



# **CERTIFICATION TEST REPORT**

**Report Number. :** 12696945-E4V2

**Applicant :** APPLE, INC.  
1 APPLE PARK WAY  
CUPERTINO, CA 95014, U.S.A.

**Model :** A2221

**FCC ID :** BCG-E3304A

**EUT Description :** SMARTPHONE

**Test Standard(s) :** FCC 47 CFR PART 15 SUBPART E

**Date Of Issue:**  
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NVLAP Lab code: 200065-0

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## REPORT REVISION HISTORY

Rev.	Issue Date	Revisions	Revised By
V1	7/19/2019	Initial Issue	Tony Li
V2	8/2/2019	Addressed TCB Questions. Updated Sections 8.3.12, 8.3.18, and 8.3.24	Tony Li

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# 1. RADIATED TEST RESULTS

## LIMITS

FCC §15.205 and §15.209 -Restricted bands

FCC §15.407(b)(1-3) -Un-Restricted bands

Frequency Range (MHz)	Field Strength Limit (uV/m) at 3 m	Field Strength Limit (dBuV/m) at 3 m
30 - 88	100	40
88 - 216	150	43.5
216 - 960	200	46
Above 960	500	54

## TEST PROCEDURE

The EUT is placed on a non-conducting table 80 cm above the ground plane for measurement below 1GHz; 1.5 m above the ground plane for measurement above 1GHz. The antenna to EUT distance is 3 meters. The EUT is configured in accordance with ANSI C63.10. The EUT is set to transmit in a continuous mode.

For measurements below 1 GHz the resolution bandwidth is set to 100 kHz for peak detection measurements or 120 kHz for quasi-peak detection measurements. Peak detection is used unless otherwise noted as quasi-peak.

For pre-scans above 1 GHz the resolution bandwidth is set to 1 MHz; the video bandwidth is set to 30 KHz for peak measurements.

For final measurements above 1 GHz the resolution bandwidth is set to 1 MHz; the video bandwidth is set to 3 MHz for peak measurements and as applicable for average measurements.

The spectrum from 30 MHz to 1GHz and 18GHz to 40 GHz is investigated with the transmitter set to transmit at the channel with highest output power as worst-case scenario. 1GHz to 18GHz was set to the lowest, middle, and highest channels in the 5 GHz bands.

The frequency range of interest is monitored at a fixed antenna height and EUT azimuth. The EUT is rotated through 360 degrees to maximize emissions received. The antenna is scanned from 1 to 4 meters above the ground plane to further maximize the emission. Measurements are made with the antenna polarized in both the vertical and the horizontal positions.

## KDB 414788 Open Field Site(OFS) and Chamber Correlation Justification

Base on FCC 15.31 (f) (2): measurements may be performed at a distance closer than that specified in the regulations; however, an attempt should be made to avoid making measurements in the near field.

OFS and chamber correlation testing had been performed and chamber measured test result is the worst case test result.

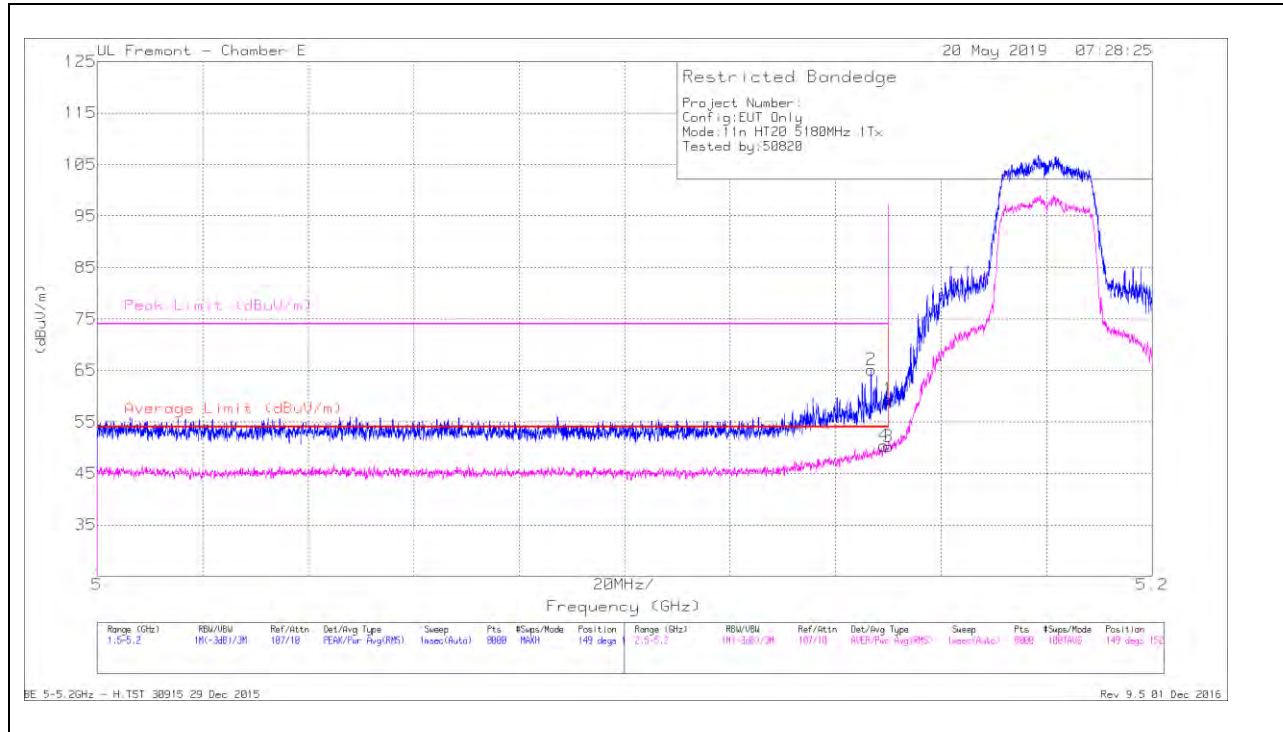
### 1.1. TRANSMITTER ABOVE 1 GHz

#### 1.1.1. TX ABOVE 1 GHz 802.11n HT20 MODE IN THE 5.2 GHz BAND

##### 1TX Antenna 4 MODE

##### BANDEDGE (LOW CHANNEL)

##### HORIZONTAL RESULT



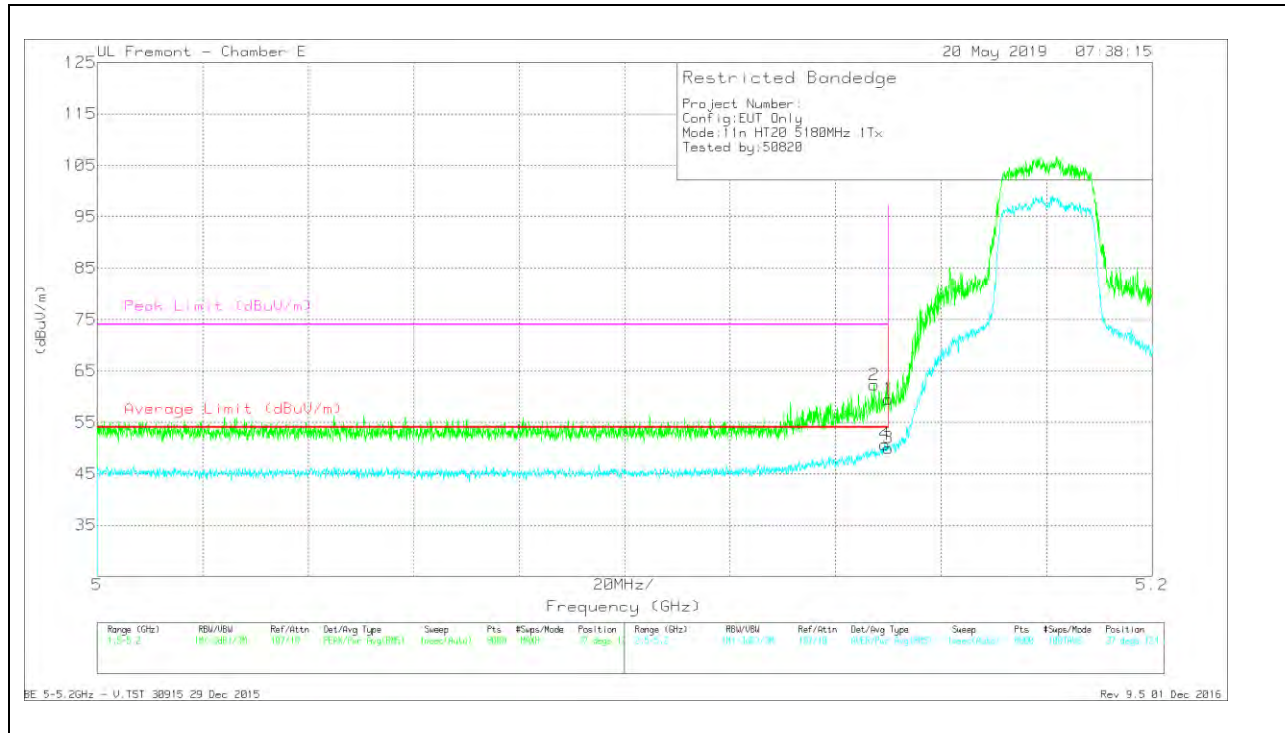
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	47.13	Pk	34.3	-22	59.43	-	-	74	-14.57	149	152	H
2	* 5.147	52.85	Pk	34.3	-22	65.15	-	-	74	-8.85	149	152	H
3	* 5.15	37.93	RMS	34.3	-22	50.23	54	-3.77	-	-	149	152	H
4	* 5.149	38.11	RMS	34.3	-22	50.41	54	-3.59	-	-	149	152	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

**VERTICAL RESULT**



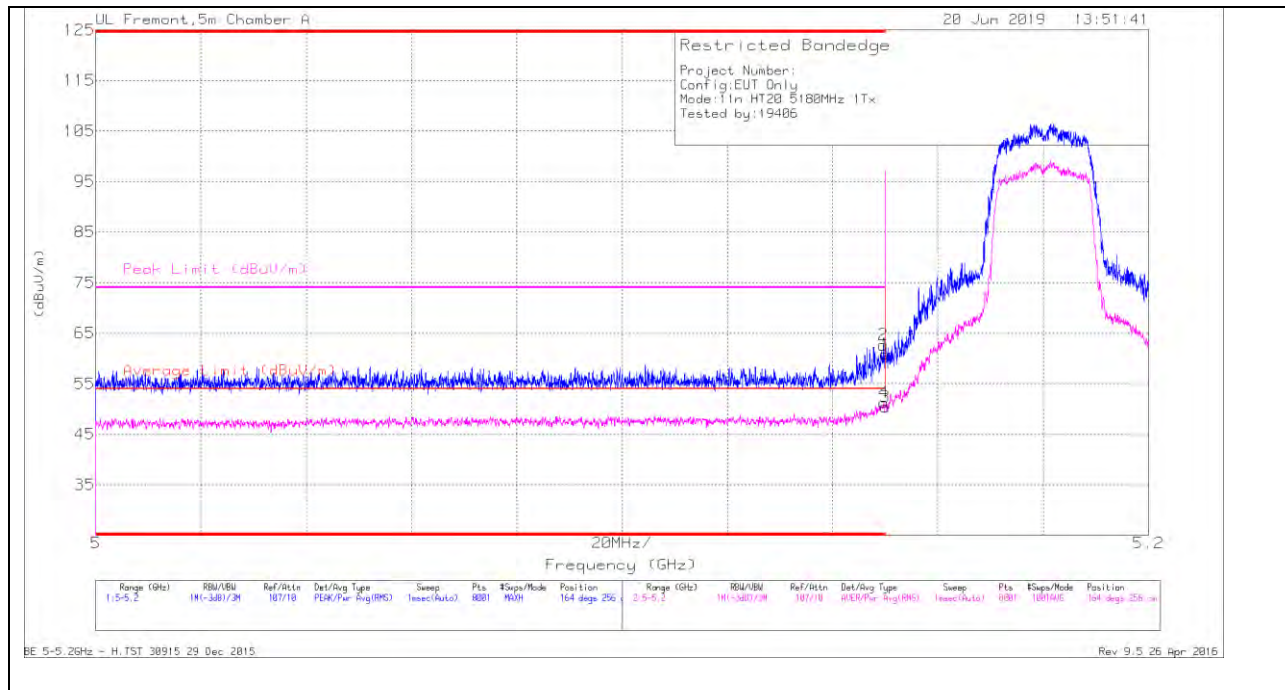
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.147	49.99	Pk	34.3	-22	62.29	-	-	74	-11.71	37	124	V
4	* 5.149	38.44	RMS	34.3	-22	50.74	54	-3.26	-	-	37	124	V
1	* 5.15	47.22	Pk	34.3	-22	59.52	-	-	74	-14.48	37	124	V
3	* 5.15	37.72	RMS	34.3	-22	50.02	54	-3.98	-	-	37	124	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**1TX Antenna 5 MODE**

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



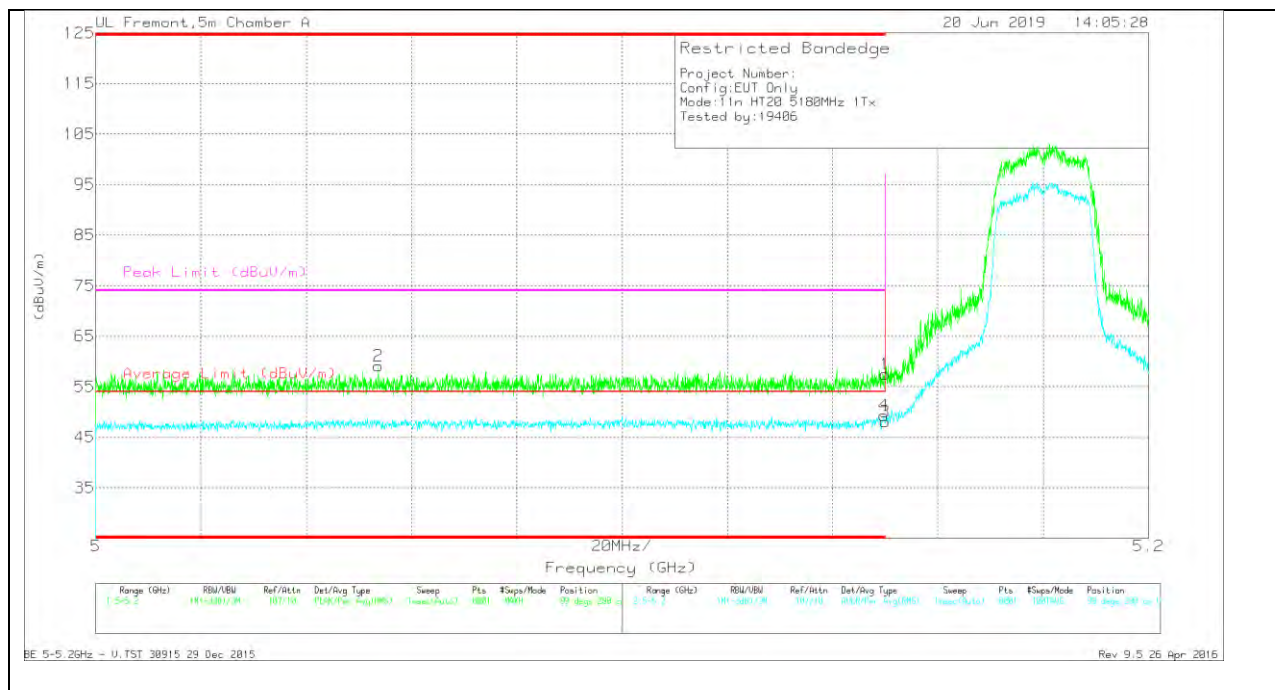
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T346 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.15	46.85	Pk	34.6	-18.8	62.65	-	-	74	-11.35	164	256	H
4	* 5.15	35.45	RMS	34.6	-18.8	51.25	54	-2.75	-	-	164	256	H
1	5.15	45	Pk	34.6	-18.8	60.8	-	-	74	-13.2	164	256	H
3	5.15	34.64	RMS	34.6	-18.8	50.44	54	-3.56	-	-	164	256	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T346 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.054	43.57	Pk	34.3	-18.8	59.07	-	-	74	-14.93	99	288	V
4	* 5.15	33.5	RMS	34.6	-18.8	49.3	54	-4.7	-	-	99	288	V
1	5.15	41.69	Pk	34.6	-18.8	57.49	-	-	74	-16.51	99	288	V
3	5.15	32.23	RMS	34.6	-18.8	48.03	54	-5.97	-	-	99	288	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

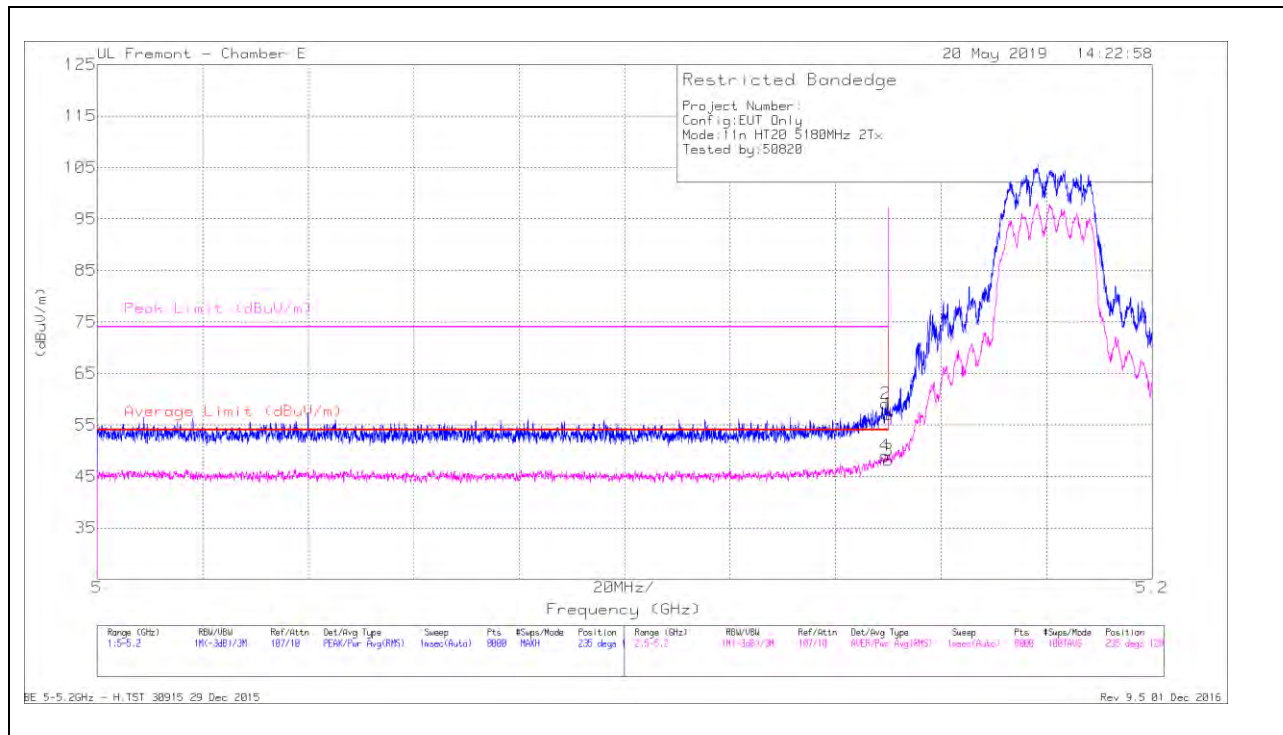
RMS - RMS detection



**2TX Antenna 4 + Antenna 5 CDD MODE**

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



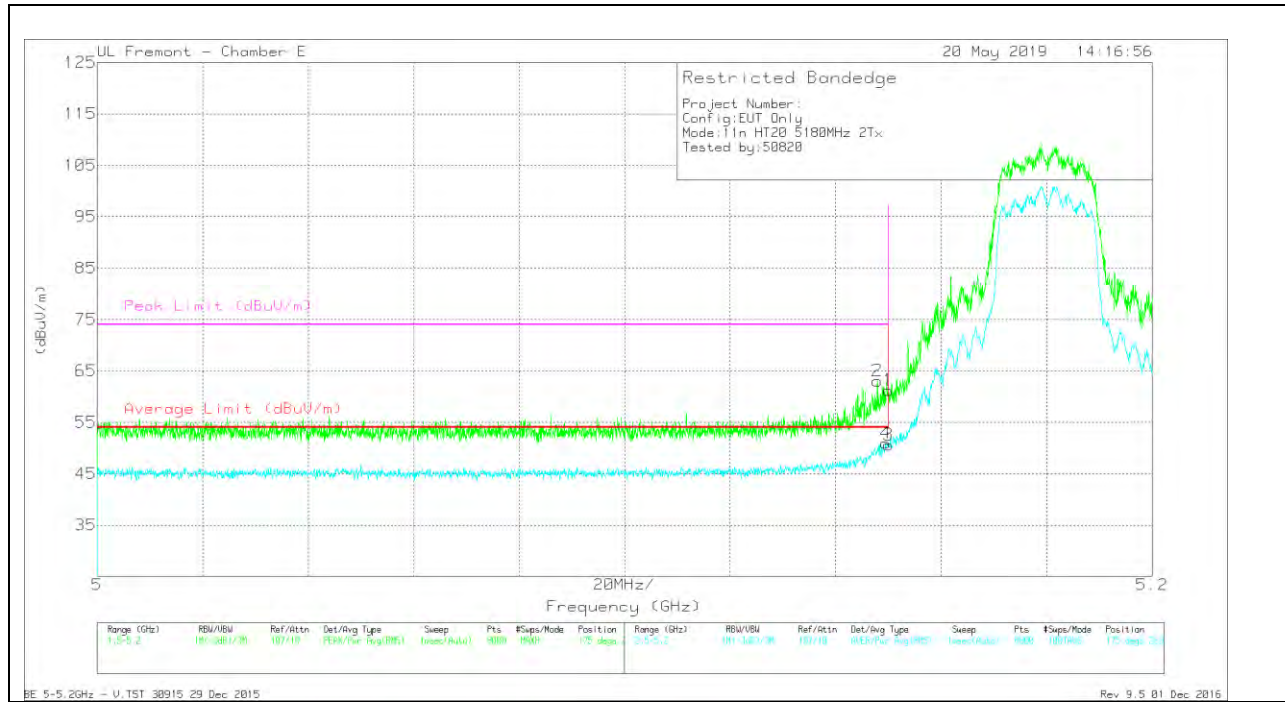
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
4	* 5.149	36.72	RMS	34.3	-22	-49.02	54	-4.98	-	-	235	128	H
1	* 5.15	44.79	Pk	34.3	-22	57.09	-	-	74	-16.91	235	128	H
2	* 5.15	46.84	Pk	34.3	-22	59.14	-	-	74	-14.86	235	128	H
3	* 5.15	35.86	RMS	34.3	-22	48.16	54	-5.84	-	-	235	128	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.148	50.77	Pk	34.3	-22	63.07	-	-	74	-10.93	175	263	V
4	* 5.149	38.64	RMS	34.3	-22	50.94	54	-3.06	-	-	175	263	V
1	* 5.15	48.94	Pk	34.3	-22	61.24	-	-	74	-12.76	175	263	V
3	* 5.15	38.31	RMS	34.3	-22	50.61	54	-3.39	-	-	175	263	V

