	122	5610	--	5.90	5.90	≤ 9.98	Pass
11ac-VHT 80+80	29.3	58	5290	8.58	--	8.58	≤ 9.98	Pass
	29.3	138	5690	--	6.35	6.35	≤ 9.98	Pass
11ac-VHT 80+80	29.3	58	5290	8.63	--	8.63	≤ 9.98	Pass
	29.3	155	5775	--	6.85	6.85	≤ 30.00	Pass
11ac-VHT 80+80	29.3	106	5530	7.48	--	7.48	≤ 9.98	Pass
	29.3	122	5610	--	8.51	8.51	≤ 9.98	Pass
11ac-VHT 80+80	29.3	106	5530	7.49	--	7.49	≤ 9.98	Pass
	29.3	138	5690	--	8.62	8.62	≤ 9.98	Pass
11ac-VHT 80+80	29.3	106	5530	8.52	--	8.52	≤ 9.98	Pass
	29.3	155	5775	--	9.74	9.74	≤ 30.00	Pass
11ac-VHT 80+80	29.3	122	5610	8.77	--	8.77	≤ 9.98	Pass
	29.3	138	5690	--	8.62	8.62	≤ 9.98	Pass
11ac-VHT 80+80	29.3	122	5610	8.76	--	8.76	≤ 9.98	Pass
	29.3	155	5775	--	8.48	8.48	≤ 30.00	Pass
11ac-VHT 80+80	29.3	138	5690	8.80	--	8.80	≤ 9.98	Pass
	29.3	155	5775	--	8.61	8.61	≤ 30.00	Pass

For Radio C Output Power Test Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11a	6	36	5180	21.83	21.91	24.88	≤ 29.00	Pass
802.11a	6	44	5220	22.06	21.75	24.92	≤ 29.00	Pass
802.11a	6	48	5240	21.22	21.33	24.29	≤ 29.00	Pass
802.11a	6	52	5260	15.23	15.36	18.31	≤ 22.98	Pass
802.11a	6	60	5300	15.12	15.24	18.19	≤ 22.98	Pass
802.11a	6	64	5320	15.31	15.19	18.26	≤ 22.98	Pass
802.11a	6	100	5500	15.15	15.35	18.26	≤ 22.98	Pass
802.11a	6	120	5600	15.32	15.52	18.43	≤ 22.98	Pass
802.11a	6	140	5700	15.22	15.63	18.44	≤ 22.98	Pass
802.11a	6	149	5745	22.41	22.19	25.31	≤ 29.00	Pass
802.11a	6	157	5785	21.61	22.03	24.84	≤ 29.00	Pass
802.11a	6	165	5825	20.82	21.49	24.18	≤ 29.00	Pass
802.11n-HT20	13	36	5180	22.06	22.16	25.12	≤ 25.99	Pass
802.11n-HT20	13	44	5220	22.03	22.16	25.11	≤ 25.99	Pass
802.11n-HT20	13	48	5240	22.08	22.32	25.21	≤ 25.99	Pass
802.11n-HT20	13	52	5260	16.06	16.18	19.13	≤ 19.97	Pass
802.11n-HT20	13	60	5300	16.11	16.26	19.20	≤ 19.97	Pass
802.11n-HT20	13	64	5320	16.22	16.38	19.31	≤ 19.97	Pass
802.11n-HT20	13	100	5500	16.05	16.42	19.25	≤ 19.97	Pass
802.11n-HT20	13	120	5600	15.71	15.84	18.79	≤ 19.97	Pass
802.11n-HT20	13	140	5700	15.86	15.87	18.88	≤ 19.97	Pass
802.11n-HT20	13	149	5745	22.26	22.07	25.18	≤ 25.99	Pass
802.11n-HT20	13	157	5785	21.58	21.95	24.78	≤ 25.99	Pass
802.11n-HT20	13	165	5825	20.78	21.43	24.13	≤ 25.99	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11n-HT40	27	38	5190	17.29	17.28	20.30	≤ 25.99	Pass
802.11n-HT40	27	46	5230	22.25	22.35	25.31	≤ 25.99	Pass
802.11n-HT40	27	54	5270	16.16	16.53	19.36	≤ 19.97	Pass
802.11n-HT40	27	62	5310	16.14	16.62	19.40	≤ 19.97	Pass
802.11n-HT40	27	102	5510	16.61	16.08	19.36	≤ 19.97	Pass
802.11n-HT40	27	118	5590	16.42	16.33	19.39	≤ 19.97	Pass
802.11n-HT40	27	134	5670	16.61	16.59	19.61	≤ 19.97	Pass
802.11n-HT40	27	151	5755	22.13	22.01	25.08	≤ 25.99	Pass
802.11n-HT40	27	159	5795	21.28	21.86	24.59	≤ 25.99	Pass
802.11ac-VHT20	13	36	5180	21.55	21.59	24.58	≤ 25.99	Pass
802.11ac-VHT20	13	44	5220	22.53	22.63	25.59	≤ 25.99	Pass
802.11ac-VHT20	13	48	5240	22.46	22.61	25.55	≤ 25.99	Pass
802.11ac-VHT20	13	52	5260	16.35	16.42	19.40	≤ 19.97	Pass
802.11ac-VHT20	13	60	5300	16.22	16.39	19.32	≤ 19.97	Pass
802.11ac-VHT20	13	64	5320	16.19	16.42	19.32	≤ 19.97	Pass
802.11ac-VHT20	13	100	5500	16.11	16.35	19.24	≤ 19.97	Pass
802.11ac-VHT20	13	120	5600	15.98	16.02	19.01	≤ 19.97	Pass
802.11ac-VHT20	13	140	5700	16.03	16.32	19.19	≤ 19.97	Pass
802.11ac-VHT20	13	144	5720	15.96	16.03	19.01	≤ 19.97	Pass
802.11ac-VHT20	13	149	5745	22.25	22.02	25.15	≤ 25.99	Pass
802.11ac-VHT20	13	157	5785	21.58	21.93	24.77	≤ 25.99	Pass
802.11ac-VHT20	13	165	5825	20.73	21.39	24.08	≤ 25.99	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
802.11ac-VHT40	27	38	5190	17.31	17.25	20.29	≤ 25.99	Pass
802.11ac-VHT40	27	46	5230	22.63	22.48	25.57	≤ 25.99	Pass
802.11ac-VHT40	27	54	5270	16.38	16.42	19.41	≤ 19.97	Pass
802.11ac-VHT40	27	62	5310	16.42	16.59	19.52	≤ 19.97	Pass
802.11ac-VHT40	27	102	5510	16.59	16.12	19.37	≤ 19.97	Pass
802.11ac-VHT40	27	118	5590	16.44	16.03	19.25	≤ 19.97	Pass
802.11ac-VHT40	27	134	5670	16.38	16.15	19.28	≤ 19.97	Pass
802.11ac-VHT40	27	142	5710	16.42	16.28	19.36	≤ 19.97	Pass
802.11ac-VHT40	27	151	5755	22.12	22.06	25.10	≤ 25.99	Pass
802.11ac-VHT40	27	159	5795	21.23	21.91	24.59	≤ 25.99	Pass
802.11ac-VHT80	58.6	42	5210	15.66	15.61	18.65	≤ 25.99	Pass
802.11ac-VHT80	58.6	58	5290	16.37	16.69	19.54	≤ 19.97	Pass
802.11ac-VHT80	58.6	106	5530	15.21	14.87	18.05	≤ 19.97	Pass
802.11ac-VHT80	58.6	122	5610	16.28	16.69	19.50	≤ 19.97	Pass
802.11ac-VHT80	58.6	138	5690	16.35	16.71	19.54	≤ 19.97	Pass
802.11ac-VHT80	58.6	155	5775	19.49	19.55	22.53	≤ 25.99	Pass
802.11ac-VHT160	117	50	5250	16.23	16.42	19.34	≤ 19.97	Pass
802.11ac-VHT160	117	114	5570	16.41	16.13	19.28	≤ 19.97	Pass

