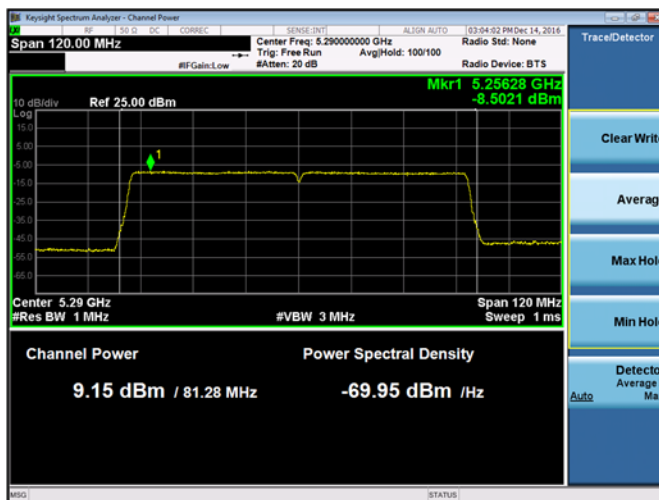
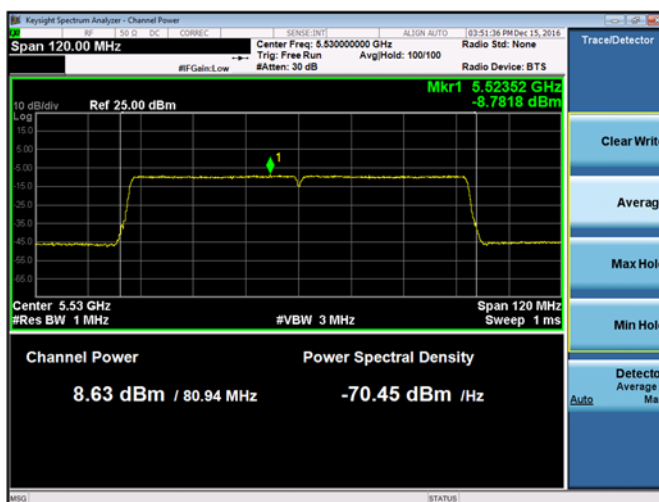


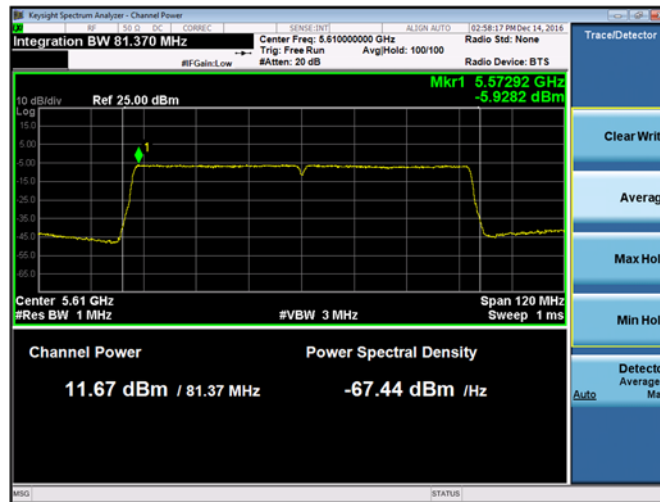
Plot 9-287. Maximum Conducted Output Power and PSD Chain B 802.11ac VHT80 (Ch. 42)



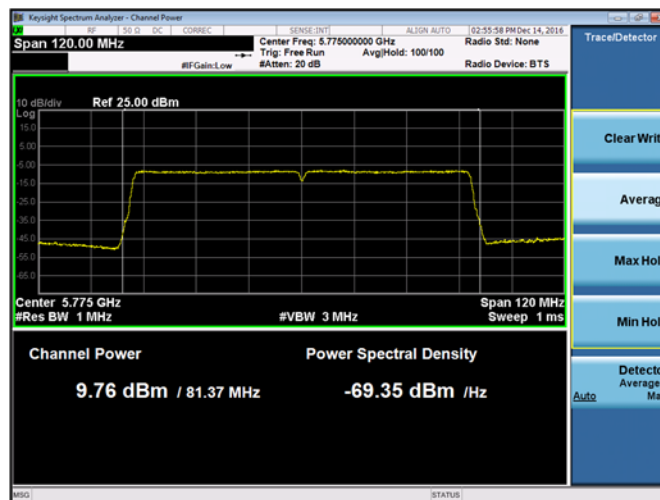
Plot 9-288. Maximum Conducted Output Power and PSD Chain B 802.11ac VHT80 (Ch. 58)



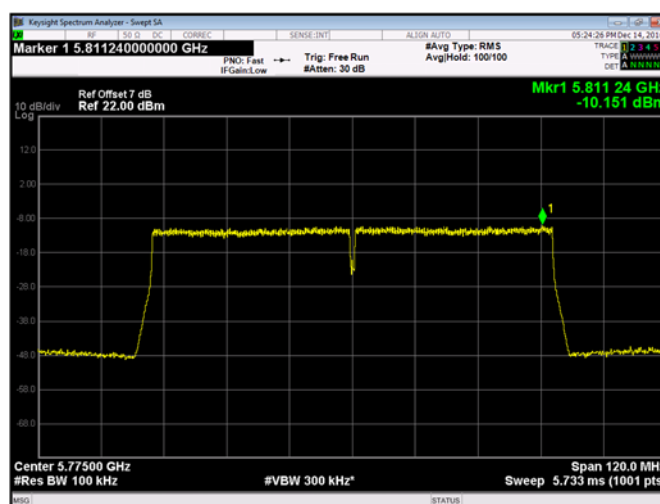
Plot 9-289. Max Conducted Output Power and PSD Chain B 802.11ac VHT80 (Ch. 106)



Plot 9-290. Max Conducted Output Power and PSD Chain B 802.11ac VHT80 (Ch. 122)



Plot 9-291. Maximum Conducted Output Power Chain B 802.11ac VHT80 (Ch. 155)



Plot 9-292. Maximum Power Spectral Density Chain B 802.11ac VHT80 (Ch. 155)

9.6 Radiated Spurious and Band Edge Emissions

9.6.1 Test Requirement:

FCC CFR 47 Rule Part 15.407 (b)
ISED RSS-247 [6.2] and RSS GEN [8.9]

9.6.2 Test Method:

Measurements were performed according to the procedure defined in KDB 789033 D02 v01r03 - Guidelines for Compliance Testing of Unlicensed National Information Infrastructure (U-NII) Devices Part 15, Subpart E and ANSI C63.10 2013.

Radiated spurious measurements are made from 30MHz to the 10th harmonic of the fundamental frequency of the transmitter. Measurements below 30MHz were not performed since the radio circuitry of the EUT does not contain clocks below 30MHz. The limit for radiated spurious emissions is per 15.209 and RSS-247 [5.5]. Additionally, emissions found in the restricted bands as listed in 15.205 and RSS-Gen were tested for compliance per limits in 15.209 and RSS-Gen.

The EUT was tested near the low, middle and high channels of operation in each sub band. Guidelines in ANSI C63.10:2013 were followed with respect to maximizing the emissions.

A pre-amp and a high pass filter were required for this test, to provide the measuring system with sufficient sensitivity. The peak reading of the emission, after being corrected by the antenna factor, cable loss, pre-amp gain, etc., is the peak field strength.

All tests were performed in MIMO transmission mode to measure the worst case for both antennas.

Both horizontal and vertical antenna polarizations were investigated. Worst case maximized data for both polarizations is shown in this test report.

Radiated Spurious Emissions**Spectrum Analyzer Settings:****30 MHz- 1 GHz:**

RBW= 120 kHz

VBW $\geq 3 \times$ RBW

Trace Mode: Peak Detector (Max Hold). Final measurements performed using QP Detector.

Span= 30 MHz- 1 GHz

Sweep time= Auto Couple

Sweep points $\geq 2 \times$ Span/RBW**Above 1 GHz:**

RBW= 1 MHz

VBW= 10 MHz

Trace Mode: Peak Detector (Max Hold) and RMS Average Detector (Max Hold) (Pre-scan Only)

Span= 1- 18 GHz, 18- 26.5 GHz and 26.5- 40 GHz

Sweep time= Auto Couple

Sweep points $\geq 2 \times$ Span/RBW**Final Peak Measurements above 1 GHz****Spectrum Analyzer Settings:**

RBW= 1 MHz

VBW $\geq 3 \times$ RBW

Detector= Peak

Span= wide enough to encompass the emission

Sweep points $\geq 2 \times$ Span/RBW

Sweep time = Auto Couple

Trace= Max Hold

Final RMS Average Measurements above 1 GHz**Spectrum Analyzer Settings:**

RBW= 1 MHz

VBW $\geq 3 \times$ RBW

Detector= RMS

Span= wide enough to encompass the emission

Sweep points $\geq 2 \times$ Span/RBW

Sweep time = Auto Couple

Trace= Average at least 100 traces

Trace Averaging type= power (RMS)

The duty cycle correction factor is added to the emission level.

Restricted Band-Edge Emissions**Peak Measurements****Spectrum Analyzer Settings:**

RBW= 1 MHz

VBW= 10 MHz

Trace Mode: Peak Detector (Max Hold)

Span= 5000 – 5470 MHz; 5350 – 5850 MHz; 5600 – 5950 MHz

Sweep Points = 1001; 801; 801

Sweep Time = Auto Couple

Average Measurements (Reduced Video Bandwidth Method)**Spectrum analyzer Settings:**

RBW= 1 MHz

VBW= 1 kHz

VBW Mode= Linear

Trace Mode: Peak Detector (Max Hold)

Span = 5000 – 5470 MHz; 5350 – 5700 MHz;

Sweep Points: 1001; 801

Sweep Time = Auto Couple

Sweep Count = 200

Sample Calculation:

Field Strength Level: Amplitude (Analyzer level) + AFCL (Antenna Factor and Cable losses) –
Amplifier Gain = 50 dBuV + 33 dB – 25 dB = 58dBuV/m

9.6.3 Limits:

Frequency (MHz)	Field Strength ($\mu\text{V/m}$)	Measurement Distance (meters)	Corrected Field Strength for 3m measurement distance ($\text{dB}\mu\text{V/m}$)
0.009-0.490	2400/F (kHz)	300	48.5- 13.8
0.490-1.705	24000/F (kHz)	30	33.8- 23.0
1.705-30	30	30	29.5
30-88	100	3	40
88-216	150	3	43.5
216-960	200	3	46
960-1000	500	3	54
Above 1000	500	3	54 (Average) 74 (Peak) Note: The peak limit for emissions in unrestricted bands is -27dBm EIRP (68.2dB $\mu\text{V/m}$ at 3m).

9.6.4 Test Result:

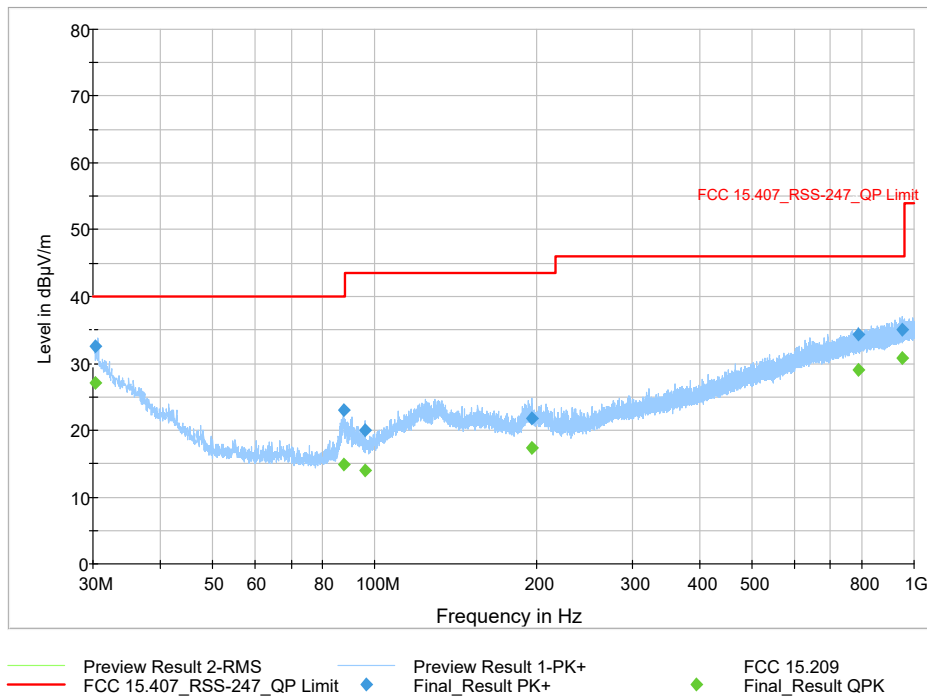
Pass.

9.6.5 Test Data:

9.6.5.1 Radiated Emissions in 30 MHz- 1 GHz range

All channels and modes were tested and worst case results from 802.11a mode, channel 44 shown here.

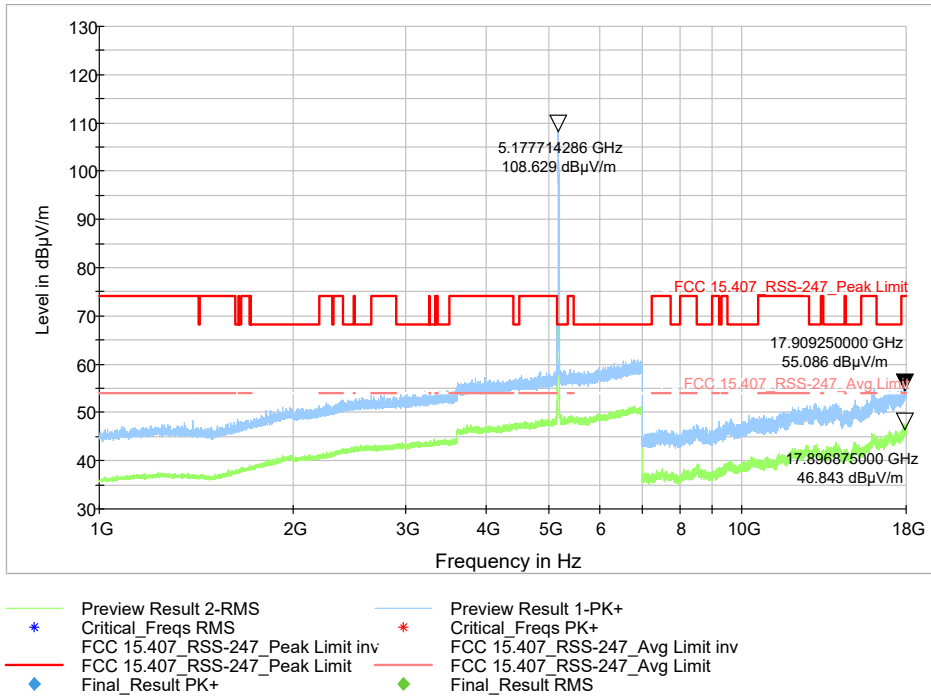
RSE 30-1000 MHz					
Frequency (MHz)	Raw Quasi-Peak Amplitude (dBµV/m)	Correction Factor (dB)	Corrected Quasi-Peak Field Strength (dBµV/m)	Quasi-Peak Limit (dBµV/m)	Quasi-Peak Margin (dB)
30.31	27.16	27.40	27.4	40.00	-12.6
87.77	14.84	14.70	14.7	40.00	-25.3
96.04	14.04	16.20	16.2	43.50	-27.3
195.33	17.43	19.00	19	43.50	-24.5
789.19	28.95	29.70	29.7	46.00	-16.3
950.65	30.74	31.50	31.5	46.00	-14.5



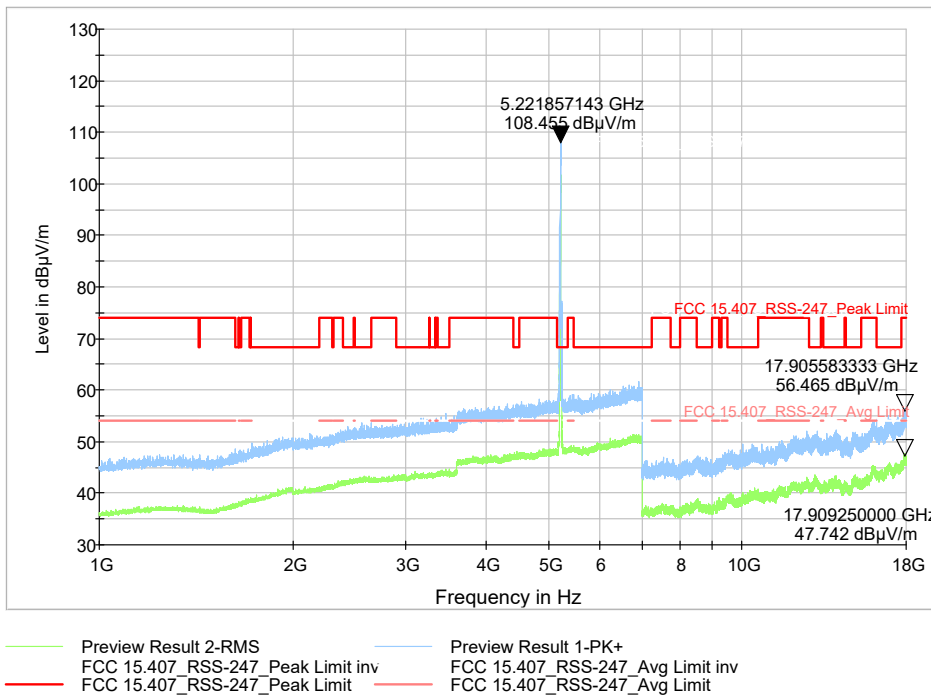
Plot 9-293. Radiated Spurious Emissions 30-1000 MHz Tx Chains A & B 802.11a (Ch. 44)

9.6.5.2 Radiated Emissions in 1-18 GHz range 802.11a

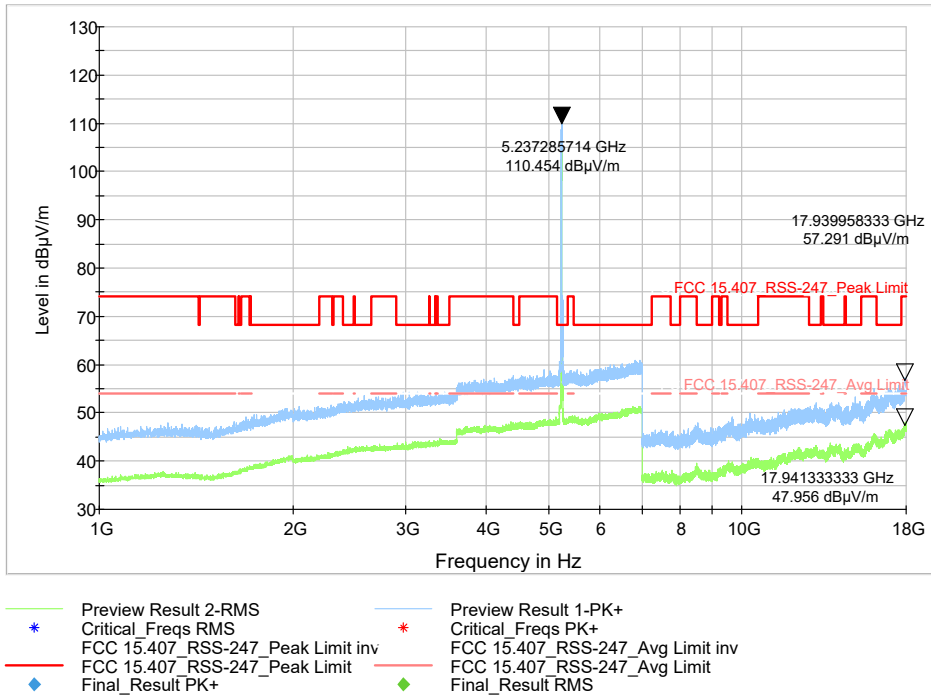
No significant emissions to report above noise floor.



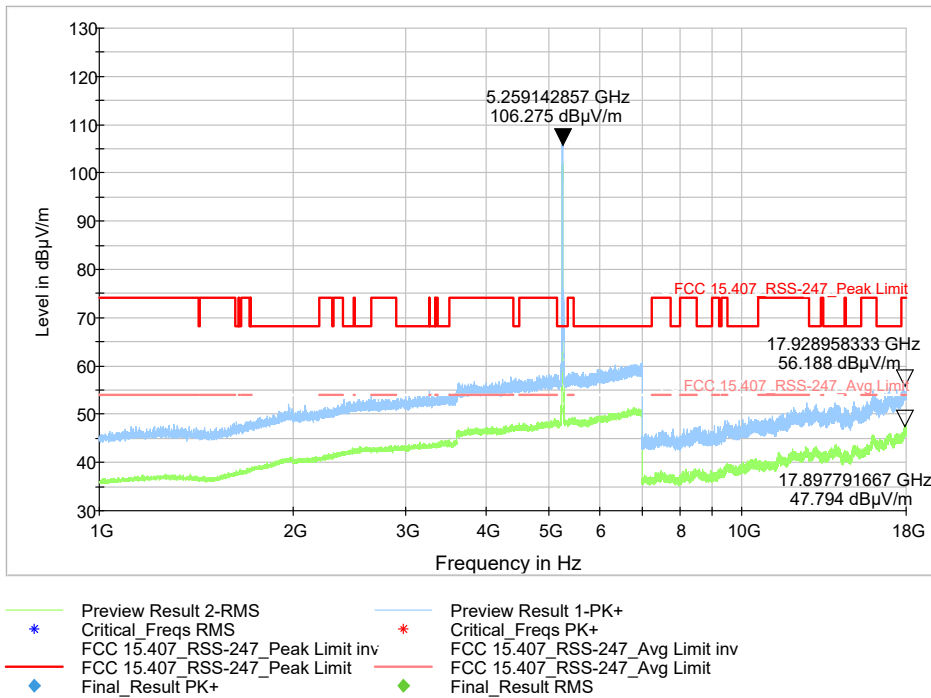
Plot 9-294. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 36)



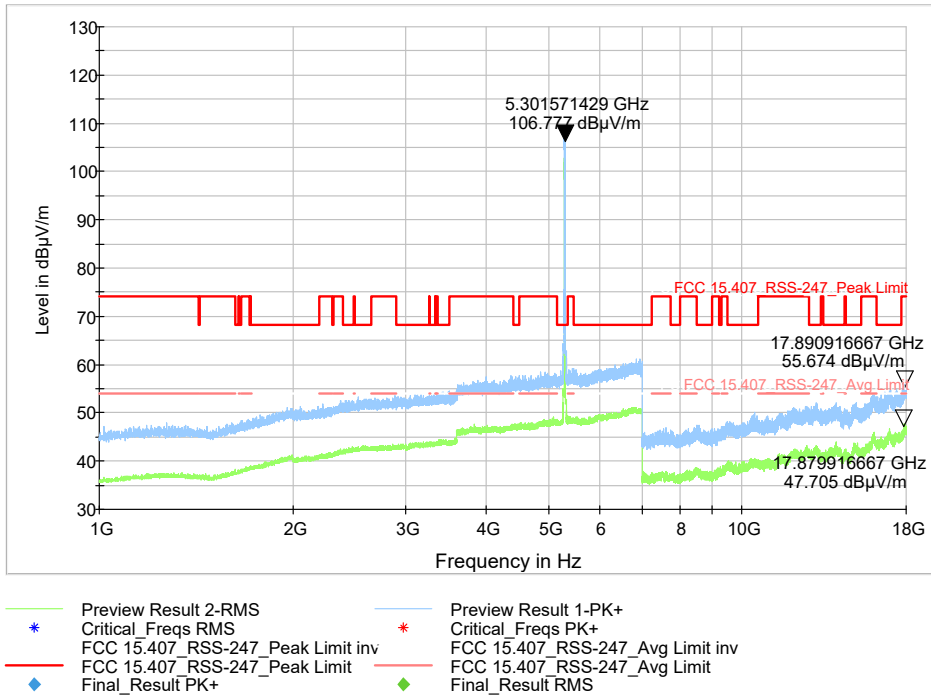
Plot 9-295. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 44)



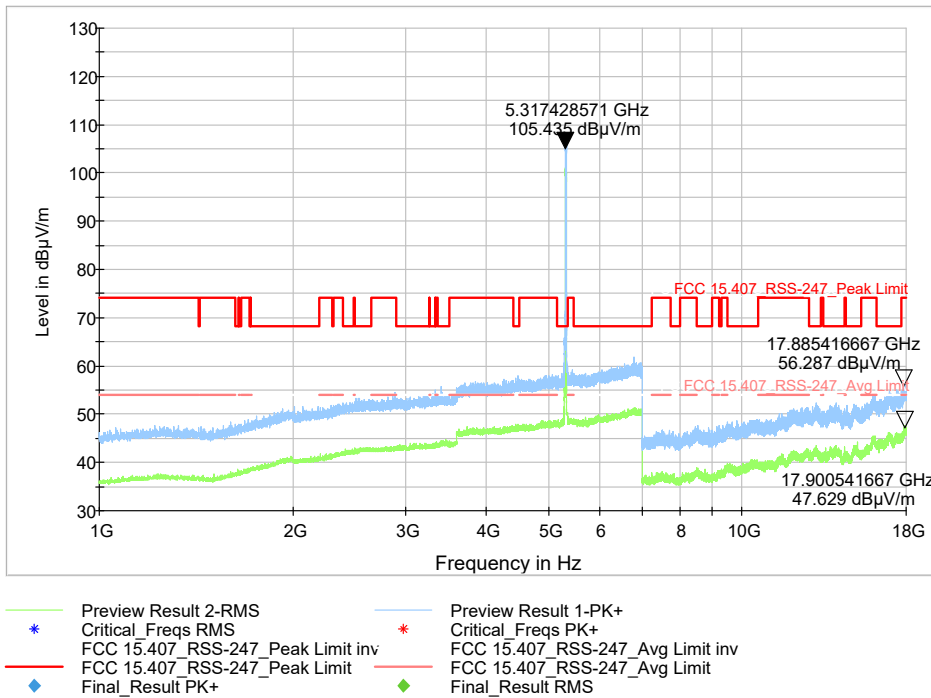
Plot 9-296. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 48)