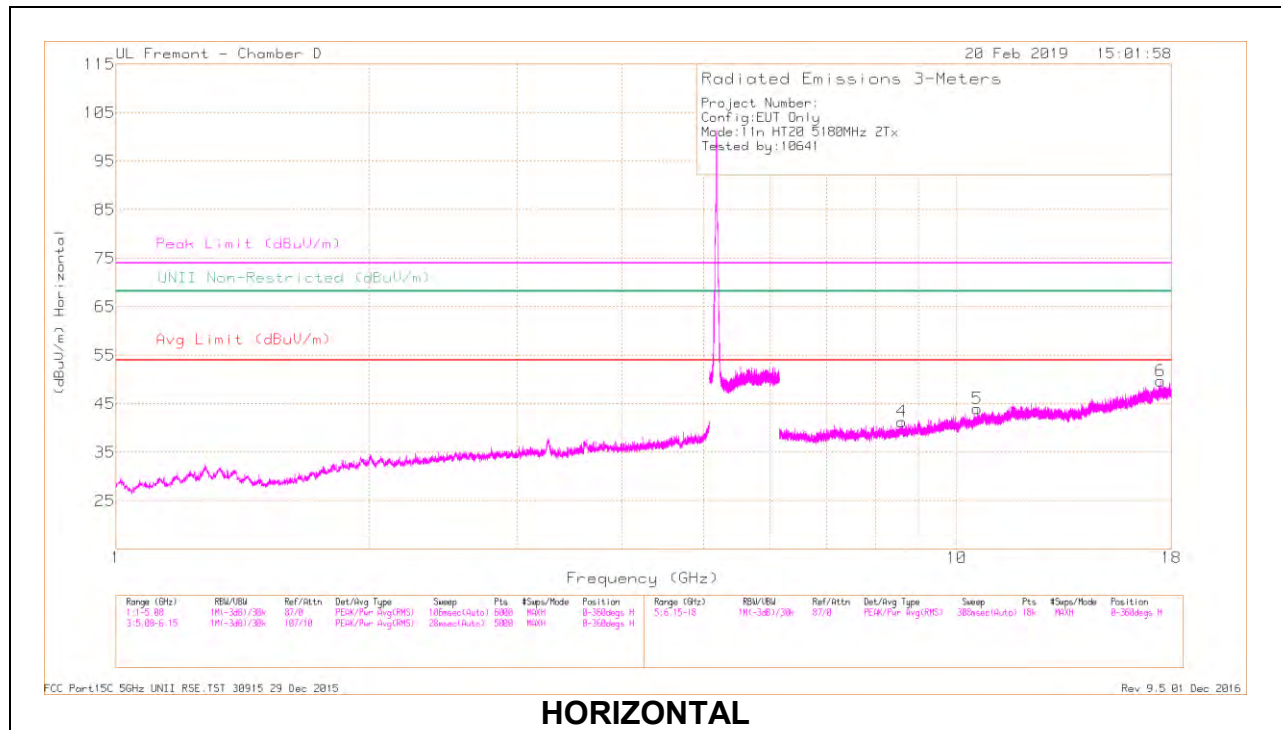
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

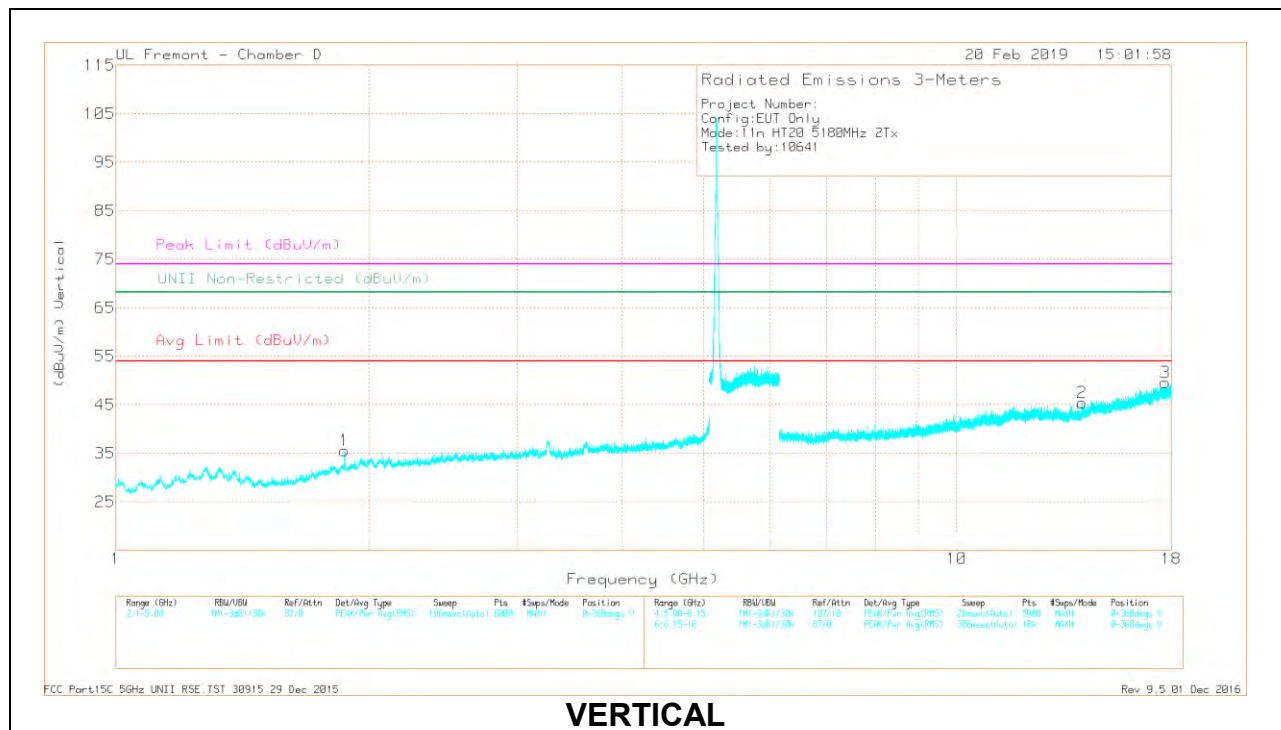
RMS - RMS detection

HARMONICS AND SPURIOUS EMISSIONS

LOW CHANNEL RESULTS



HORIZONTAL



VERTICAL

**RADIATED EMISSIONS**

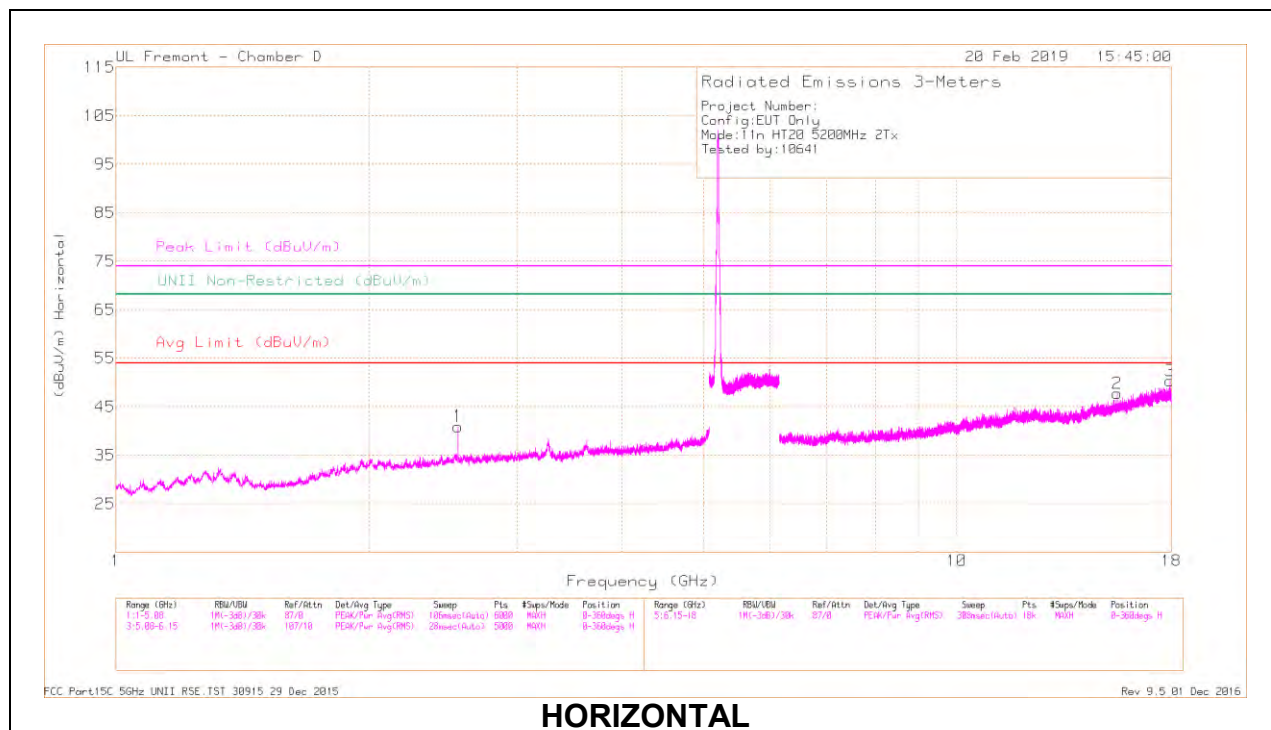
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
3	* 17.704	34.22	PK-U	41.6	-18.9	56.92	-	-	74	-17.08	-	-	245	113	V
	* 17.705	20.41	ADR	41.6	-18.9	43.11	54	-10.89	-	-	-	-	245	113	V
1	1.867	40.57	PK-U	31.1	-31.3	40.37	-	-	-	-	68.2	-27.83	229	151	V
4	8.61	35.07	PK-U	35.9	-22.9	48.07	-	-	-	-	68.2	-20.13	215	121	H
5	10.579	34.45	PK-U	37.8	-22	50.25	-	-	-	-	68.2	-17.95	226	136	H
2	14.096	35.92	PK-U	39	-23.1	51.82	-	-	-	-	68.2	-16.38	254	125	V
6	17.469	34.2	PK-U	41.3	-19.1	56.4	-	-	-	-	68.2	-11.8	250	155	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

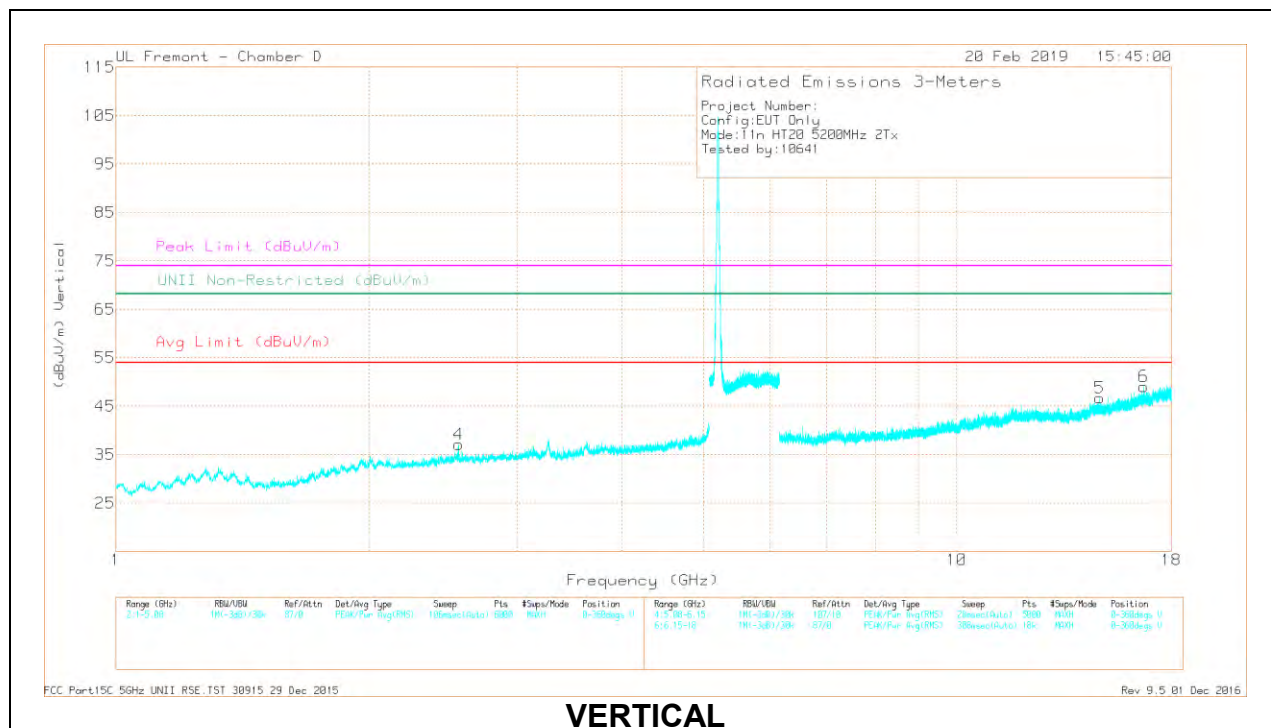
PK-U - U-NII: Maximum Peak

ADR - U-NII AD primary method, RMS average

### MID CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 15.513	34.98	PK-U	40.3	-21.6	53.68	-	-	74	-20.32	-	-	237	248	H
	* 15.512	22.52	ADR	40.3	-21.7	41.12	54	-12.88	-	-	-	-	237	248	H
3	* 17.921	33.12	PK-U	41.7	-17.7	57.12	-	-	74	-16.88	-	-	283	222	H
	* 17.919	19.53	ADR	41.7	-17.7	43.53	54	-10.47	-	-	-	-	283	222	H
1	2.548	39.35	PK-U	32.6	-29.5	42.45	-	-	-	-	68.2	-25.75	206	143	H
4	2.55	39.68	PK-U	32.5	-29.6	42.58	-	-	-	-	68.2	-25.62	255	283	V
5	14.794	35.87	PK-U	40	-23.6	52.27	-	-	-	-	68.2	-15.93	300	265	V
6	16.692	34.38	PK-U	41.4	-20.8	54.98	-	-	-	-	68.2	-13.22	332	232	V

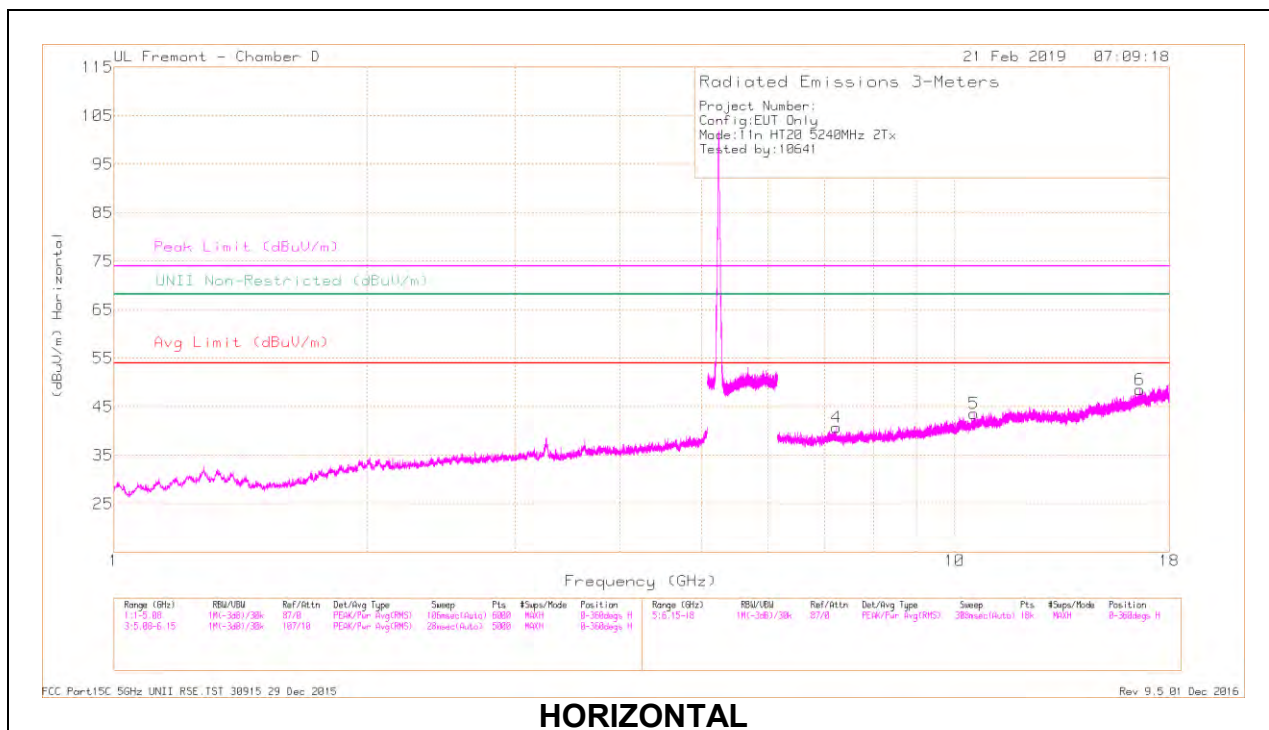
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

PK-U - U-NII: Maximum Peak

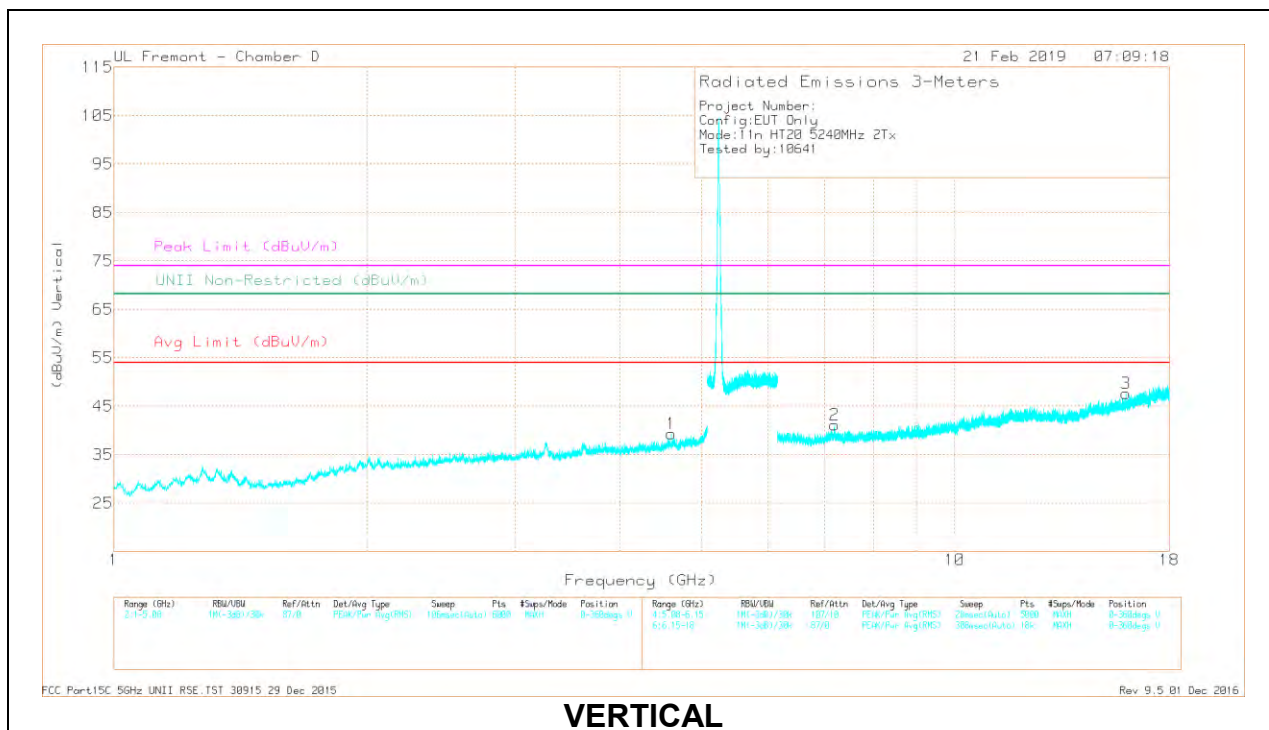
ADR - U-NII AD primary method, RMS average