Note: The Total Average Power (dBm) = $10 \cdot \log\{10^{(\text{Ant 0 Average Power} / 10)} + 10^{(\text{Ant 1 Average Power} / 10)}\}$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 Average Power (dBm)	Ant 1 Average Power (dBm)	Total Average Power (dBm)	Average Power Limit (dBm)	Result
11ac-VHT 80+80	29.3	42	5210	13.41	--	13.41	≤ 29.00	Pass
	29.3	58	5290	--	13.86	13.86	≤ 22.98	Pass
11ac-VHT 80+80	29.3	42	5210	13.48	--	13.48	≤ 29.00	Pass
	29.3	106	5530	--	12.77	12.77	≤ 22.98	Pass
11ac-VHT 80+80	29.3	58	5210	13.52	--	13.52	≤ 29.00	Pass
	29.3	122	5610	--	12.53	12.53	≤ 22.98	Pass
11ac-VHT 80+80	29.3	58	5210	13.58	--	13.58	≤ 29.00	Pass
	29.3	138	5690	--	12.22	12.22	≤ 22.98	Pass
11ac-VHT 80+80	29.3	42	5210	13.53	--	13.53	≤ 29.00	Pass
	29.3	155	5775	--	13.32	13.32	≤ 29.00	Pass
11ac-VHT 80+80	29.3	58	5290	20.15	--	20.15	≤ 22.98	Pass
	29.3	106	5530	--	19.04	19.04	≤ 22.98	Pass
11ac-VHT 80+80	29.3	58	5290	22.22	--	22.22	≤ 22.98	Pass
	29.3	122	5610	--	20.88	20.88	≤ 22.98	Pass
11ac-VHT 80+80	29.3	58	5290	22.25	--	22.25	≤ 22.98	Pass
	29.3	138	5690	--	20.46	20.46	≤ 22.98	Pass
11ac-VHT 80+80	29.3	58	5290	20.19	--	20.19	≤ 22.98	Pass
	29.3	155	5775	--	18.50	18.50	≤ 29.00	Pass
11ac-VHT 80+80	29.3	106	5530	18.65	--	18.65	≤ 22.98	Pass
	29.3	122	5610	--	18.15	18.15	≤ 22.98	Pass
11ac-VHT 80+80	29.3	106	5530	19.11	--	19.11	≤ 22.98	Pass
	29.3	138	5690	--	18.44	18.44	≤ 22.98	Pass
11ac-VHT 80+80	29.3	106	5530	19.14	--	19.14	≤ 22.98	Pass
	29.3	155	5775	--	18.49	18.49	≤ 29.00	Pass
11ac-VHT 80+80	29.3	122	5610	22.39	--	22.39	≤ 22.98	Pass
	29.3	138	5690	--	22.02	22.02	≤ 22.98	Pass
11ac-VHT 80+80	29.3	122	5610	20.84	--	20.84	≤ 22.98	Pass
	29.3	155	5775	--	20.44	20.44	≤ 29.00	Pass
11ac-VHT 80+80	29.3	138	5690	20.42	--	20.42	≤ 22.98	Pass
	29.3	155	5775	--	20.53	20.53	≤ 29.00	Pass

7.5. Transmit Power Control

7.5.1. Test Limit

The U-NII device is required to have the capability to operate at least 6 dB below the mean EIRP value of 30 dBm.

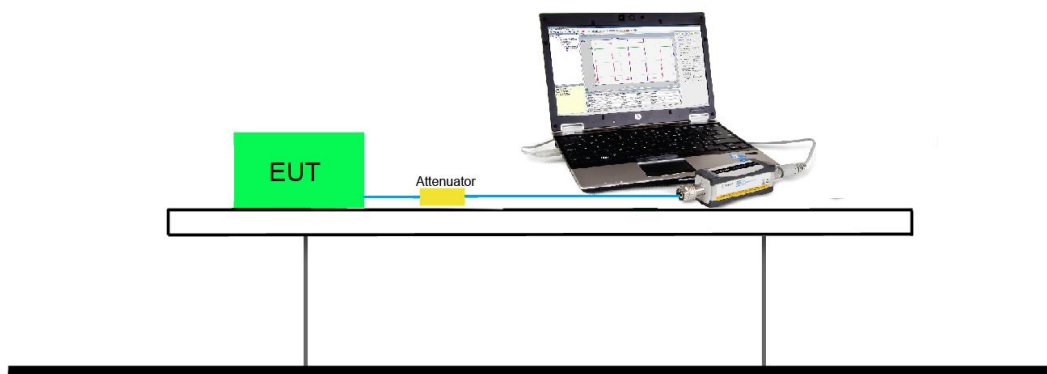
7.5.2. Test Procedure Used

KDB 789033 D02v01 - Section E) 3) b) Method PM-G

7.5.3. Test Setting

Average power measurements were performed only when the EUT was transmitting at its maximum power control level using a broadband power meter with a pulse sensor. The power meter implemented triggering and gating capabilities which were set up such that power measurements were recorded only during the ON time of the transmitter. The trace was averaged over 100 traces to obtain the final measured average power.

7.5.4. Test Setup



7.5.5.Test Result

For Radio A Transmit Power Control Test Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
802.11a	6	52	5260	-4.52	-4.35	23.79	≤ 24	Pass
802.11a	6	60	5300	-4.75	-4.46	23.62	≤ 24	Pass
802.11a	6	64	5320	-4.82	-4.24	23.70	≤ 24	Pass
802.11a	6	100	5500	-5.03	-4.53	23.75	≤ 24	Pass
802.11a	6	120	5600	-4.83	-4.69	23.76	≤ 24	Pass
802.11a	6	140	5700	-4.98	-4.78	23.64	≤ 24	Pass
802.11n-HT20	13	52	5260	-4.81	-4.36	23.64	≤ 24	Pass
802.11n-HT20	13	60	5300	-4.69	-4.62	23.57	≤ 24	Pass
802.11n-HT20	13	64	5320	-4.75	-4.24	23.73	≤ 24	Pass
802.11n-HT20	13	100	5500	-4.85	-4.63	23.78	≤ 24	Pass
802.11n-HT20	13	120	5600	-4.91	-4.59	23.77	≤ 24	Pass
802.11n-HT20	13	140	5700	-4.92	-4.38	23.88	≤ 24	Pass
802.11n-HT40	27	54	5270	-4.95	-4.35	23.58	≤ 24	Pass
802.11n-HT40	27	62	5310	-4.89	-4.35	23.61	≤ 24	Pass
802.11n-HT40	27	102	5510	-4.75	-4.62	23.84	≤ 24	Pass
802.11n-HT40	27	118	5590	-5.03	-4.68	23.67	≤ 24	Pass
802.11n-HT40	27	134	5670	-4.81	-4.62	23.81	≤ 24	Pass
802.11ac-VHT20	13	52	5260	-4.98	-4.65	23.41	≤ 24	Pass
802.11ac-VHT20	13	60	5300	-4.79	-4.88	23.39	≤ 24	Pass
802.11ac-VHT20	13	64	5320	-4.82	-4.24	23.70	≤ 24	Pass
802.11ac-VHT20	13	100	5500	-4.96	-4.41	23.84	≤ 24	Pass
802.11ac-VHT20	13	120	5600	-5.03	-4.54	23.74	≤ 24	Pass
802.11ac-VHT20	13	140	5700	-4.96	-4.39	23.85	≤ 24	Pass
802.11ac-VHT20	13	144	5720	-4.63	-4.74	23.84	≤ 24	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
802.11ac-VHT40	27	54	5270	-4.75	-4.39	23.65	≤ 24	Pass
802.11ac-VHT40	27	62	5310	-4.86	-4.26	23.67	≤ 24	Pass
802.11ac-VHT40	27	102	5510	-4.86	-4.63	23.78	≤ 24	Pass
802.11ac-VHT40	27	118	5590	-4.92	-4.35	23.89	≤ 24	Pass
802.11ac-VHT40	27	134	5670	-4.91	-4.49	23.83	≤ 24	Pass
802.11ac-VHT40	27	142	5710	-5.03	-4.72	23.65	≤ 24	Pass
802.11ac-VHT80	58.6	58	5290	-4.85	-4.63	23.48	≤ 24	Pass
802.11ac-VHT80	58.6	106	5530	-5.03	-4.68	23.67	≤ 24	Pass
802.11ac-VHT80	58.6	122	5610	-5.03	-4.43	23.80	≤ 24	Pass
802.11ac-VHT80	58.6	138	5690	-4.85	-4.74	23.73	≤ 24	Pass
802.11ac-VHT160	117	50	5250	-4.52	-4.62	23.65	≤ 24	Pass
802.11ac-VHT160	117	114	5570	-4.36	-4.71	23.99	≤ 24	Pass