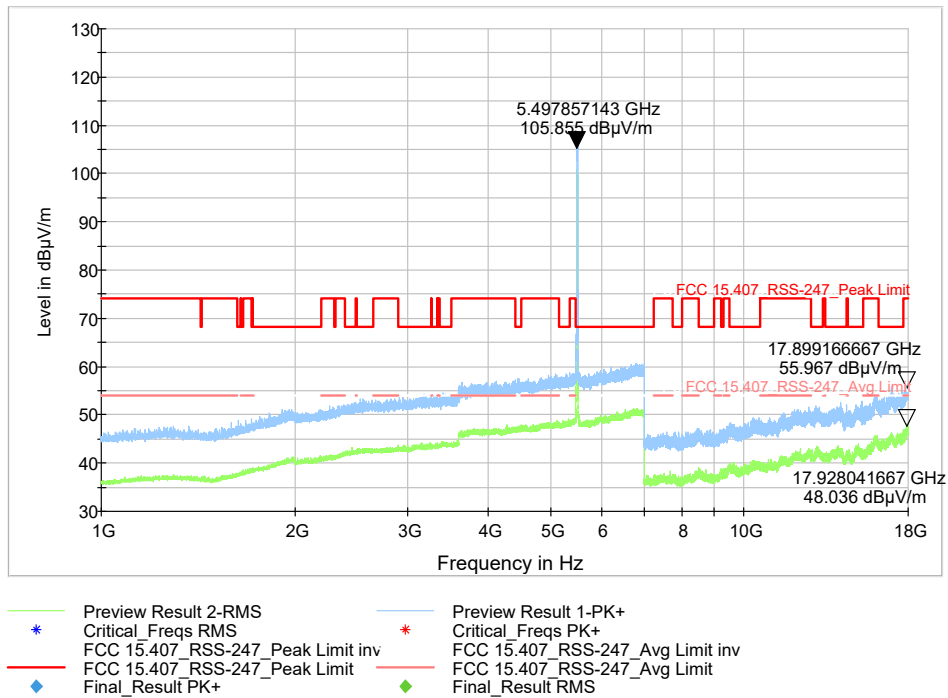
Plot 9-297. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 52)



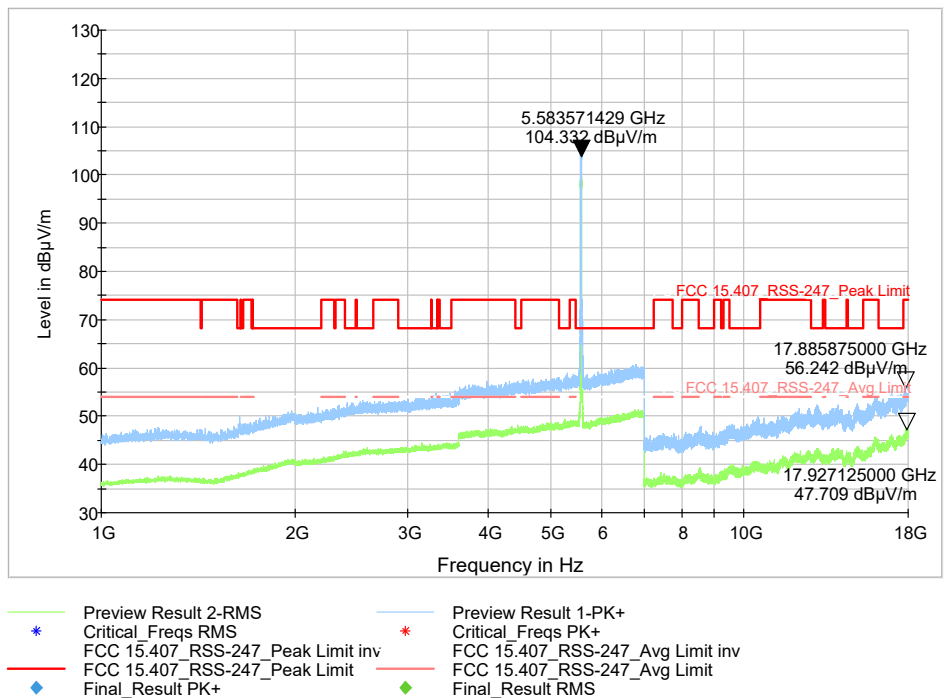
Plot 9-298. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 60)



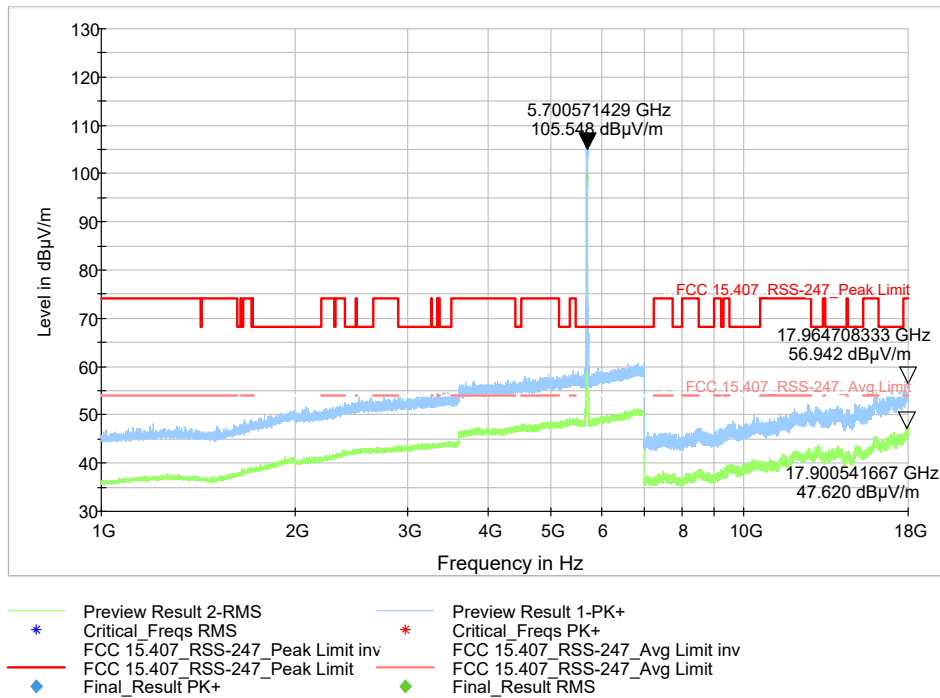
Plot 9-299. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 64)



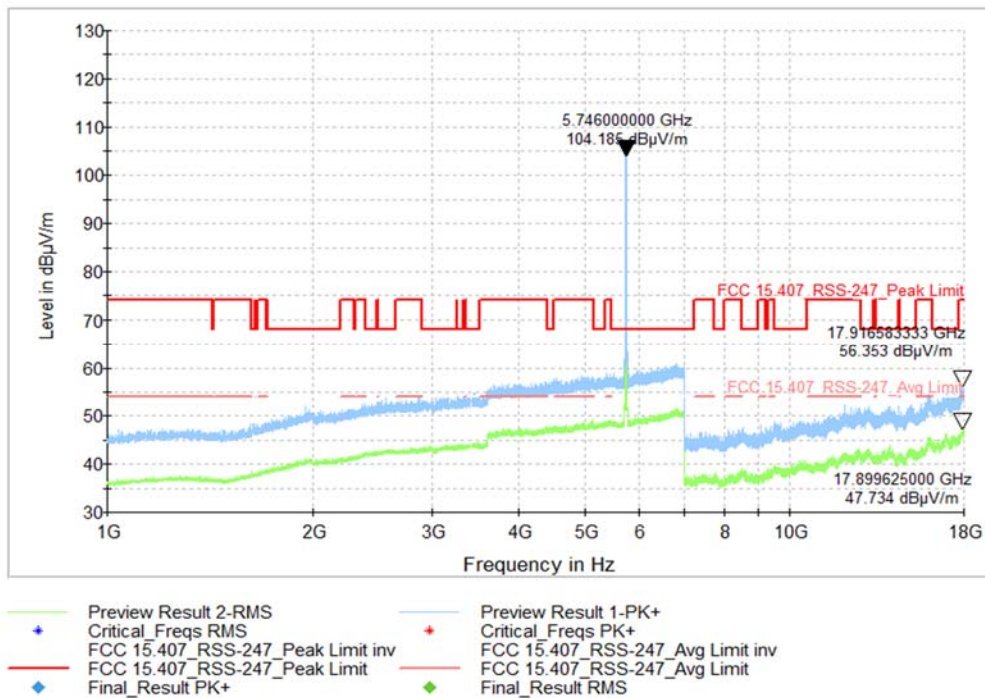
Plot 9-300. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 100)



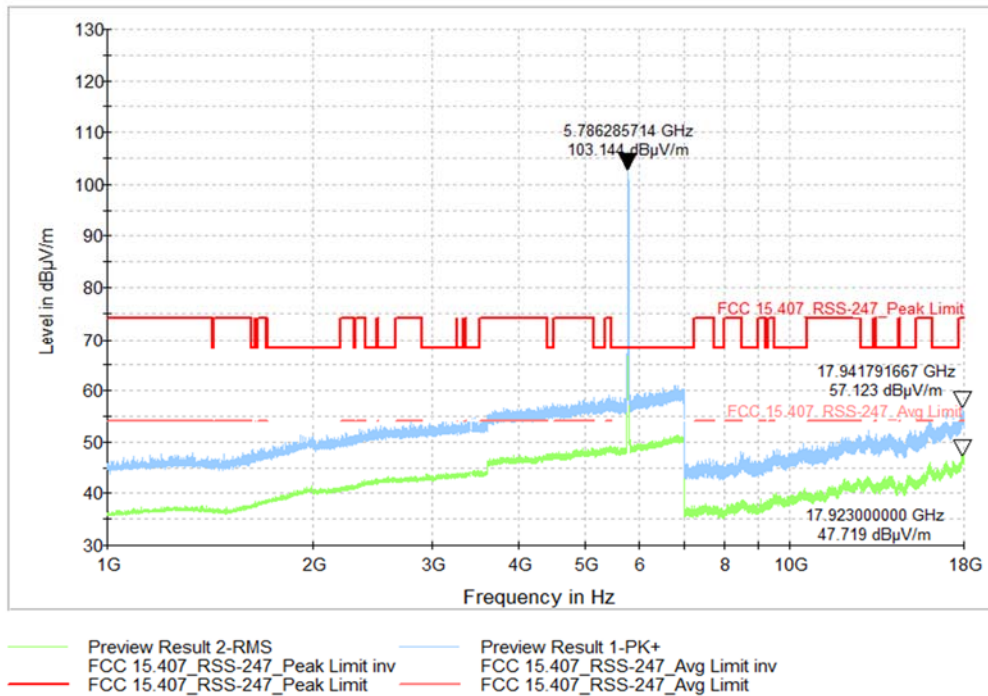
Plot 9-301. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 116)



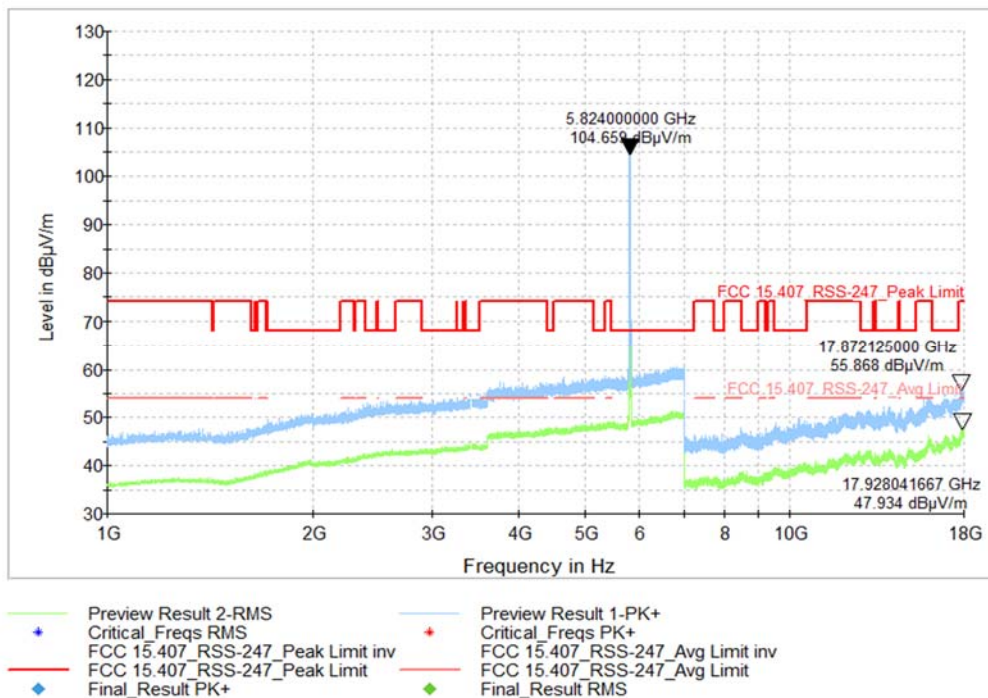
Plot 9-302. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 140)



Plot 9-303. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 149)



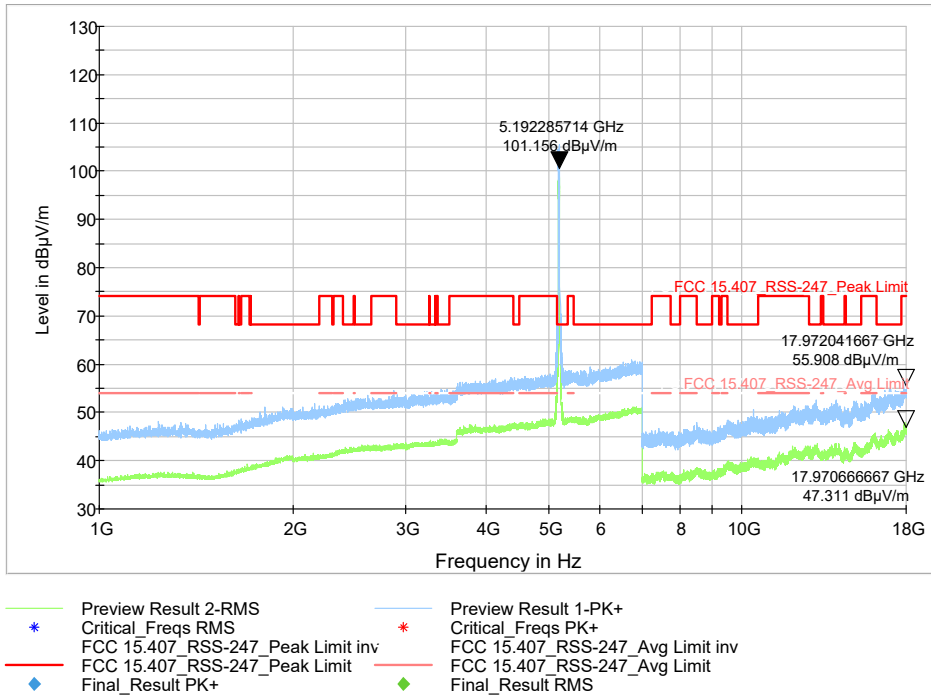
Plot 9-304. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 157)



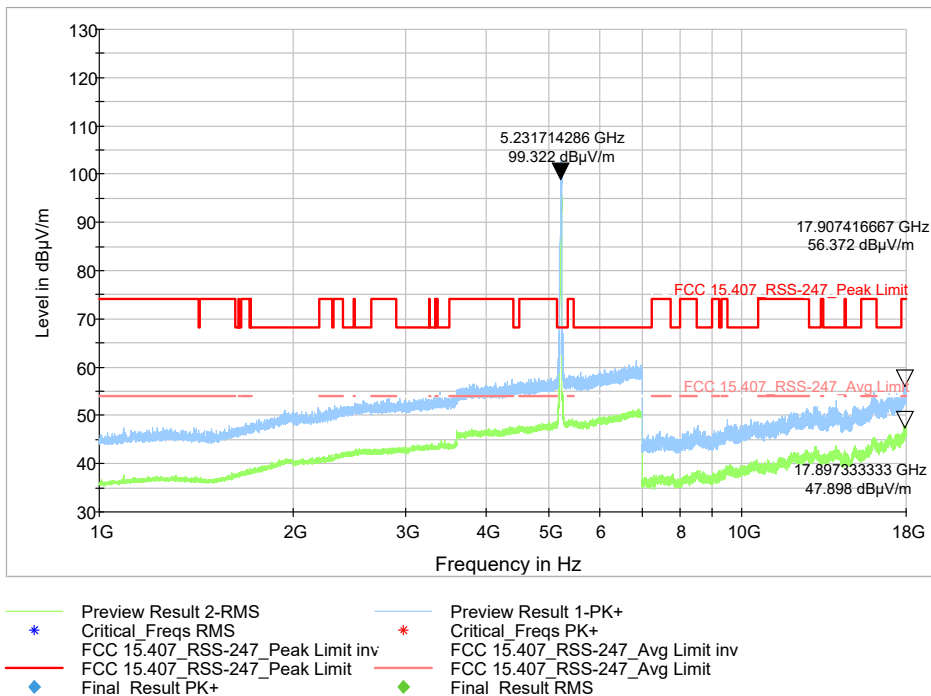
Plot 9-305. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11a (Ch. 165)

9.6.5.3 Radiated Emissions in 1-18 GHz range 802.11n HT40

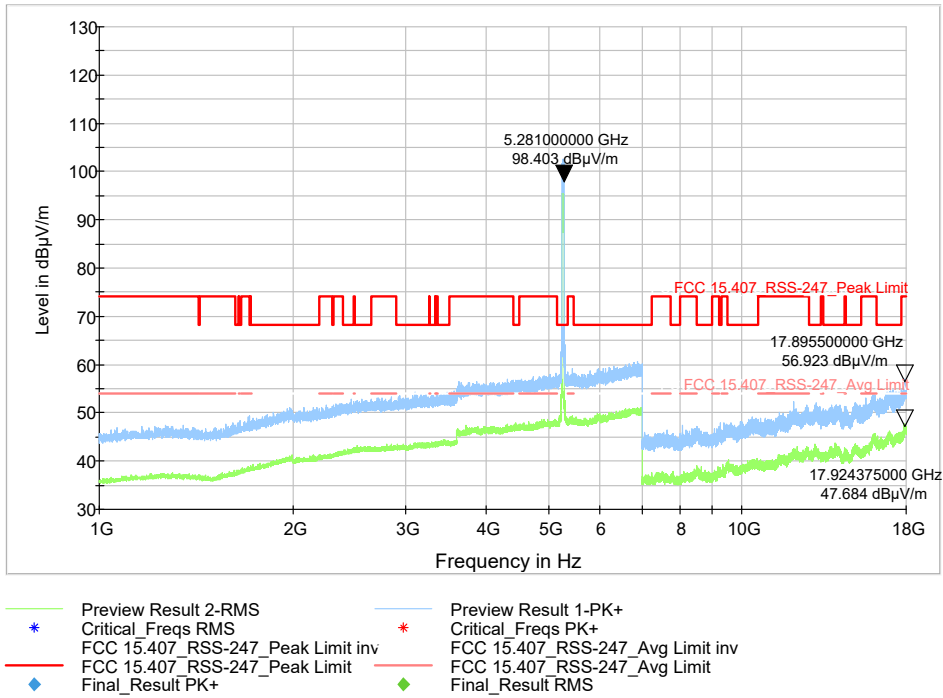
No significant emissions to report above noise floor.



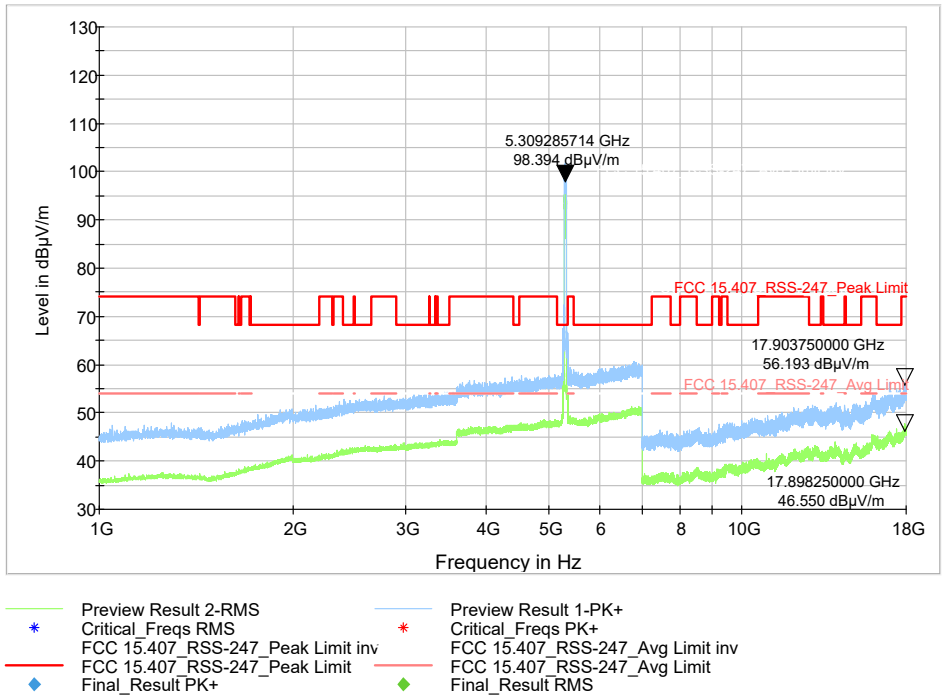
Plot 9-306. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 38)



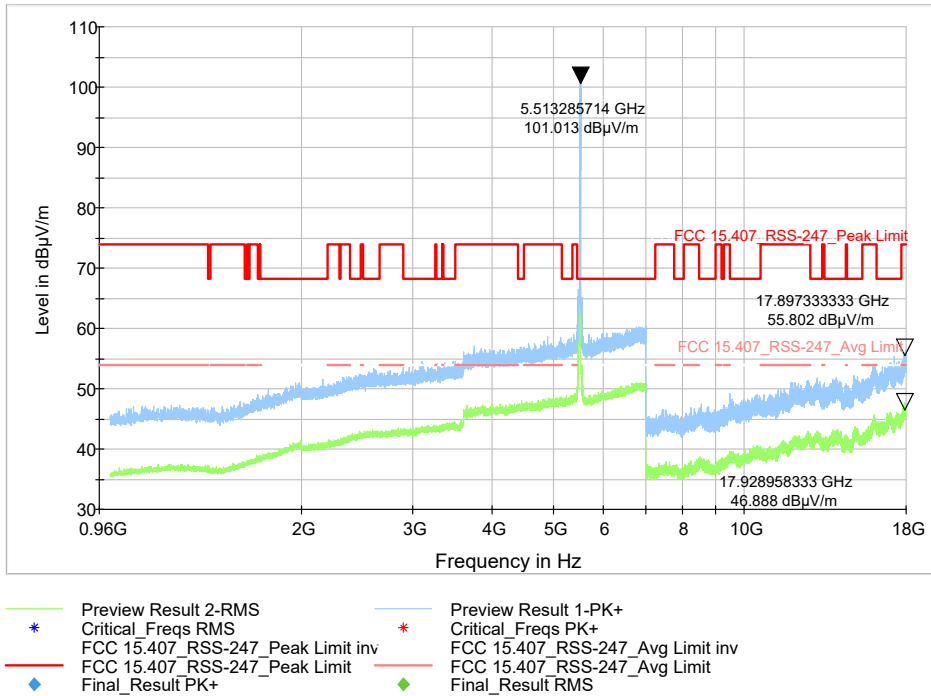
Plot 9-307. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 46)



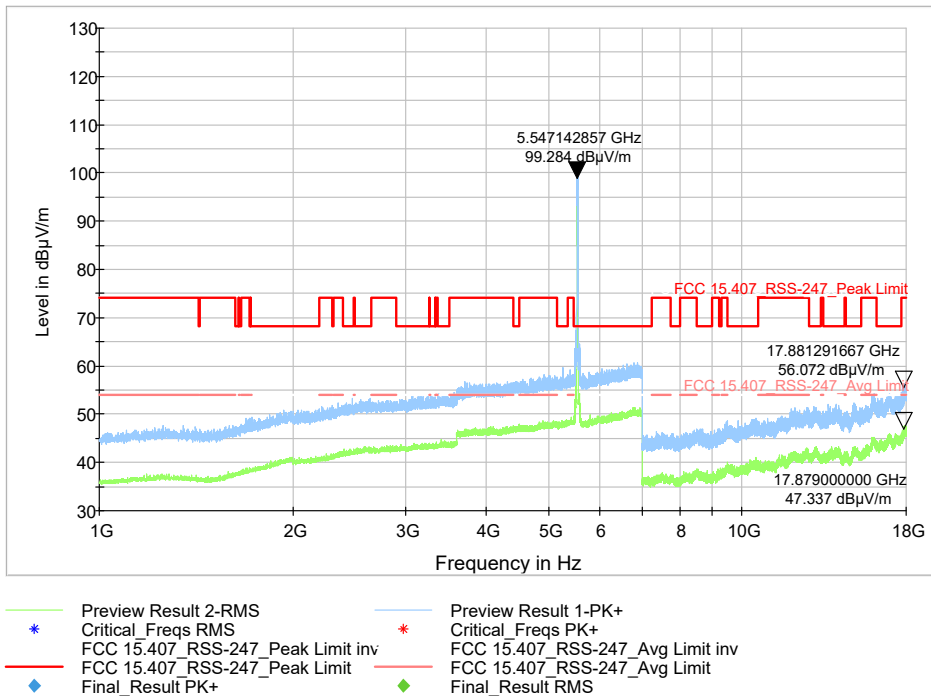
Plot 9-308. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 54)