### HIGH CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 4.604	38.51	PK-U	34.4	-27	45.91	-	-	74	-28.09	-	-	296	137	V
	* 4.601	26.38	ADR	34.4	-26.9	33.88	54	-20.12	-	-	-	-	296	137	V
3	* 15.98	34.44	PK-U	40.3	-21.3	53.44	-	-	74	-20.56	-	-	312	148	V
	* 15.978	22.12	ADR	40.3	-21.3	41.12	54	-12.88	-	-	-	-	312	148	V
2	7.202	36.11	PK-U	35.6	-23.7	48.01	-	-	-	-	68.2	-20.19	262	284	V
4	7.235	36.02	PK-U	35.6	-24.2	47.42	-	-	-	-	68.2	-20.78	243	111	H
5	10.536	34.3	PK-U	37.8	-22.2	49.9	-	-	-	-	68.2	-18.3	223	100	H
6	16.594	34.08	PK-U	41.3	-20.6	54.78	-	-	-	-	68.2	-13.42	277	312	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

PK-U - U-NII: Maximum Peak

ADR - U-NII AD primary method, RMS average

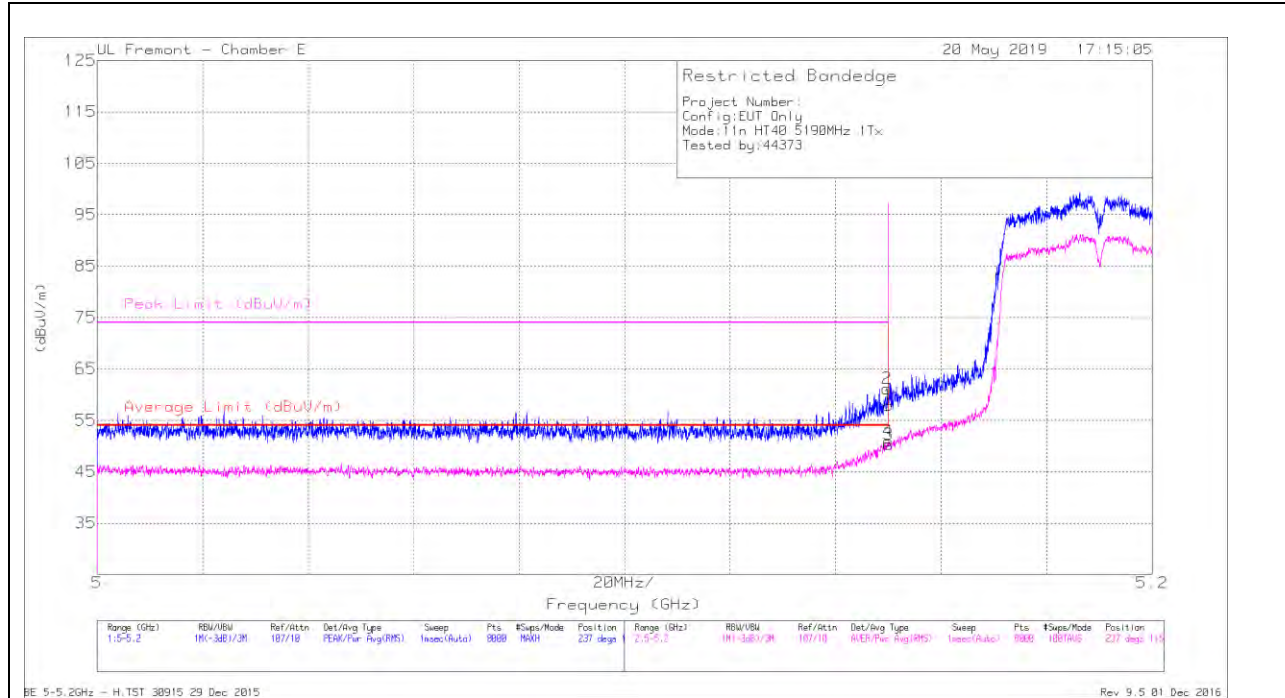


**1.1.2. TX ABOVE 1 GHz 802.11n HT40 MODE IN THE 5.2 GHz BAND**

**1TX Antenna 4 MODE**

**BANDEDGE (LOW CHANNEL)**

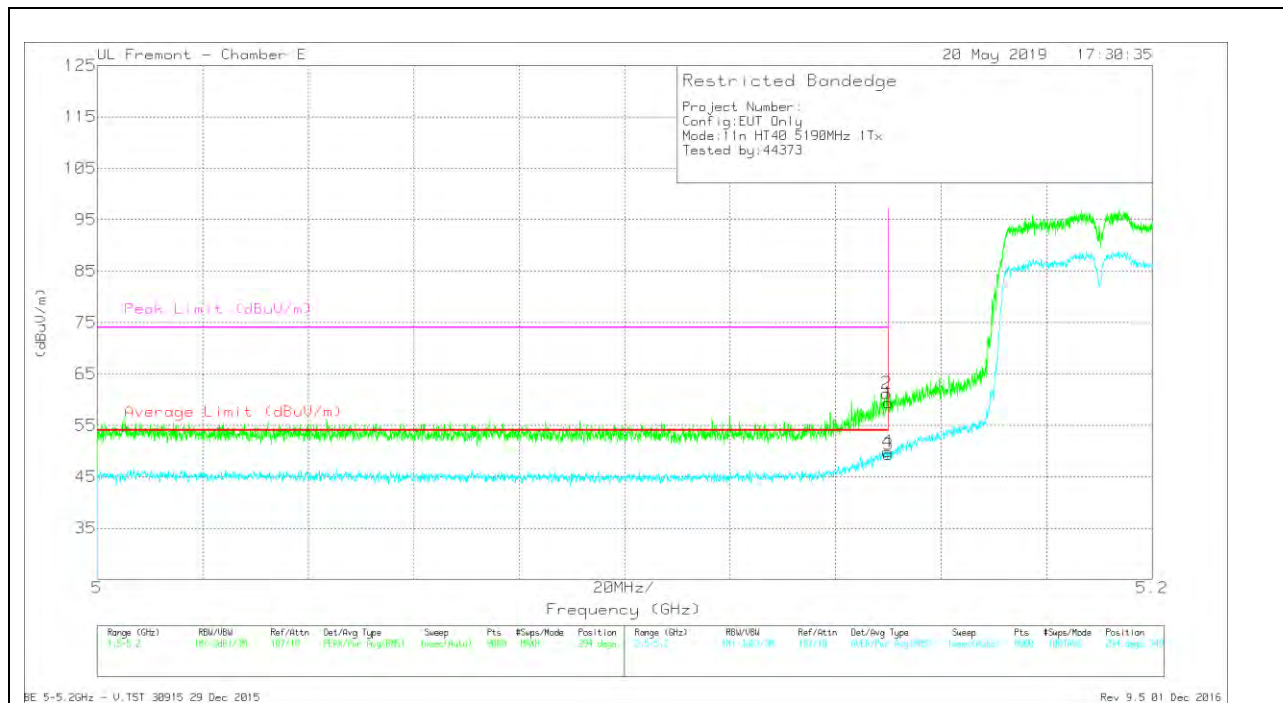
**HORIZONTAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	45.65	Pk	34.3	-22	0	57.95	-	-	74	-16.05	237	115	H
2	* 5.15	48.85	Pk	34.3	-22	0	61.15	-	-	74	-12.85	237	115	H
3	* 5.15	38.02	RMS	34.3	-22	0.09	50.41	54	-3.59	-	-	237	115	H
4	* 5.15	38.61	RMS	34.3	-22	0.09	51	54	-3	-	-	237	115	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

### VERTICAL RESULT



Marker	Frequenc y (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	47.05	Pk	34.3	-22	0	59.35	-	-	74	-14.65	294	349	V
2	* 5.15	48.93	Pk	34.3	-22	0	61.23	-	-	74	-12.77	294	349	V
3	* 5.15	37.03	RMS	34.3	-22	0.09	49.42	54	-4.58	-	-	294	349	V
4	* 5.15	37.56	RMS	34.3	-22	0.09	49.95	54	-4.05	-	-	294	349	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

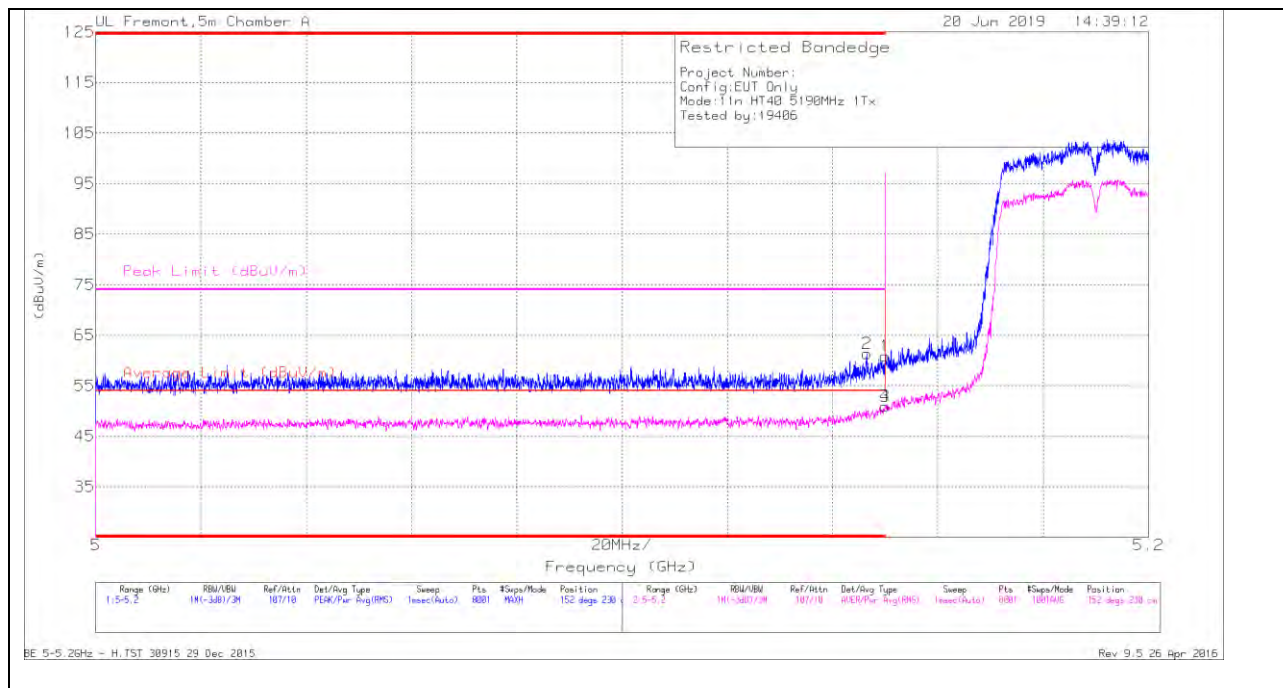
Pk - Peak detector

RMS - RMS detection

**1TX Antenna 5 MODE**

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



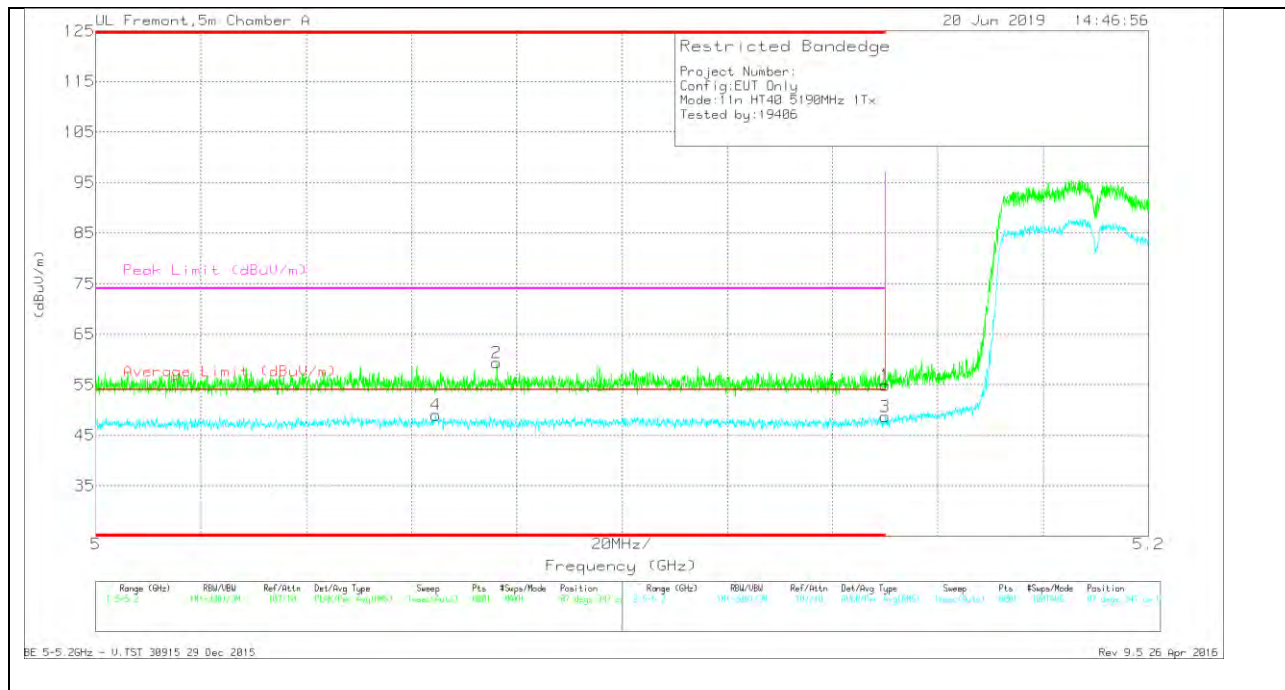
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T346 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.147	45.64	PK	34.5	-18.8	0	61.34	-	-	74	-12.66	152	230	H
4	* 5.15	35.14	RMS	34.6	-18.8	0.09	51.03	54	-2.97	-	-	152	230	H
1	5.15	45.06	PK	34.6	-18.8	0	60.86	-	-	74	-13.14	152	230	H
3	5.15	35.14	RMS	34.6	-18.8	0.09	51.03	54	-2.97	-	-	152	230	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



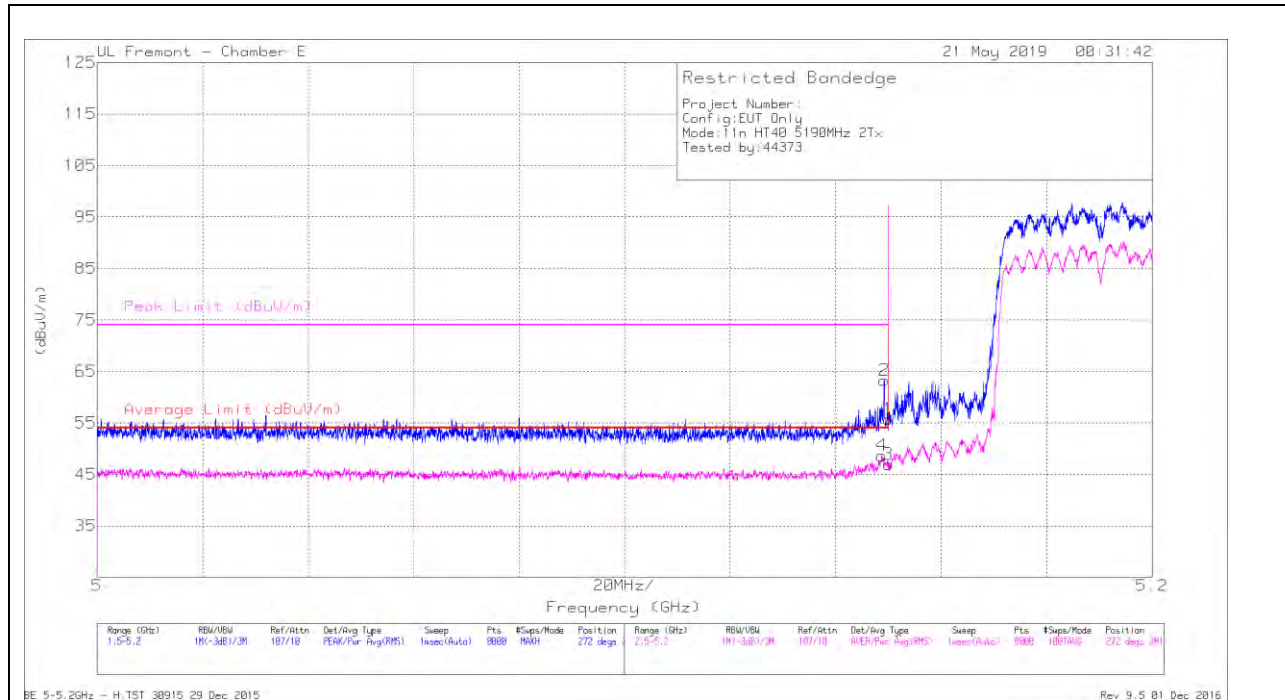
Marker	Frequenc y (GHz)	Meter Reading (dBuV)	Det	AF T346 (dB/m)	Amp/CbI/Fltr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.076	43.96	Pk	34.3	-18.9	0	59.36	-	-	74	-14.64	87	347	V
4	* 5.065	33.49	RMS	34.4	-18.9	0.09	49.08	54	-4.92	-	-	87	347	V
1	5.15	39.14	Pk	34.6	-18.8	0	54.94	-	-	74	-19.06	87	347	V
3	5.15	32.93	RMS	34.6	-18.8	0.09	48.82	54	-5.18	-	-	87	347	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**2TX Antenna 4 + Antenna 5 CDD MODE**

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	43.44	Pk	34.3	-22	0	55.74	-	-	74	-18.26	272	381	H
2	* 5.149	50.96	Pk	34.3	-22	0	63.26	-	-	74	-10.74	272	381	H
3	* 5.15	34.64	RMS	34.3	-22	0.09	47.03	54	-6.97	-	-	272	381	H
4	* 5.149	36.37	RMS	34.3	-22	0.09	48.76	54	-5.24	-	-	272	381	H

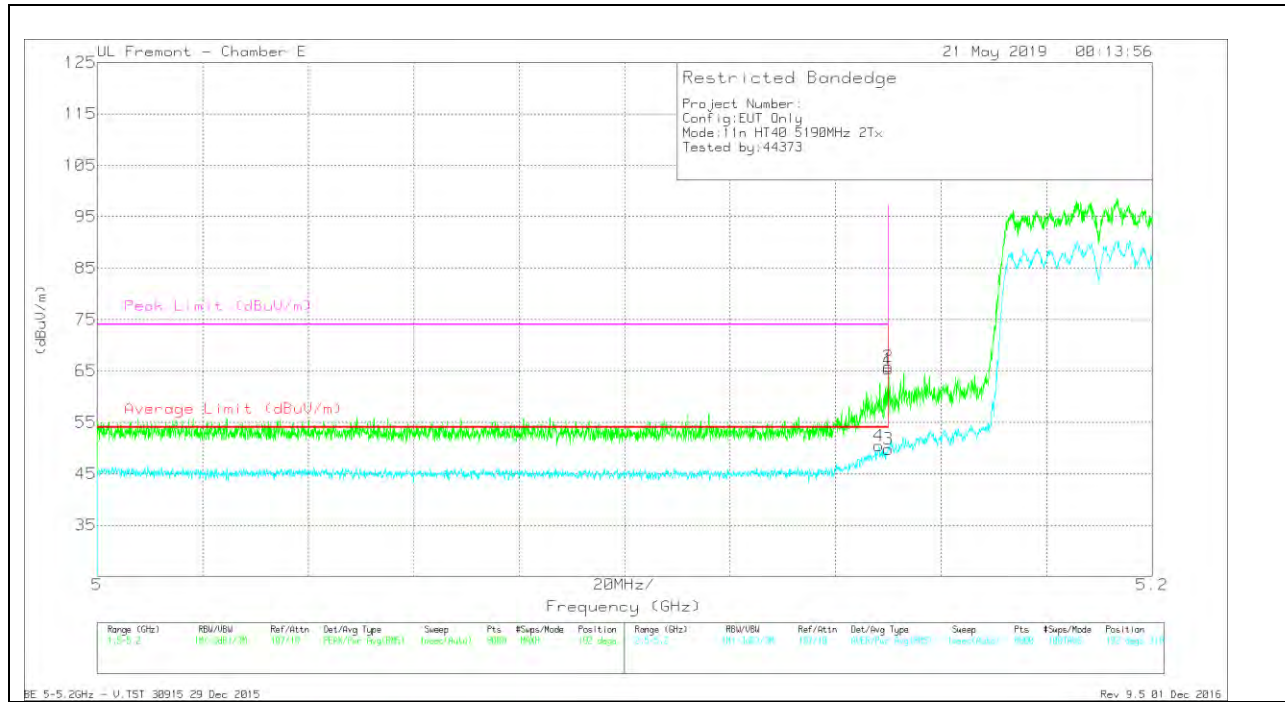
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection



### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	53.02	Pk	34.3	-22	0	65.32	-	-	74	-8.68	192	318	V
2	* 5.15	53.54	Pk	34.3	-22	0	65.84	-	-	74	-8.16	192	318	V
3	* 5.15	37.49	RMS	34.3	-22	0.09	49.88	54	-4.12	-	-	192	318	V
4	* 5.148	38.15	RMS	34.3	-22	0.09	50.54	54	-3.46	-	-	192	318	V