Note: Total EIRP TPC Power (dBm) = $10 \cdot \log\{10^{(\text{Ant 0 TPC Power} / 10)} + 10^{(\text{Ant 1 TPC Power} / 10)}\} + \text{Directional Antenna Gain (dBi)}$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	58	5290	--	-1.46	23.75	≤ 24	Pass
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	106	5530	--	-1.84	23.67	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5210	--	--	--	≤ 24	Pass
	29.3	122	5610	--	-1.78	23.73	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5210	--	--	--	≤ 24	Pass
	29.3	138	5690	--	-1.74	23.77	≤ 24	Pass
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	-1.53	--	23.68	≤ 24	Pass
	29.3	106	5530	--	-1.86	23.65	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	-1.59	--	23.62	≤ 24	Pass
	29.3	122	5610	--	-1.79	23.72	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	-1.69	--	23.52	≤ 24	Pass
	29.3	138	5690	--	-1.86	23.65	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	-1.68	--	23.53	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	-1.96	--	23.55	≤ 24	Pass
	29.3	122	5610	--	-1.84	23.67	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	-1.69	--	23.82	≤ 24	Pass
	29.3	138	5690	--	-1.81	23.70	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	-1.84	--	23.67	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	122	5610	-1.69	--	23.82	≤ 24	Pass
	29.3	138	5690	--	-1.84	23.67	≤ 24	Pass
11ac-VHT 80+80	29.3	122	5610	-1.81	--	23.70	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	138	5690	-1.63	--	23.88	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass

For Radio B Transmit Power Control Test Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
802.11a	6	52	5260	-2.59	-2.91	23.27	≤ 24	Pass
802.11a	6	60	5300	-2.86	-2.55	23.32	≤ 24	Pass
802.11a	6	64	5320	-2.49	-2.35	23.60	≤ 24	Pass
802.11a	6	100	5500	-3.24	-2.86	22.97	≤ 24	Pass
802.11a	6	120	5600	-2.86	-3.24	22.97	≤ 24	Pass
802.11a	6	140	5700	-3.25	-3.62	22.59	≤ 24	Pass
802.11n-HT20	13	52	5260	-3.06	-2.86	23.06	≤ 24	Pass
802.11n-HT20	13	60	5300	-2.86	-2.54	23.32	≤ 24	Pass
802.11n-HT20	13	64	5320	-2.96	-2.42	23.34	≤ 24	Pass
802.11n-HT20	13	100	5500	-3.16	-3.24	22.82	≤ 24	Pass
802.11n-HT20	13	120	5600	-3.75	-3.68	22.31	≤ 24	Pass
802.11n-HT20	13	140	5700	-2.35	-2.24	23.73	≤ 24	Pass
802.11n-HT40	27	54	5270	-2.45	-2.23	23.68	≤ 24	Pass
802.11n-HT40	27	62	5310	-2.49	-2.35	23.60	≤ 24	Pass
802.11n-HT40	27	102	5510	-2.39	-2.49	23.58	≤ 24	Pass
802.11n-HT40	27	118	5590	-2.68	-2.48	23.44	≤ 24	Pass
802.11n-HT40	27	134	5670	-2.71	-2.48	23.43	≤ 24	Pass
802.11ac-VHT20	13	52	5260	-2.46	-2.31	23.64	≤ 24	Pass
802.11ac-VHT20	13	60	5300	-2.48	-2.68	23.44	≤ 24	Pass
802.11ac-VHT20	13	64	5320	-2.46	-2.74	23.42	≤ 24	Pass
802.11ac-VHT20	13	100	5500	-3.41	-3.64	22.50	≤ 24	Pass
802.11ac-VHT20	13	120	5600	-3.39	-3.69	22.48	≤ 24	Pass
802.11ac-VHT20	13	140	5700	-3.86	-3.74	22.22	≤ 24	Pass
802.11ac-VHT20	13	144	5720	-3.89	-3.68	22.24	≤ 24	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
802.11ac-VHT40	27	54	5270	-2.48	-2.96	23.31	≤ 24	Pass
802.11ac-VHT40	27	62	5310	-2.35	-2.66	23.52	≤ 24	Pass
802.11ac-VHT40	27	102	5510	-2.84	-2.64	23.28	≤ 24	Pass
802.11ac-VHT40	27	118	5590	-2.58	-2.69	23.39	≤ 24	Pass
802.11ac-VHT40	27	134	5670	-2.86	-2.48	23.35	≤ 24	Pass
802.11ac-VHT40	27	142	5710	-2.43	-2.91	23.36	≤ 24	Pass
802.11ac-VHT80	58.6	58	5290	-2.68	-2.31	23.53	≤ 24	Pass
802.11ac-VHT80	58.6	106	5530	-2.45	-2.35	23.62	≤ 24	Pass
802.11ac-VHT80	58.6	122	5610	-2.66	-2.61	23.39	≤ 24	Pass
802.11ac-VHT80	58.6	138	5690	-2.48	-2.43	23.57	≤ 24	Pass
802.11ac-VHT160	117	50	5250	-2.62	-2.84	23.29	≤ 24	Pass
802.11ac-VHT160	117	114	5570	-2.56	-2.68	23.40	≤ 24	Pass

Note: Total EIRP TPC Power (dBm) = $10 \cdot \log\{10^{(\text{Ant 0 TPC Power} / 10)} + 10^{(\text{Ant 1 TPC Power} / 10)}\} + \text{Directional Antenna Gain (dBi)}$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	58	5290	--	0.68	23.69	≤ 24	Pass
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	106	5530	--	0.48	23.49	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5210	--	--	--	≤ 24	Pass
	29.3	122	5610	--	0.65	23.66	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5210	--	--	--	≤ 24	Pass
	29.3	138	5690	--	0.71	23.72	≤ 24	Pass
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	0.56	--	23.57	≤ 24	Pass
	29.3	106	5530	--	0.48	23.49	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	0.39	--	23.40	≤ 24	Pass
	29.3	122	5610	--	0.55	23.56	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	0.58	--	23.59	≤ 24	Pass
	29.3	138	5690	--	0.66	23.67	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	0.59	--	23.60	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	0.48	--	23.49	≤ 24	Pass
	29.3	122	5610	--	0.71	23.72	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	0.61	--	23.62	≤ 24	Pass
	29.3	138	5690	--	0.59	23.60	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	0.51	--	23.52	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	122	5610	0.49	--	23.50	≤ 24	Pass
	29.3	138	5690	--	0.63	23.64	≤ 24	Pass
11ac-VHT 80+80	29.3	122	5610	0.81	--	23.82	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	138	5690	0.55	--	23.56	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass

For Radio C Transmit Power Control Test Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
802.11a	6	52	5260	9.68	9.55	22.64	≤ 24	Pass
802.11a	6	60	5300	9.74	9.86	22.82	≤ 24	Pass
802.11a	6	64	5320	9.65	9.71	22.70	≤ 24	Pass
802.11a	6	100	5500	9.82	9.62	22.74	≤ 24	Pass
802.11a	6	120	5600	9.77	9.45	22.63	≤ 24	Pass
802.11a	6	140	5700	9.74	9.36	22.57	≤ 24	Pass
802.11n-HT20	13	52	5260	9.99	10.03	23.03	≤ 24	Pass
802.11n-HT20	13	60	5300	10.11	10.15	23.15	≤ 24	Pass
802.11n-HT20	13	64	5320	10.20	10.34	23.29	≤ 24	Pass
802.11n-HT20	13	100	5500	10.03	10.32	23.20	≤ 24	Pass
802.11n-HT20	13	120	5600	9.68	9.72	22.72	≤ 24	Pass
802.11n-HT20	13	140	5700	9.79	9.89	22.86	≤ 24	Pass
802.11n-HT40	27	54	5270	10.11	10.48	23.32	≤ 24	Pass
802.11n-HT40	27	62	5310	10.12	10.46	23.31	≤ 24	Pass
802.11n-HT40	27	102	5510	10.59	10.03	23.34	≤ 24	Pass
802.11n-HT40	27	118	5590	10.26	10.39	23.35	≤ 24	Pass
802.11n-HT40	27	134	5670	10.42	10.24	23.35	≤ 24	Pass
802.11ac-VHT20	13	52	5260	10.33	10.26	23.32	≤ 24	Pass
802.11ac-VHT20	13	60	5300	10.03	10.31	23.19	≤ 24	Pass
802.11ac-VHT20	13	64	5320	10.11	10.26	23.21	≤ 24	Pass
802.11ac-VHT20	13	100	5500	10.06	10.32	23.21	≤ 24	Pass
802.11ac-VHT20	13	120	5600	9.86	10.01	22.96	≤ 24	Pass
802.11ac-VHT20	13	140	5700	10.01	10.26	23.16	≤ 24	Pass
802.11ac-VHT20	13	144	5720	9.93	9.89	22.93	≤ 24	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
802.11ac-VHT40	27	54	5270	10.26	10.28	23.29	≤ 24	Pass
802.11ac-VHT40	27	62	5310	10.38	10.49	23.46	≤ 24	Pass
802.11ac-VHT40	27	102	5510	10.44	10.03	23.26	≤ 24	Pass
802.11ac-VHT40	27	118	5590	10.49	10.86	23.70	≤ 24	Pass
802.11ac-VHT40	27	134	5670	10.25	10.03	23.16	≤ 24	Pass
802.11ac-VHT40	27	142	5710	10.41	10.24	23.35	≤ 24	Pass
802.11ac-VHT80	58.6	58	5290	10.29	10.36	23.35	≤ 24	Pass
802.11ac-VHT80	58.6	106	5530	9.31	8.99	22.17	≤ 24	Pass
802.11ac-VHT80	58.6	122	5610	10.28	10.44	23.38	≤ 24	Pass
802.11ac-VHT80	58.6	138	5690	10.29	10.63	23.48	≤ 24	Pass
802.11ac-VHT160	117	50	5250	10.63	10.26	23.47	≤ 24	Pass
802.11ac-VHT160	117	114	5570	10.71	10.42	23.59	≤ 24	Pass