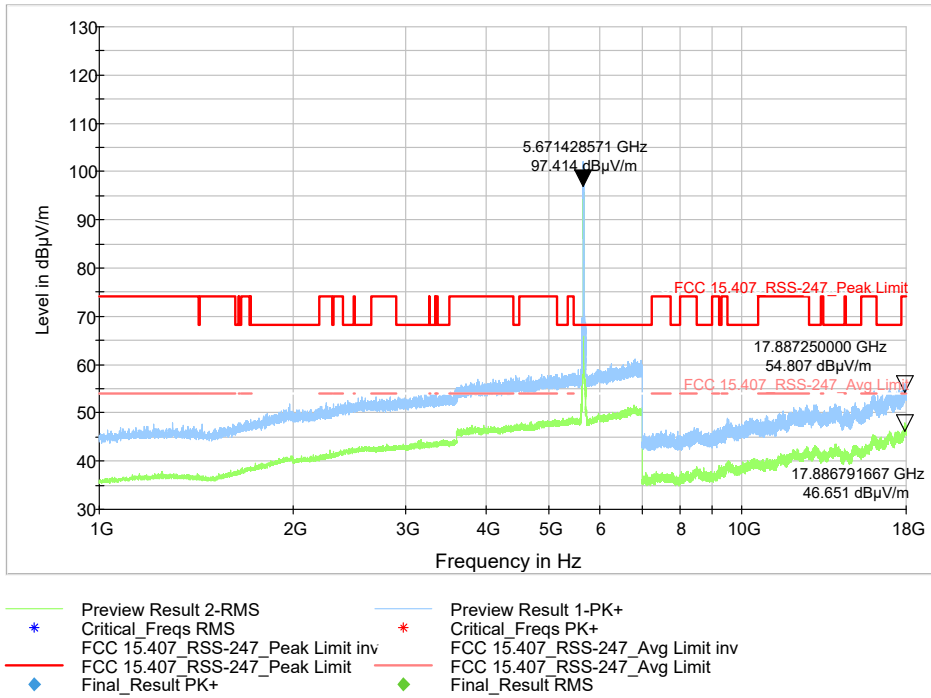
Plot 9-309. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 62)



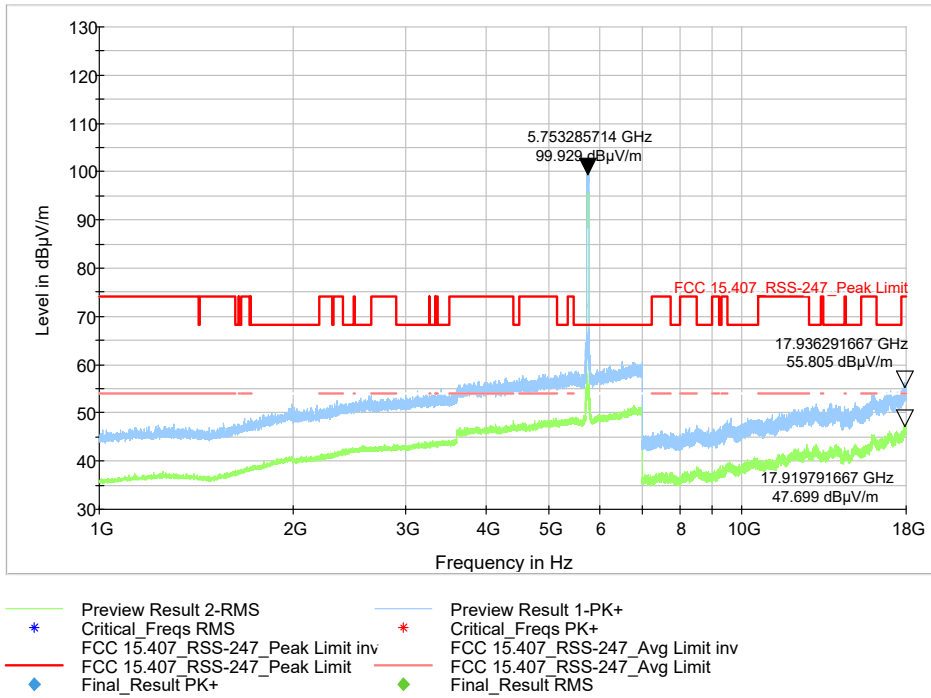
Plot 310. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 102)



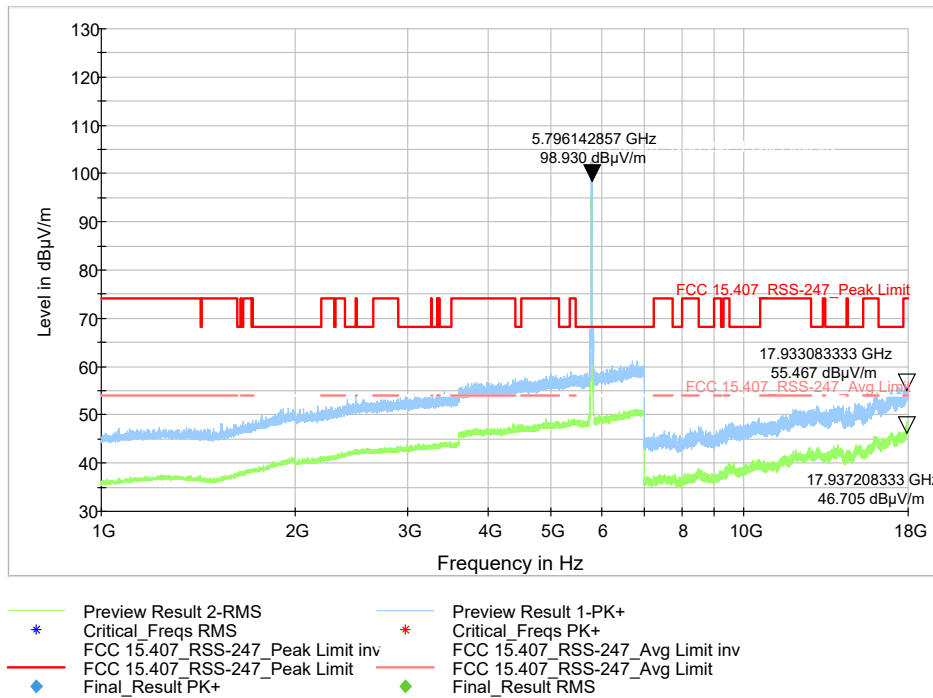
Plot 9-311. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 110)



Plot 9-312. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 134)



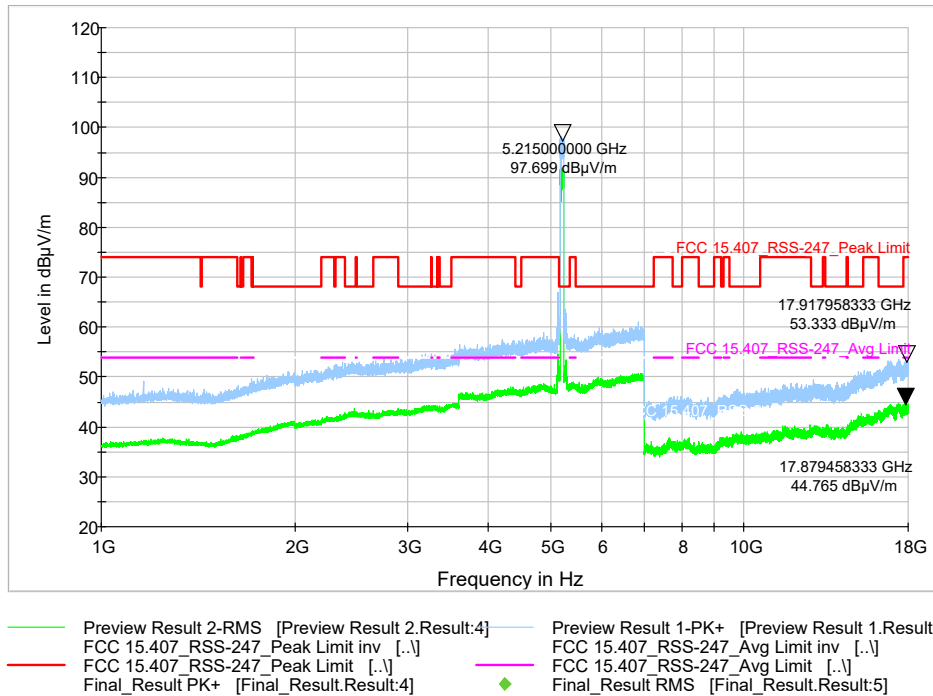
Plot 9-313. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 151)



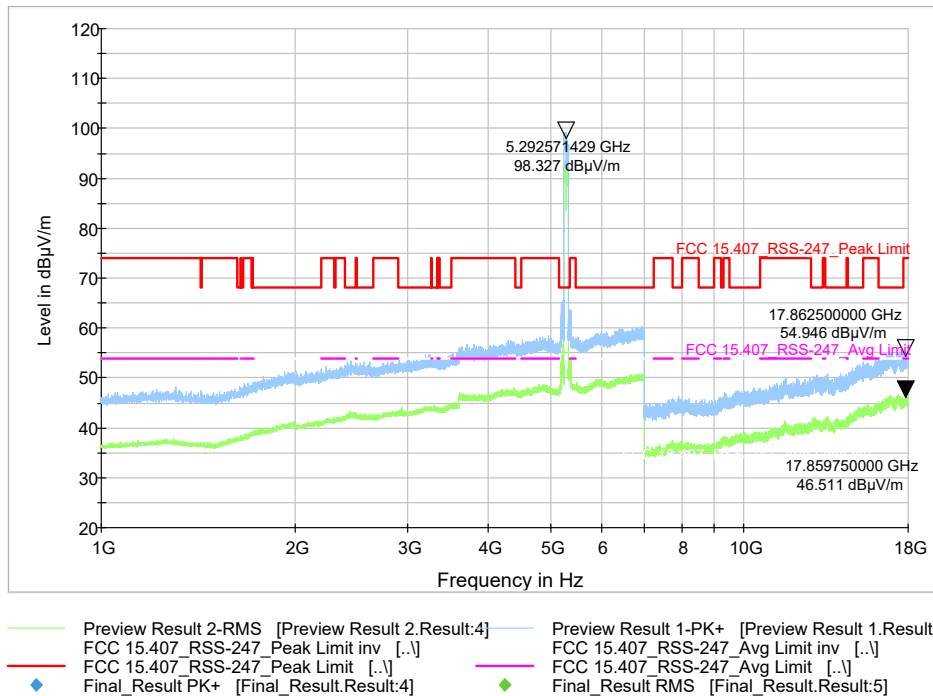
Plot 9-314. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11n HT40 (Ch. 159)

9.6.5.4 Radiated Emissions in 1-18 GHz range 802.11ac VHT80

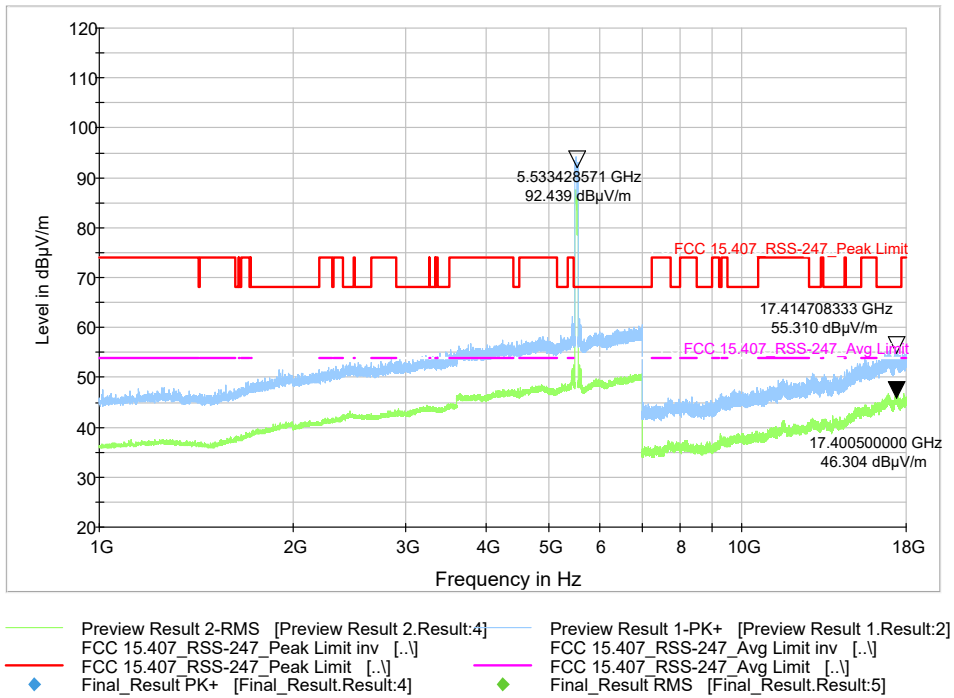
No significant emissions to report above noise floor.



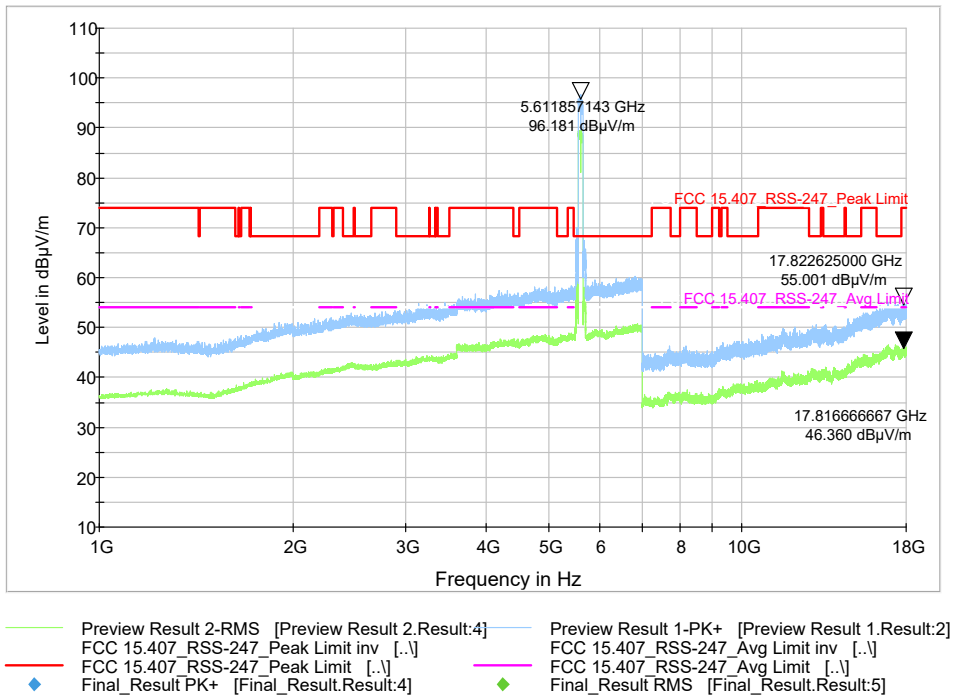
Plot 9-315. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11ac VHT80 (Ch. 42)



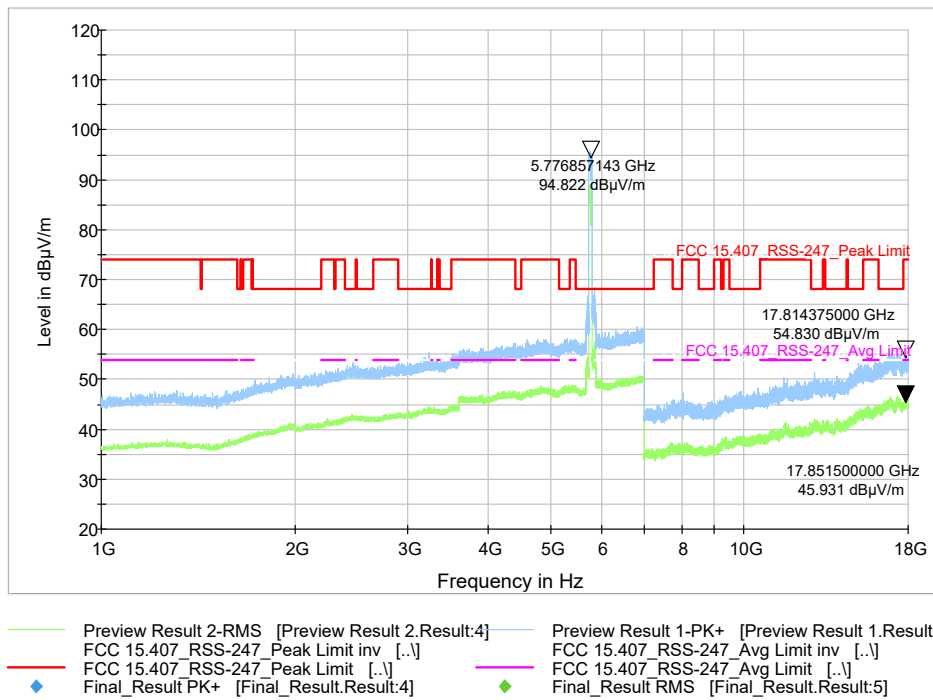
Plot 9-316. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11ac VHT80 (Ch. 58)



Plot 9-317. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11ac VHT80 (Ch. 106)



Plot 9-318. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11ac VHT80 (Ch. 122)

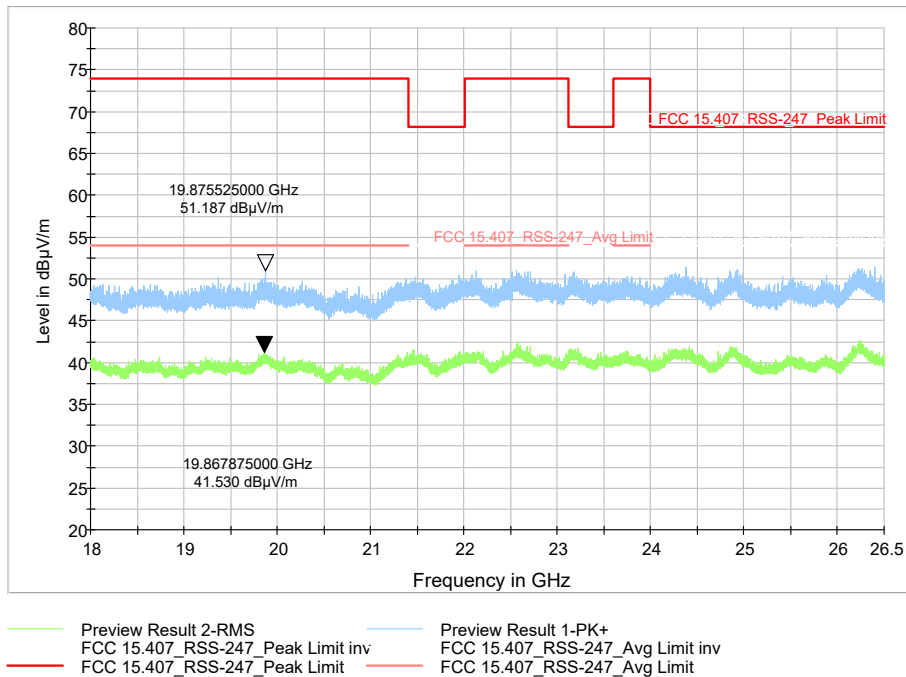


Plot 9-319. Radiated Spurious Emissions 1-18 GHz Tx Chains A & B 802.11ac VHT80 (Ch. 155)

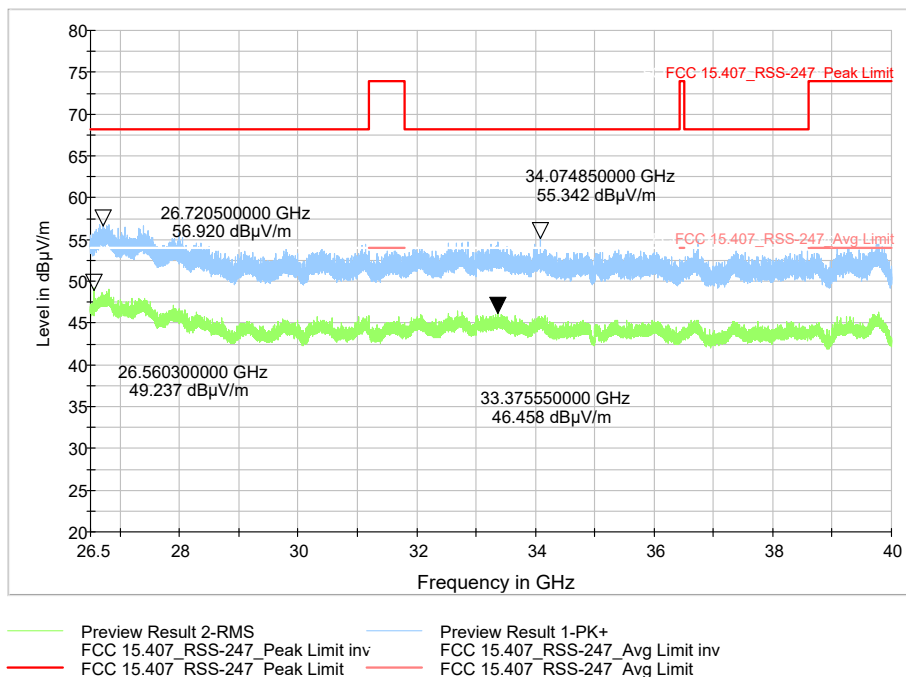
9.6.5.5 Emissions in 18-40 GHz range

No significant emissions to report above noise floor. Near field scans were performed in 18GHz to 40GHz range. 4th harmonics were found at the EUT antenna port at a distance of 10cm, but not measurable at 3m distance.

All channels and modes were tested and data from 802.11n mode, channel 64 shown here.