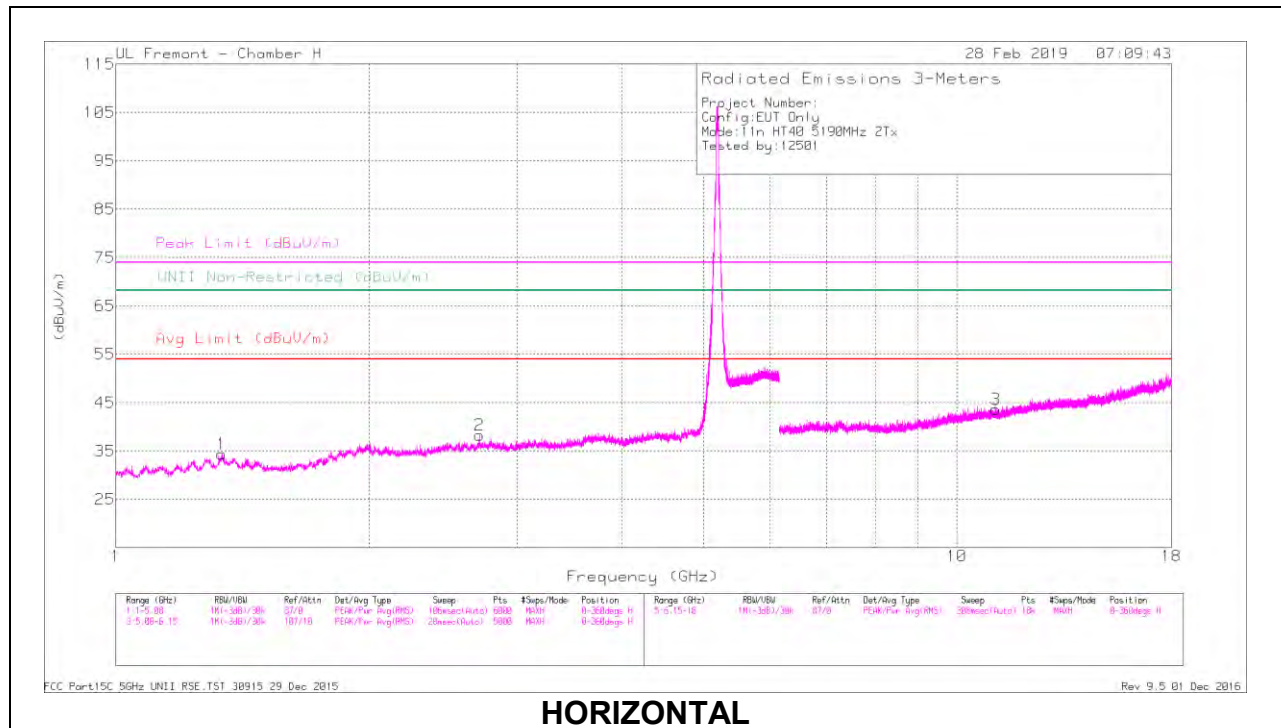
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

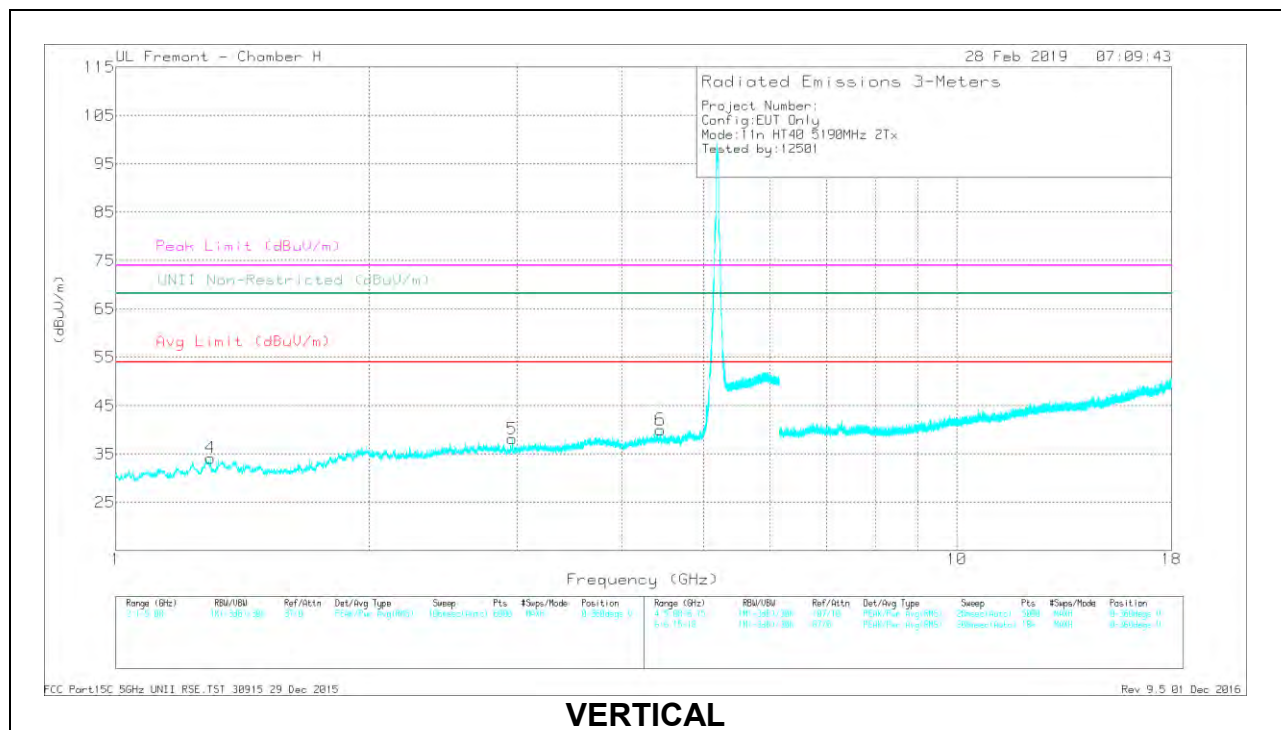
RMS - RMS detection

HARMONICS AND SPURIOUS EMISSIONS

LOW CHANNEL RESULTS



HORIZONTAL



VERTICAL

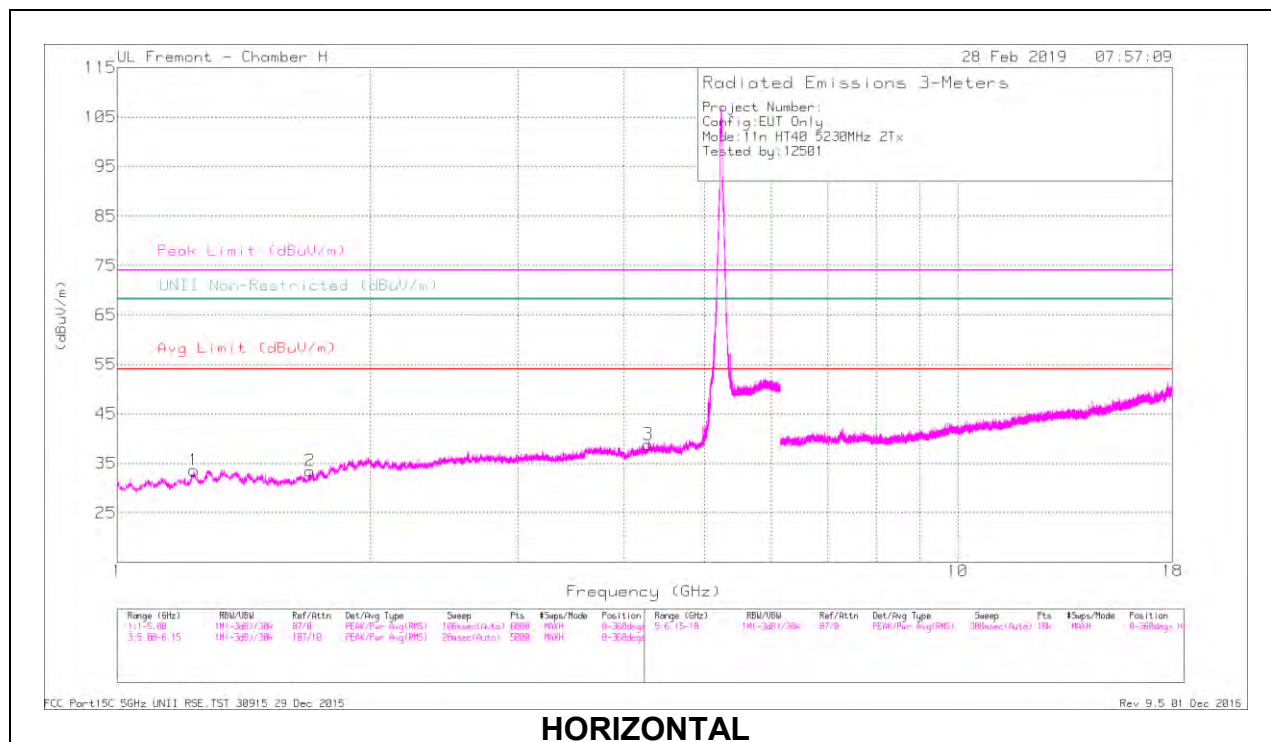
**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T136 (dB/m)	Amp/Cbl/Filr/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 1.338	45.2	PK-U	29.3	-32.9	0	41.6	-	-	74	-32.4	-	-	312	201	H
	* 1.338	33.38	ADR	29.3	-32.9	.09	29.97	54	-24.03	-	-	-	-	312	201	H
2	* 2.705	43.11	PK-U	32.5	-31.6	0	44.01	-	-	74	-29.99	-	-	295	218	H
	* 2.707	31.69	ADR	32.5	-31.6	.09	32.78	54	-21.22	-	-	-	-	295	218	H
4	* 1.295	44	PK-U	29.3	-32.9	0	40.4	-	-	74	-33.6	-	-	116	146	V
	* 1.296	32.6	ADR	29.2	-32.9	.09	29.09	54	-24.91	-	-	-	-	116	146	V
3	* 11.124	36.64	PK-U	37.8	-23.5	0	50.94	-	-	74	-23.06	-	-	137	319	H
	* 11.127	24.69	ADR	37.8	-23.5	.09	39.18	54	-14.82	-	-	-	-	137	319	H
5	2.961	42.1	PK-U	32.3	-30.6	0	43.6	-	-	-	-	68.2	-24.4	340	258	V
6	4.443	42.23	PK-U	33.8	-30.6	0	45.43	-	-	-	-	68.2	-22.77	221	236	V

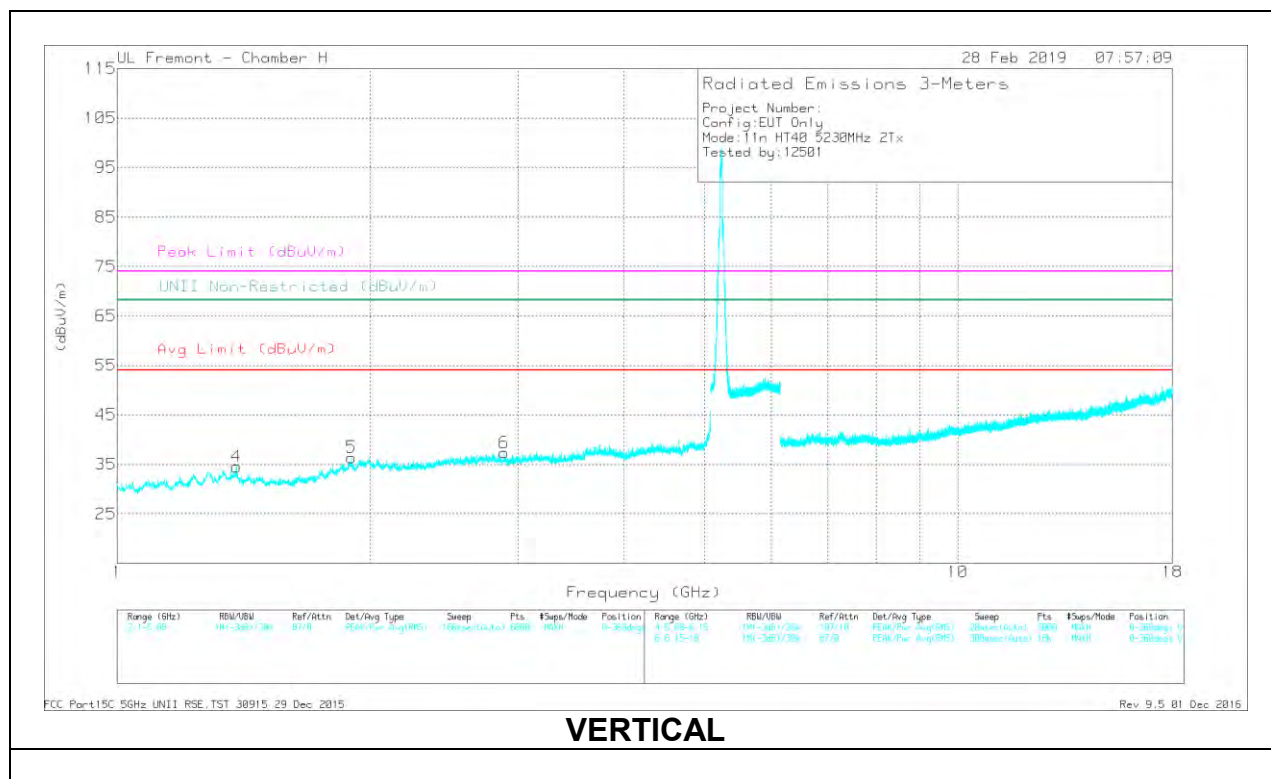
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average



### HIGH CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequenc y (GHz)	Meter Reading (dBuV)	Det	AF T156 (dB/m)	Amp/CBI/Filt/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 1.233	44.95	PK-U	28.7	-33	0	40.65	-	-	74	-33.35	-	-	316	326	H
	* 1.235	32.87	ADR	28.7	-33	.09	28.76	54	-25.24	-	-	-	-	316	326	H
2	* 1.696	43.82	PK-U	28.5	-32.5	0	39.82	-	-	74	-34.18	-	-	21	293	H
	* 1.697	32.07	ADR	28.5	-32.5	.09	28.26	54	-25.74	-	-	-	-	21	293	H
3	* 4.282	41.48	PK-U	33.7	-29.9	0	45.28	-	-	74	-28.72	-	-	12	103	H
	* 4.281	29.62	ADR	33.7	-29.9	.09	33.61	54	-20.39	-	-	-	-	12	103	H
4	* 1.387	45.35	PK-U	29.1	-33	0	41.45	-	-	74	-32.55	-	-	146	360	V
	* 1.385	32.85	ADR	29.1	-33	.09	29.14	54	-24.86	-	-	-	-	146	360	V
6	* 2.889	43.8	PK-U	32.3	-31.3	0	44.8	-	-	74	-29.2	-	-	150	273	V
	* 2.888	30.87	ADR	32.3	-31.4	.09	31.96	54	-22.04	-	-	-	-	150	273	V
5	1.899	44.15	PK-U	31.1	-32.5	0	42.75	-	-	-	-	68.2	-25.45	22	340	V

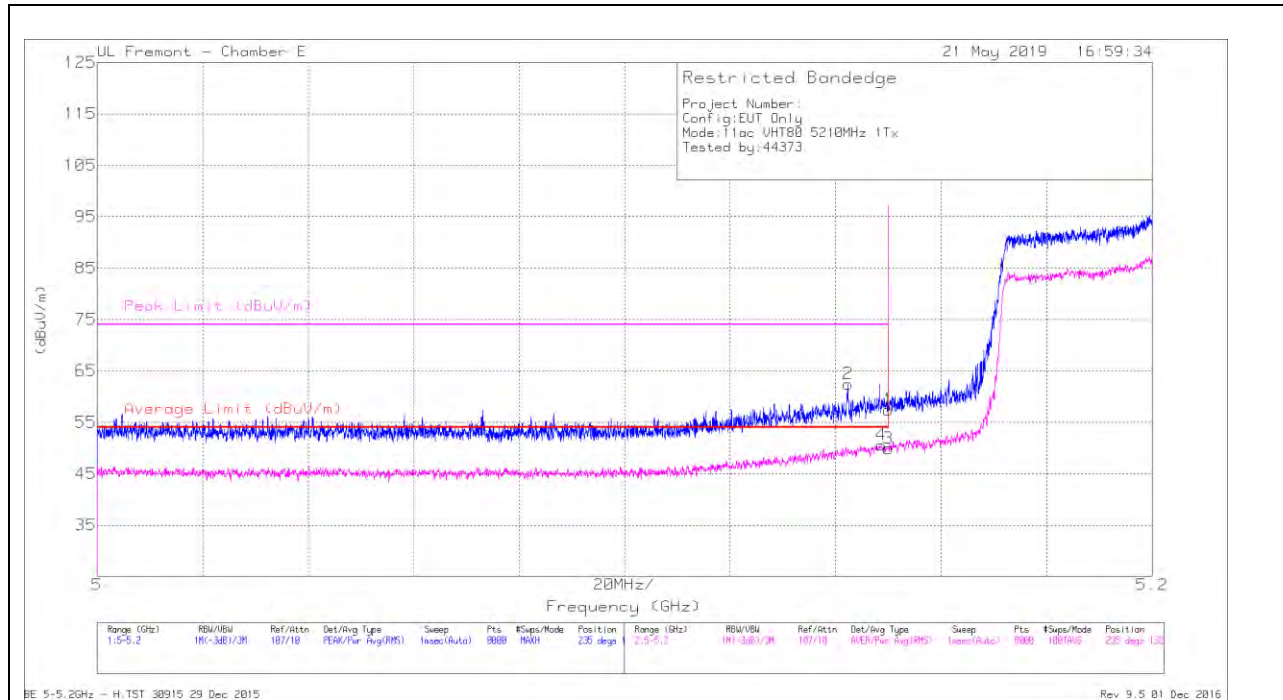
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

**1.1.3. TX ABOVE 1 GHz 802.11ac VHT80 MODE IN THE 5.2 GHz BAND**

**1TX Antenna 4 MODE**

**BANDEDGE (MID CHANNEL)**

**HORIZONTAL RESULT**



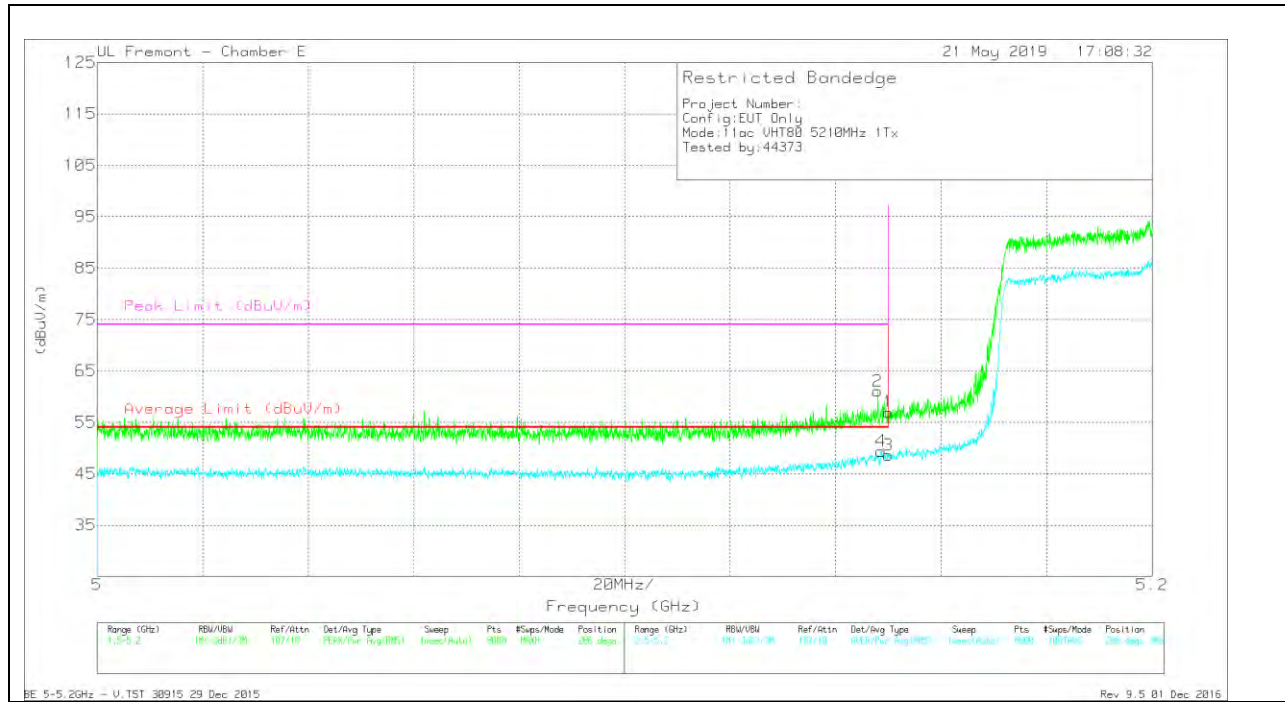
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	DC corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	45.16	Pk	34.3	-22	0	57.46	-	-	74	-16.54	235	132	H
2	* 5.142	50.28	Pk	34.2	-22	0	62.48	-	-	74	-11.52	235	132	H
3	* 5.15	37.61	RMS	34.3	-22	.2	50.11	54	-3.89	-	-	235	132	H
4	* 5.149	38.31	RMS	34.3	-22	.2	50.81	54	-3.19	-	-	235	132	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