Note: Total EIRP TPC Power (dBm) = $10 \cdot \log\{10^{(\text{Ant 0 TPC Power} / 10)} + 10^{(\text{Ant 1 TPC Power} / 10)}\} + \text{Directional Antenna Gain (dBi)}$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 TPC Power (dBm)	Ant 1 TPC Power (dBm)	Total EIRP TPC Power (dBm)	Limit (dBm)	Result
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	58	5290	--	8.65	18.66	≤ 24	Pass
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	106	5530	--	7.41	17.42	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5210	--	--	--	≤ 24	Pass
	29.3	122	5610	--	7.03	17.04	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5210	--	--	--	≤ 24	Pass
	29.3	138	5690	--	6.85	16.86	≤ 24	Pass
11ac-VHT 80+80	29.3	42	5210	--	--	--	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	13.56	--	23.57	≤ 24	Pass
	29.3	106	5530	--	12.86	22.87	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	13.44	--	23.45	≤ 24	Pass
	29.3	122	5610	--	12.25	22.26	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	13.55	--	23.56	≤ 24	Pass
	29.3	138	5690	--	12.03	22.04	≤ 24	Pass
11ac-VHT 80+80	29.3	58	5290	13.26	--	23.27	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	12.26	--	22.27	≤ 24	Pass
	29.3	122	5610	--	12.10	22.11	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	13.24	--	23.25	≤ 24	Pass
	29.3	138	5690	--	12.62	22.63	≤ 24	Pass
11ac-VHT 80+80	29.3	106	5530	13.20	--	23.21	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	122	5610	13.36	--	23.37	≤ 24	Pass
	29.3	138	5690	--	13.03	23.04	≤ 24	Pass
11ac-VHT 80+80	29.3	122	5610	13.49	--	23.50	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass
11ac-VHT 80+80	29.3	138	5690	13.44	--	23.45	≤ 24	Pass
	29.3	155	5775	--	--	--	≤ 24	Pass

7.6. Power Spectral Density Measurement

7.6.1. Test Limit

For fixed point-to-point access points operating in the band 5.15-5.25 GHz, the maximum power spectral density shall not exceed 17 dBm in any 1 megahertz band. For fixed point-to-point transmitters that employ a directional antenna gain greater than 23 dBi, a 1 dB reduction in maximum conducted output power and maximum power spectral density is required for each 1 dB of antenna gain in excess of 23 dBi.

For the 5.25-5.35 GHz and 5.47-5.725 GHz bands, the maximum power spectral density shall not exceed 11 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6dBi are used, the maximum conducted output power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

For the band 5.725-5.85 GHz, the maximum power spectral density shall not exceed 30 dBm in any 500-kHz band. If transmitting antennas of directional gain greater than 6dBi are used, the maximum conducted output power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

Radio Type	Mode	Frequency Range	Limit of Power Spectral Density
Radio A	802.11a/n/ac	5150 ~ 5250 MHz	14.79 dBm/MHz
		5250 ~ 5350 MHz	-8.21 dBm/MHz
		5470 ~ 5725 MHz	-8.21 dBm/MHz
		5725 ~ 5850 MHz	11.19 dBm/500kHz
Radio B	802.11a/n/ac	5150 ~ 5250 MHz	16.99 dBm/MHz
		5250 ~ 5350 MHz	-6.01 dBm/MHz
		5470 ~ 5725 MHz	-6.01 dBm/MHz
		5725 ~ 5850 MHz	12.99 dBm/500kHz
Radio C	802.11a/n/ac	5150 ~ 5250 MHz	12.99 dBm/MHz
		5250 ~ 5350 MHz	6.99 dBm/MHz
		5470 ~ 5725 MHz	6.99 dBm/MHz
		5725 ~ 5850 MHz	25.99 dBm/500kHz

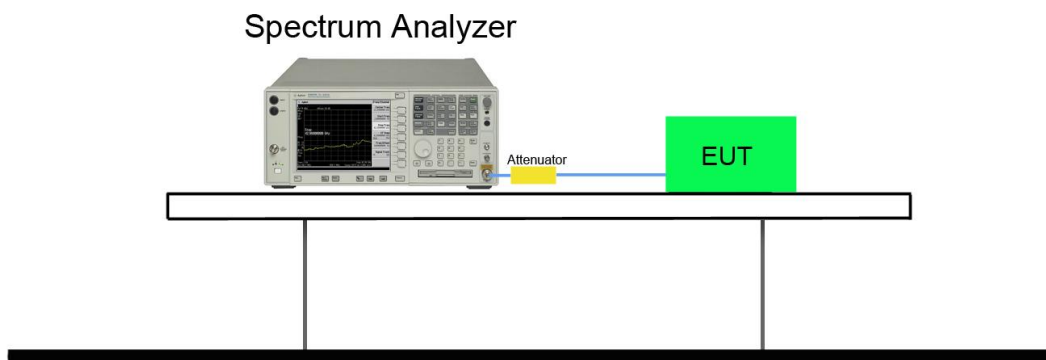
7.6.2. Test Procedure Used

KDB 789033 D02v01 - Section F

7.6.3. Test Setting

1. Analyzer was set to the center frequency of the UNII channel under investigation
2. Span was set to encompass the entire 26dB EBW of the signal.
3. RBW = 1MHz, if measurement bandwidth of Maximum PSD is specified in 500 kHz,
4. RBW = 100 kHz
5. VBW = 3MHz
6. Number of sweep points $\geq 2 \times (\text{span} / \text{RBW})$
7. Detector = power averaging (Average)
8. Sweep time = auto
9. Trigger = free run
10. Use the peak search function on the instrument to find the peak of the spectrum and record its value.
11. Add $10 \cdot \log(1/x)$, where x is the duty cycle, to the measured power in order to compute the average power during the actual transmission times (because the measurement represents an average over both the on and off times of the transmission). For example, add $10 \cdot \log(1/0.25) = 6$ dB if the duty cycle is 25 percent.
12. When the measurement bandwidth of Maximum PSD is specified in 500 kHz, add a constant factor $10 \cdot \log(500\text{kHz}/100\text{kHz}) = 7$ dB to the measured result

7.6.4. Test Setup



7.6.5.Test Result

For Radio A Power Spectral Density Test Result

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 PSD (dBm/MHz)	Ant 1 PSD (dBm/MHz)	Duty Cycle (%)	Total PSD (dBm/MHz)	PSD Limit (dBm/MHz)	Result
11a	6	36	5180	-0.53	-0.61	96.22	2.61	≤ 14.79	Pass
11a	6	44	5220	10.78	11.00	96.22	14.07	≤ 14.79	Pass
11a	6	48	5240	8.70	9.59	96.22	12.35	≤ 14.79	Pass
11a	6	52	5260	-12.15	-12.51	96.22	-9.15	≤ -8.21	Pass
11a	6	60	5300	-12.10	-12.12	96.22	-8.93	≤ -8.21	Pass
11a	6	64	5320	-12.20	-11.94	96.22	-8.89	≤ -8.21	Pass
11a	6	100	5500	-11.91	-12.21	96.22	-8.88	≤ -8.21	Pass
11a	6	120	5600	-11.89	-12.13	96.22	-8.83	≤ -8.21	Pass
11a	6	140	5700	-12.04	-11.45	96.22	-8.56	≤ -8.21	Pass
11n-HT20	26	36	5180	-3.73	-2.46	97.04	0.09	≤ 14.79	Pass
11n-HT20	26	44	5220	9.21	9.79	97.04	12.65	≤ 14.79	Pass
11n-HT20	26	48	5240	8.95	9.19	97.04	12.21	≤ 14.79	Pass
11n-HT20	26	52	5260	-12.06	-12.28	97.04	-9.03	≤ -8.21	Pass
11n-HT20	26	60	5300	-12.08	-11.87	97.04	-8.83	≤ -8.21	Pass
11n-HT20	26	64	5320	-12.37	-12.10	97.04	-9.09	≤ -8.21	Pass
11n-HT20	26	100	5500	-12.13	-12.31	97.04	-9.08	≤ -8.21	Pass
11n-HT20	26	120	5600	-12.00	-11.86	97.04	-8.79	≤ -8.21	Pass
11n-HT20	26	140	5700	-11.99	-11.53	97.04	-8.61	≤ -8.21	Pass
11n-HT40	54	38	5190	-9.63	-8.42	95.47	-5.77	≤ 14.79	Pass
11n-HT40	54	46	5230	6.20	6.91	95.47	9.78	≤ 14.79	Pass
11n-HT40	54	54	5270	-12.29	-12.37	95.47	-9.12	≤ -8.21	Pass
11n-HT40	54	62	5310	-12.17	-12.03	95.47	-8.89	≤ -8.21	Pass
11n-HT40	54	102	5510	-12.04	-12.22	95.47	-8.92	≤ -8.21	Pass
11n-HT40	54	118	5590	-12.18	-12.28	95.47	-9.02	≤ -8.21	Pass
11n-HT40	54	134	5670	-12.01	-11.97	95.47	-8.78	≤ -8.21	Pass