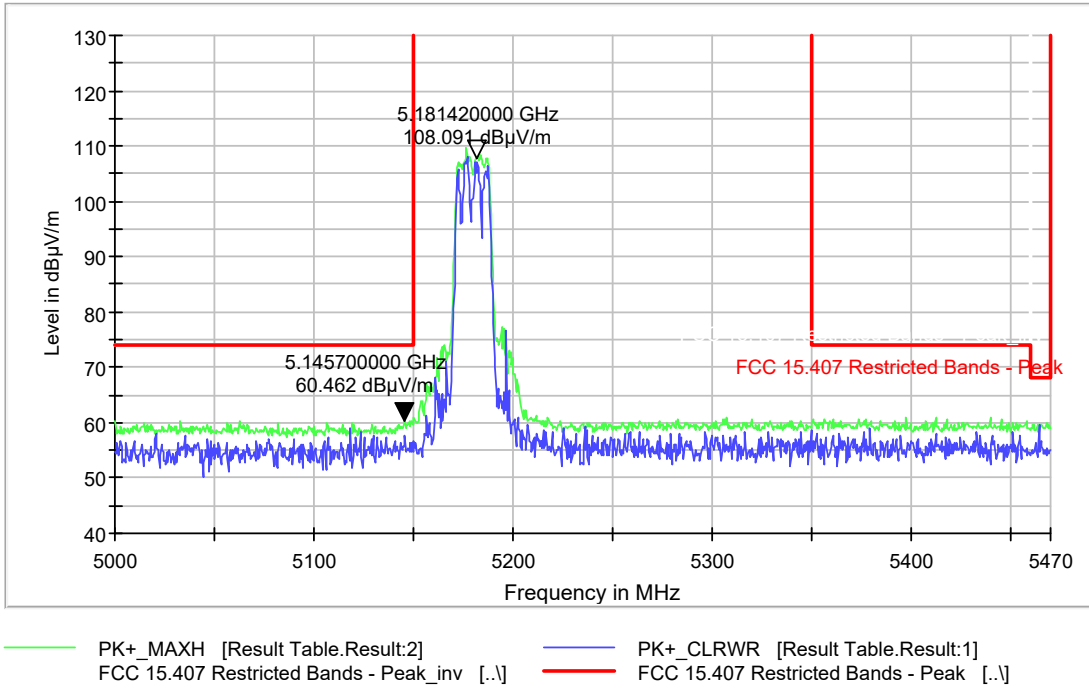


Plot 9-320. Radiated Spurious Emissions 18-26 GHz Tx A & B 802.11n HT20 (Ch. 64)

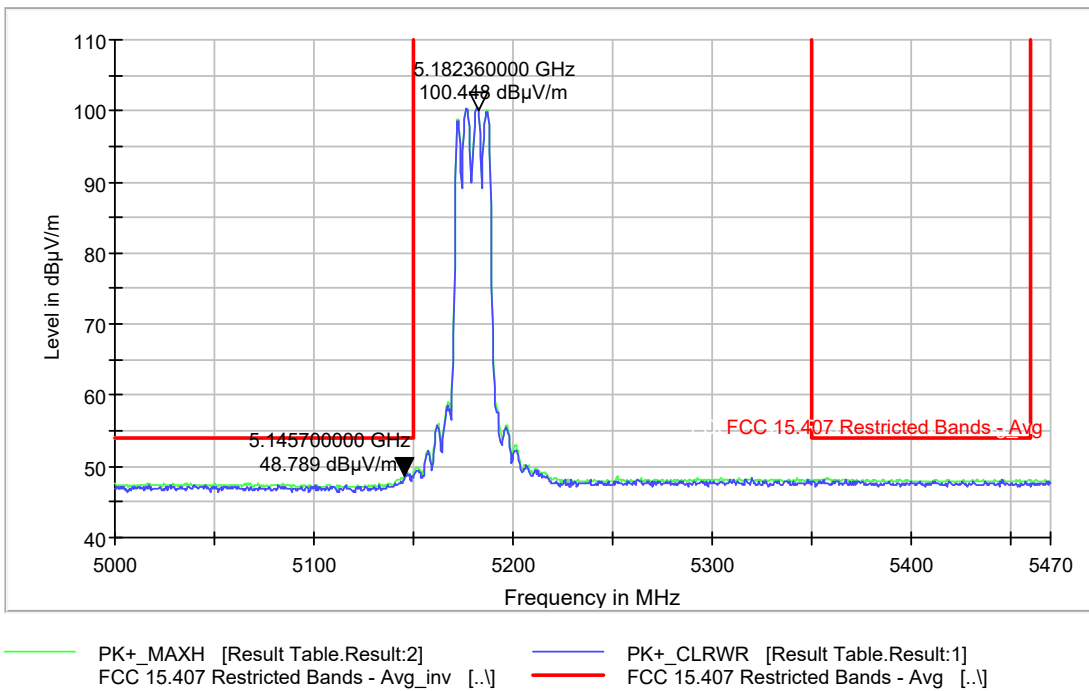


Plot 9-321. Radiated Spurious Emissions 26-40 GHz Tx A & B 802.11n HT20 (Ch. 64)

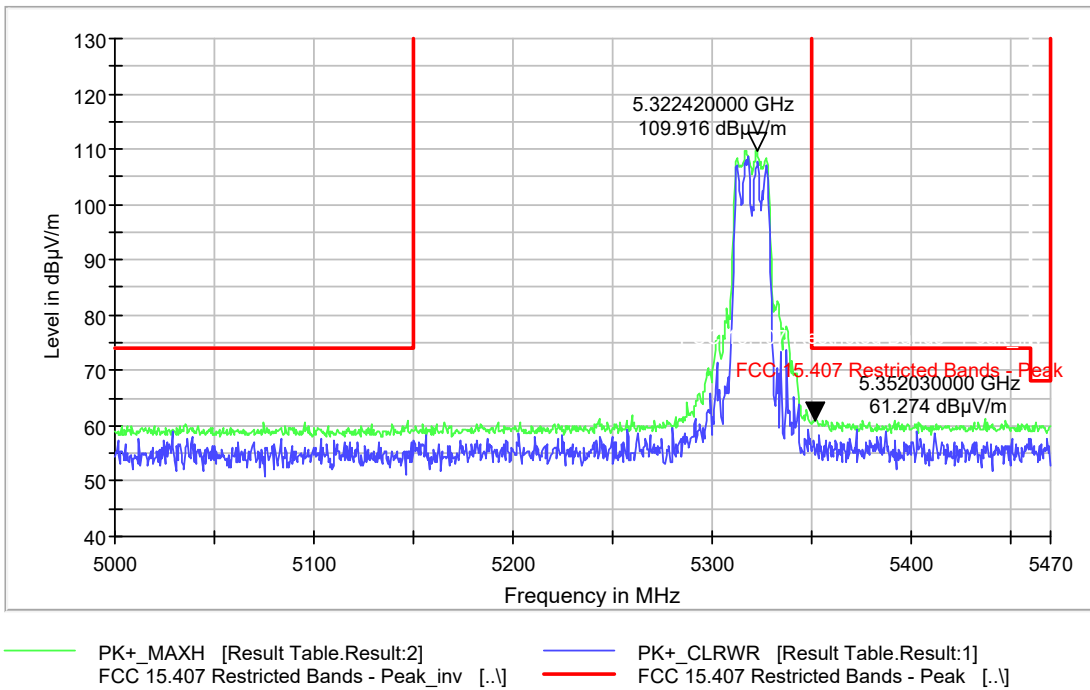
9.6.5.6 Radiated Band-edge emissions 802.11a



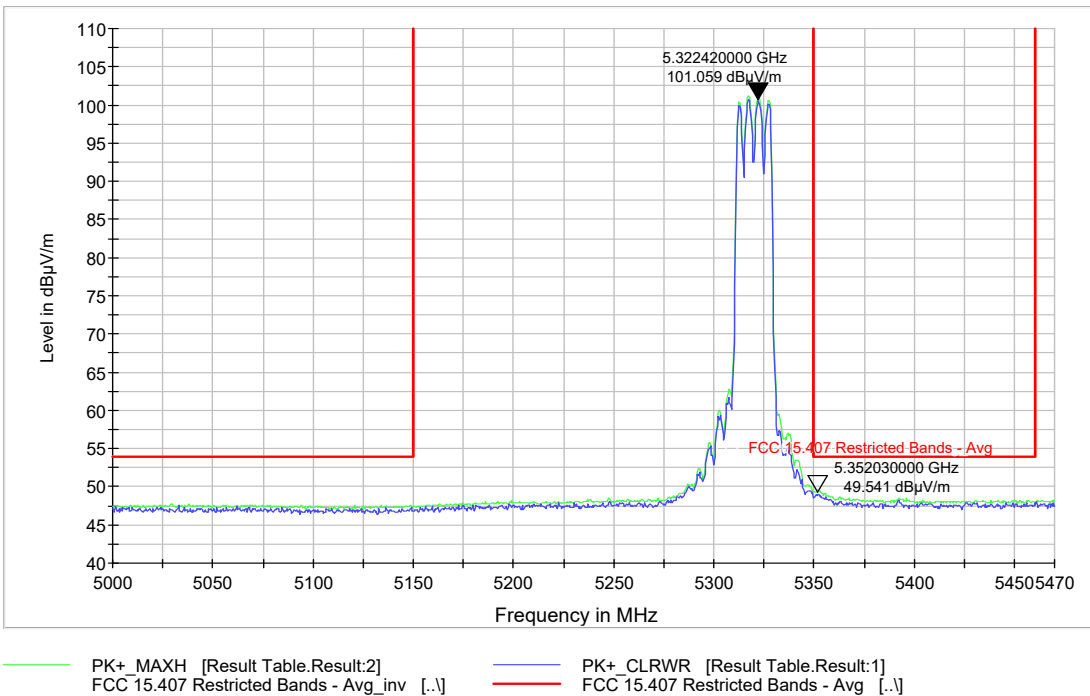
Plot 9-322. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 36)



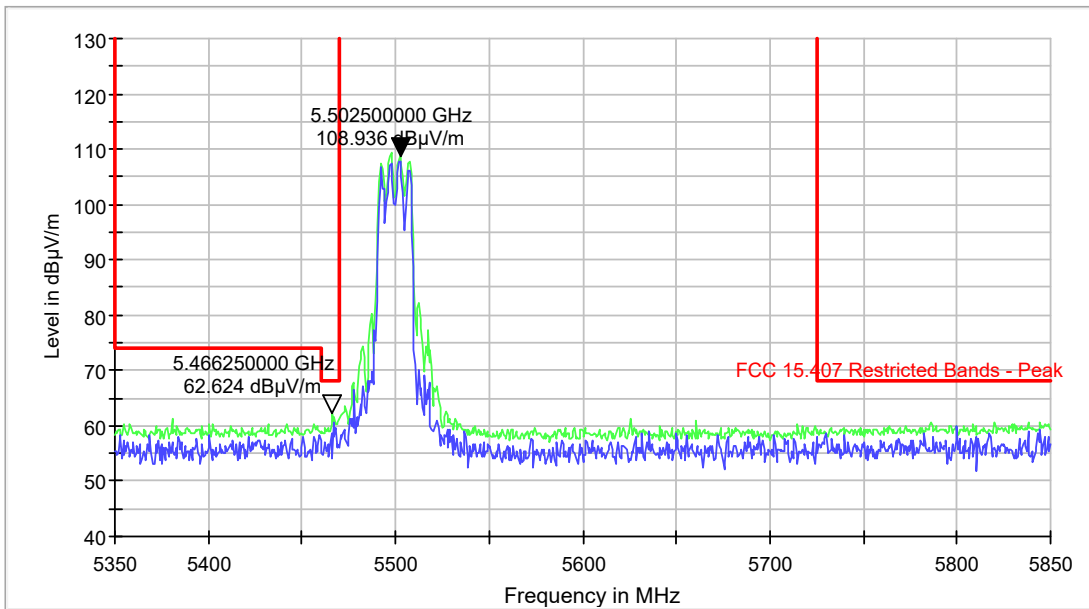
Plot 9-323. Average Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 36)



Plot 9-324. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 64)

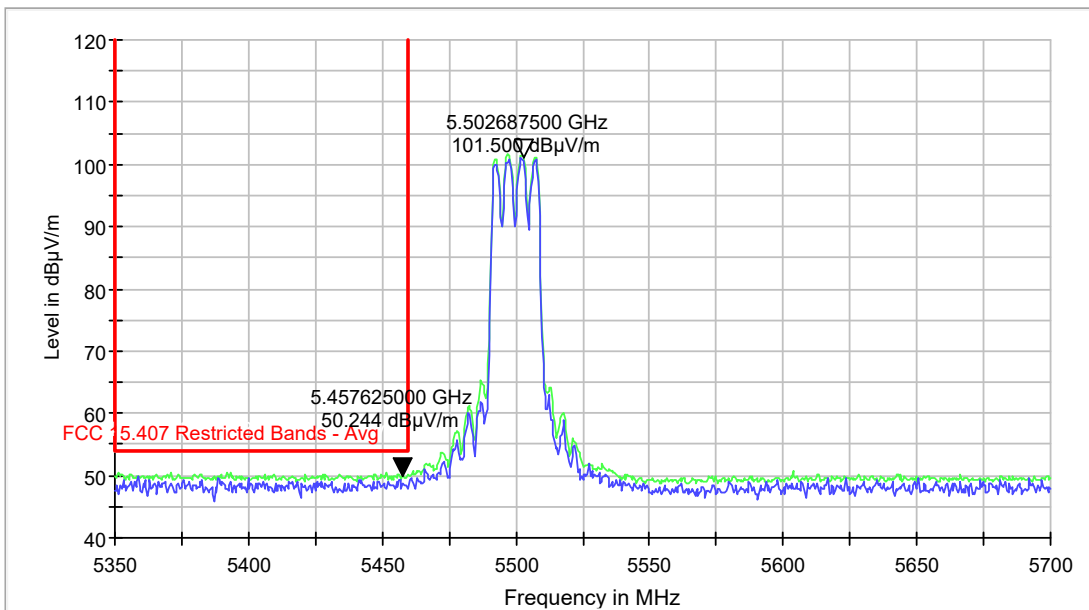


Plot 9-325. Average Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 64)



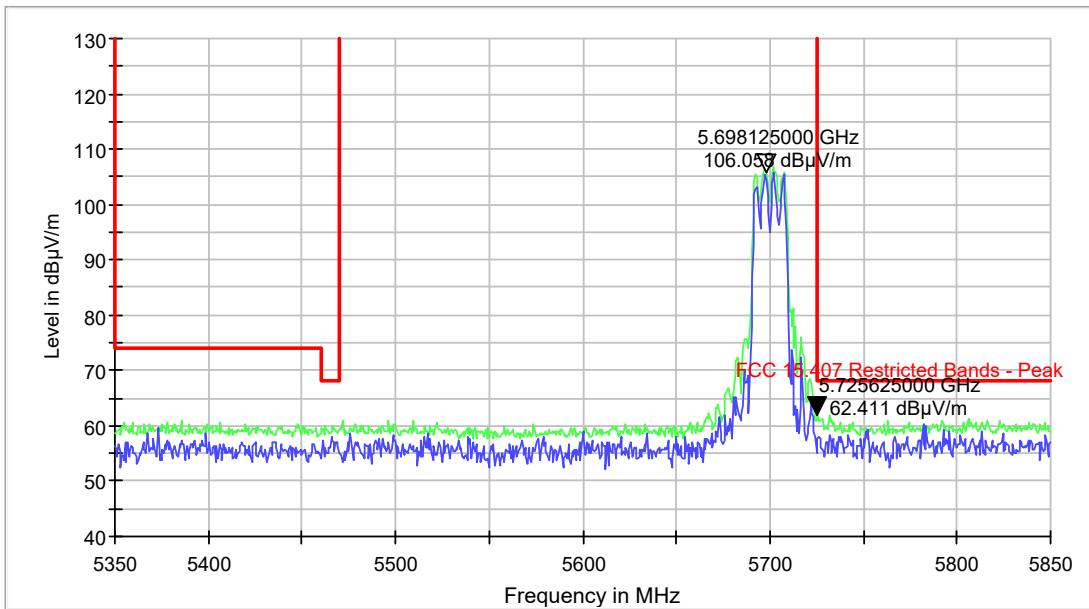
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Peak [..]

Plot 9-326. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 100)



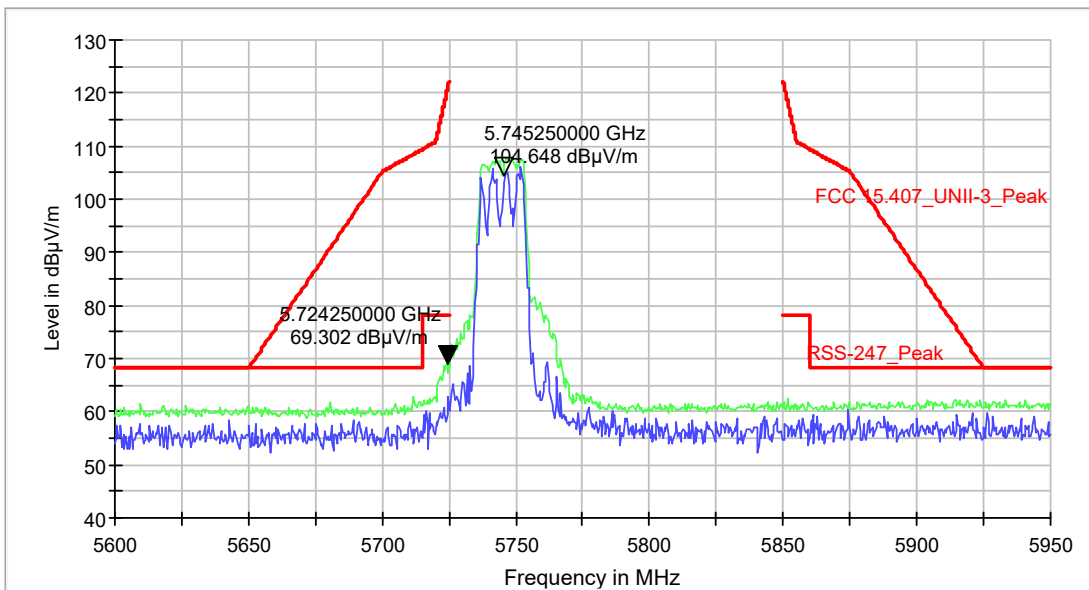
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Avg_inv [..] — FCC 15.407 Restricted Bands - Avg [..]

Plot 9-327. Average Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 100)



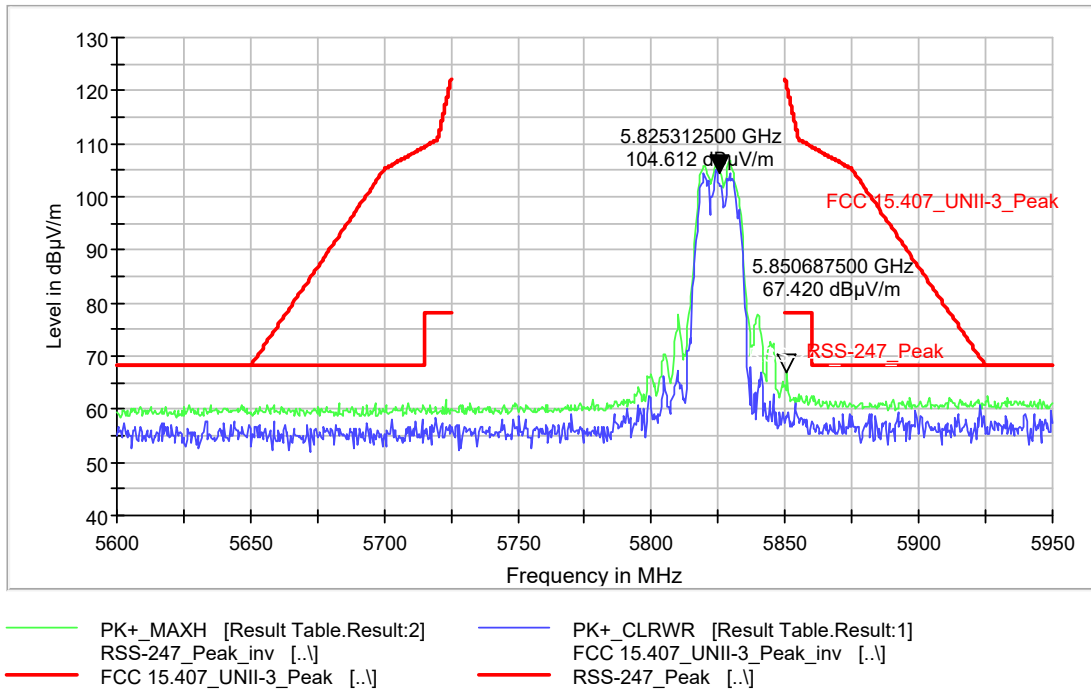
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Peak [..]

Plot 9-328. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 140)



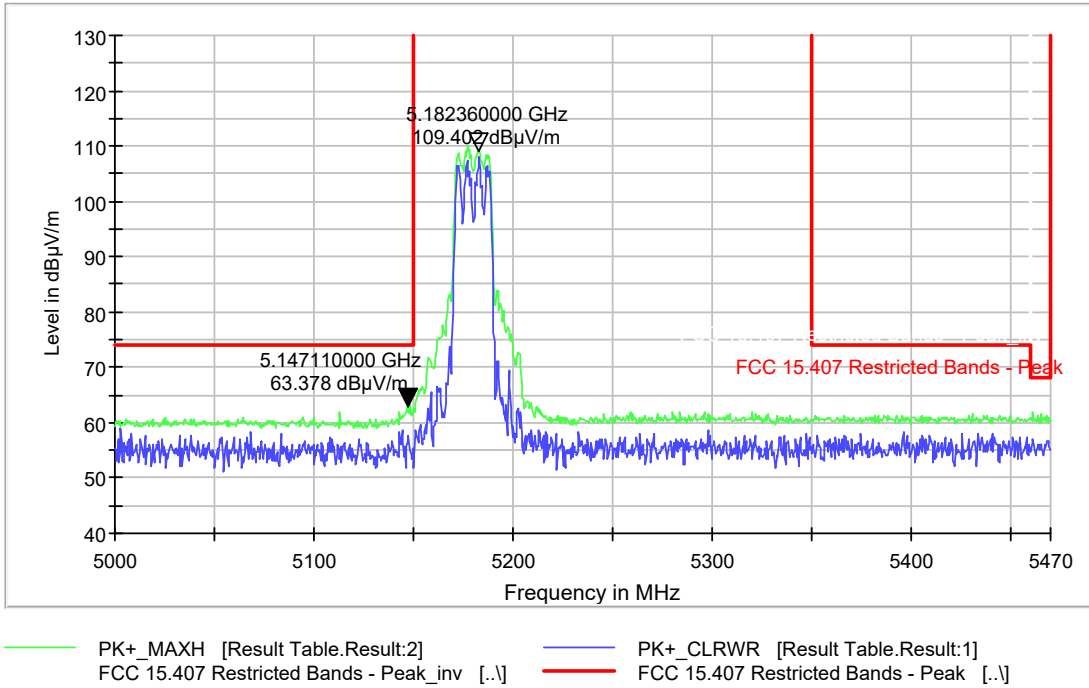
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— RSS-247_Peak_inv [..] — FCC 15.407_UNII-3_Peak_inv [..]
— FCC 15.407_UNII-3_Peak [..] — RSS-247_Peak [..]

Plot 9-329. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 149)

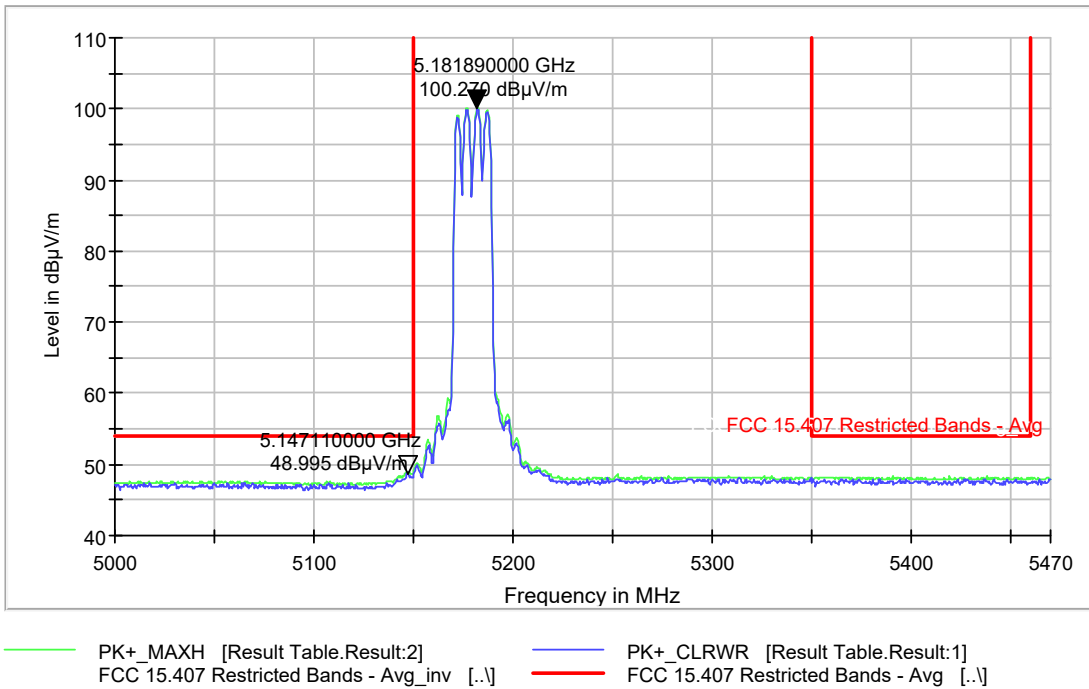


Plot 9-330. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11a (Ch. 165)

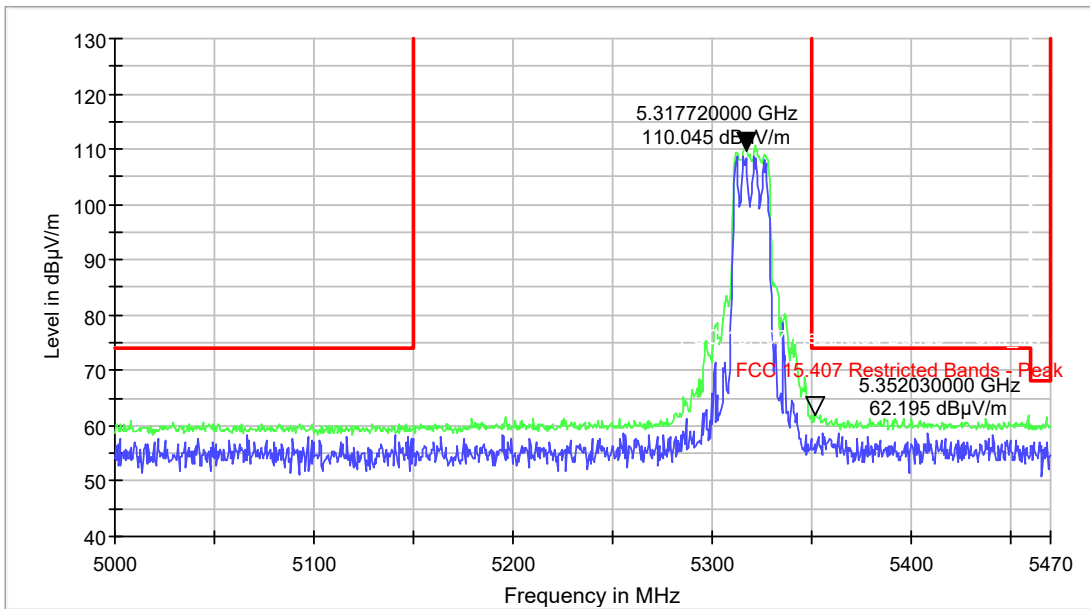
9.6.5.7 Radiated Band-edge emissions 802.11n HT20



Plot 9-331. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 36)

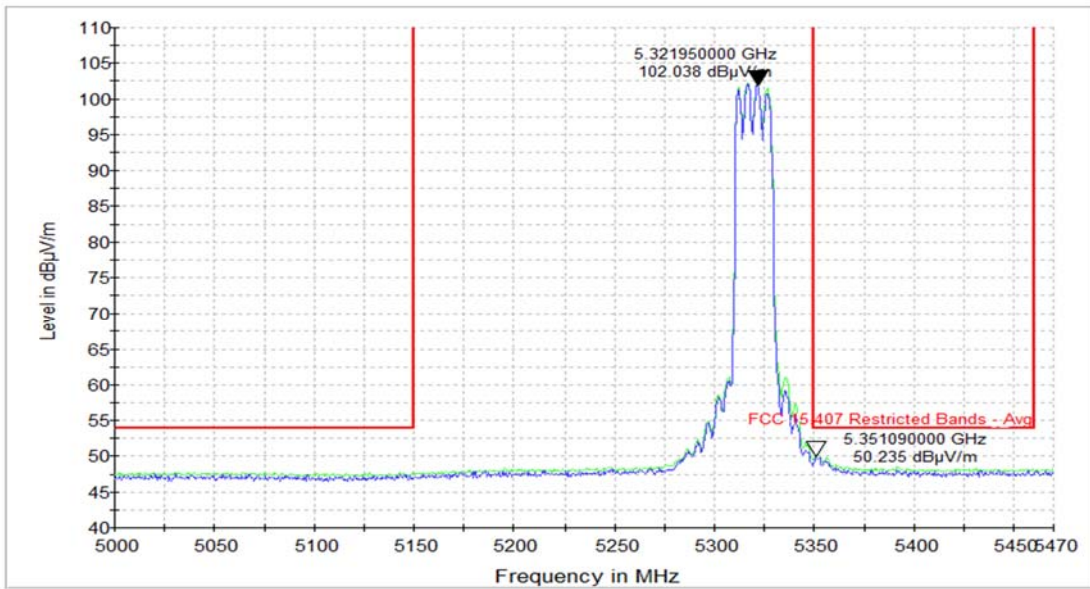


Plot 9-332. Average Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 36)



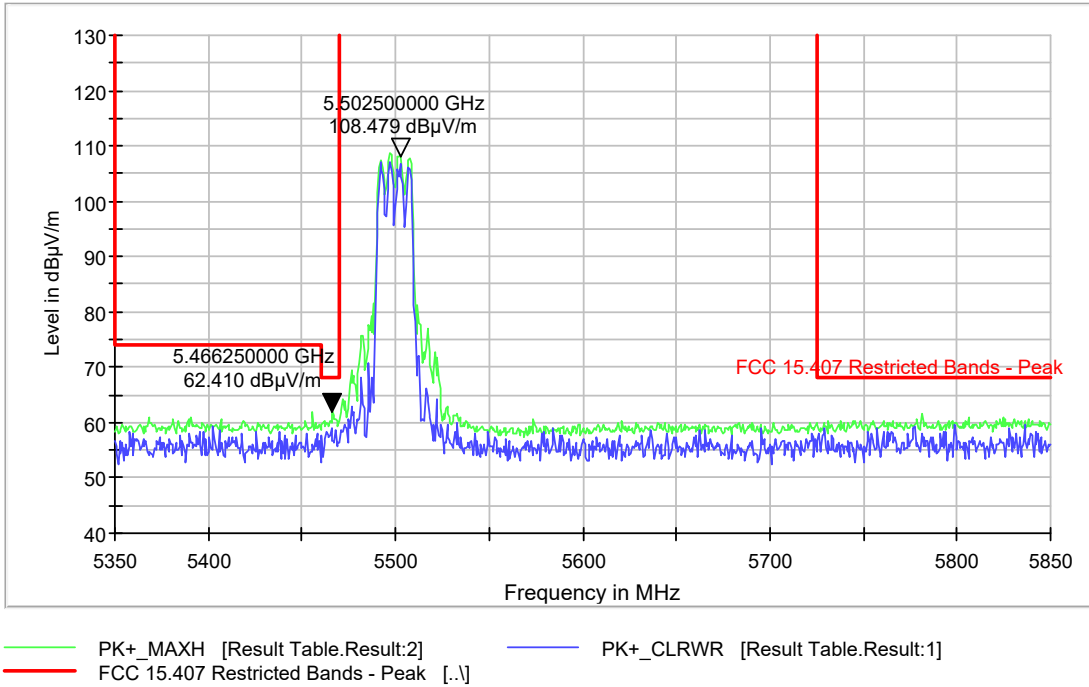
PK+_MAXH [Result Table.Result:2] PK+_CLRWR [Result Table.Result:1]
FCC 15.407 Restricted Bands - Peak_inv [...] FCC 15.407 Restricted Bands - Peak [...]