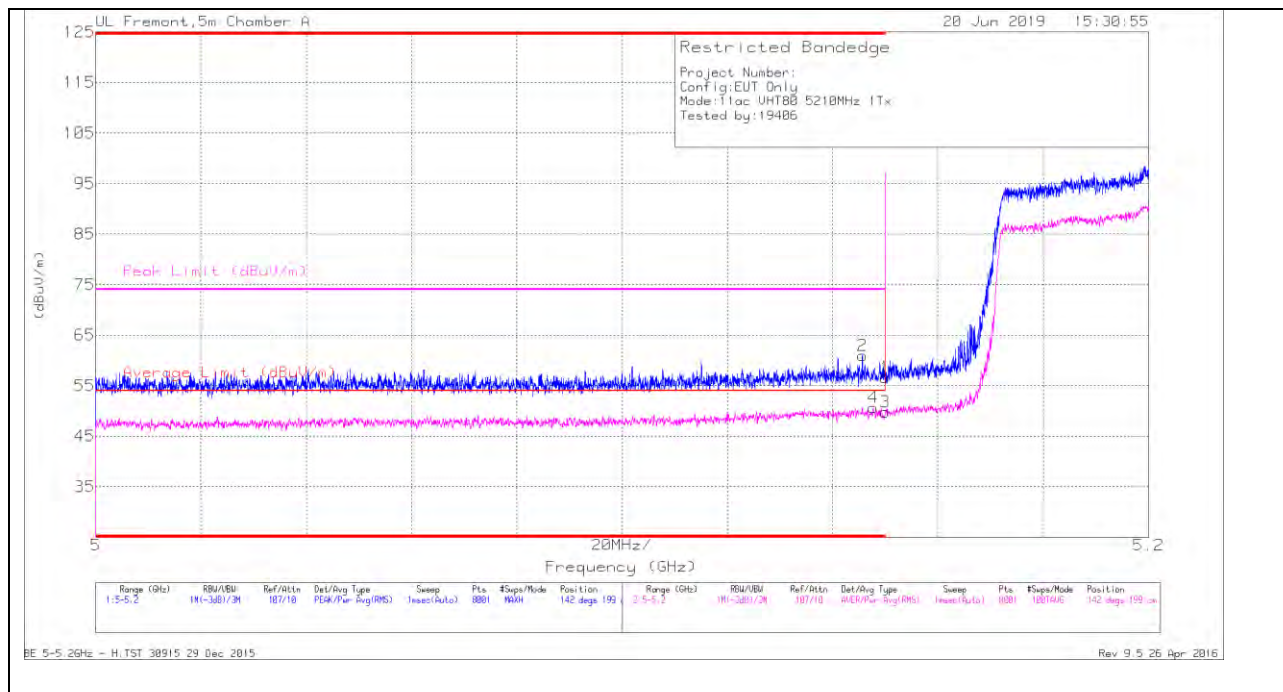
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	44.68	Pk	34.3	-22	0	56.98	-	-	74	-17.02	286	386	V
2	* 5.148	48.77	Pk	34.3	-22	0	61.07	-	-	74	-12.93	286	386	V
3	* 5.15	36.31	RMS	34.3	-22	.2	48.81	54	-5.19	-	-	286	386	V
4	* 5.149	37.07	RMS	34.3	-22	.2	49.57	54	-4.43	-	-	286	386	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**1TX Antenna 5 MODE**

**BANDEDGE (MID CHANNEL)**

**HORIZONTAL RESULT**



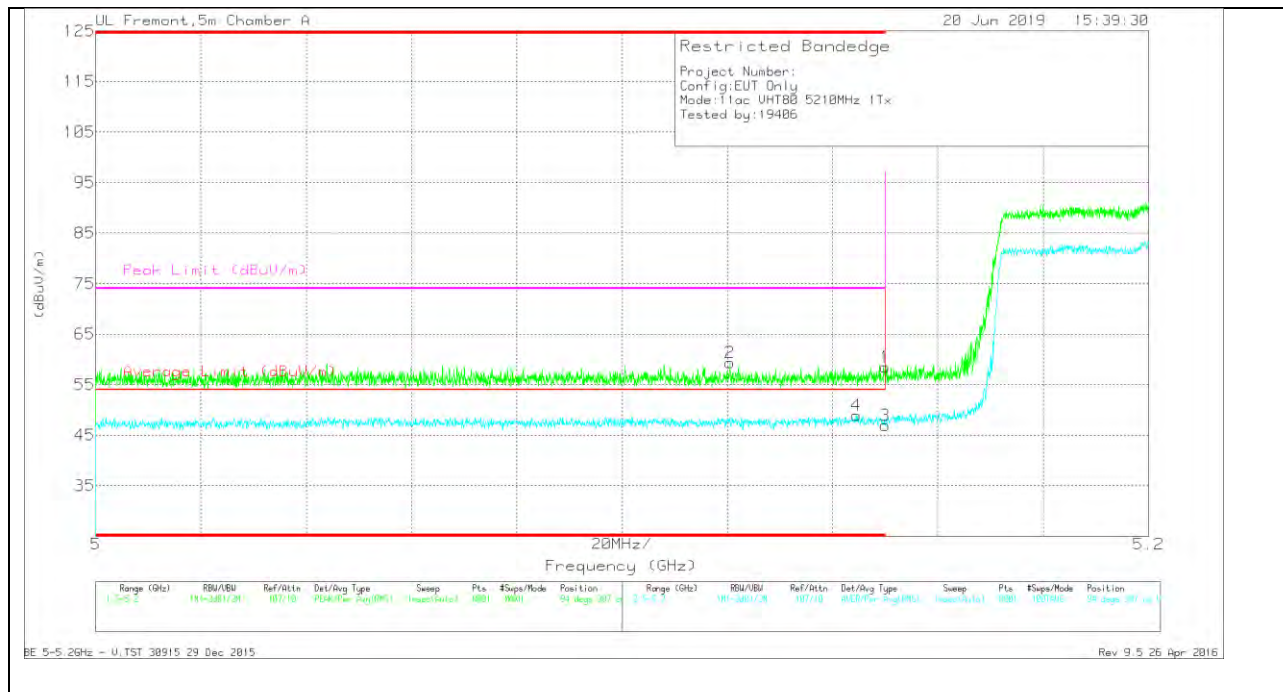
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T346 (dBm)	Amp/Cb/Filtz/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.146	45.22	Pk	34.5	-18.8	0	60.92	-	-	74	-13.08	142	199	H
4	* 5.148	34.83	RMS	34.5	-18.8	.2	50.73	54	-3.27	-	-	142	199	H
1	5.15	40.82	Pk	34.6	-18.8	0	56.62	-	-	74	-17.38	142	199	H
3	5.15	33.79	RMS	34.6	-18.8	.2	49.79	54	-4.21	-	-	142	199	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T346 (dB/m)	Amp/Cbl/Filtr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
2	* 5.12	43.41	Pk	34.6	-18.7	0	59.31	-	-	74	-14.69	94	387	V
4	* 5.144	33.28	RMS	34.5	-18.8	.2	49.18	54	-4.82	-	-	94	387	V
1	5.15	42.71	Pk	34.6	-18.8	0	58.51	-	-	74	-15.49	94	387	V
3	5.15	31.17	RMS	34.6	-18.8	.2	47.17	54	-6.83	-	-	94	387	V

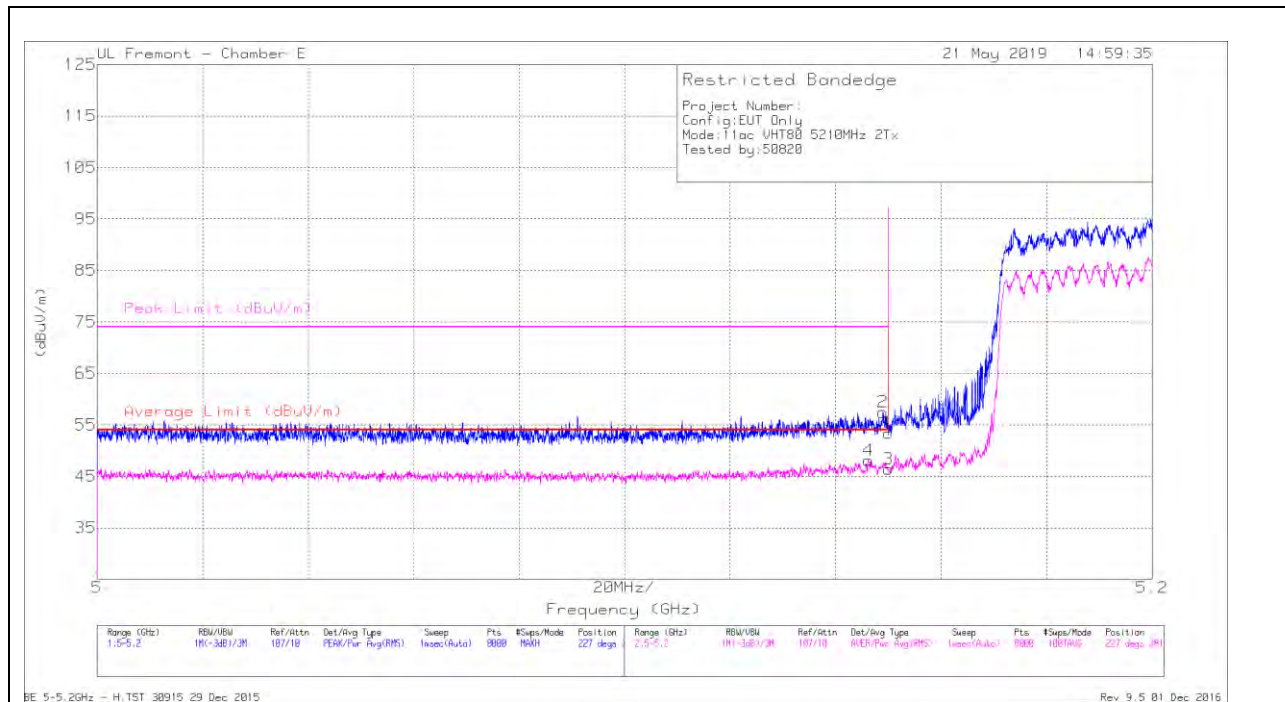
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection



**2TX Antenna 4 + Antenna 5 CDD MODE**

**BANDEDGE (MID CHANNEL)**

**HORIZONTAL RESULT**



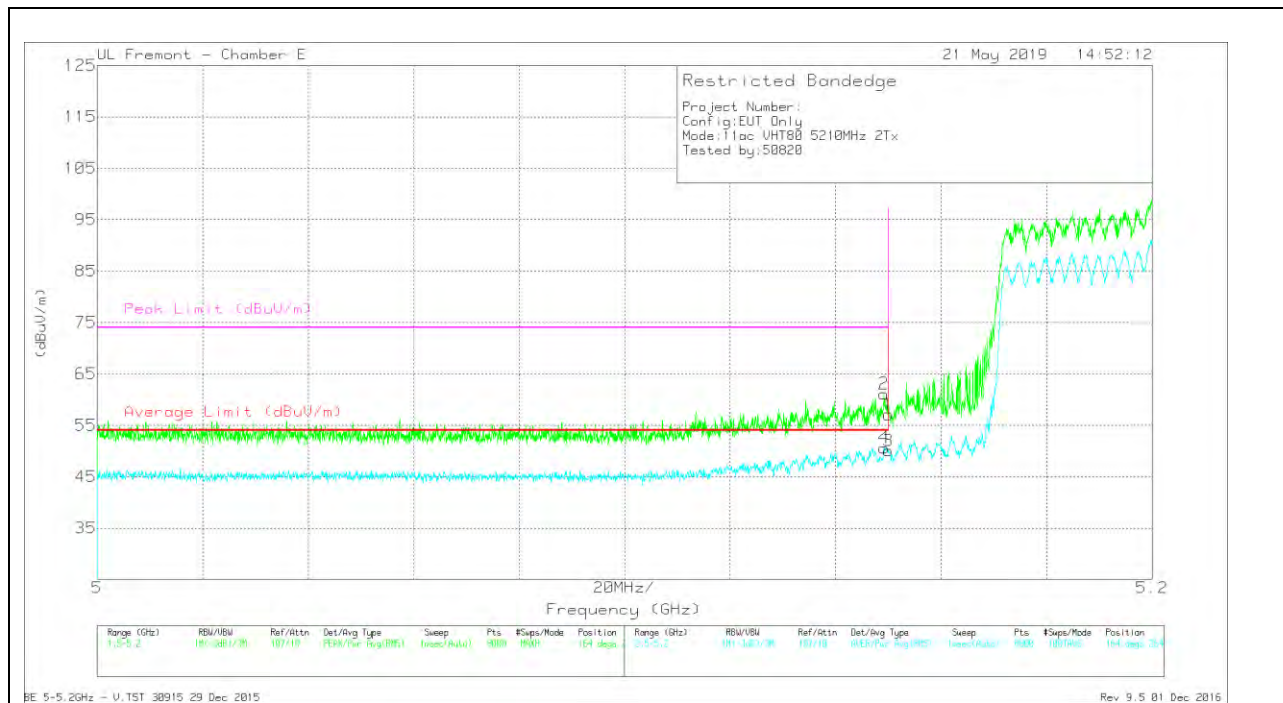
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
4	* 5.146	35.84	RMS	34.3	-22	.19	-48.33	54	-5.67	-	-	227	381	H
2	* 5.149	45.18	Pk	34.3	-22	0	57.48	-	-	74	-16.52	227	381	H
1	* 5.15	41.12	PK	34.3	-22	0	53.42	-	-	74	-20.58	227	381	H
3	* 5.15	34.09	RMS	34.3	-22	.19	46.58	54	-7.42	-	-	227	381	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbi/Filtr/P ad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	44.82	Pk	34.3	-22	0	57.12	-	-	74	-16.88	164	264	V
2	* 5.149	48.83	Pk	34.3	-22	0	61.13	-	-	74	-12.87	164	264	V
3	* 5.15	37.75	RMS	34.3	-22	.19	50.24	54	-3.76	-	-	164	264	V
4	* 5.149	38.32	RMS	34.3	-22	.19	50.81	54	-3.19	-	-	164	264	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

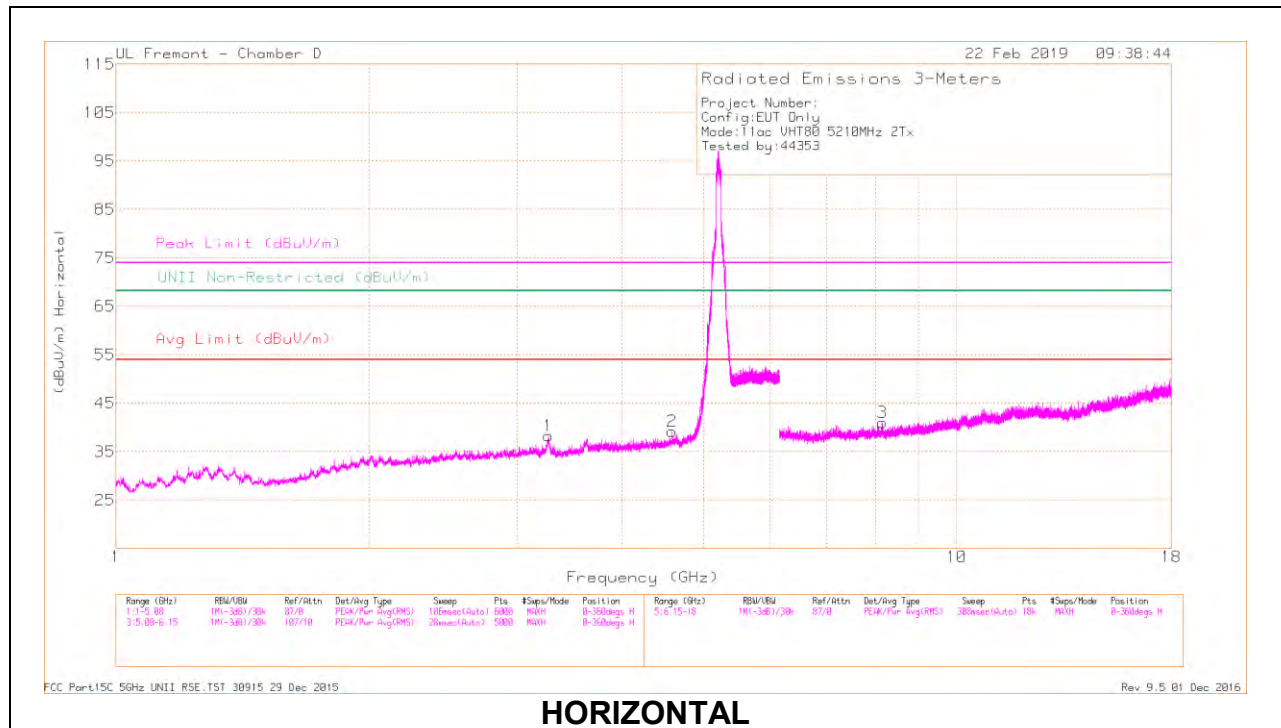
Pk - Peak detector

RMS - RMS detection

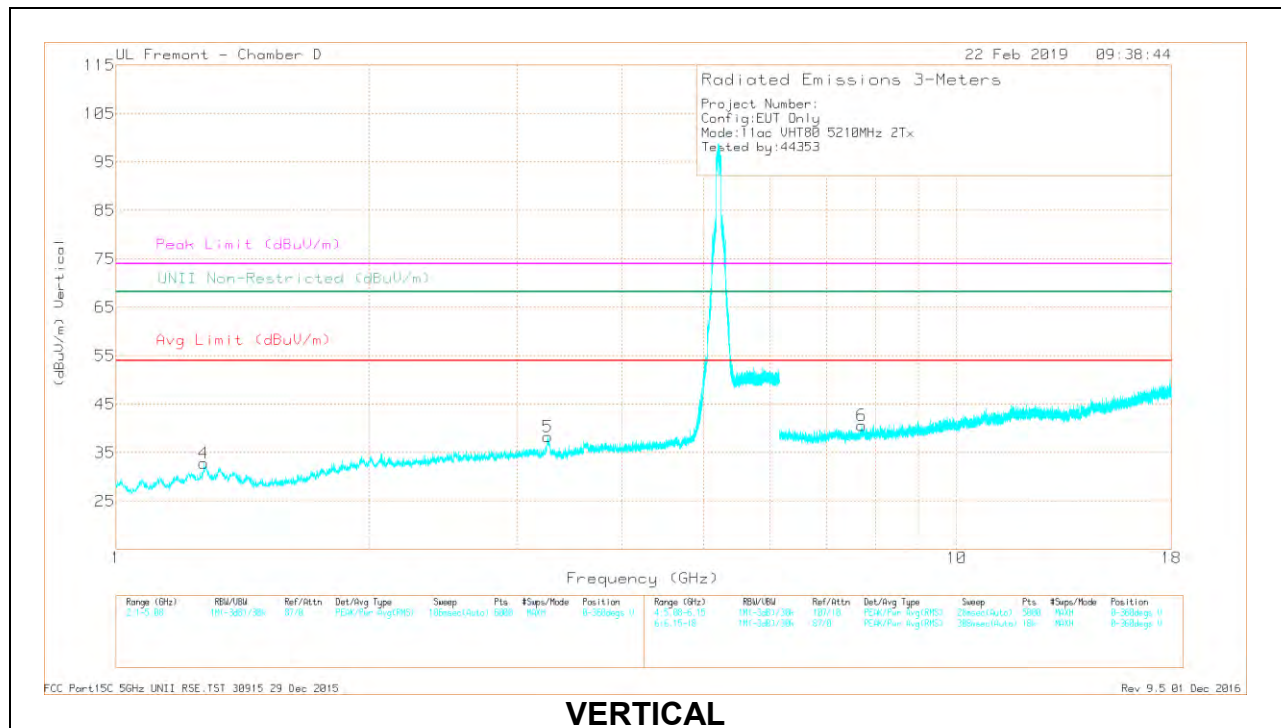


**HARMONICS AND SPURIOUS EMISSIONS**

**MID CHANNEL RESULTS**



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	DC Corr (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polariz
2	* 4.588	38.35	PK-U	34.4	-27	0	45.75	-	-	74	-28.25	-	-	176	200	H
	* 4.59	26.37	ADR	34.4	-27	.19	33.96	54	-20.04	-	-	-	-	176	200	H
5	* 3.261	39.71	PK-U	35.4	-29.2	0	45.91	-	-	74	-28.09	-	-	253	191	V
	* 3.261	26.77	ADR	35.4	-29.2	.19	33.16	54	-20.84	-	-	-	-	253	191	V
4	* 1.274	41.04	PK-U	30.2	-31.8	0	39.44	-	-	74	-34.56	-	-	330	174	V
	* 1.274	29.5	ADR	30.3	-31.8	.19	28.19	54	-25.81	-	-	-	-	330	174	V
3	* 8.166	36.12	PK-U	35.8	-23.9	0	48.02	-	-	74	-25.98	-	-	202	257	H
	* 8.164	23.45	ADR	35.8	-24.1	.19	35.34	54	-18.66	-	-	-	-	202	257	H
6	* 7.711	35.23	PK-U	35.8	-24.6	0	46.43	-	-	74	-27.57	-	-	124	102	V
	* 7.711	24.83	ADR	35.8	-24.6	.19	36.22	54	-17.80	-	-	-	-	124	102	V
1	3.269	38.45	PK-U	35.3	-29.3	0	44.45	-	-	-	-	68.2	-23.75	38	334	H