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 PSD (dBm/MHz)	Ant 1 PSD (dBm/MHz)	Duty Cycle (%)	Total PSD (dBm/MHz)	PSD Limit (dBm/MHz)	Result
11ac-VHT20	26	36	5180	-4.24	-2.26	98.23	-0.13	≤ 14.79	Pass
11ac-VHT20	26	44	5220	8.68	9.90	98.23	12.34	≤ 14.79	Pass
11ac-VHT20	26	48	5240	7.87	9.14	98.23	11.56	≤ 14.79	Pass
11ac-VHT20	26	52	5260	-11.59	-11.95	98.23	-8.76	≤ -8.21	Pass
11ac-VHT20	26	60	5300	-12.18	-11.94	98.23	-9.05	≤ -8.21	Pass
11ac-VHT20	26	64	5320	-12.20	-11.95	98.23	-9.06	≤ -8.21	Pass
11ac-VHT20	26	100	5500	-11.85	-12.21	98.23	-9.02	≤ -8.21	Pass
11ac-VHT20	26	120	5600	-11.99	-12.13	98.23	-9.05	≤ -8.21	Pass
11ac-VHT20	26	140	5700	-12.82	-11.56	98.23	-9.13	≤ -8.21	Pass
11ac-VHT20	26	144	5720	-12.27	-12.27	98.23	-9.26	≤ -8.21	Pass
11ac-VHT40	54	38	5190	-9.65	-8.13	95.60	-5.62	≤ 14.79	Pass
11ac-VHT40	54	46	5230	5.75	7.16	95.60	9.72	≤ 14.79	Pass
11ac-VHT40	54	54	5270	-14.77	-13.15	95.60	-10.68	≤ -8.21	Pass
11ac-VHT40	54	62	5310	-14.58	-13.36	95.60	-10.72	≤ -8.21	Pass
11ac-VHT40	54	102	5510	-13.55	-14.38	95.60	-10.73	≤ -8.21	Pass
11ac-VHT40	54	118	5590	-12.41	-12.49	95.60	-9.24	≤ -8.21	Pass
11ac-VHT40	54	134	5670	-12.50	-12.82	95.60	-9.45	≤ -8.21	Pass
11ac-VHT40	54	142	5710	-11.82	-12.29	95.60	-8.84	≤ -8.21	Pass
11ac-VHT80	117.2	42	5210	-12.32	-11.48	92.62	-8.54	≤ 14.79	Pass
11ac-VHT80	117.2	58	5290	-18.25	-16.21	92.62	-13.77	≤ -8.21	Pass
11ac-VHT80	117.2	106	5530	-17.10	-17.52	92.62	-13.96	≤ -8.21	Pass
11ac-VHT80	117.2	122	5610	-15.32	-15.39	92.62	-12.01	≤ -8.21	Pass
11ac-VHT80	117.2	138	5690	-14.63	-14.34	92.62	-11.14	≤ -8.21	Pass
11ac-VHT160	117	50	5250	-13.86	-14.12	96.75	-10.64	≤ -5.20	Pass
11ac-VHT160	117	114	5570	-12.83	-13.27	96.75	-9.70	≤ -5.20	Pass

Note 1: When EUT duty cycle ≥ 98%, the Total PSD (dBm/MHz) = $10 \cdot \log\{10^{(\text{Ant 0 PSD}/10)} + 10^{(\text{Ant 1 PSD}/10)}\}$.

Note 2: When EUT duty cycle < 98%, the Total PSD (dBm/MHz) = $10 \cdot \log\{10^{(\text{Ant 0 PSD}/10)} + 10^{(\text{Ant 1 PSD}/10)}\} + 10 \cdot \log(1/\text{Duty Cycle})$.

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 PSD (dBm/ MHz)	Ant 1 PSD (dBm/ MHz)	Duty Cycle (%)	Total PSD (dBm/ MHz)	PSD Limit (dBm/MHz)	Result
11ac-VHT 80+80	29.3	42	5210	-11.63	--	92.62	-11.30	≤ 17.00	Pass
	29.3	58	5290	--	-12.20	92.62	-11.87	≤ -5.20	Pass
11ac-VHT 80+80	29.3	42	5210	-11.73	--	92.62	-11.40	≤ 17.00	Pass
	29.3	106	5530	--	-10.95	92.62	-10.62	≤ -5.20	Pass
11ac-VHT 80+80	29.3	58	5210	-11.00	--	92.62	-10.67	≤ 17.00	Pass
	29.3	122	5610	--	-10.31	92.62	-9.98	≤ -5.20	Pass
11ac-VHT 80+80	29.3	58	5210	-11.67	--	92.62	-11.34	≤ 17.00	Pass
	29.3	138	5690	--	-10.16	92.62	-9.83	≤ -5.20	Pass
11ac-VHT 80+80	29.3	42	5210	-8.12	--	92.62	-7.79	≤ 17.00	Pass
	29.3	155	5775	--	--	--	--	--	--
11ac-VHT 80+80	29.3	58	5290	-12.52	--	92.62	-12.19	≤ -5.20	Pass
	29.3	106	5530	--	-11.58	92.62	-11.25	≤ -5.20	Pass
11ac-VHT 80+80	29.3	58	5290	-12.42	--	92.62	-12.09	≤ -5.20	Pass
	29.3	122	5610	--	-11.35	92.62	-11.02	≤ -5.20	Pass
11ac-VHT 80+80	29.3	58	5290	-12.50	--	92.62	-12.17	≤ -5.20	Pass
	29.3	138	5690	--	-11.05	92.62	-10.72	≤ -5.20	Pass
11ac-VHT 80+80	29.3	58	5290	-12.66	--	92.62	-12.33	≤ -5.20	Pass
	29.3	155	5775	--	--	--	--	--	--
11ac-VHT 80+80	29.3	106	5530	-12.78	--	92.62	-12.45	≤ -5.20	Pass
	29.3	122	5610	--	-10.83	92.62	-10.50	≤ -5.20	Pass
11ac-VHT 80+80	29.3	106	5530	-12.02	--	92.62	-11.69	≤ -5.20	Pass
	29.3	138	5690	--	-9.99	92.62	-9.66	≤ -5.20	Pass
11ac-VHT 80+80	29.3	106	5530	-11.70	--	92.62	-11.37	≤ -5.20	Pass
	29.3	155	5775	--	--	--	--	--	--
11ac-VHT 80+80	29.3	122	5610	-11.09	--	92.62	-10.76	≤ -5.20	Pass
	29.3	138	5690	--	-10.75	92.62	-10.42	≤ -5.20	Pass
11ac-VHT 80+80	29.3	122	5610	-11.10	--	92.62	-10.77	≤ -5.20	Pass
	29.3	155	5775	--	--	--	--	--	--
11ac-VHT 80+80	29.3	138	5690	-10.85	--	92.62	-10.52	≤ -5.20	Pass
	29.3	155	5775	--	--	--	--	--	--

Note: When EUT duty cycle < 98%, the Total PSD (dBm/MHz) = Ant PSD (dBm/MHz) + 10*log(1/Duty Cycle).

Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 PSD (dBm/100kHz)	Ant 1 PSD (dBm/100kHz)	Duty Cycle (%)	Constant Factor	Total PSD (dBm/500kHz)	Limit (dBm/500kHz)	Result
11a	6	149	5745	-1.52	1.33	96.22	7.00	10.31	≤ 11.19	Pass
11a	6	157	5785	-0.79	1.87	96.22	7.00	10.92	≤ 11.19	Pass
11a	6	165	5825	-0.99	1.46	96.22	7.00	10.58	≤ 11.19	Pass
11n-HT20	26	149	5745	-1.61	1.00	97.04	7.00	10.03	≤ 11.19	Pass
11n-HT20	26	157	5785	-1.43	1.68	97.04	7.00	10.54	≤ 11.19	Pass
11n-HT20	26	165	5825	-1.07	1.16	97.04	7.00	10.33	≤ 11.19	Pass
11n-HT40	54	151	5755	-6.16	-3.19	95.47	7.00	5.79	≤ 11.19	Pass
11n-HT40	54	159	5795	-4.15	-1.48	95.47	7.00	7.60	≤ 11.19	Pass
11ac-VHT20	26	149	5745	-1.60	1.55	98.23	7.00	10.26	≤ 11.19	Pass
11ac-VHT20	26	157	5785	-0.89	1.55	98.23	7.00	10.51	≤ 11.19	Pass
11ac-VHT20	26	165	5825	-1.17	1.02	98.23	7.00	10.07	≤ 11.19	Pass
11ac-VHT40	54	151	5755	-5.83	-3.14	95.60	7.00	5.93	≤ 11.19	Pass
11ac-VHT40	54	159	5795	-3.68	-1.51	95.60	7.00	7.74	≤ 11.19	Pass
11ac-VHT80	117.2	155	5775	-14.73	-11.93	92.62	7.00	-2.76	≤ 11.19	Pass

Note 1: When EUT duty cycle ≥ 98%, the Total PSD (dBm/500kHz) = $10 \cdot \log\{10^{(\text{Ant 0 PSD}/10)} + 10^{(\text{Ant 1 PSD}/10)}\} + \text{Constant Factor}$.

Note 2: When EUT duty cycle < 98%, the Total PSD (dBm/500kHz) = $10 \cdot \log\{10^{(\text{Ant 0 PSD}/10)} + 10^{(\text{Ant 1 PSD}/10)}\} + 10 \cdot \log(1/\text{Duty Cycle}) + \text{Constant Factor}$.

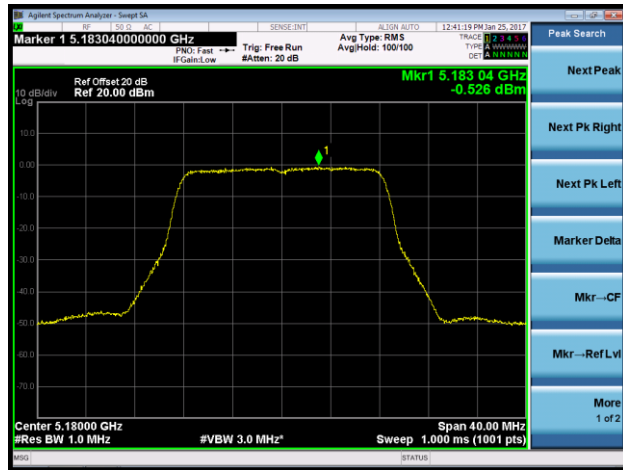
Test Mode	Data Rate (Mbps)	Channel No.	Freq. (MHz)	Ant 0 PSD (dBm/100kHz)	Ant 1 PSD (dBm/100kHz)	Duty Cycle (%)	Constant Factor	Total PSD (dBm/500kHz)	Limit (dBm/500kHz)	Result
11ac-VHT 80+80	29.3	42	5210	--	--	--	--	--	--	--
	29.3	155	5775	--	-16.35	92.62	7.00	-9.02	≤ 14.20	Pass
11ac-VHT 80+80	29.3	58	5290	--	--	--	--	--	--	--
	29.3	155	5775	--	-19.82	92.62	7.00	-12.49	≤ 14.20	Pass
11ac-VHT 80+80	29.3	106	5530	--	--	--	--	--	--	--
	29.3	155	5775	--	-19.32	92.62	7.00	-11.99	≤ 14.20	Pass
11ac-VHT 80+80	29.3	122	5610	--	--	--	--	--	--	--
	29.3	155	5775	--	-20.37	92.62	7.00	-13.04	≤ 14.20	Pass
11ac-VHT 80+80	29.3	138	5690	--	--	--	--	--	--	--
	29.3	155	5775	--	-20.63	92.62	7.00	-13.30	≤ 14.20	Pass

Note: When EUT duty cycle < 98%, the Total PSD (dBm/500kHz) = Ant PSD (dBm / 100kHz) + 10*log(1/Duty Cycle) + Constant Factor.

For Radio A Power Spectral Density Test Result

802.11a Power Spectral Density - Ant 0 / Ant 0 + 1

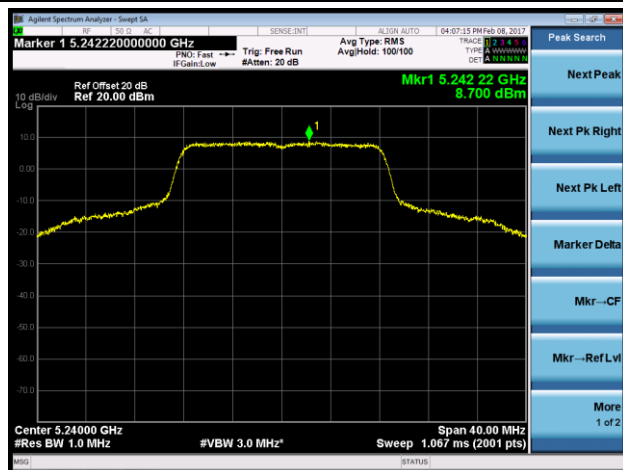
Channel 36 (5180MHz)



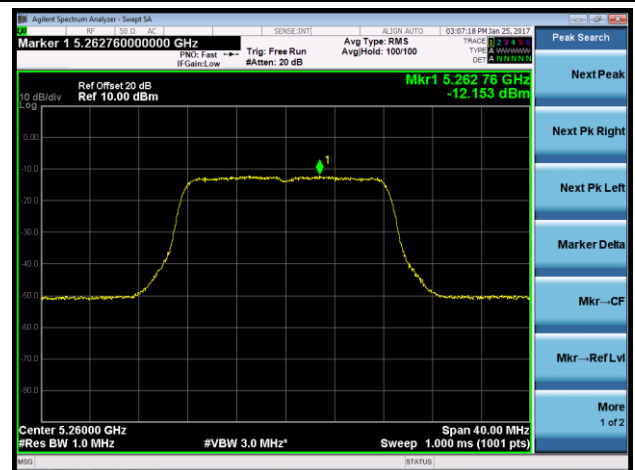
Channel 44 (5220MHz)



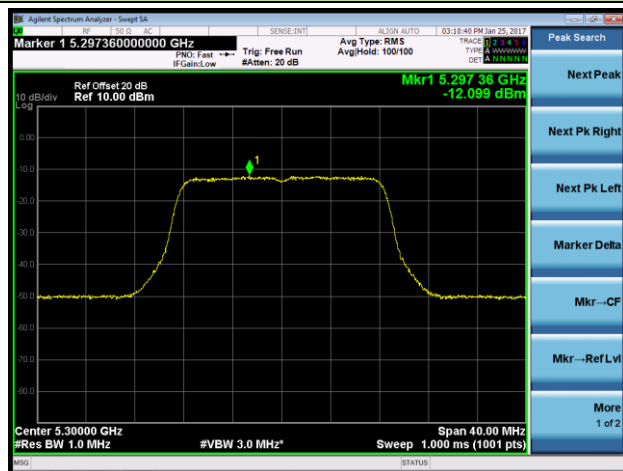
Channel 48 (5240MHz)



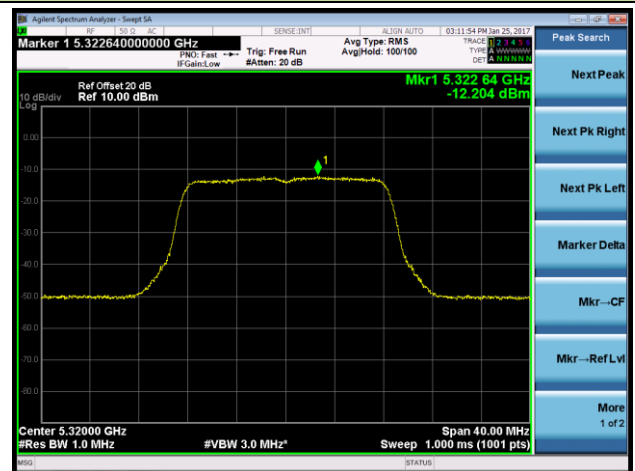
Channel 52 (5260MHz)