Plot 9-333. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 64)

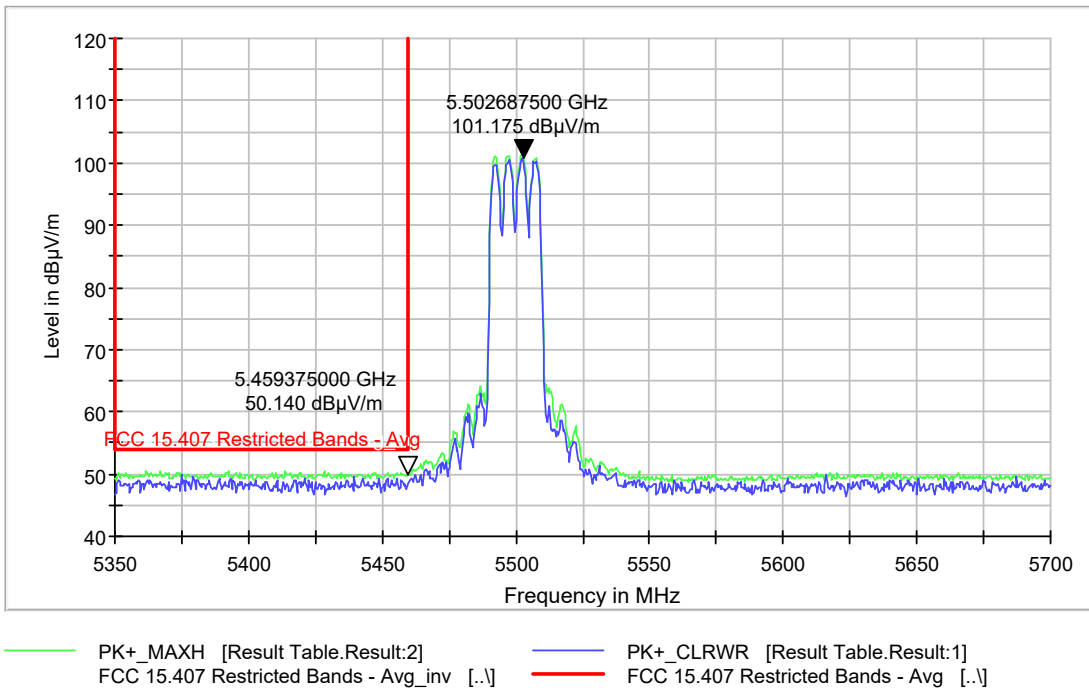


PK+_MAXH [Result Table.Result:2] PK+_CLRWR [Result Table.Result:1]
FCC 15.407 Restricted Bands - Avg_inv [...] FCC 15.407 Restricted Bands - Avg [...]

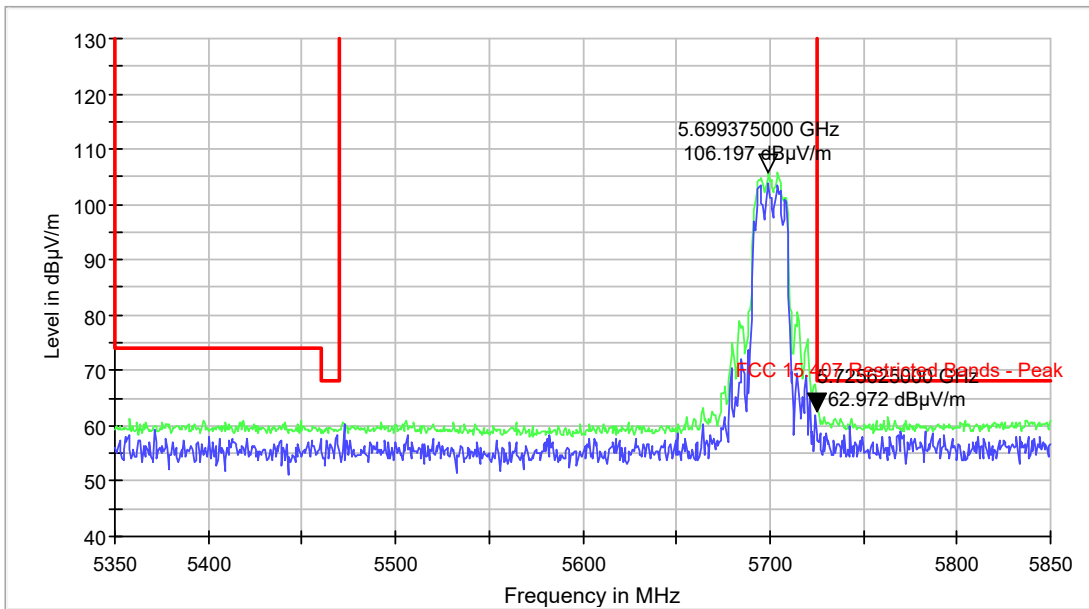
Plot 9-334. Average Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 64)



Plot 9-335. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 100)

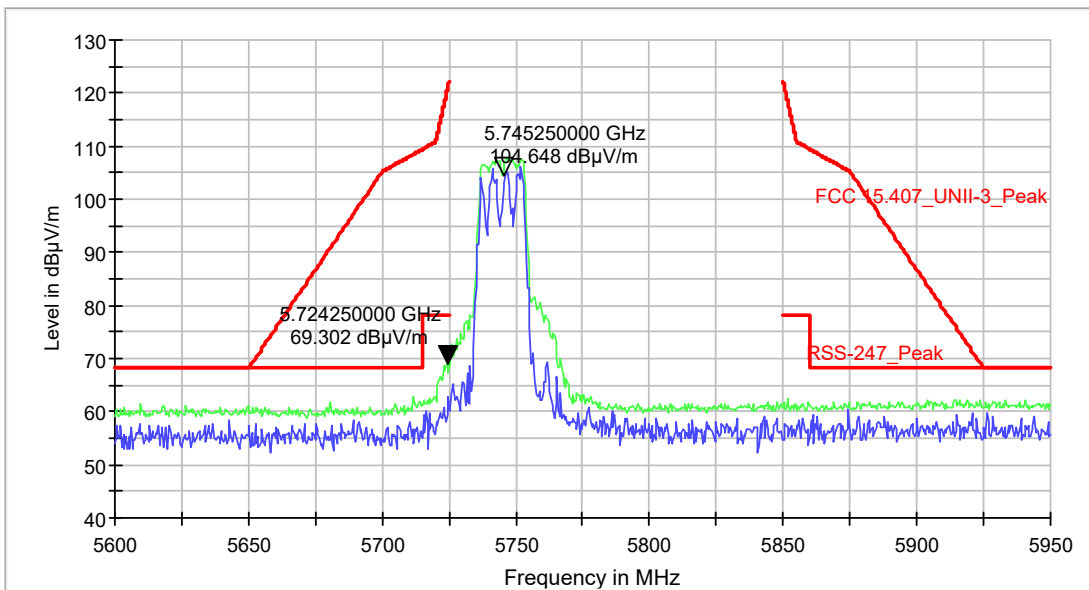


Plot 9-336. Average Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 100)



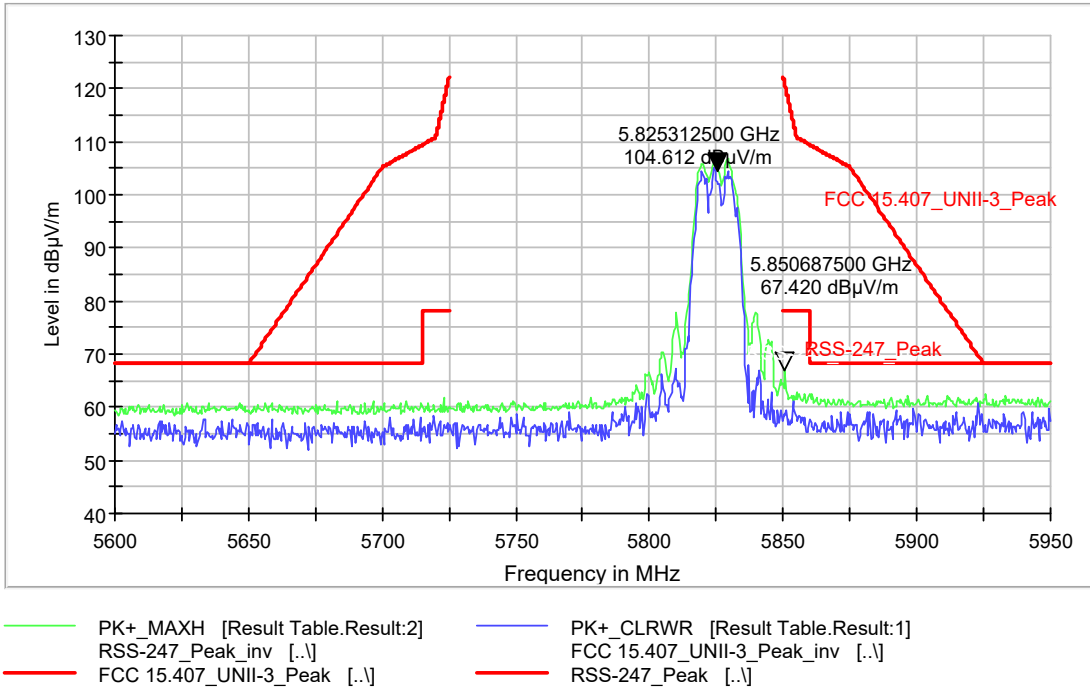
PK+_MAXH [Result Table.Result:2] PK+_CLRWR [Result Table.Result:1]
FCC 15.407 Restricted Bands - Peak [..]

Plot 9-337. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 140)



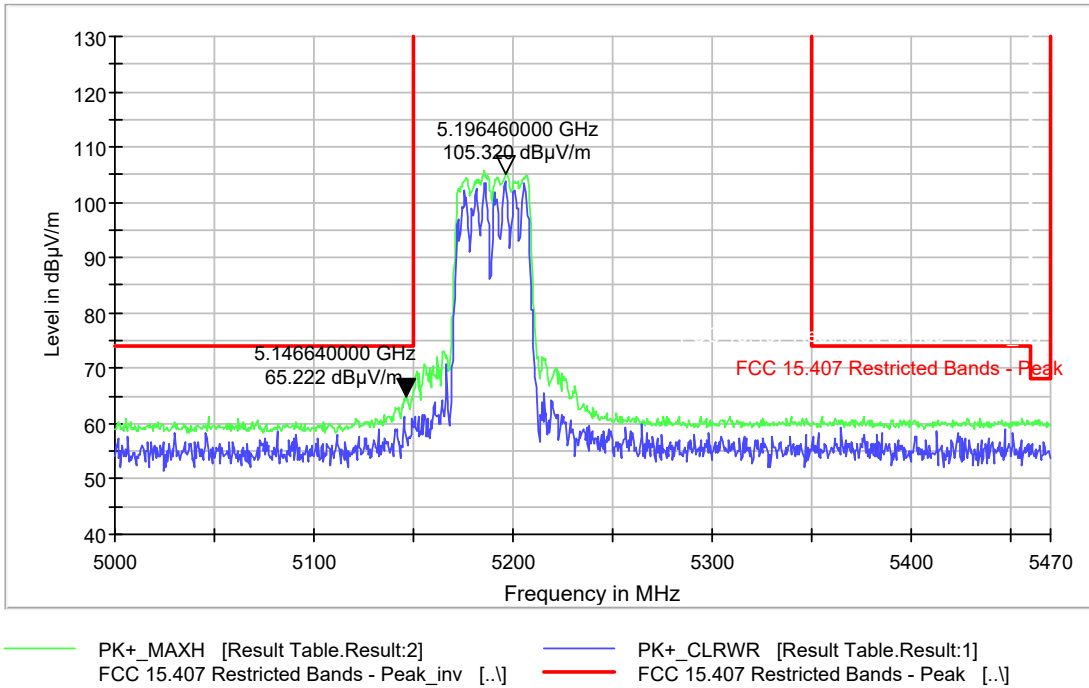
PK+_MAXH [Result Table.Result:2] PK+_CLRWR [Result Table.Result:1]
RSS-247_Peak_inv [..] FCC 15.407_UNII-3_Peak_inv [..]
FCC 15.407_UNII-3_Peak [..] RSS-247_Peak [..]

Plot 9-338. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 149)

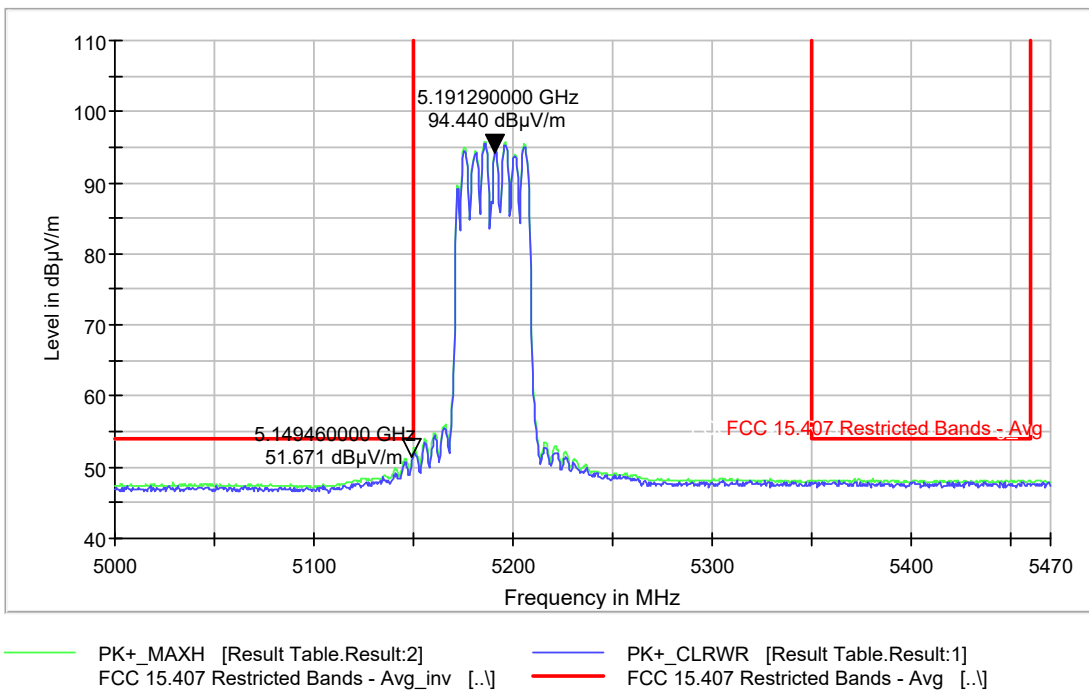


Plot 9-339. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT20 (Ch. 165)

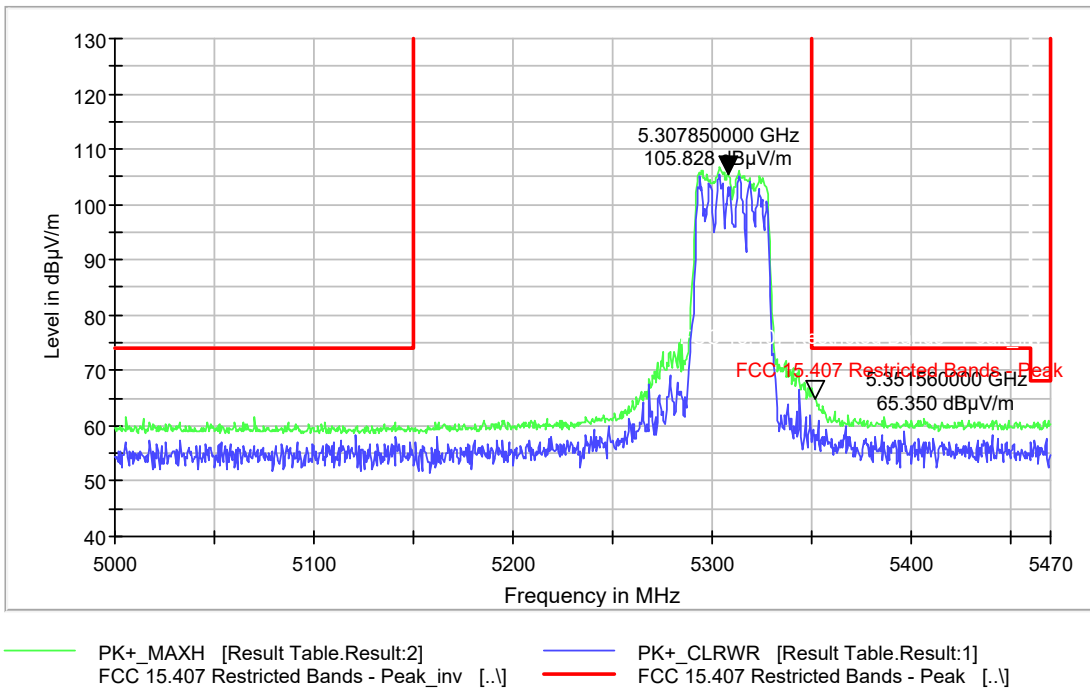
9.6.5.8 Radiated Band-edge emissions 802.11n HT40



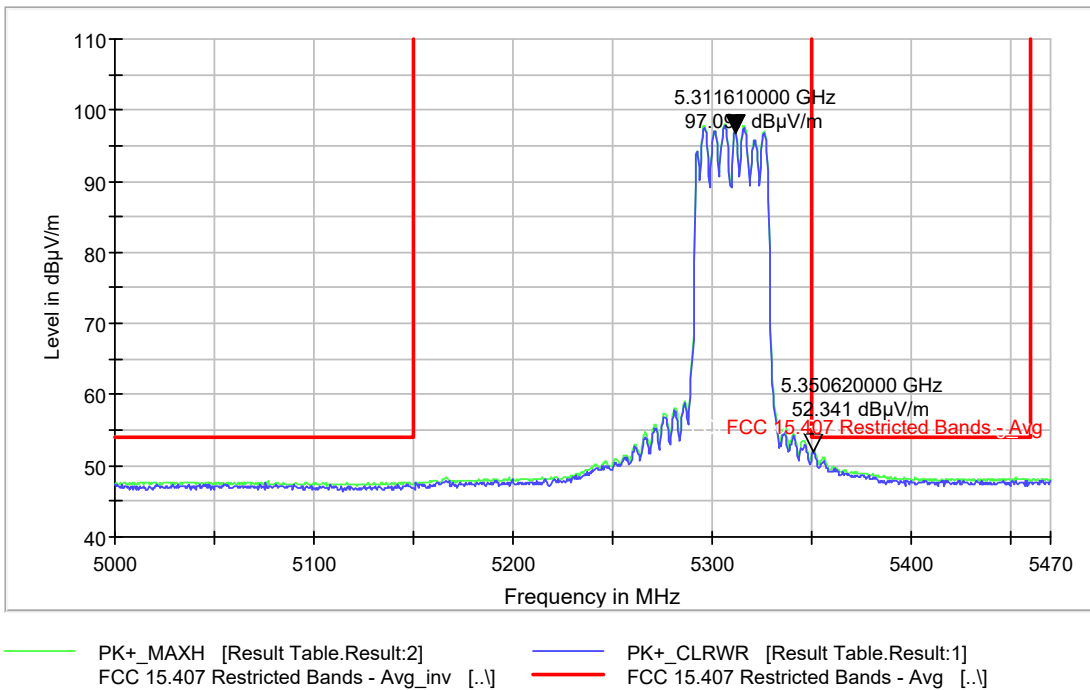
Plot 9-340. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 38)



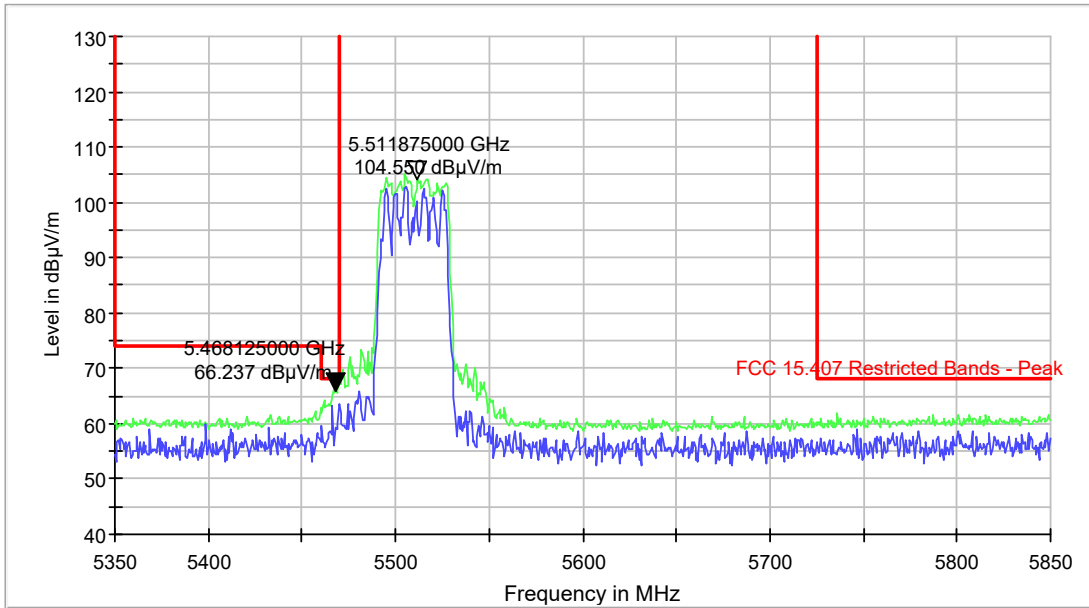
Plot 9-341. Average Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 38)



Plot 9-342. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 62)

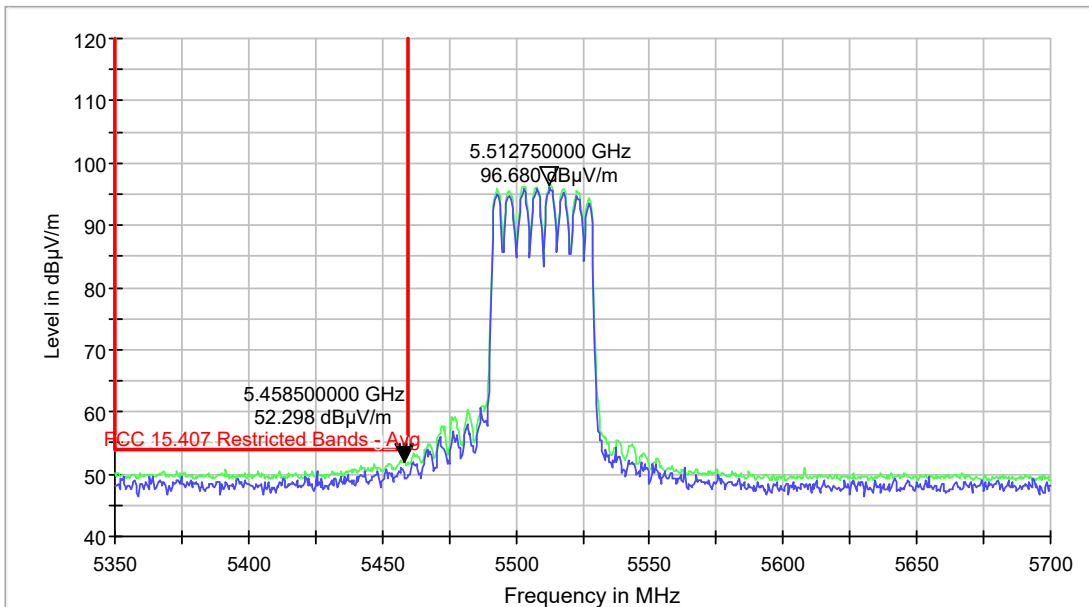


Plot 9-343 . Average Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 62)



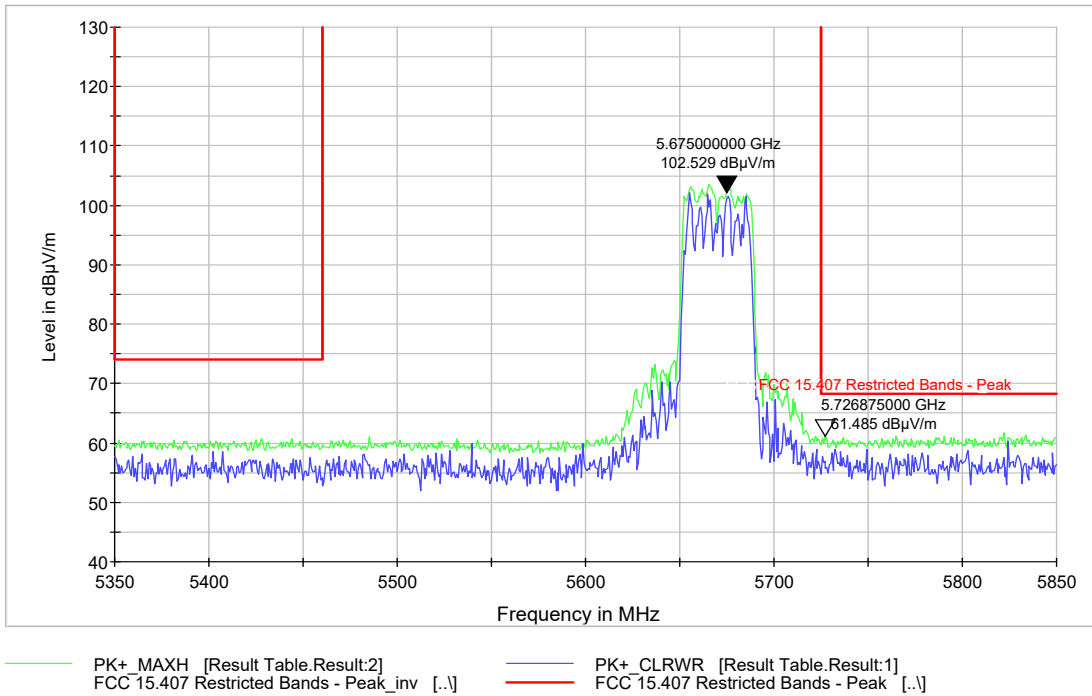
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Peak [...]