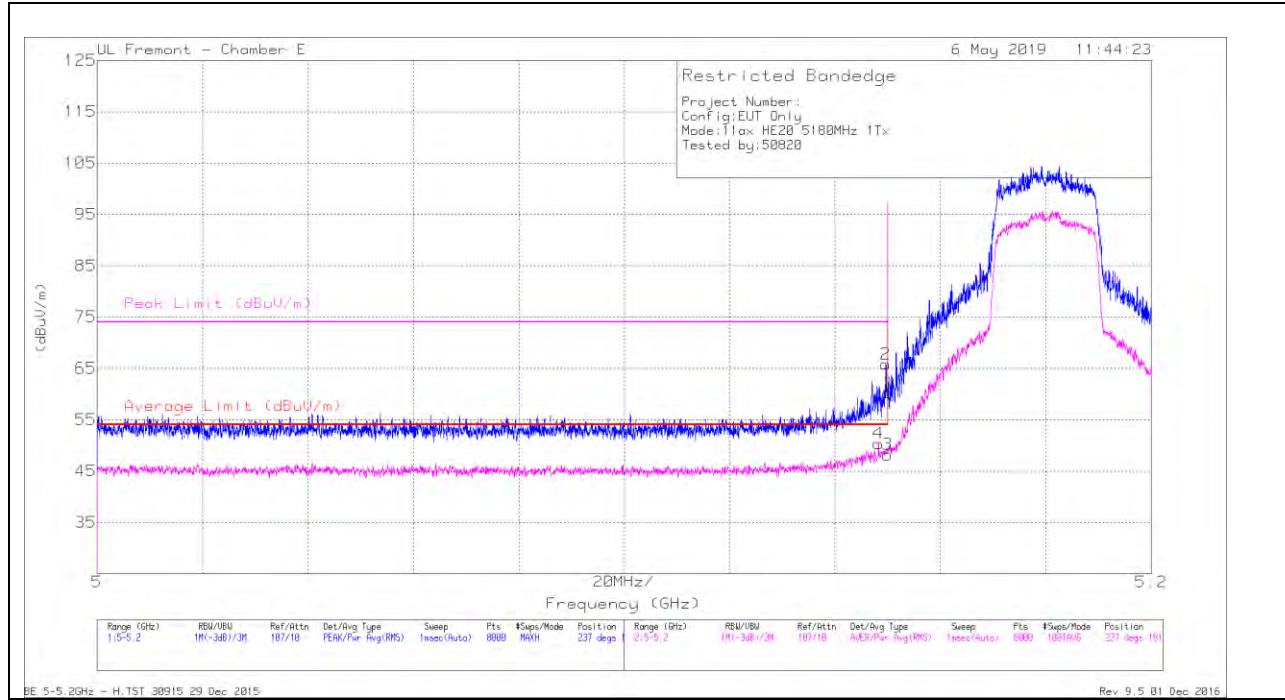
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

**1.1.4. TX ABOVE 1 GHz 802.11ax HE20 MODE IN THE 5.2 GHz BAND**

**1TX Antenna 4 MODE – 242 Tones, RU Index 61**

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



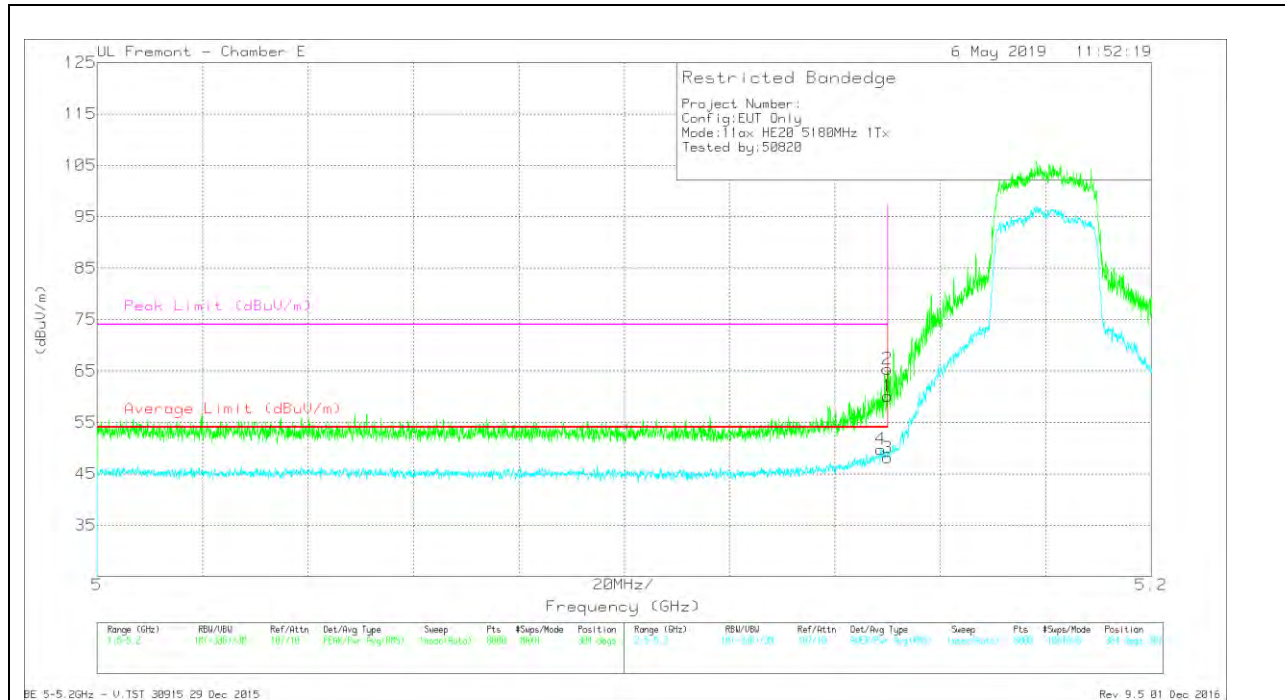
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Ftr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	47.97	Pk	34.3	-22	60.27	-	-	74	-13.73	237	181	H
2	* 5.15	53.54	Pk	34.3	-22	65.84	-	-	74	-8.16	237	181	H
3	* 5.15	35.9	RMS	34.3	-22	48.2	54	-5.8	-	-	237	181	H
4	* 5.148	38.09	RMS	34.3	-22	50.39	54	-3.61	-	-	237	181	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	47.78	Pk	34.3	-22	60.08	-	-	74	-13.92	304	307	V
2	* 5.15	53.09	Pk	34.3	-22	65.39	-	-	74	-8.61	304	307	V
3	* 5.15	35.81	RMS	34.3	-22	48.11	54	-5.89	-	-	304	307	V
4	* 5.149	37.46	RMS	34.3	-22	49.76	54	-4.24	-	-	304	307	V

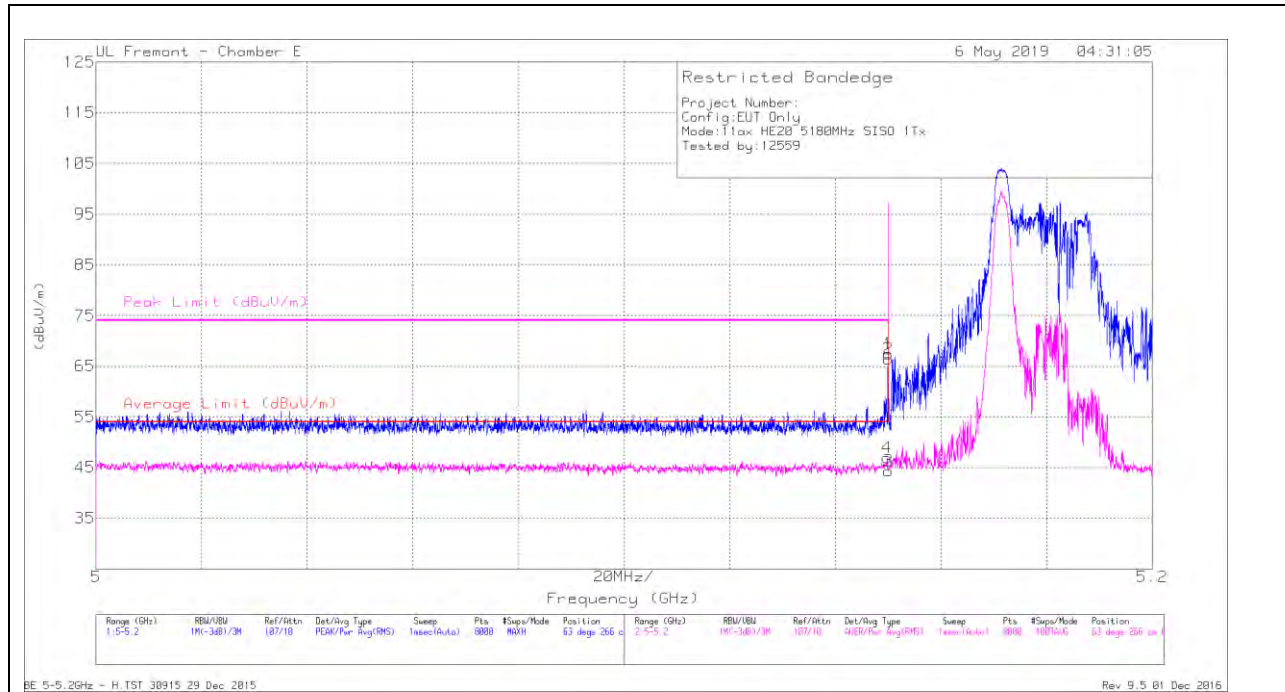
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



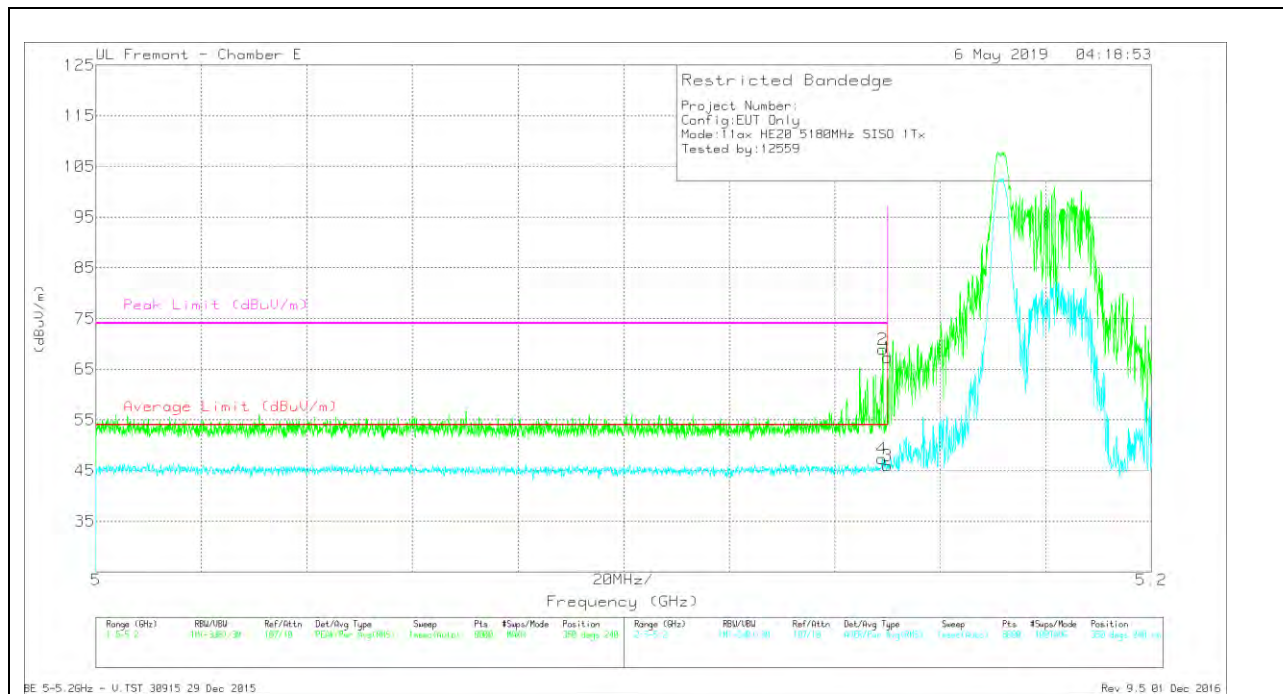
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cb/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	55.07	Pk	34.3	-22	67.37	-	-	74	-6.63	63	266	H
2	* 5.15	54.12	Pk	34.3	-22	66.42	-	-	74	-7.58	63	266	H
3	* 5.15	32.05	RMS	34.3	-22	44.35	54	-9.65	-	-	63	266	H
4	* 5.15	34.59	RMS	34.3	-22	46.89	54	-7.11	-	-	63	266	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	54.96	Pk	34.3	-22	67.26	-	-	74	-6.74	350	240	V
2	* 5.149	56.56	Pk	34.3	-22	68.86	-	-	74	-5.14	350	240	V
3	* 5.15	33.61	RMS	34.3	-22	45.91	54	-8.09	-	-	350	240	V
4	* 5.149	35.01	RMS	34.3	-22	47.31	54	-6.69	-	-	350	240	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

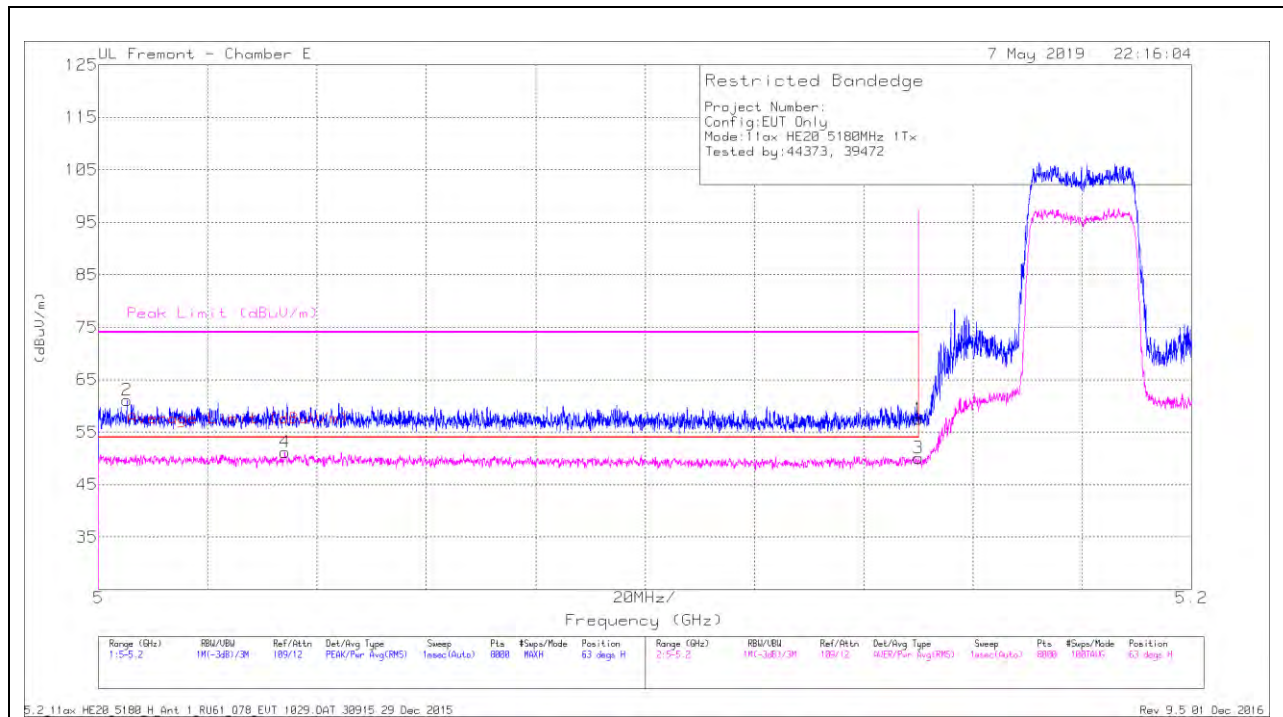
Pk - Peak detector

RMS - RMS detection



**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



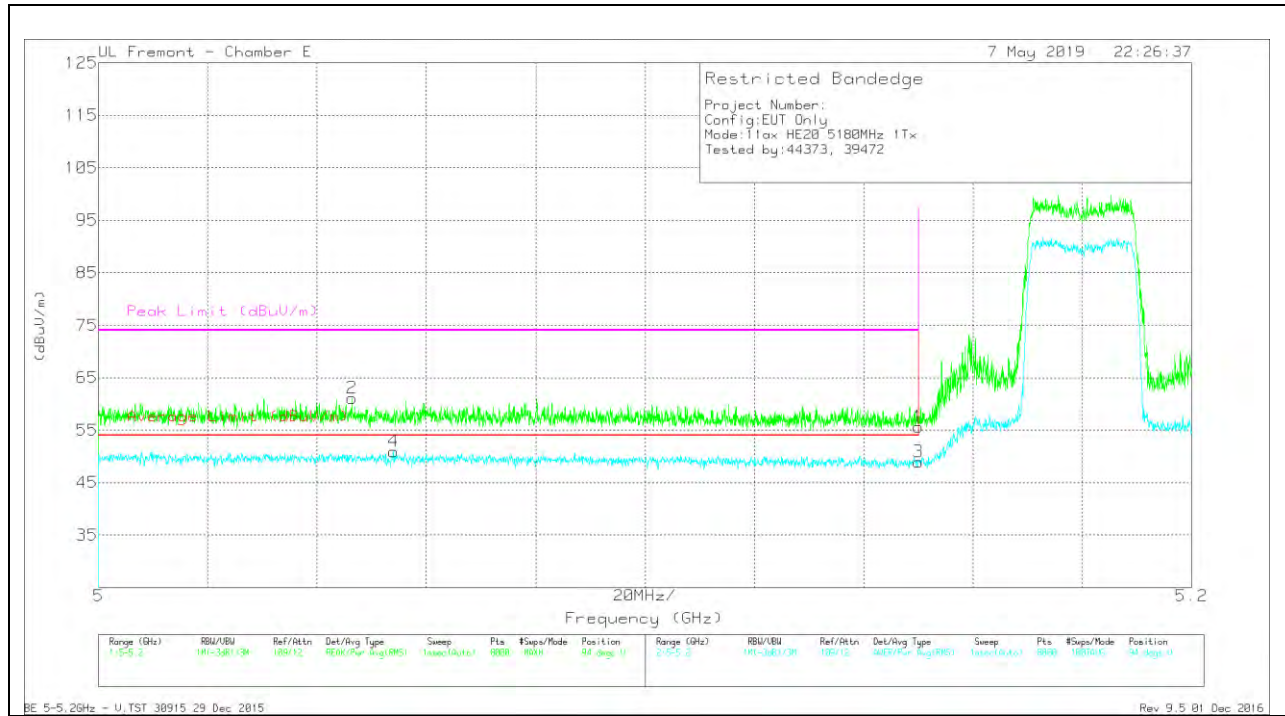
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cb/Ftr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	39.75	Pk	34.3	-16.6	57.45	-	-	74	-16.55	63	167	H
2	* 5.005	43.06	Pk	34.1	-16.1	61.06	-	-	74	-12.94	63	167	H
3	* 5.15	32.36	RMS	34.3	-16.6	50.06	54	-3.94	-	-	63	167	H
4	* 5.034	33.21	RMS	34.1	-16.2	51.11	54	-2.89	-	-	63	167	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

**VERTICAL RESULT**

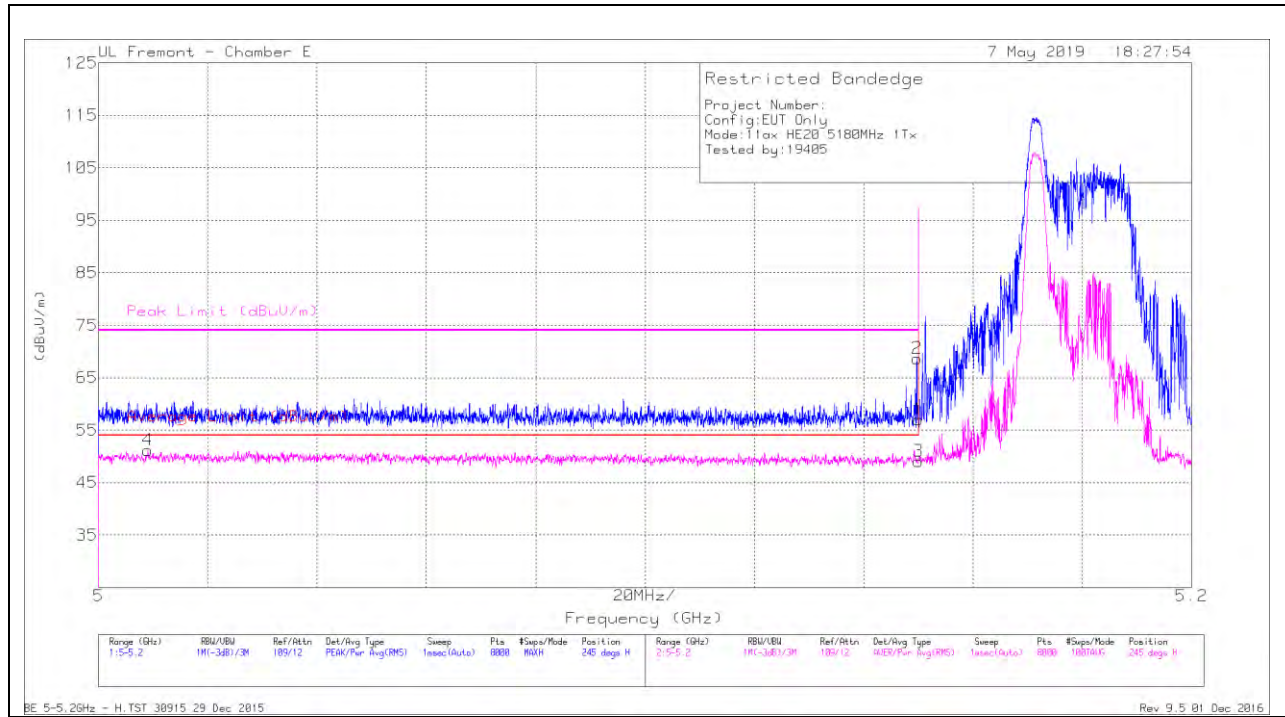


Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	37.95	Pk	34.3	-16.6	55.65	-	-	74	-18.35	94	103	V
2	* 5.046	43.07	Pk	34.2	-16.2	61.07	-	-	74	-12.93	94	103	V
3	* 5.15	31.21	RMS	34.3	-16.6	48.91	54	-5.09	-	-	94	103	V
4	* 5.054	33.06	RMS	34.1	-16.3	50.86	54	-3.14	-	-	94	103	V