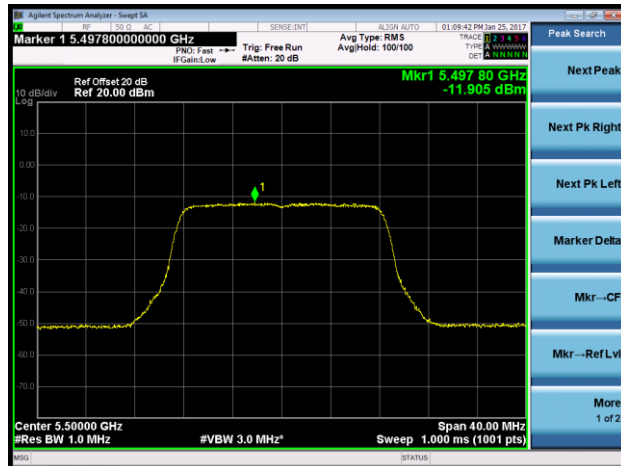
Channel 60 (5300MHz)



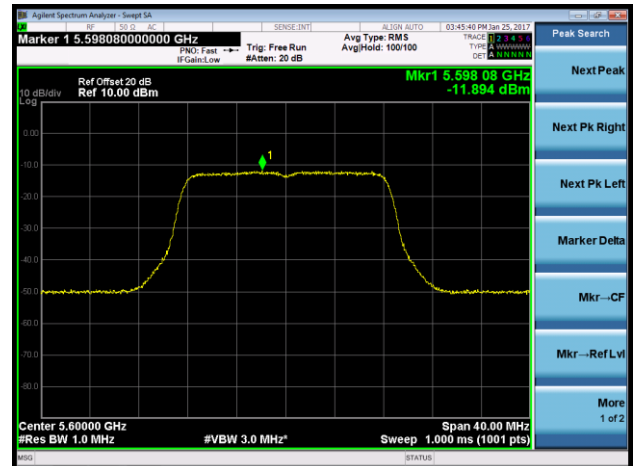
Channel 64 (5320MHz)



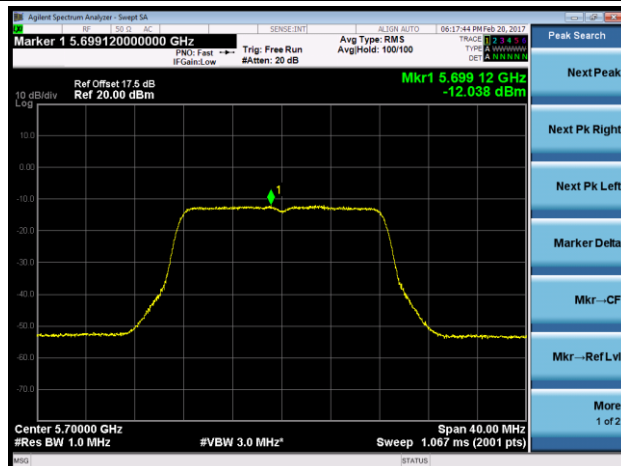
Channel 100 (5500MHz)



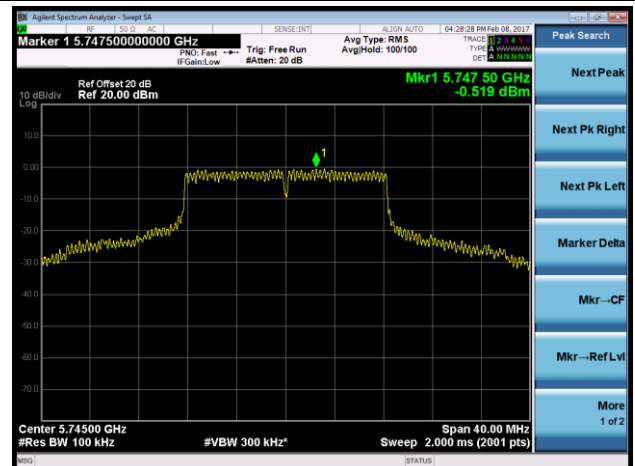
Channel 120 (5600MHz)



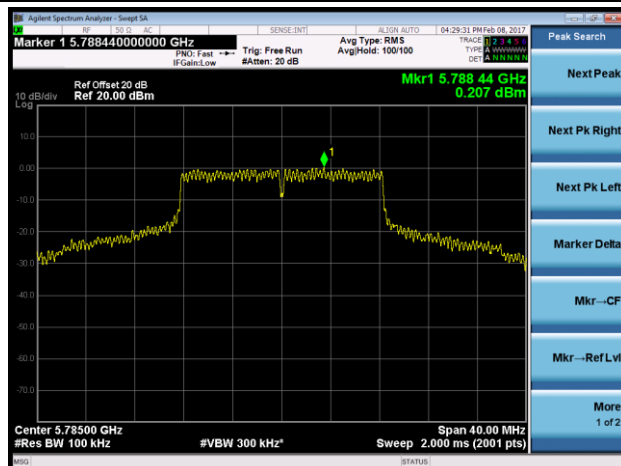
Channel 140 (5700MHz)



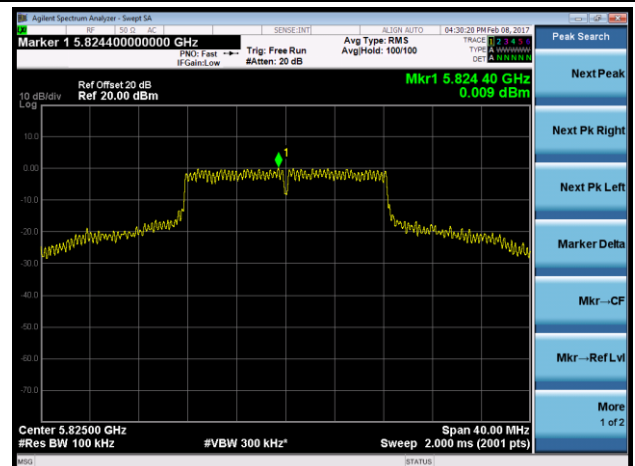
Channel 149 (5745MHz)



Channel 157 (5785MHz)

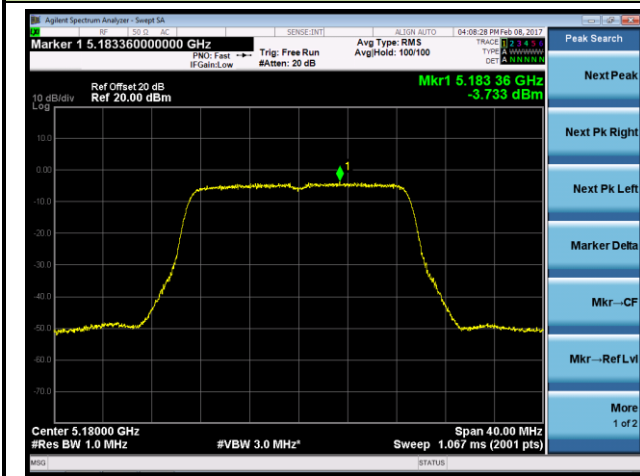


Channel 165 (5825MHz)

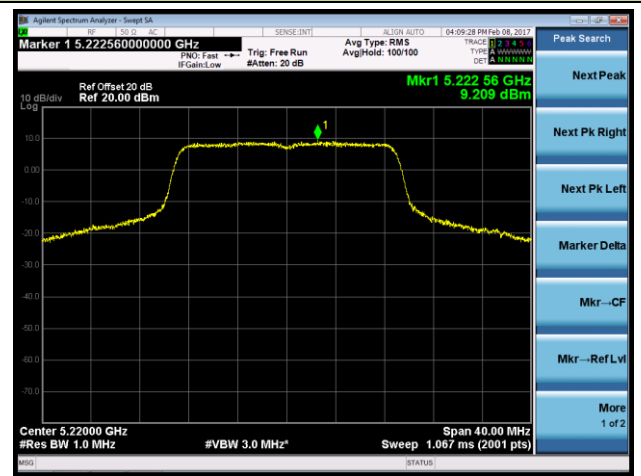


802.11n-HT20 Power Spectral Density - Ant 0 / Ant 0 + 1

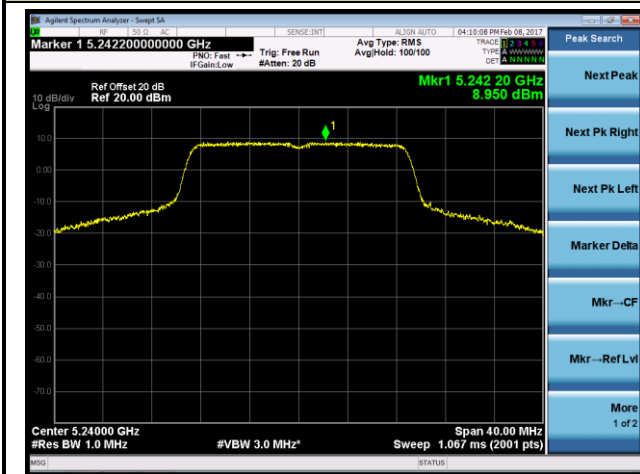
Channel 36 (5180MHz)