Plot 9-344. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 102)

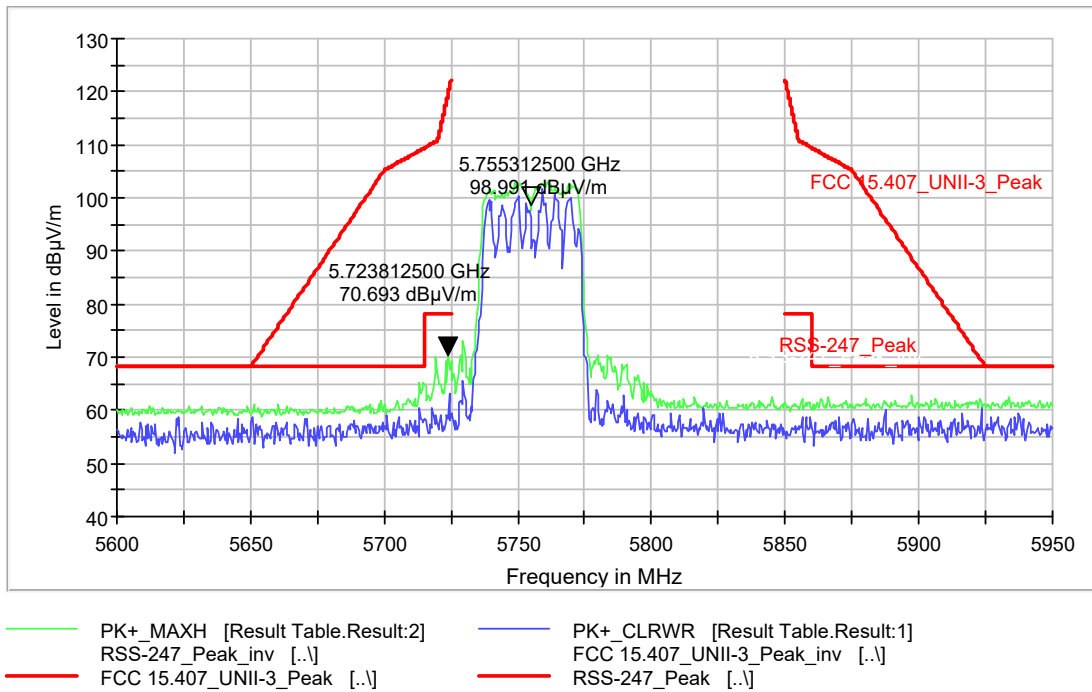


— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Avg_inv [...] — FCC 15.407 Restricted Bands - Avg [...]

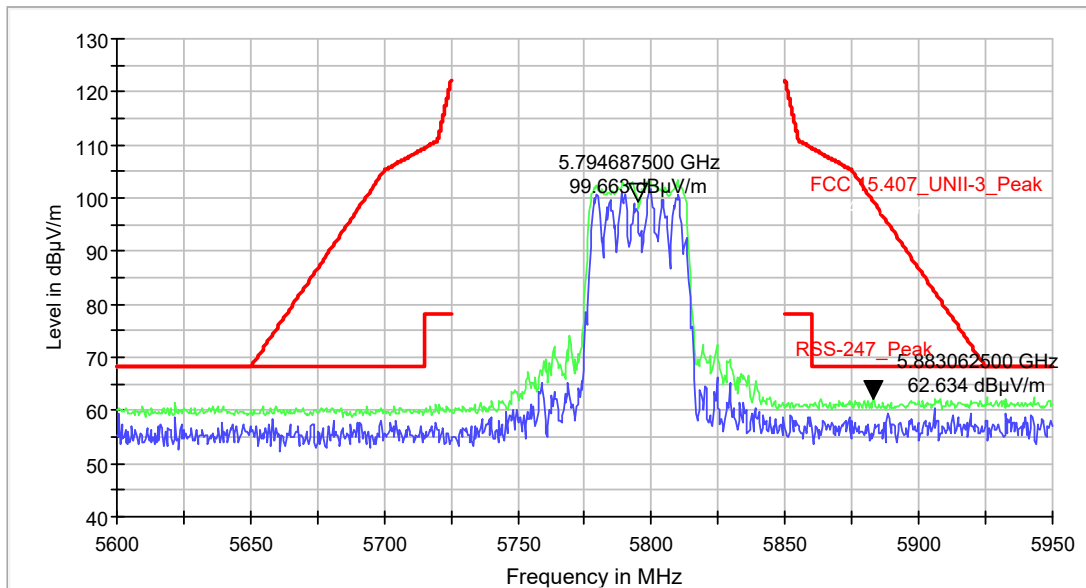
Plot 9-345. Average Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 102)



Plot 9-346. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 134)



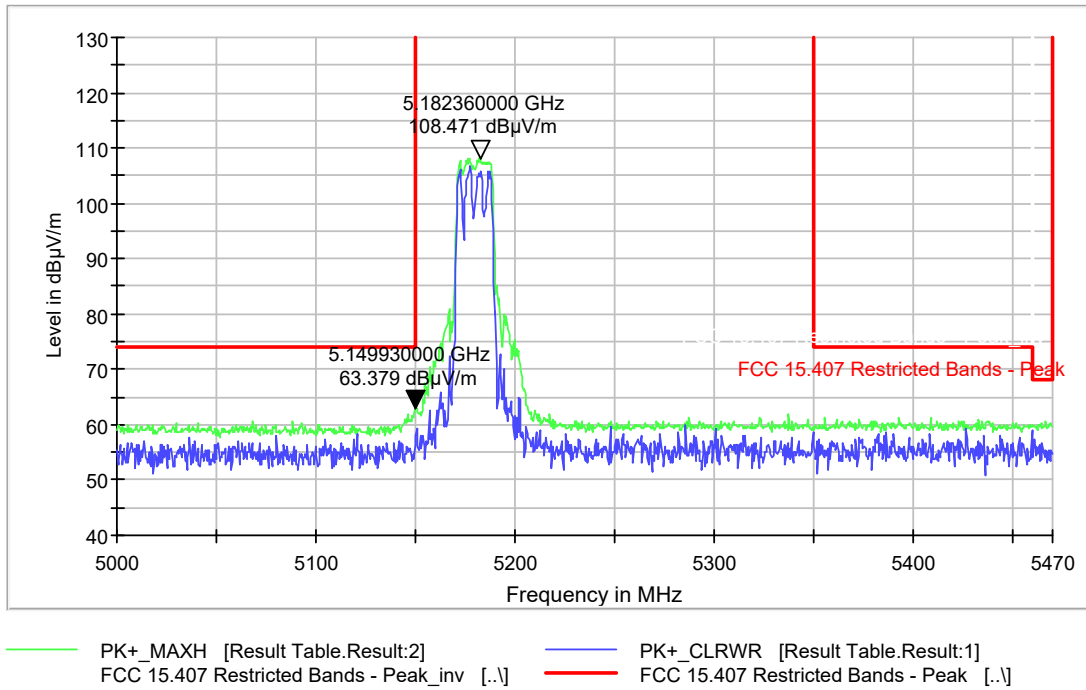
Plot 9-347. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 151)



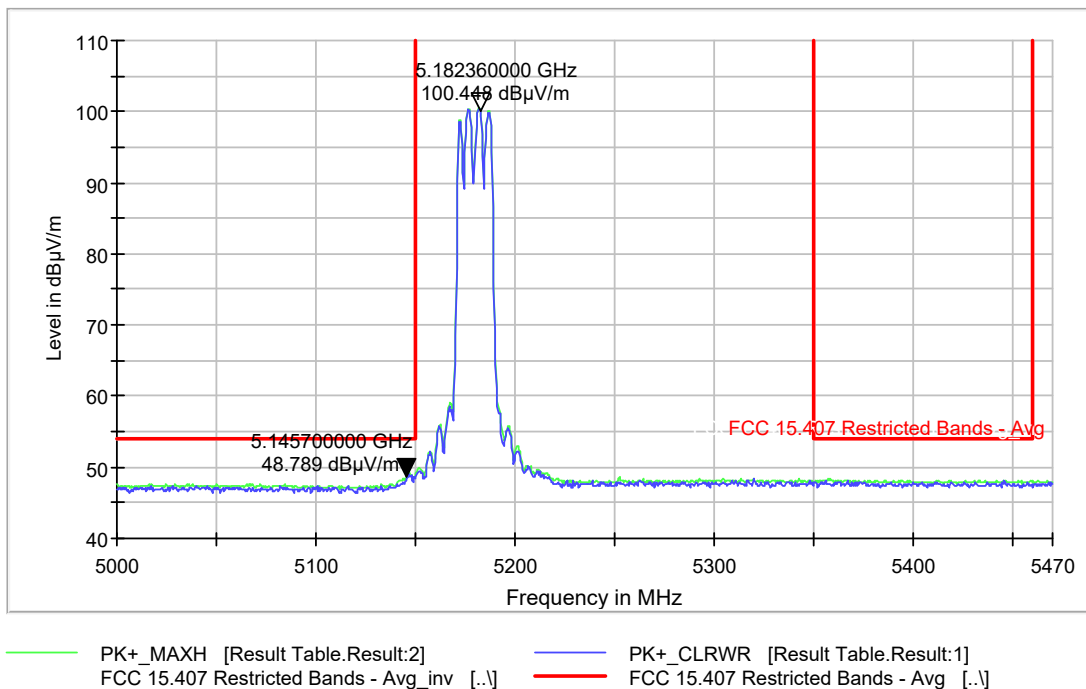
- PK+_MAXH [Result Table.Result:2]
- PK+_CLRWR [Result Table.Result:1]
- RSS-247_Peak_inv [..]
- FCC 15.407_UNII-3_Peak_inv [..]
- FCC 15.407_UNII-3_Peak [..]
- RSS-247_Peak [..]

Plot 9-348. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11n HT40 (Ch. 159)

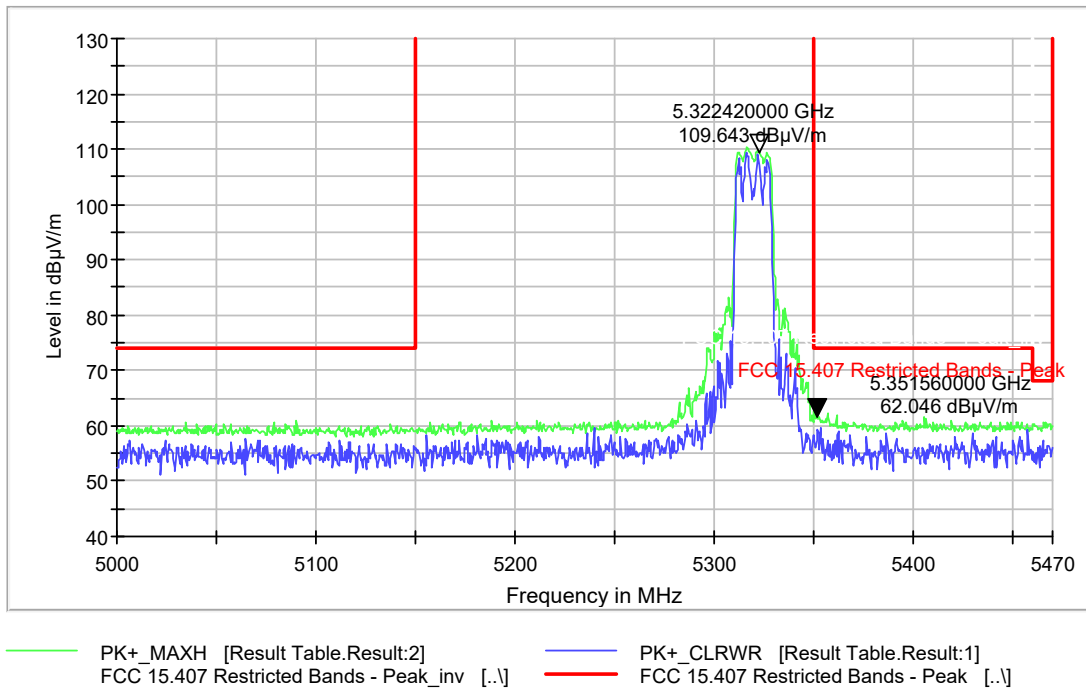
9.6.5.9 Radiated Band-edge emissions 802.11ac VHT20



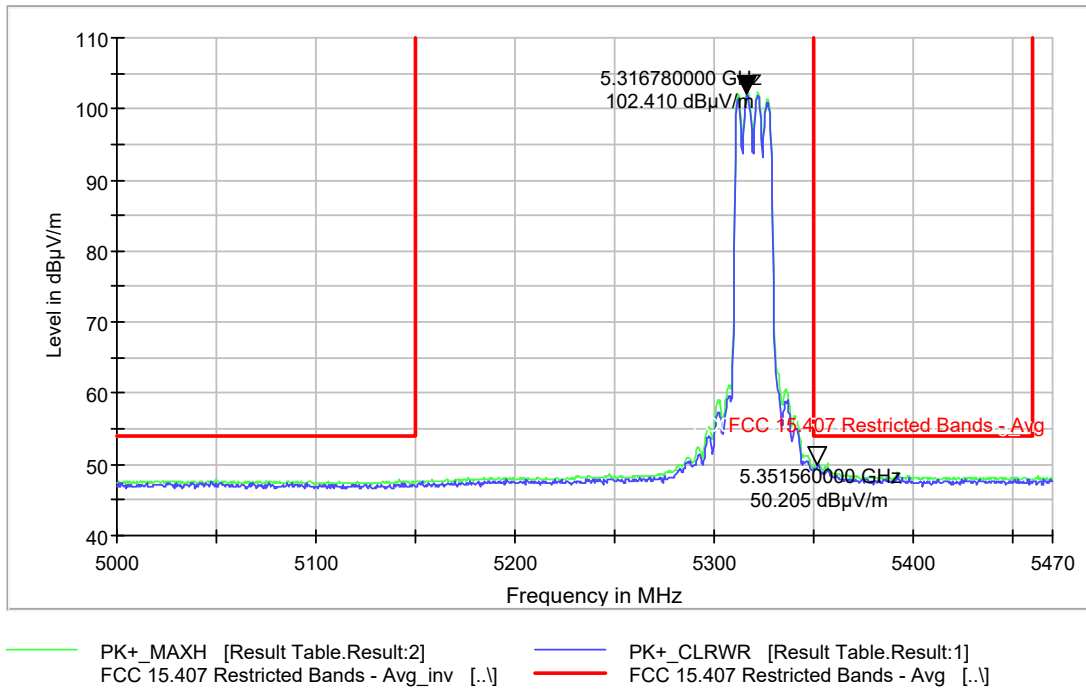
Plot 9-349. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 36)



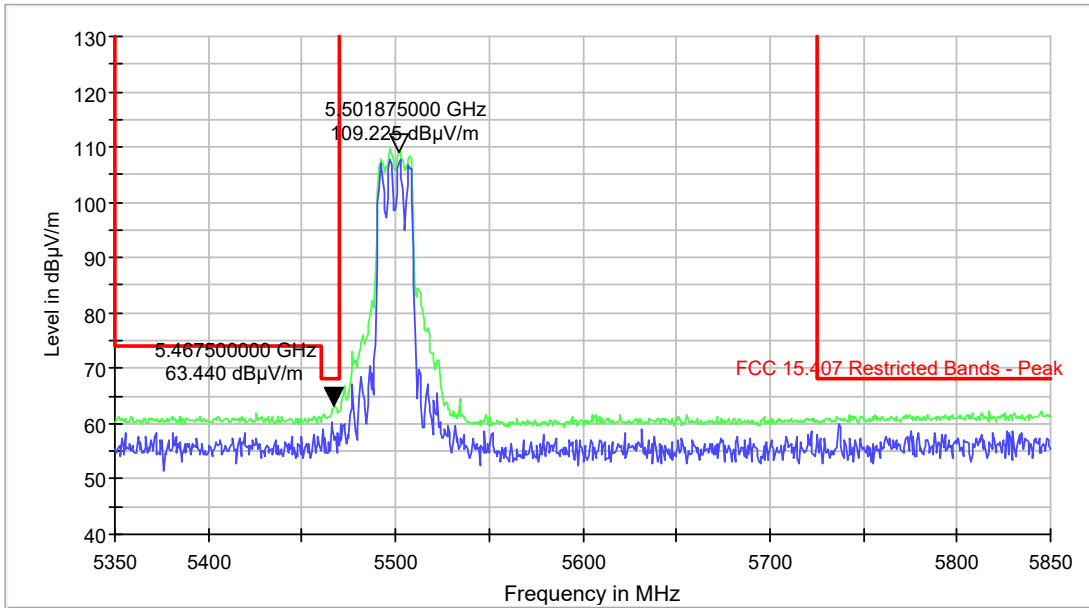
Plot 9-350. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 36)



Plot 9-351. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 64)

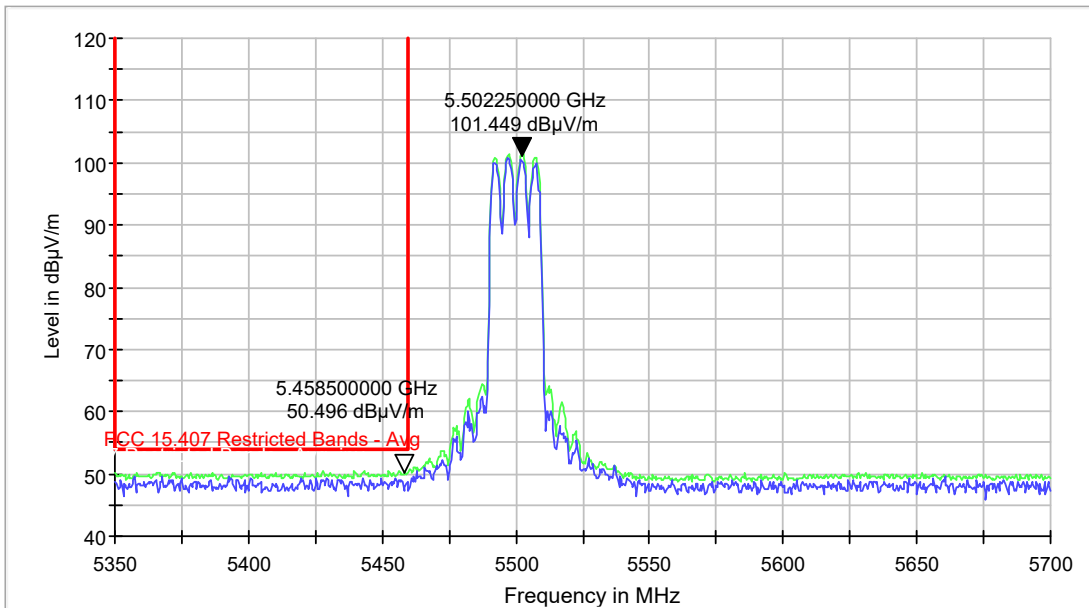


Plot 9-352. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 64)



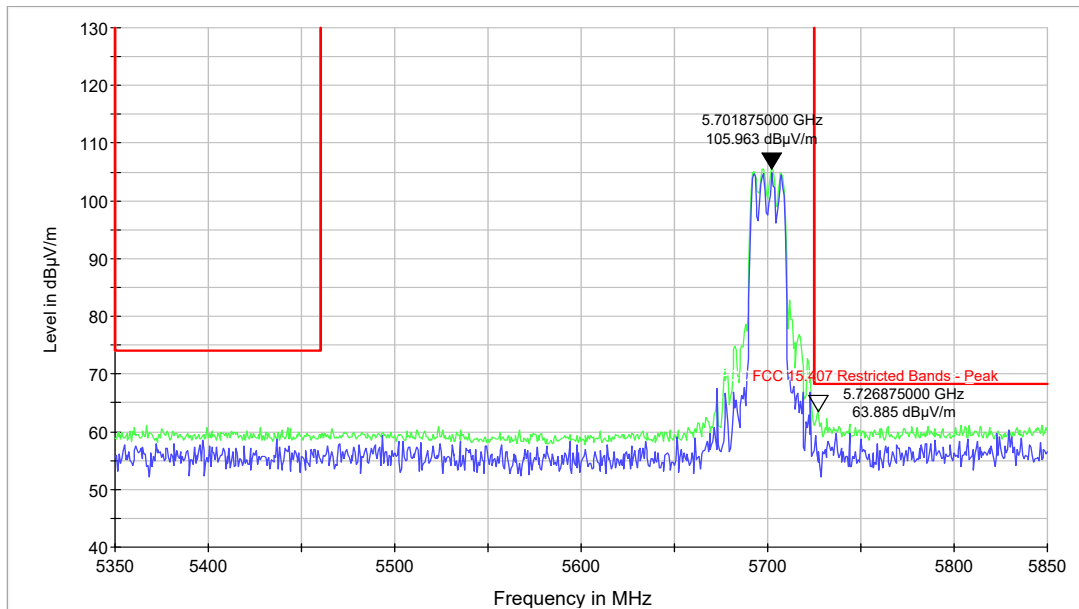
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Peak [..]

Plot 9-353. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 100)



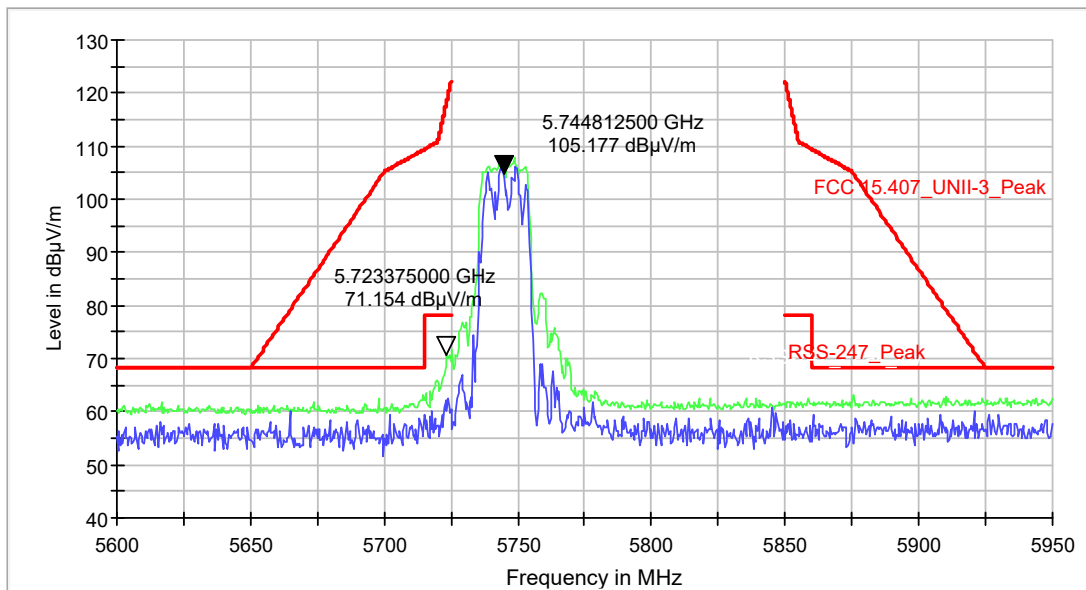
— PK+_MAXH [Result Table.Result:2] — PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Avg_inv [..] — FCC 15.407 Restricted Bands - Avg [..]