**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



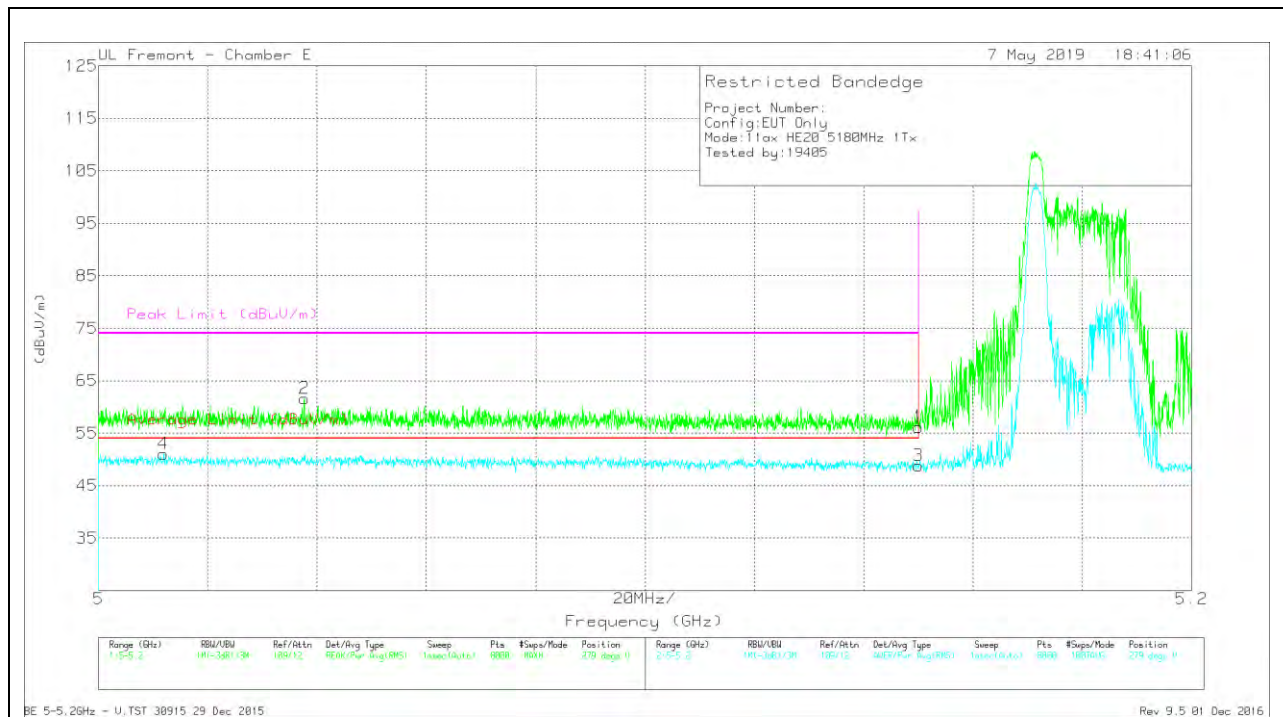
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cb/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	39.28	Pk	34.3	-16.6	56.98	-	-	74	-17.02	245	146	H
2	* 5.15	50.97	Pk	34.3	-16.6	68.67	-	-	74	-5.33	245	146	H
3	* 5.15	31.35	RMS	34.3	-16.6	49.05	54	-4.95	-	-	245	146	H
4	* 5.009	33.28	RMS	34.1	-16.2	51.18	54	-2.82	-	-	245	146	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	38.4	Pk	34.3	-16.6	56.1	-	-	74	-17.9	279	122	V
2	* 5.038	43.61	Pk	34.2	-16.2	61.61	-	-	74	-12.39	279	122	V
3	* 5.15	31.06	RMS	34.3	-16.6	48.76	54	-5.24	-	-	279	122	V
4	* 5.012	33.28	RMS	34.1	-16.3	51.08	54	-2.92	-	-	279	122	V

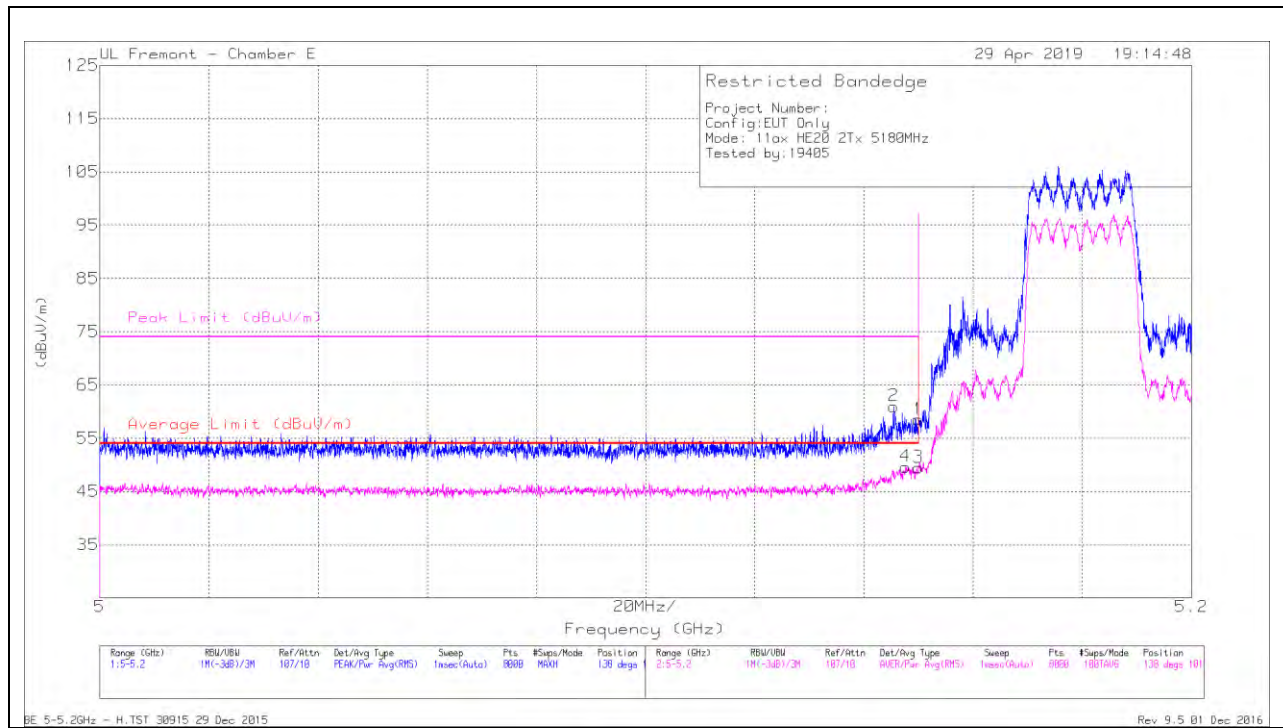
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



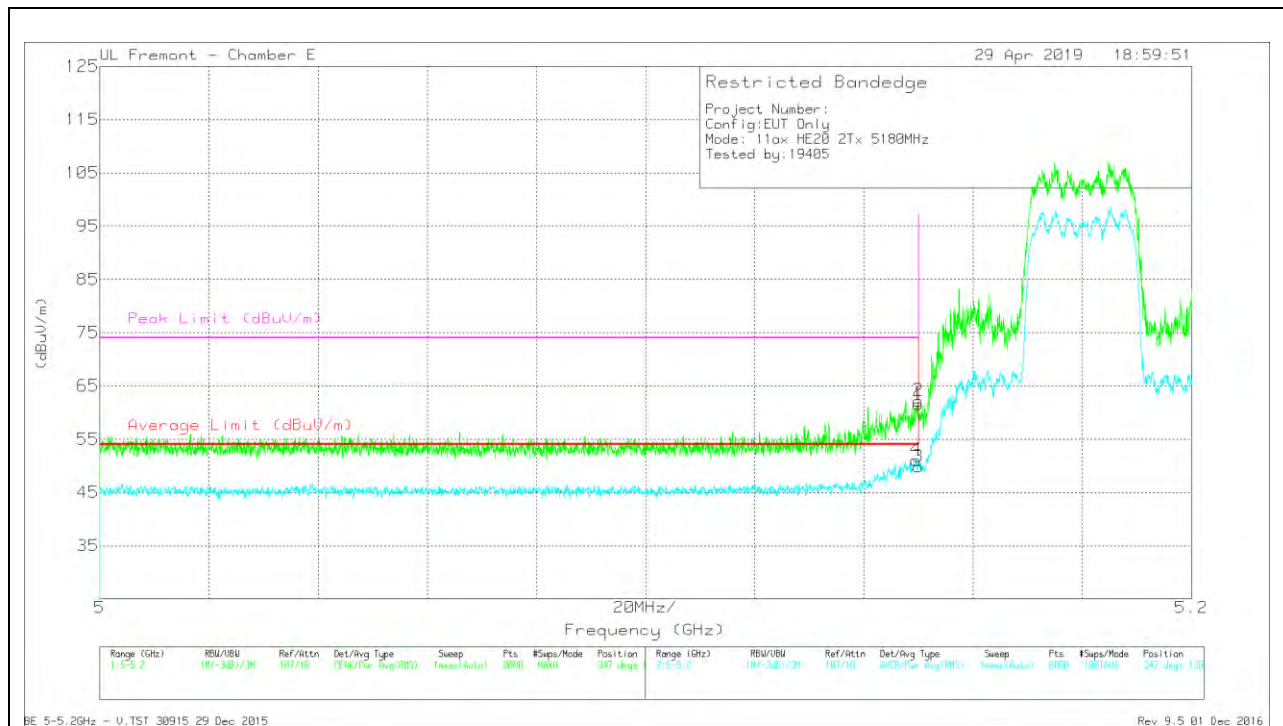
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cb/Fltr/PA d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	46.23	Pk	34.3	-22	58.53	-	-	74	-15.47	138	101	H
2	* 5.145	48.72	Pk	34.3	-22	61.02	-	-	74	-12.98	138	101	H
3	* 5.15	37.21	RMS	34.3	-22	49.51	54	-4.49	-	-	138	101	H
4	* 5.148	37.35	RMS	34.3	-22	49.65	54	-4.35	-	-	138	101	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cb/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	49.31	Pk	34.3	-22	61.61	-	-	74	-12.39	347	138	V
2	* 5.15	49.9	Pk	34.3	-22	62.2	-	-	74	-11.8	347	138	V
3	* 5.15	37.53	RMS	34.3	-22	49.83	54	-4.17	-	-	347	138	V
4	* 5.15	38.8	RMS	34.3	-22	51.1	54	-2.9	-	-	347	138	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