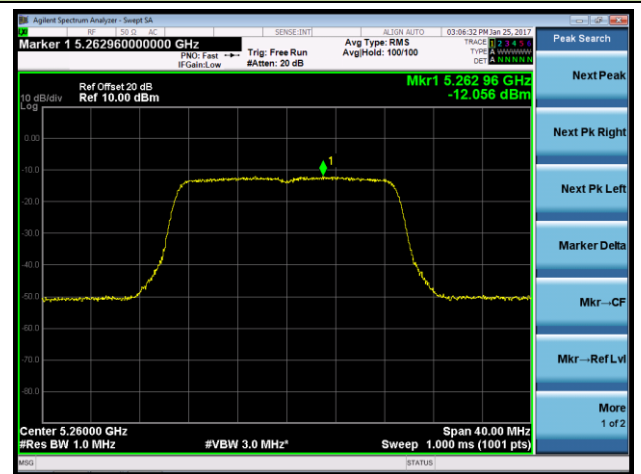
Channel 44 (5220MHz)



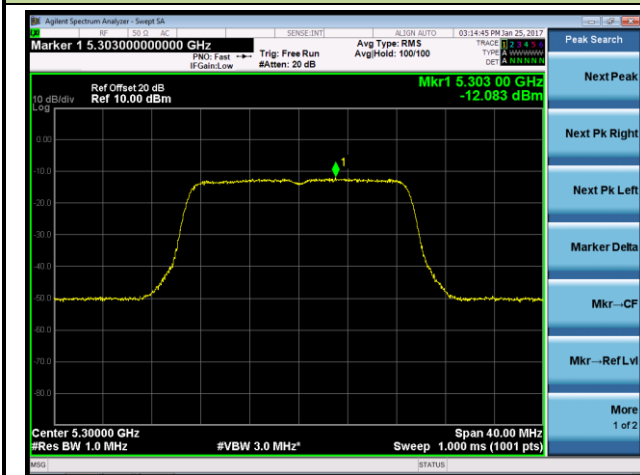
Channel 48 (5240MHz)



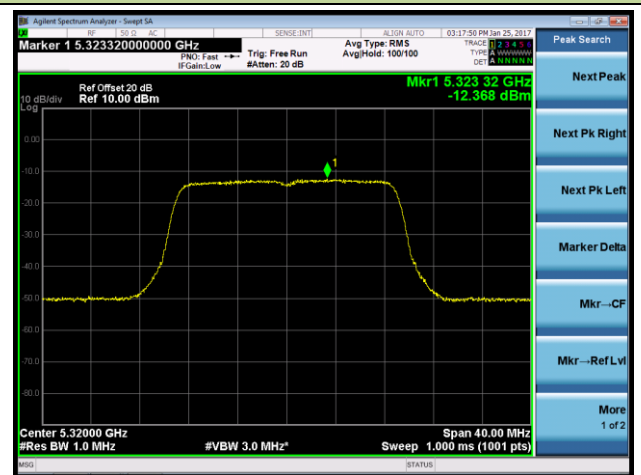
Channel 52 (5260MHz)



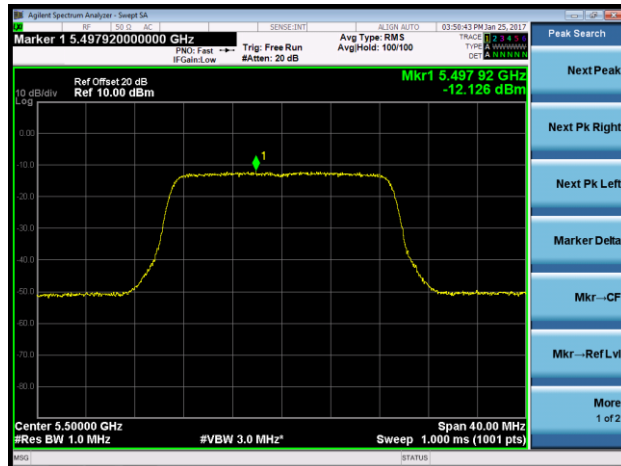
Channel 60 (5300MHz)



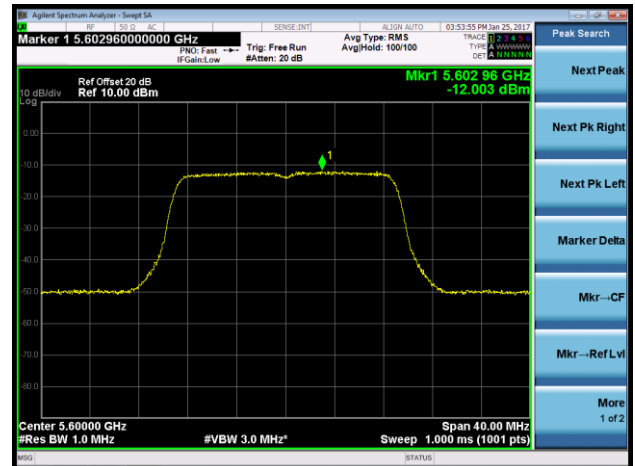
Channel 64 (5320MHz)



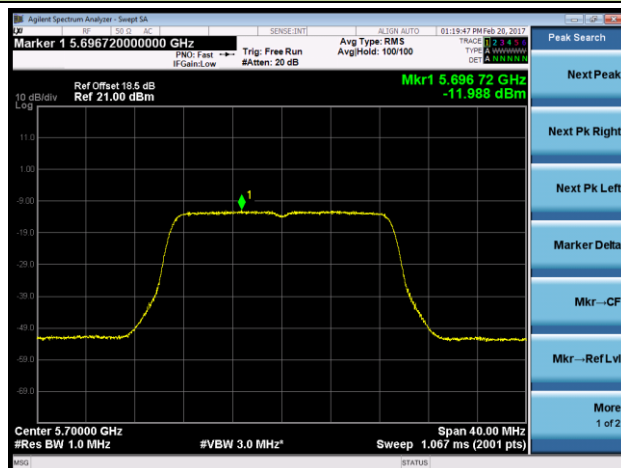
Channel 100 (5500MHz)



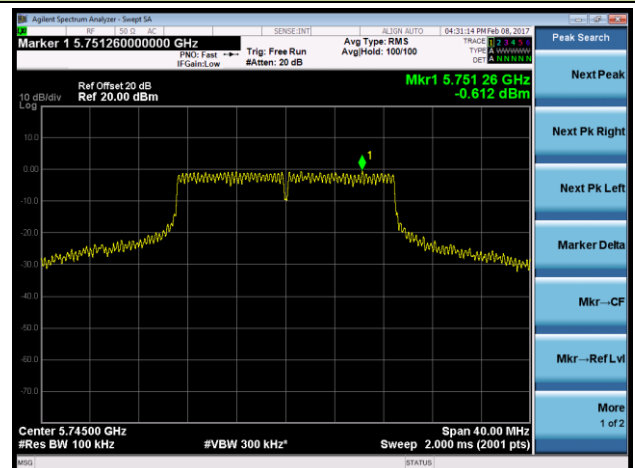
Channel 120 (5600MHz)



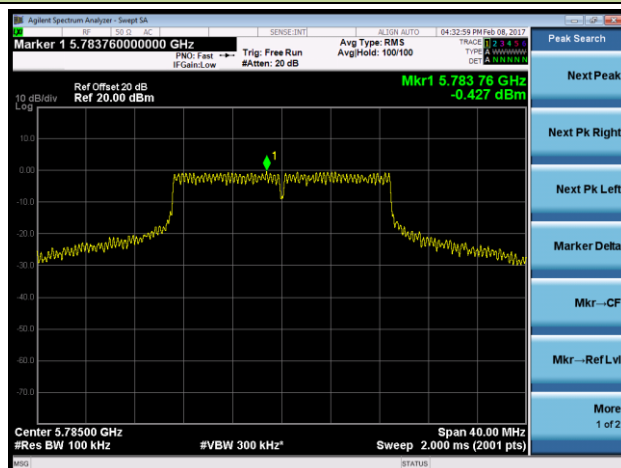
Channel 140 (5700MHz)



Channel 149 (5745MHz)



Channel 157 (5785MHz)



Channel 165 (5825MHz)