Plot 9-354. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 100)



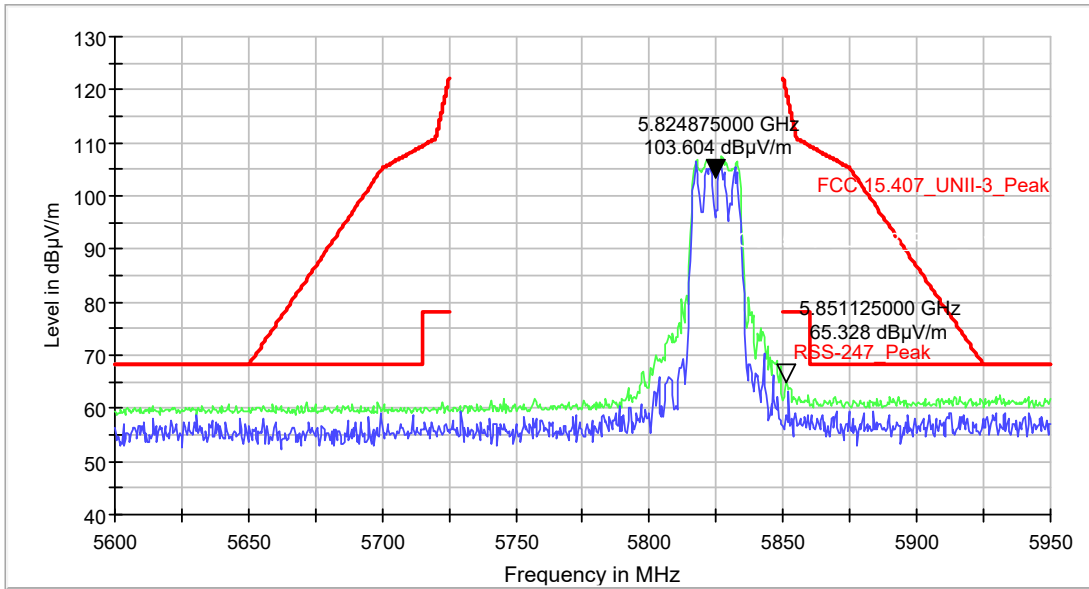
— PK+ - MAXH [Result Table.Result:2]
— PK+ - CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Peak [..]
— FCC 15.407 Restricted Bands - Peak [..]

Plot 9-355. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 140)



— PK+ - MAXH [Result Table.Result:2]
— PK+ - CLRWR [Result Table.Result:1]
— RSS-247_Peak [..]
— FCC 15.407_UNII-3_Peak [..]
— RSS-247_Peak [..]

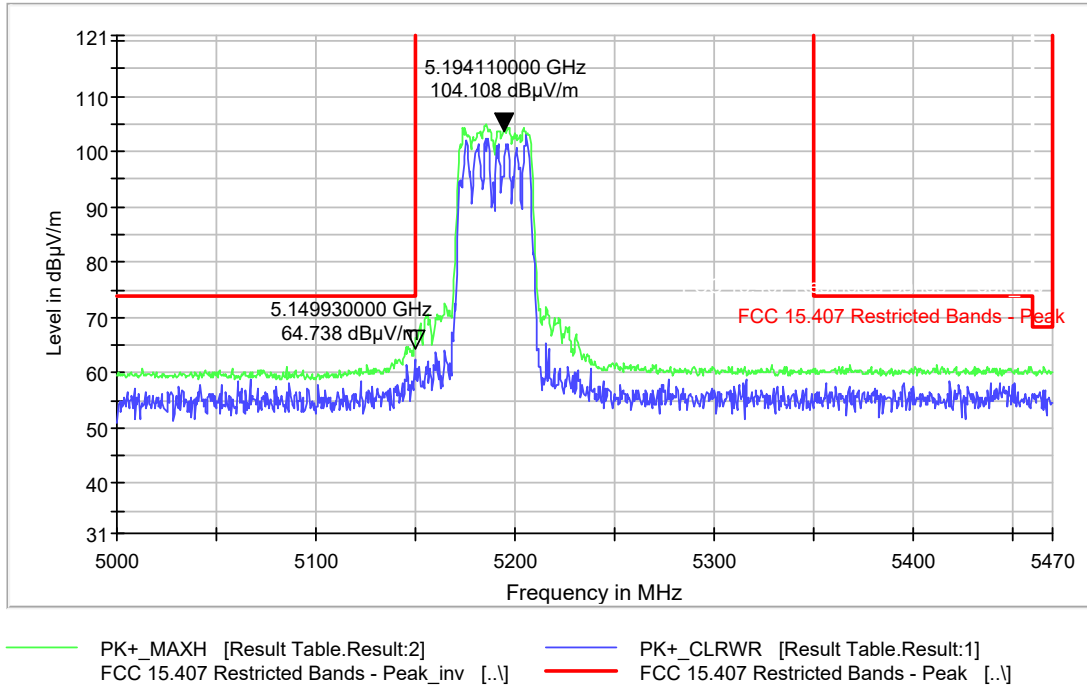
Plot 9-356. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 149)



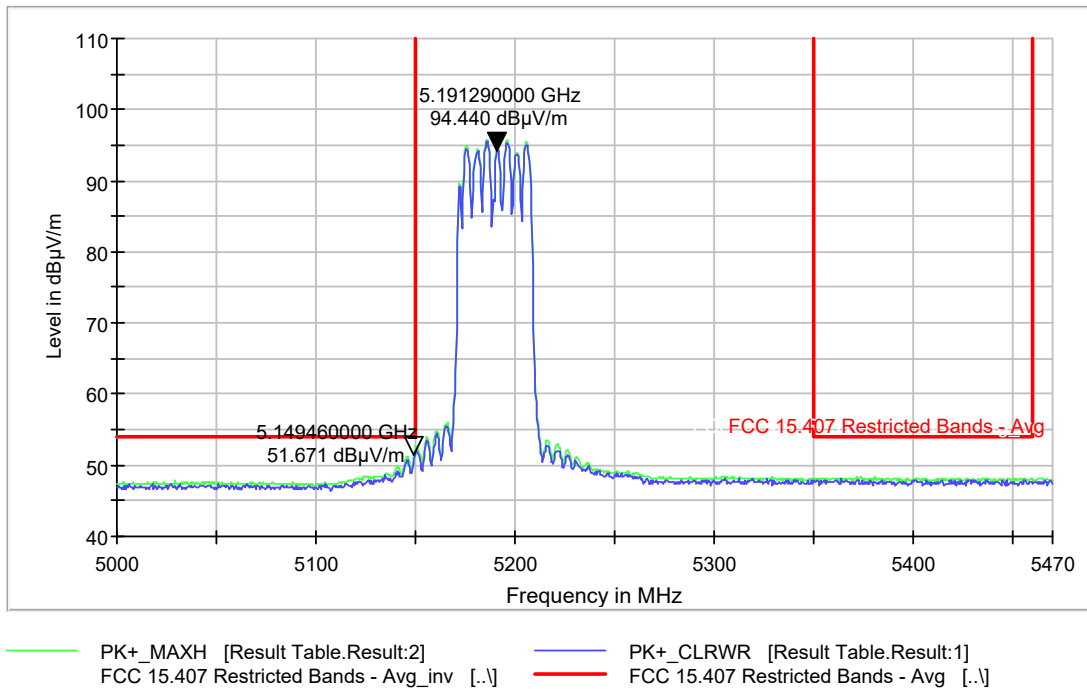
- PK+_MAXH [Result Table.Result:2]
- RSS-247_Peak_inv [..]
- FCC 15.407_UNII-3_Peak [..]
- PK+_CLRWR [Result Table.Result:1]
- FCC 15.407_UNII-3_Peak_inv [..]
- RSS-247_Peak [..]

Plot 9-357. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT20 (Ch. 165)

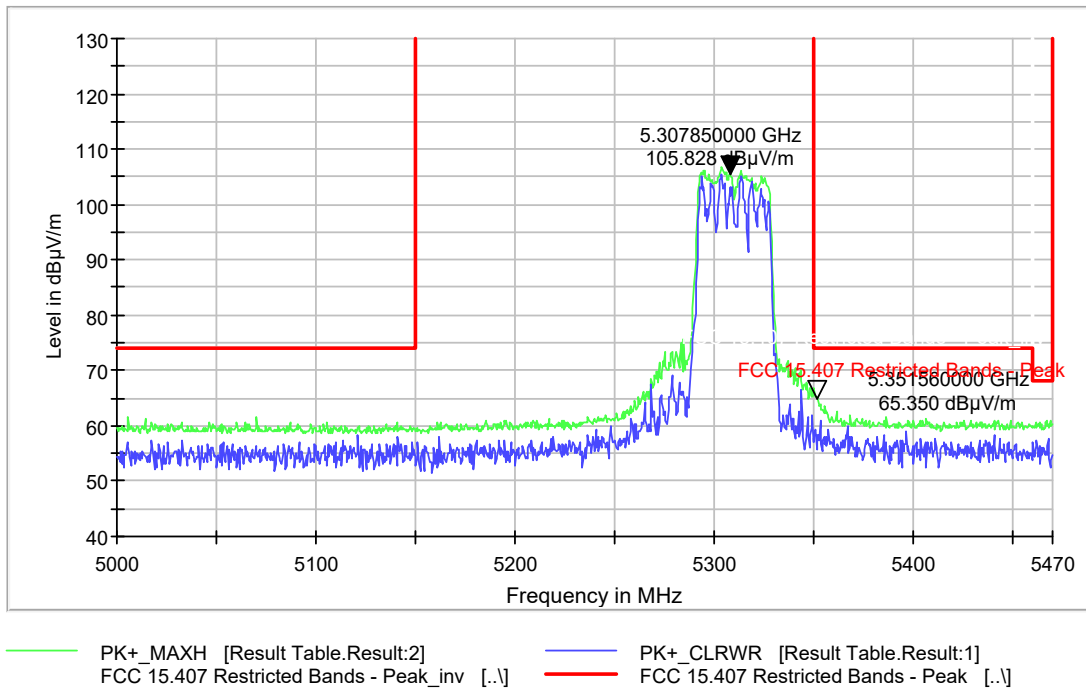
9.6.5.10 Radiated Band-edge emissions 802.11ac VHT40



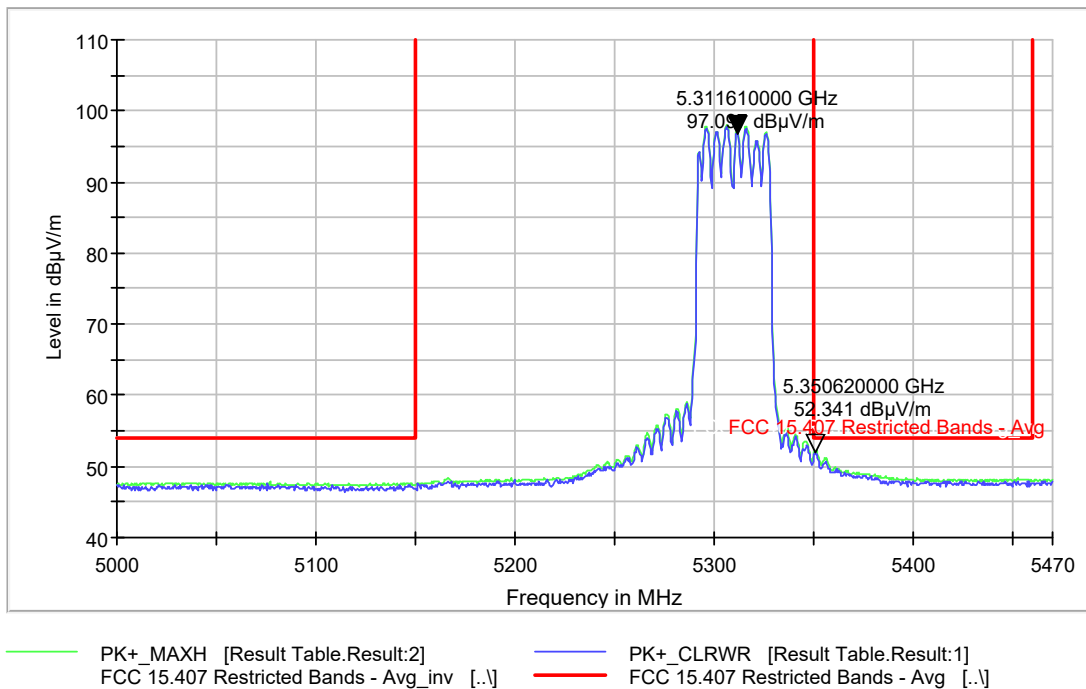
Plot 9-358. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 38)



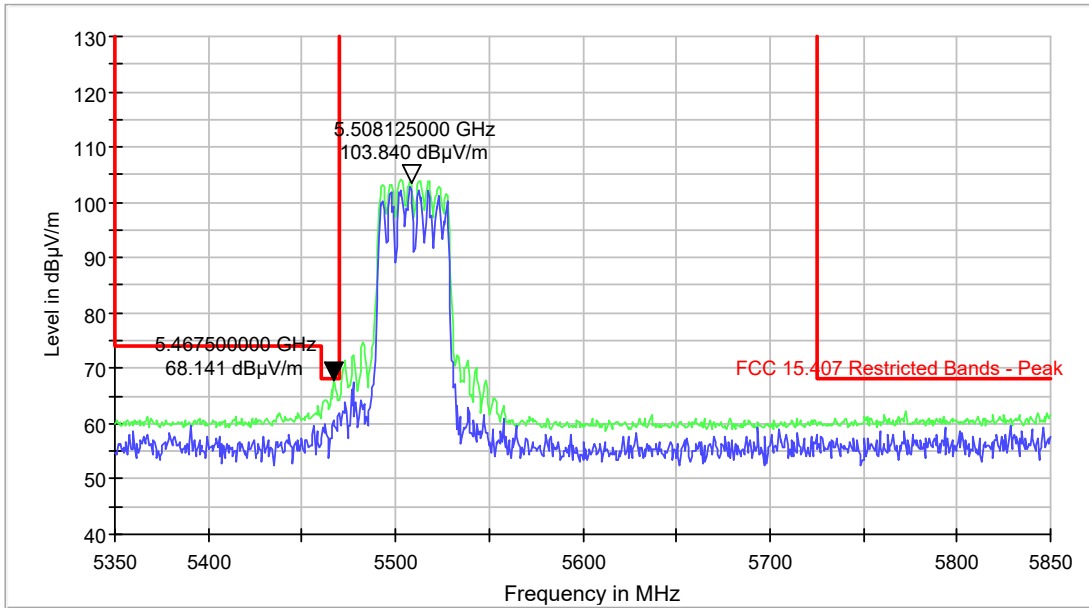
Plot 9-359. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 38)



Plot 9-360. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 62)

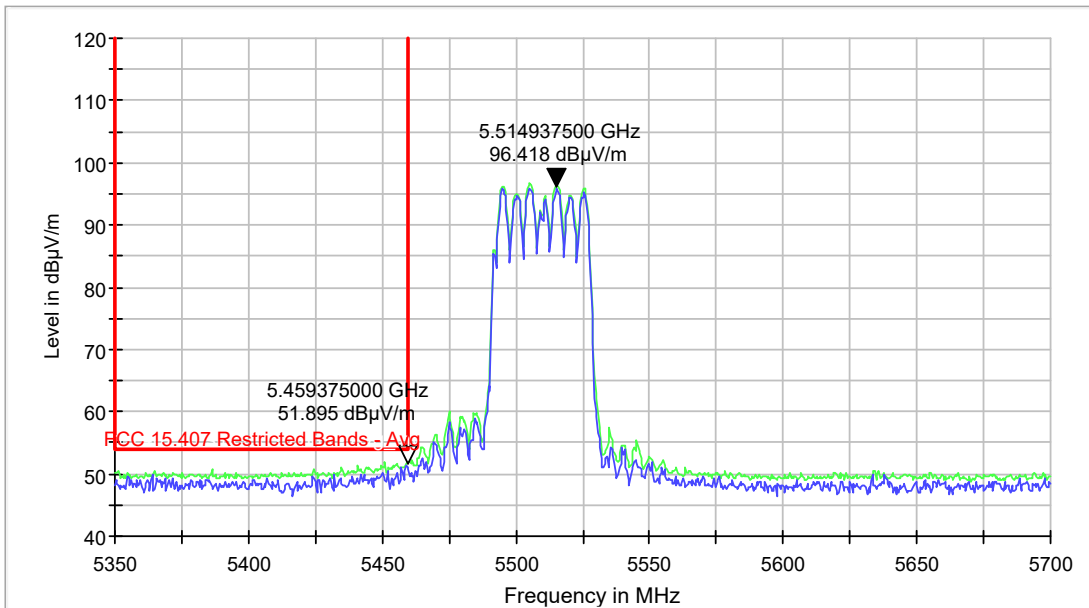


Plot 9-361. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 62)



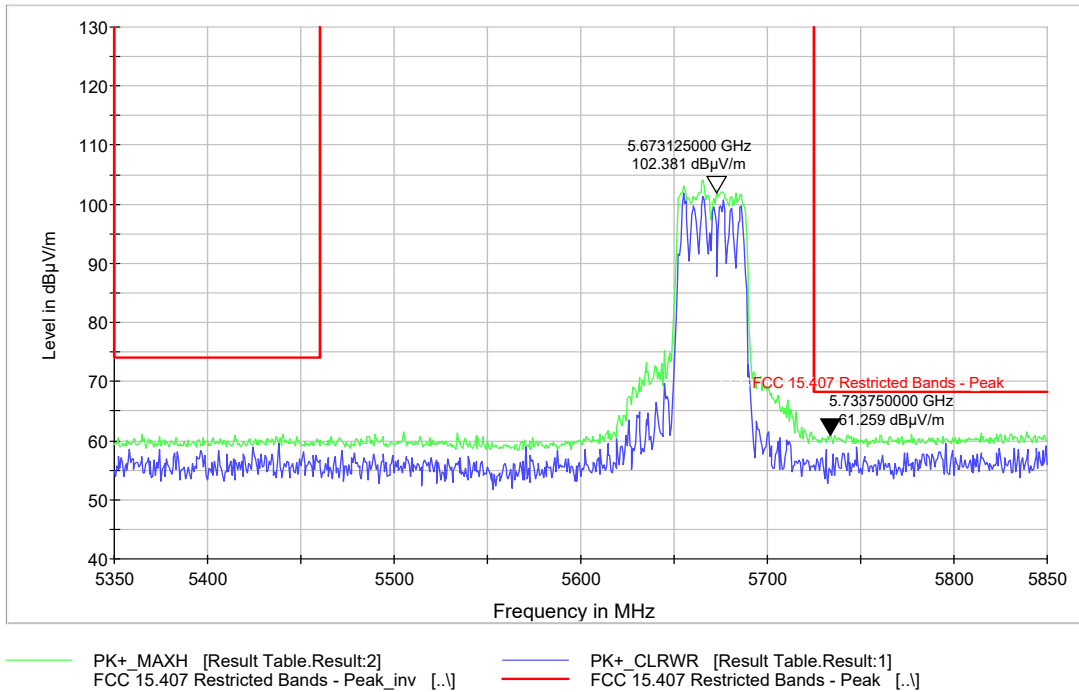
PK+_MAXH [Result Table.Result:2] PK+_CLRWR [Result Table.Result:1]
FCC 15.407 Restricted Bands - Peak [..]

Plot 9-362. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 102)

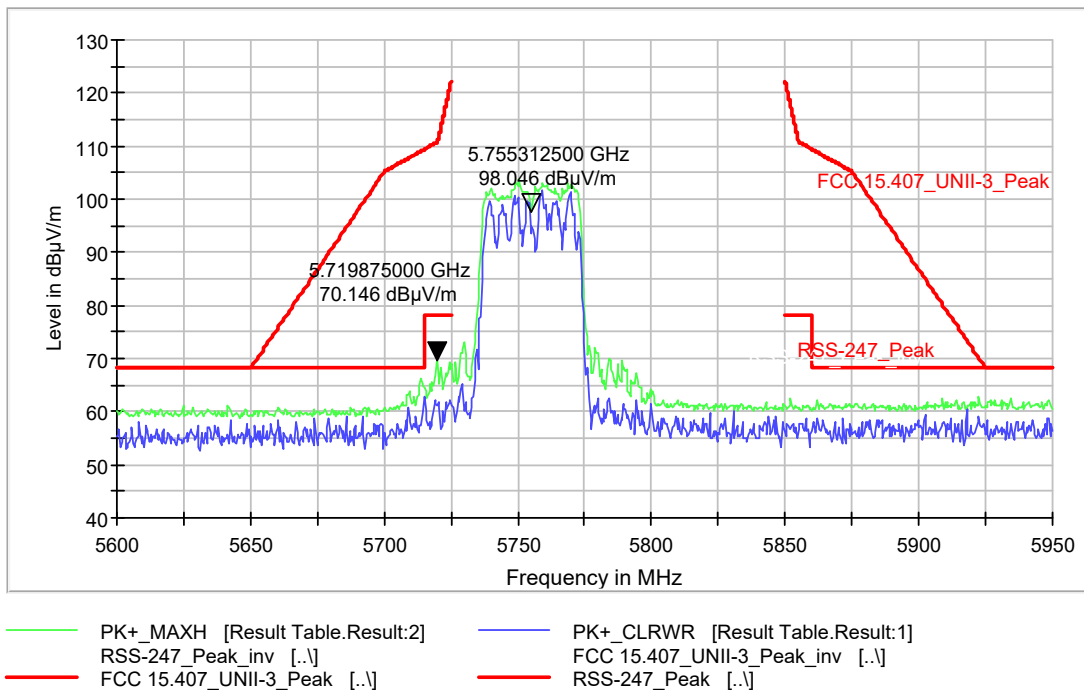


PK+_MAXH [Result Table.Result:2] PK+_CLRWR [Result Table.Result:1]
FCC 15.407 Restricted Bands - Avg_inv [..] FCC 15.407 Restricted Bands - Avg [..]

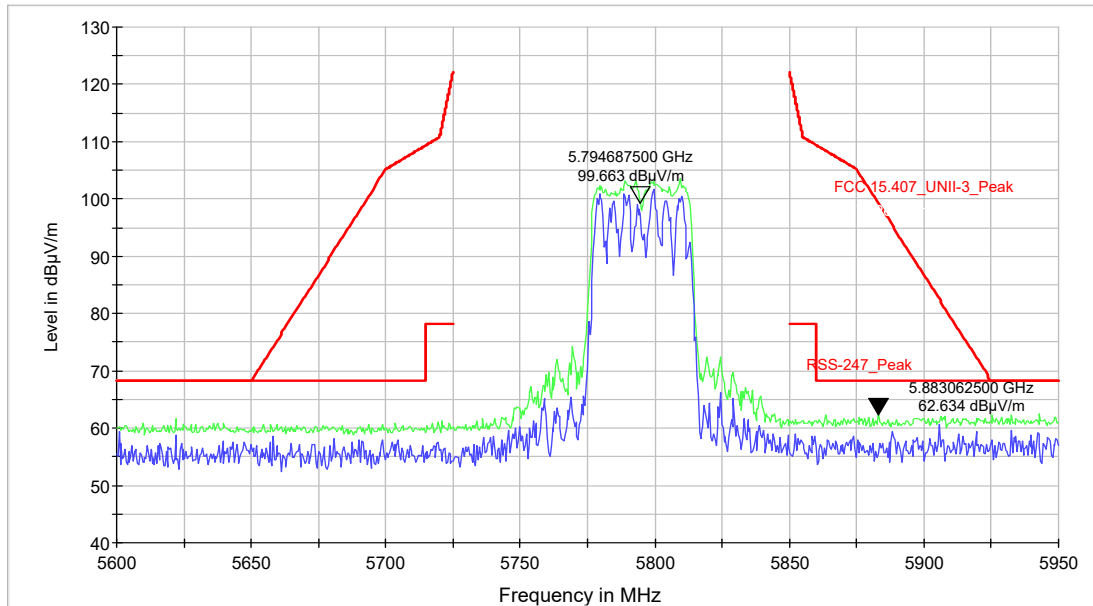
Plot 363. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 102)



Plot 9-364. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 134)



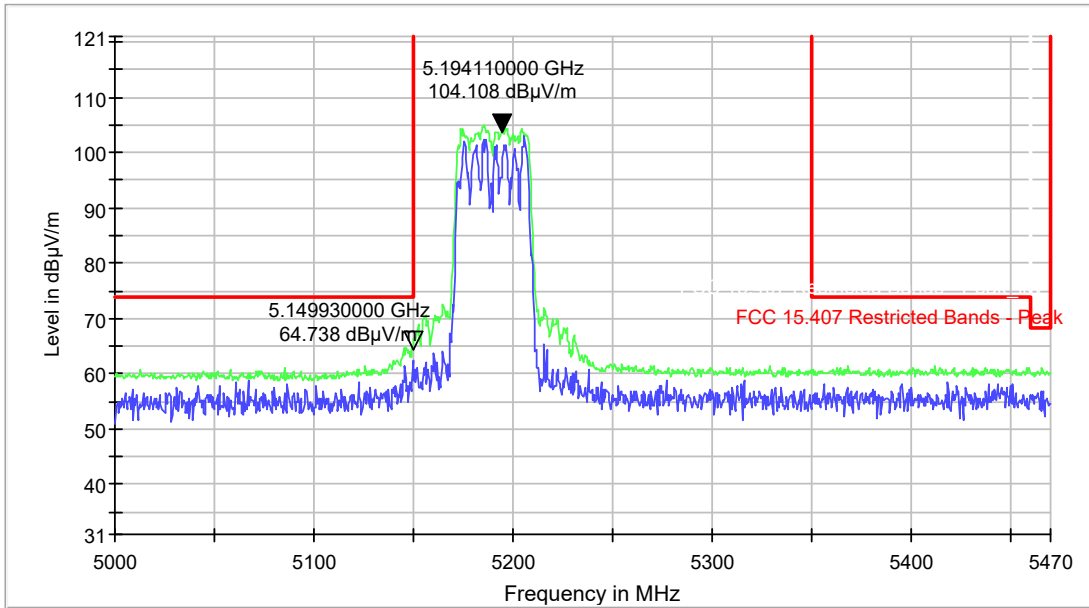
Plot 9-365. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 151)



— PK+_MAXH [Result Table.Result:2]	— PK+_CLRWR [Result Table.Result:1]
— RSS-247_Peak_inv [..]	— FCC 15.407_UNII-3_Peak_inv [..]
— FCC 15.407_UNII-3_Peak [..]	— RSS-247_Peak [..]

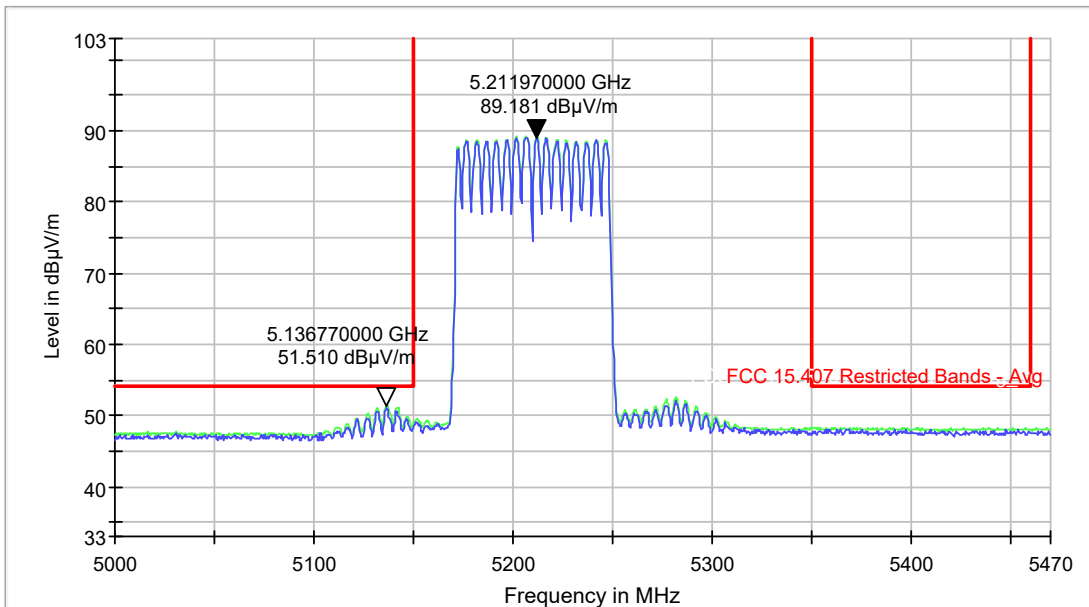
Plot 9-366. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT40 (Ch. 159)

9.6.5.11 Radiated Band-edge emissions 802.11ac VHT80



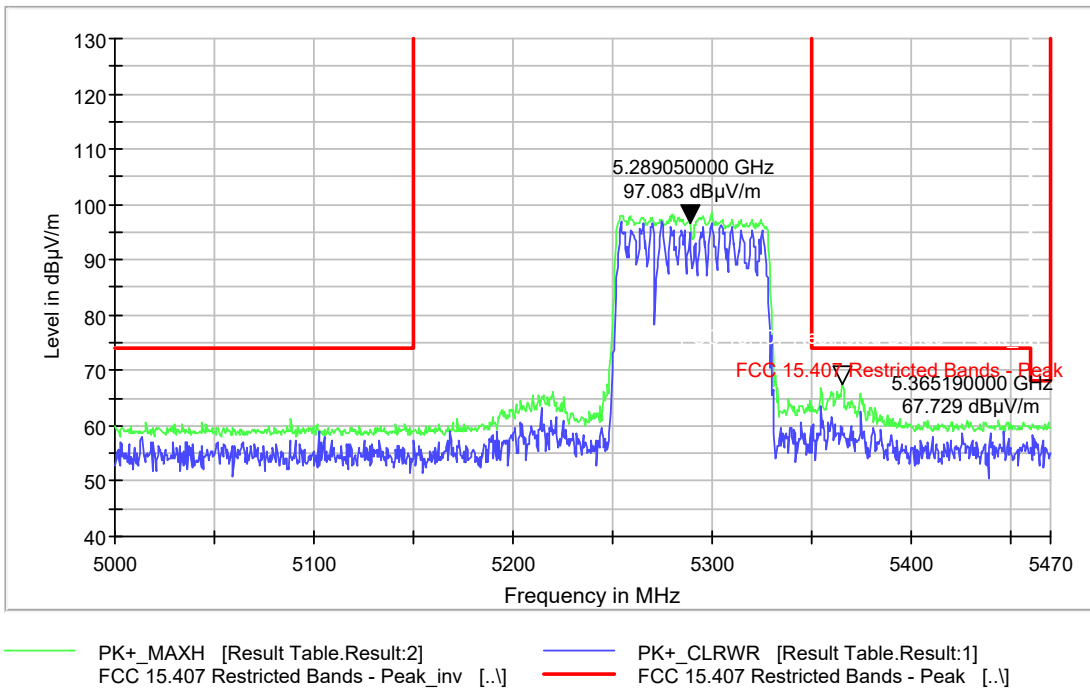
— PK+_MAXH [Result Table.Result:2]
— PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Peak [. . .]

Plot 9-367. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 42)

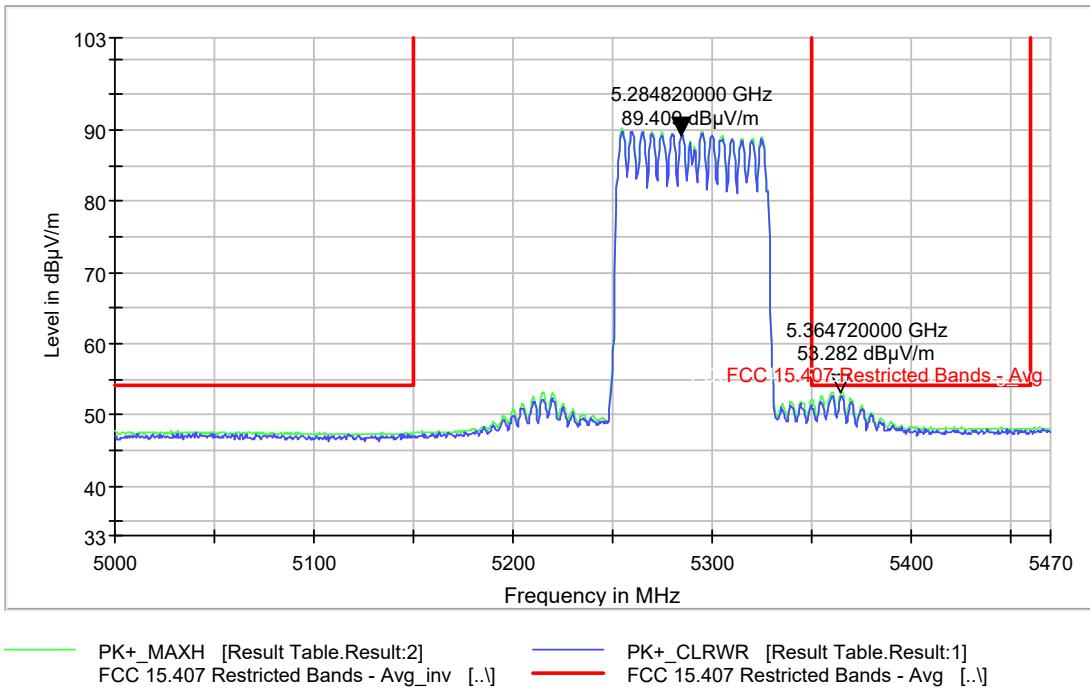


— PK+_MAXH [Result Table.Result:2]
— PK+_CLRWR [Result Table.Result:1]
— FCC 15.407 Restricted Bands - Avg [. . .]

Plot 9-368. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 42)



Plot 9-369. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 58)



Plot 9-370. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 58)

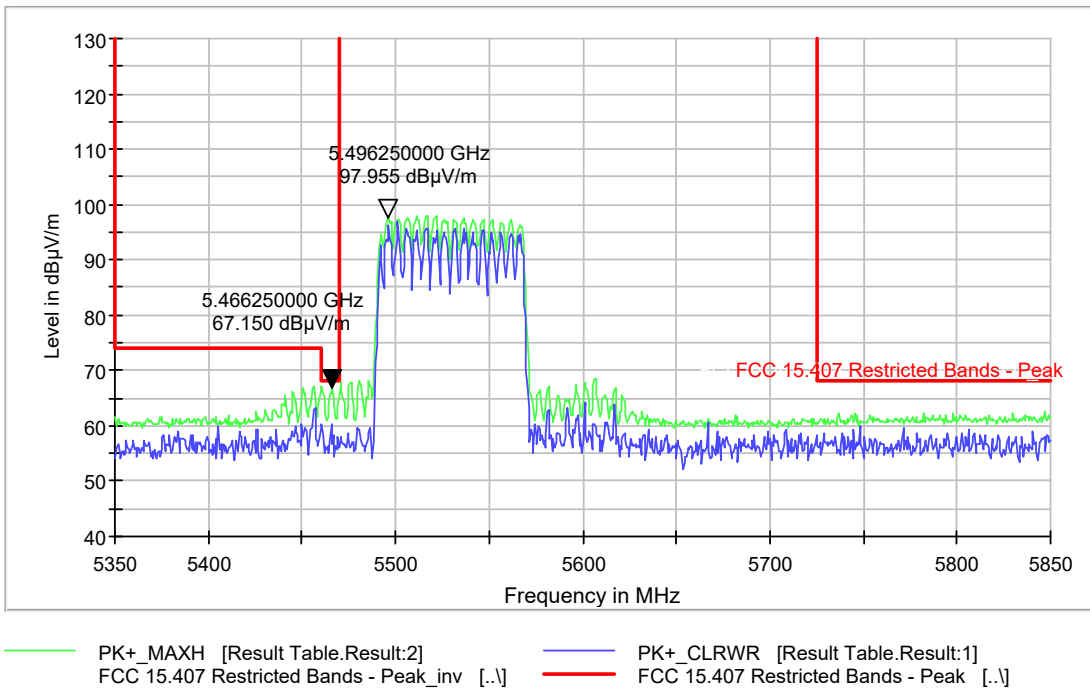


Figure 371. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 106)

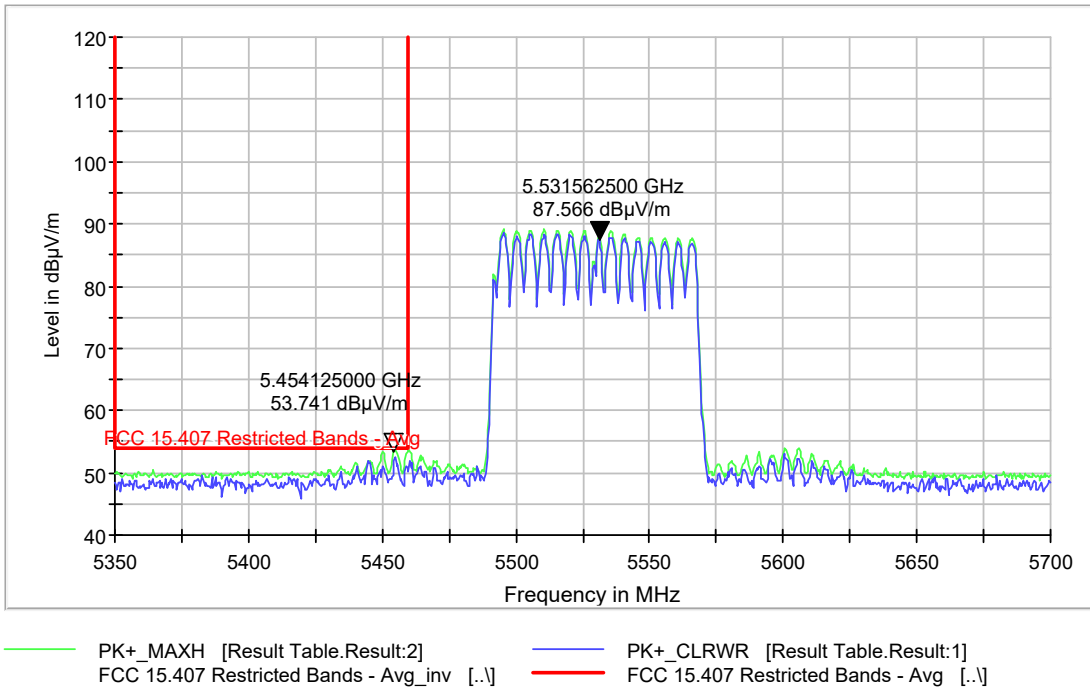


Figure 9-372. Average Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 106)

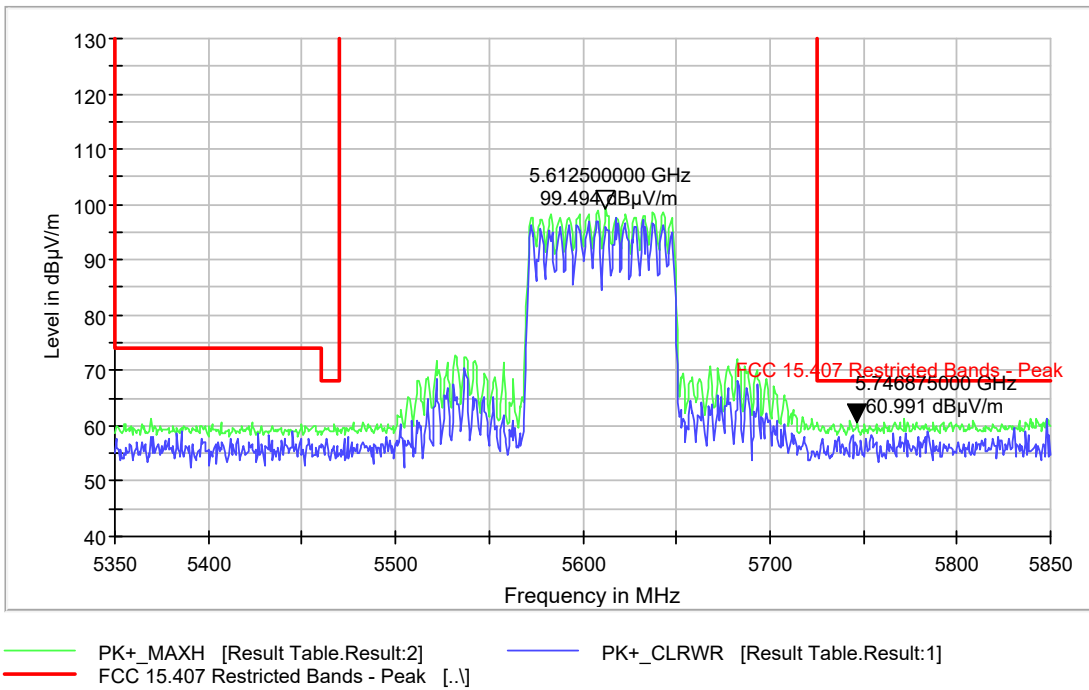
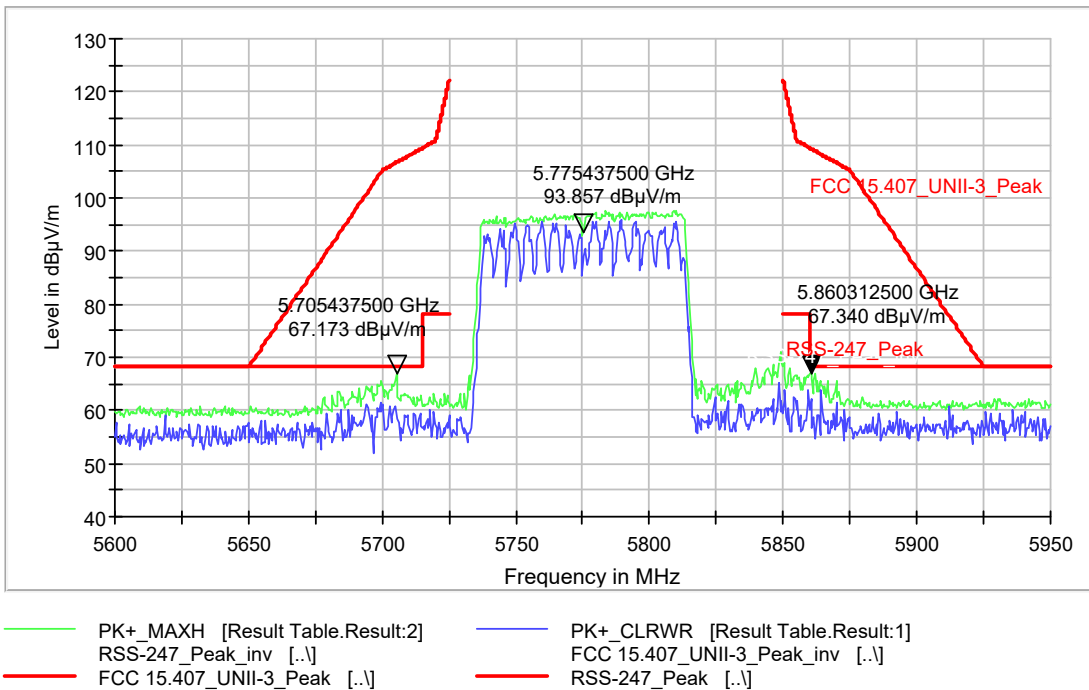


Figure 9-373. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 122)



Plot 9-374. Peak Radiated Band Edge Emissions Tx Chains A & B 802.11ac VHT80 (Ch. 155)

9.7 AC Line Conducted Emissions

9.7.1 Test Requirements

FCC CFR 47 Rule Part 15.207 (a)
ISED RSS Gen [8.8]

9.7.2 Test Method

Conducted power line measurements were made, unless otherwise specified, over the frequency range from 150 kHz to 30 MHz to determine the line-to-ground radio-noise voltage that is conducted from the EUT power-input terminals that are directly (or indirectly via separate transformer or power supplies) connected to a public power network. Equipment was tested with the power cords that were used under normal operating conditions. The following measurements were made using a LISN (Line Impedance Stabilization Network). AC powered peripherals were attached to a second LISN with the 50 ohm measurement port terminated by a 50 ohm resistive load.

EMI Receiver Settings:

150 kHz – 30 MHz:

RBW= 9 kHz

VBW \geq 3 X RBW

Trace Mode: Peak Detector (Max Hold).

Final measurements were performed using Quasi-Peak and Average Detectors.

Span= 150 kHz – 30 MHz

Sweep time= Auto

EUT Exercising:

Technology: 802.11n

RF Channel: Channel 116, 5580GHz

Antenna Path: Path A and Path B

Signal Duty Cycle > 95%

Power Level Setting: 13 dBm

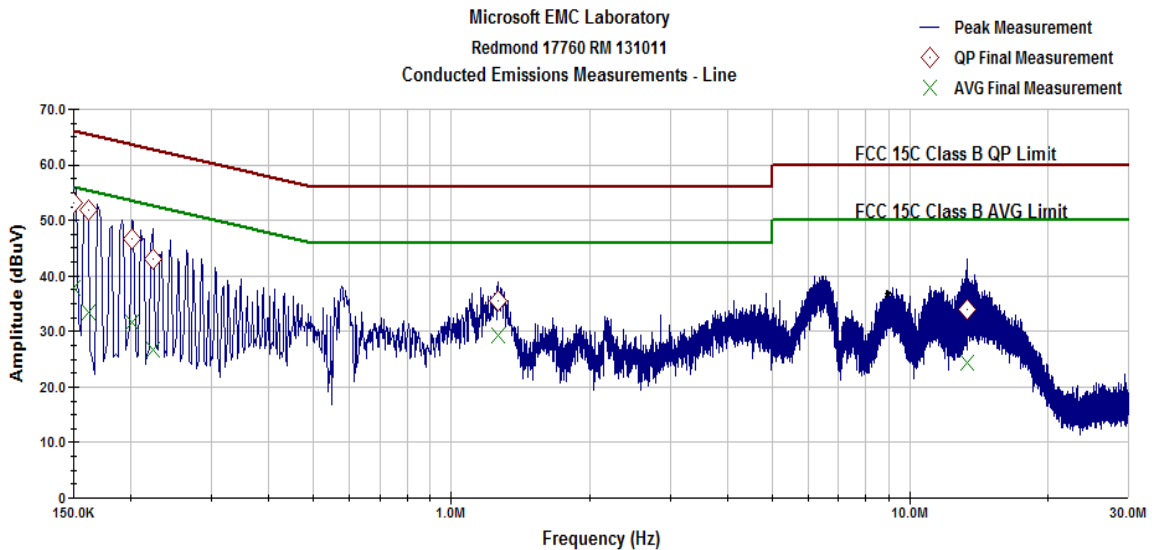
9.7.3 Limit

Frequency of emission (MHz)	Conducted limit (dB μ V)	
	Quasi-peak	Average
0.15-0.5	66 to 56*	56 to 46*
0.5-5	56	46
5-30	60	50

9.7.4 Test Result:

Pass.

9.7.5 Test Data:

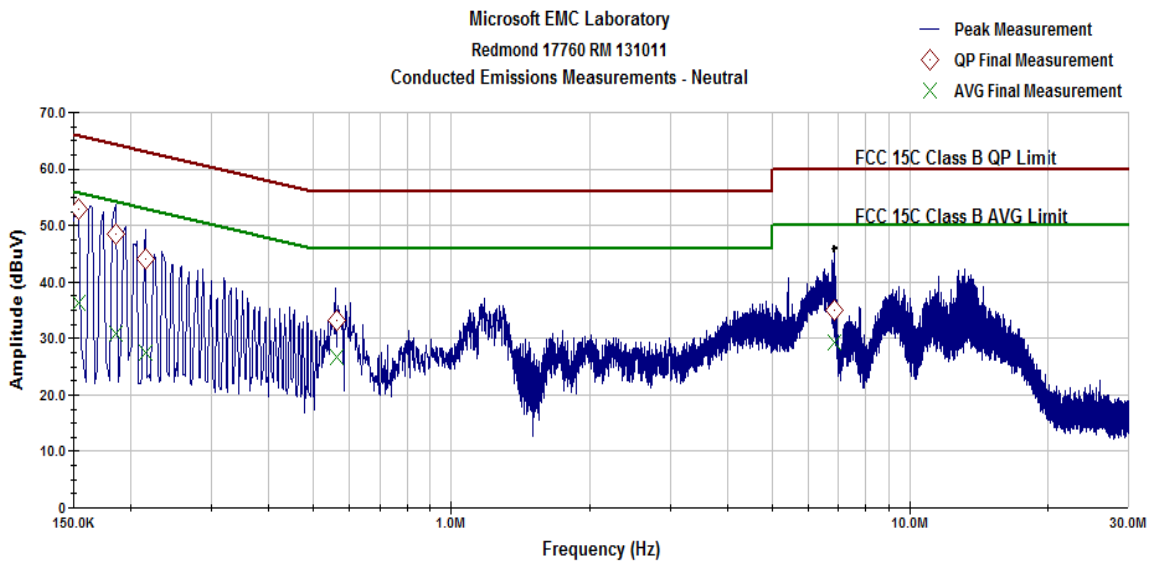


Operator: Vishwas

Current Time -01:35:20 PM, Friday, December 23, 2016

CE Profile V2.1

Figure 9-375. AC Line Conducted Emissions- Line (150 kHz- 30 MHz)



Operator: Vishwas

Current Time -01:42:10 PM, Friday, December 23, 2016

CE Profile V2.1

Figure 9-376. AC Line Conducted Emissions- Neutral (150 kHz- 30 MHz)

Frequency (MHz)	QP Net Reading (dB μ V)	AVG Net Reading (dB μ V)	Quasi-Peak Limit (dB μ V)	Average Limit (dB μ V)	Line Tested (L or N)	Quasi-Peak Margin (dB)	Average Margin (dB)
0.15	53.23	37.74	66.00	56.00	L	-12.77	-18.26
0.161	51.72	33.47	65.68	55.68	L	-13.96	-22.21
0.201	46.75	31.74	64.56	54.56	L	-17.81	-22.81
1.265	35.59	29.18	56.00	46.00	L	-20.41	-16.82
0.223	43.02	26.79	63.91	53.91	L	-20.90	-27.13
13.369	33.89	24.41	60.00	50.00	L	-26.11	-25.59
0.154	52.78	36.17	65.89	55.89	N	-13.11	-19.72
0.186	48.53	30.81	64.98	54.98	N	-16.46	-24.17
0.216	44.03	27.46	64.13	54.13	N	-20.10	-26.67
0.561	33.24	26.64	56.00	46.00	N	-22.76	-19.36
6.866	35.08	29.16	60.00	50.00	N	-24.92	-20.84

End of Report