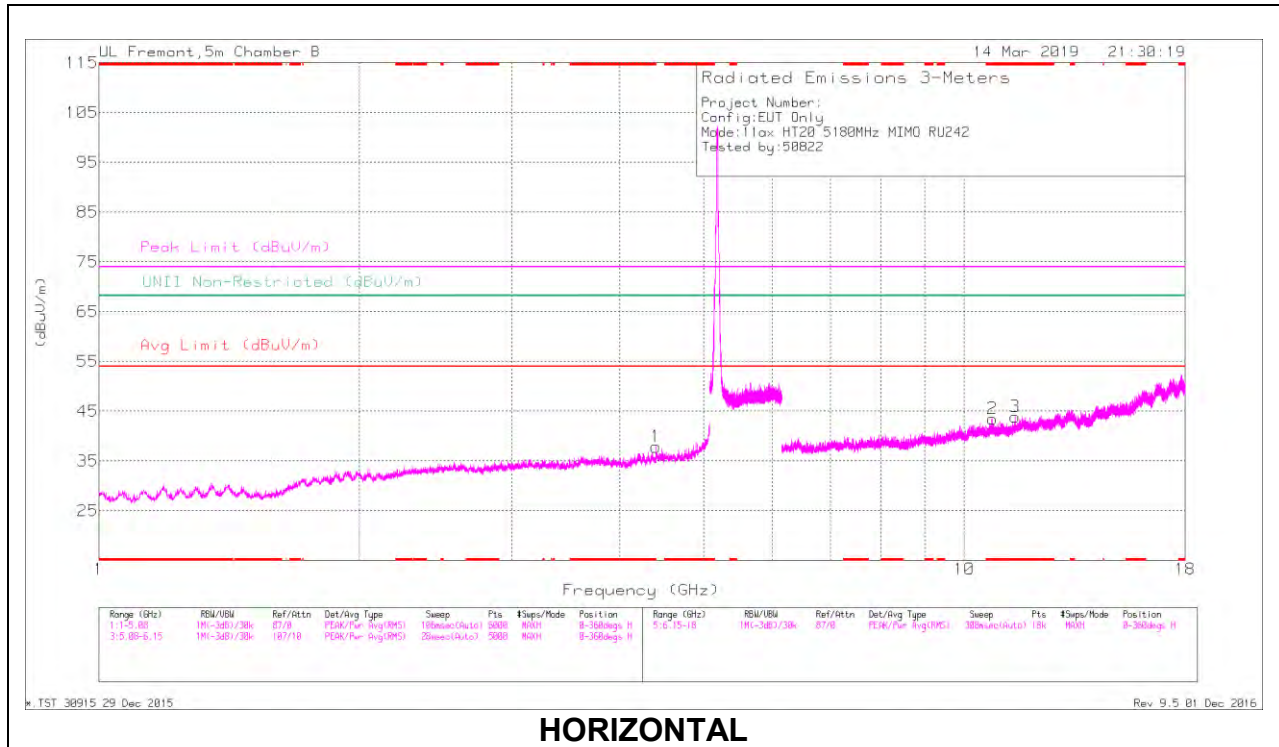
Pk - Peak detector

RMS - RMS detection

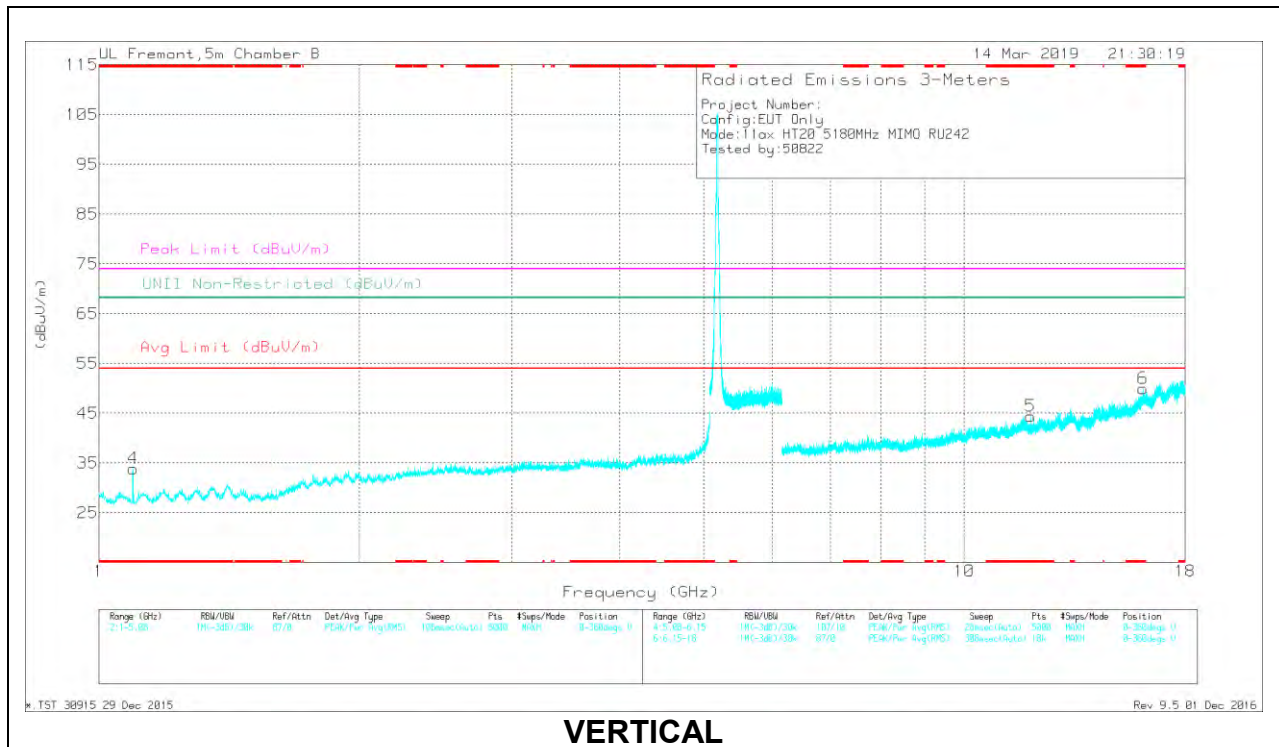


HARMONICS AND SPURIOUS EMISSIONS

LOW CHANNEL RESULTS



HORIZONTAL



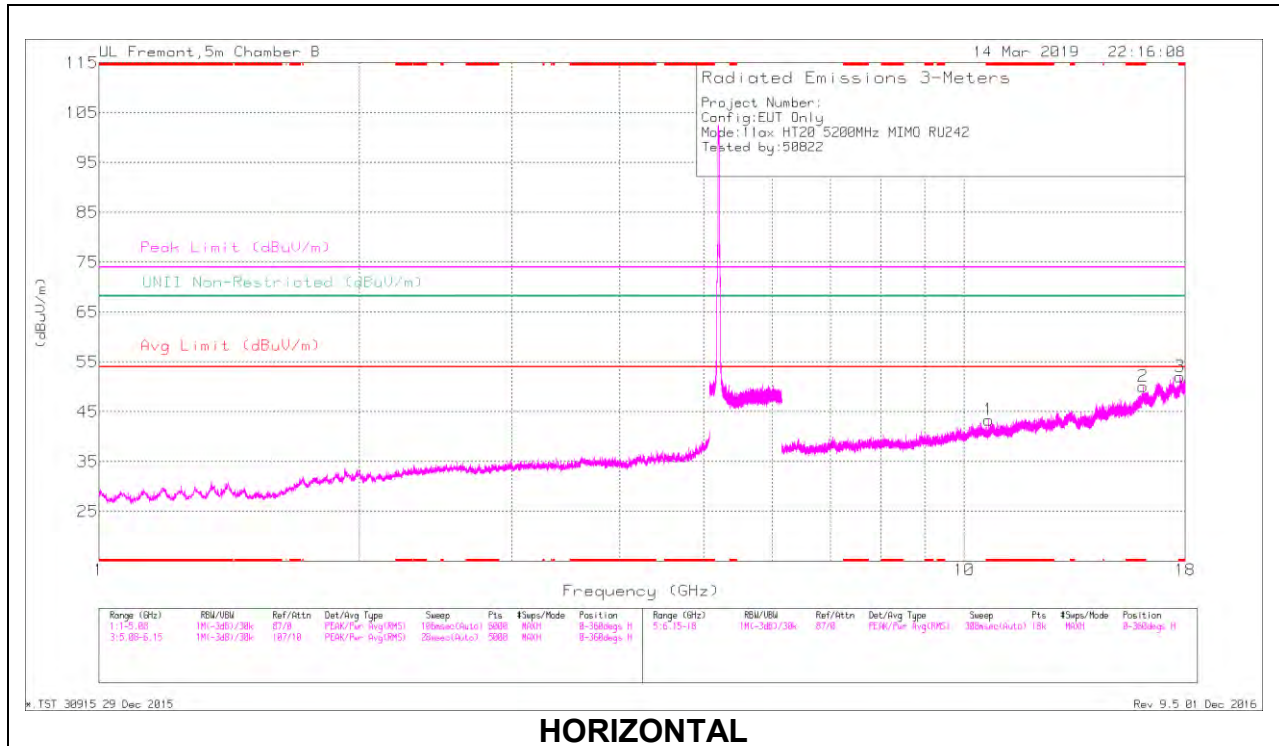
VERTICAL

**RADIATED EMISSIONS**

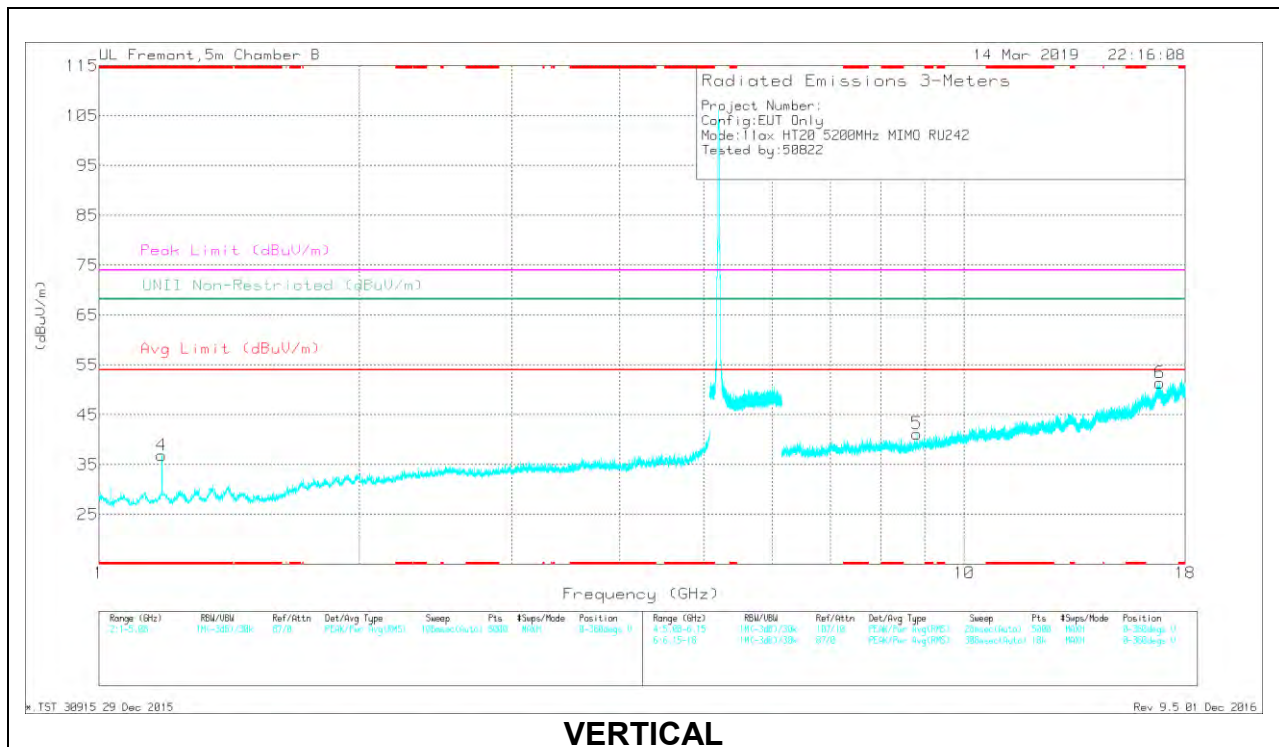
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cb/Filt/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	Margin (dB)	UNII Non-Restricted (dBuV/m)	Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
4	* 1.093	41.47	PK-U	27.3	-33.3	35.47	-	-	74	-38.53	-	-	292	258	V
	* 1.094	29.25	ADR	27.3	-33.3	23.25	54	-30.75	-	-	-	-	292	258	V
2	* 10.784	32.62	PK-U	37.9	-20.9	49.62	-	-	74	-24.38	-	-	360	121	H
	* 10.783	19.08	ADR	37.9	-20.9	36.08	54	-17.92	-	-	-	-	360	121	H
3	* 11.455	33.28	PK-U	38.4	-20.9	50.78	-	-	74	-23.22	-	-	107	281	H
	* 11.456	19.17	ADR	38.4	-20.9	36.67	54	-17.33	-	-	-	-	107	281	H
5	* 11.928	32.54	PK-U	38.8	-21	50.34	-	-	74	-23.66	-	-	260	281	V
	* 11.928	18.99	ADR	38.8	-21	36.79	54	-17.21	-	-	-	-	260	281	V
6	* 16.1	32.25	PK-U	43	-17.7	57.55	-	-	74	-16.45	-	-	298	281	V
	* 16.097	17.11	ADR	43	-17.8	42.31	54	-11.69	-	-	-	-	298	281	V
1	4.404	38.71	PK-U	33.8	-28.1	44.41	-	-	-	-	68.2	-23.79	19	329	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

### MID CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

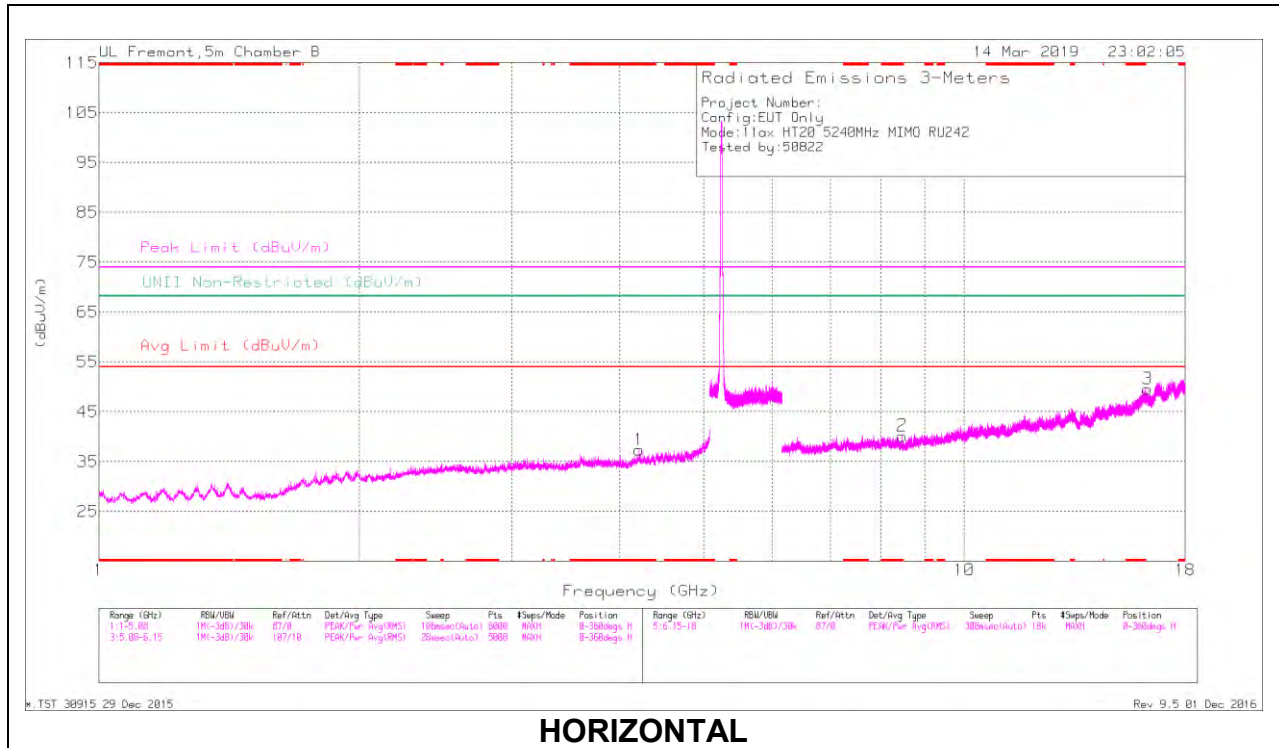


**RADIATED EMISSIONS**

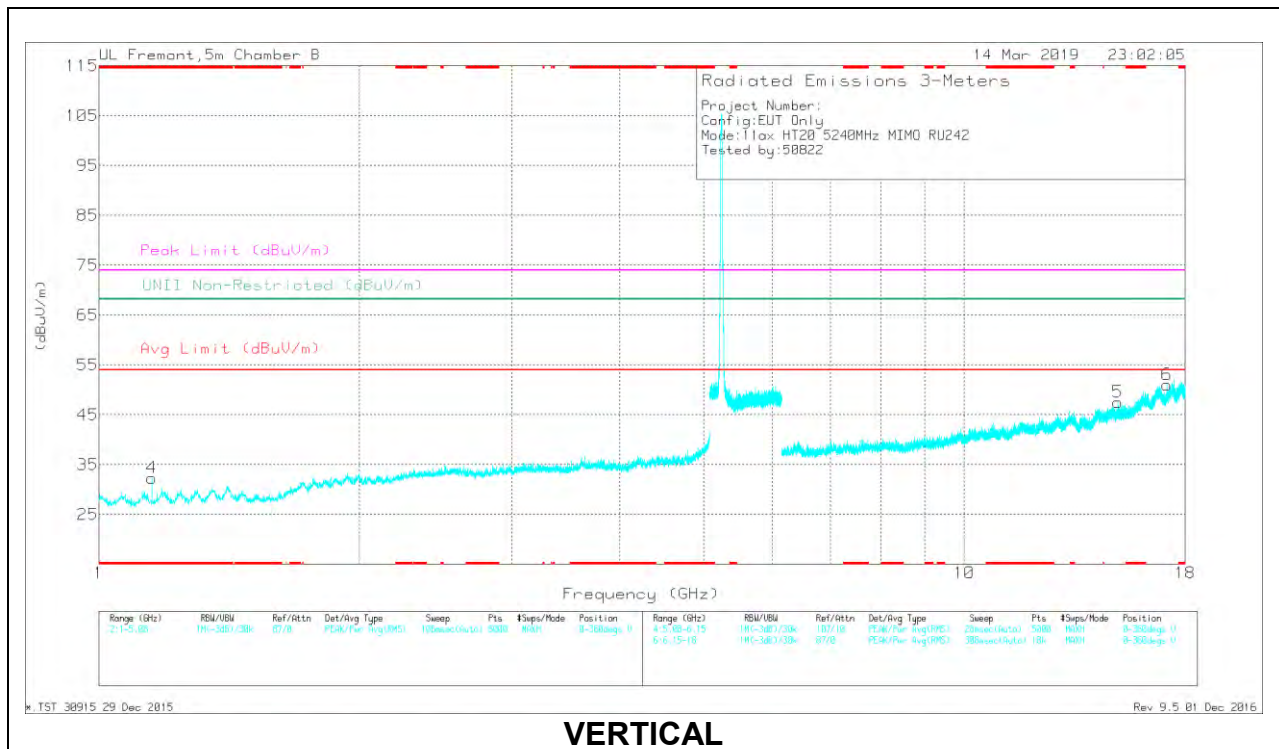
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cb/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	Margin (dB)	UNII Non-Restricted (dBuV/m)	Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 10.667	33.34	PK-U	37.8	-21.6	49.54	-	-	74	-24.46	-	-	324	229	H
	* 10.67	19.58	ADR	37.8	-21.5	35.88	54	-18.12	-	-	-	-	324	229	H
2	* 16.092	32.41	PK-U	42.9	-17.7	57.61	-	-	74	-16.39	-	-	190	272	H
	* 16.09	17.25	ADR	42.9	-17.7	42.45	54	-11.55	-	-	-	-	190	272	H
3	* 17.755	32.35	PK-U	44.2	-17.3	59.25	-	-	74	-14.75	-	-	160	240	H
	* 17.757	16.84	ADR	44.3	-17.3	43.84	54	-10.16	-	-	-	-	160	240	H
4	* 1.182	42.14	PK-U	28	-33.2	36.94	-	-	74	-37.06	-	-	87	171	V
	* 1.183	30.2	ADR	28	-33.2	25	54	-29	-	-	-	-	87	171	V
5	8.82	34.49	PK-U	36.7	-23.9	47.29	-	-	-	-	68.2	-20.91	7	287	V
6	16.841	31.57	PK-U	44.4	-17.2	58.77	-	-	-	-	68.2	-9.43	46	133	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

### HIGH CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cbl/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	Margin (dB)	UNII Non-Restricted (dBuV/m)	Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 4.211	38.75	PK-U	33.6	-27.8	44.55	-	-	74	-29.45	-	-	87	163	H
	* 4.212	25.89	ADR	33.6	-27.8	31.69	54	-22.31	-	-	-	-	87	163	H
2	* 8.469	35.25	PK-U	36.1	-24.7	46.65	-	-	74	-27.35	-	-	179	297	H
	* 8.47	21.94	ADR	36.1	-24.7	33.34	54	-20.66	-	-	-	-	179	297	H
3	16.282	32.35	PK-U	43	-18.5	56.85	-	-	-	-	68.2	-11.35	137	326	H
4	* 1.149	41.02	PK-U	27.7	-33.2	35.52	-	-	74	-38.48	-	-	4	284	V
	* 1.149	28.87	ADR	27.7	-33.2	23.37	54	-30.63	-	-	-	-	4	284	V
5	15.059	33.04	PK-U	40.5	-18.7	54.84	-	-	-	-	68.2	-13.36	177	278	V
6	17.161	31.9	PK-U	43.5	-18.1	57.3	-	-	-	-	68.2	-10.9	329	222	V

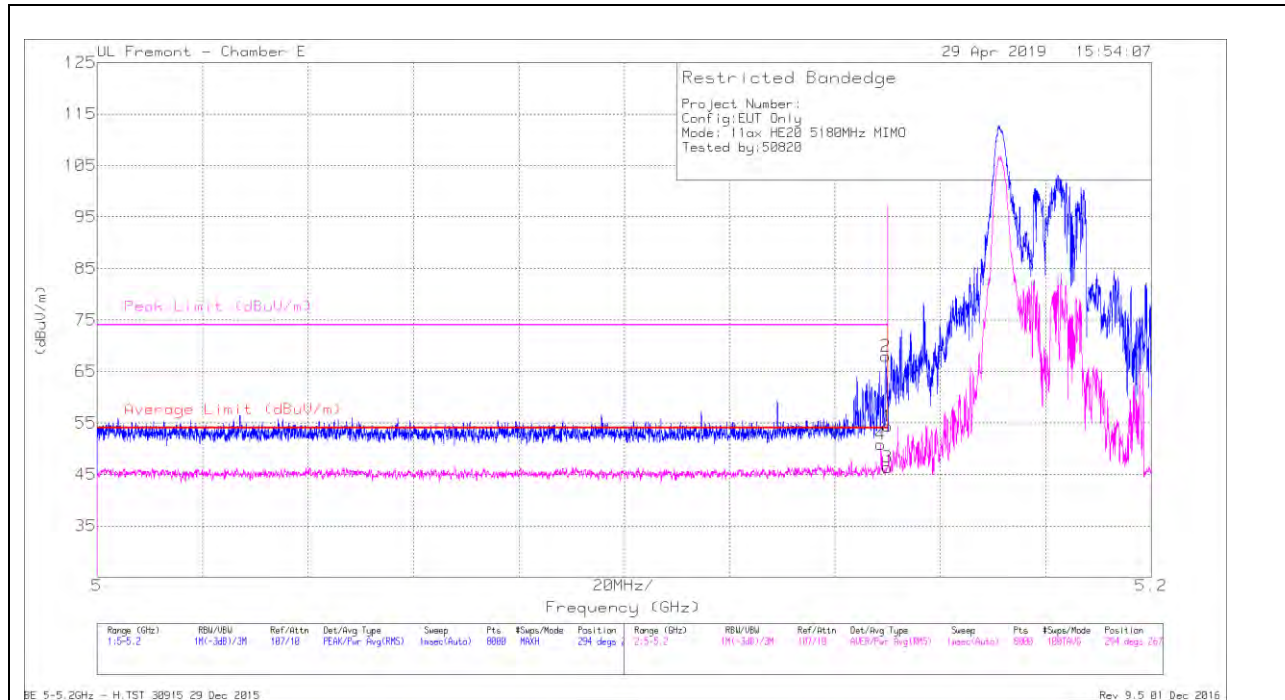
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

PK-U - U-NII: Maximum Peak

ADR - U-NII AD primary method, RMS average

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



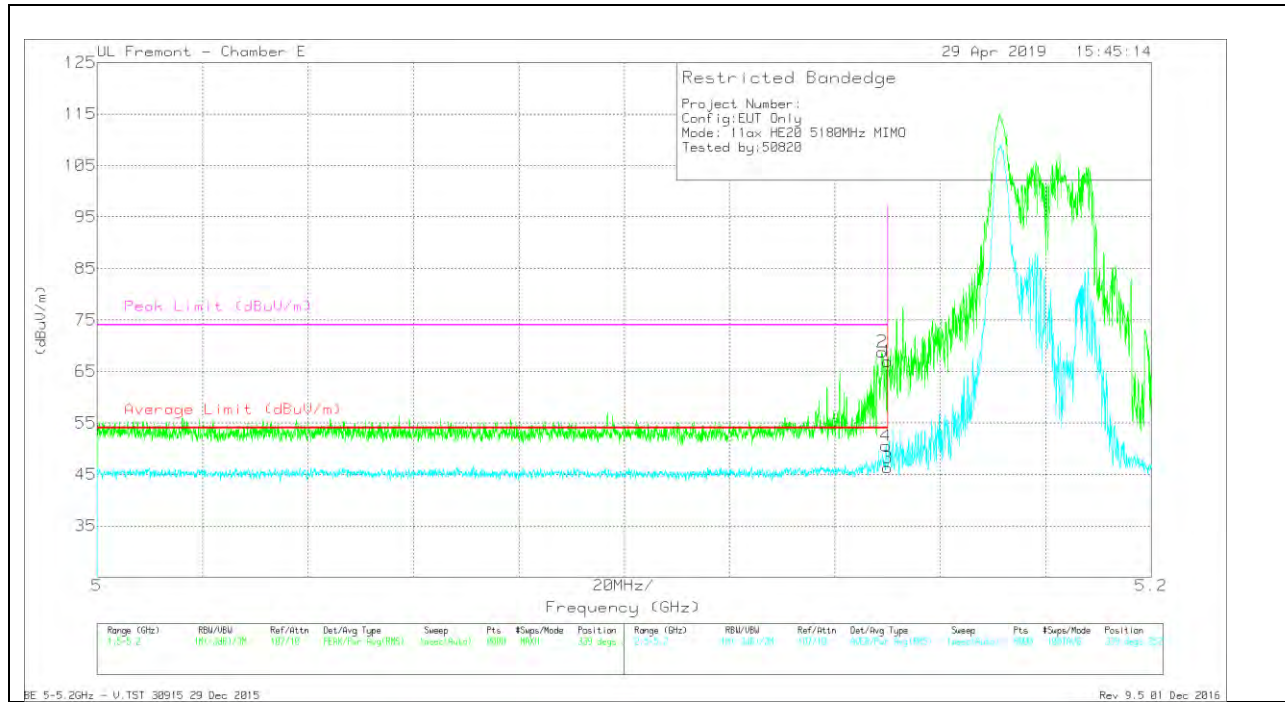
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	42.06	Pk	34.3	-22	54.36	-	-	74	-19.64	294	267	H
2	* 5.15	55.64	PK	34.3	-22	67.94	-	-	74	-6.06	294	267	H
3	* 5.15	34.08	RMS	34.3	-22	46.38	54	-7.62	-	-	294	267	H
4	* 5.149	38.55	RMS	34.3	-22	50.85	54	-3.15	-	-	294	267	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



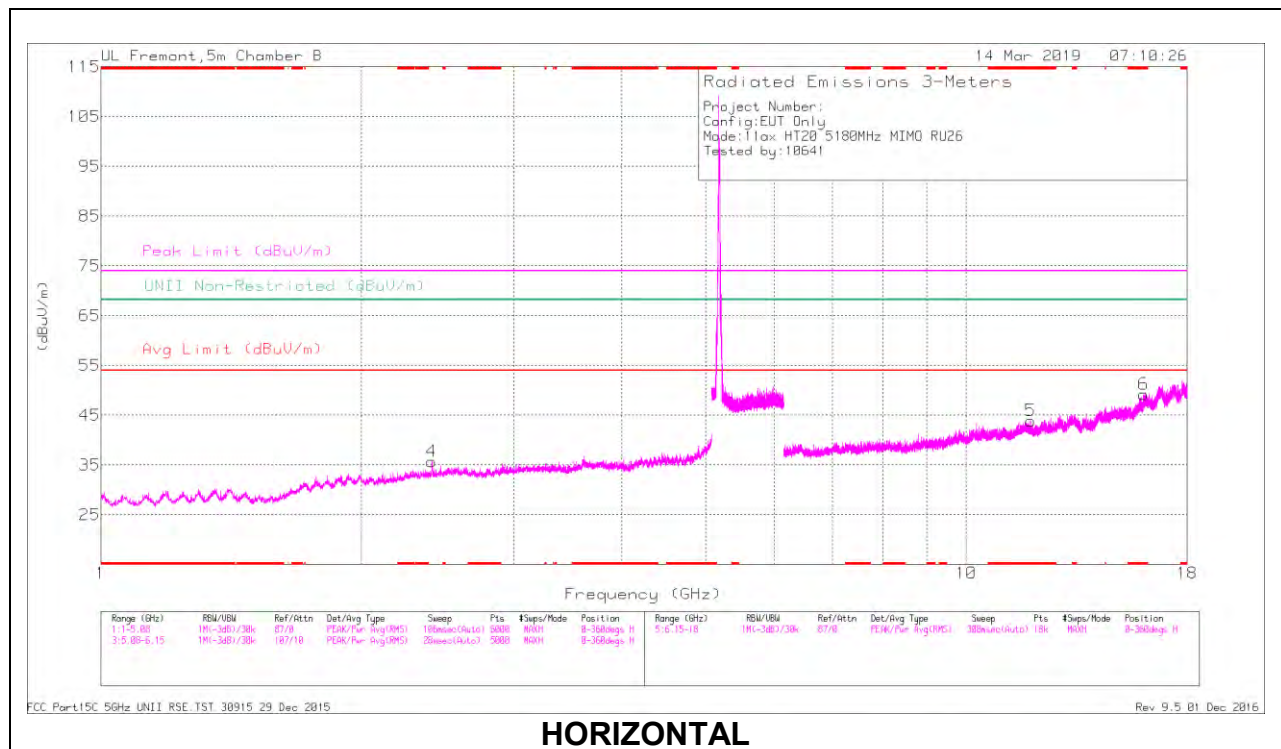
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	54.63	Pk	34.3	-22	66.93	-	-	74	-7.07	339	352	V
2	* 5.149	56.5	Pk	34.3	-22	68.8	-	-	74	-5.2	339	352	V
3	* 5.15	34	RMS	34.3	-22	46.3	54	-7.7	-	-	339	352	V
4	* 5.15	38.25	RMS	34.3	-22	50.55	54	-3.45	-	-	339	352	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

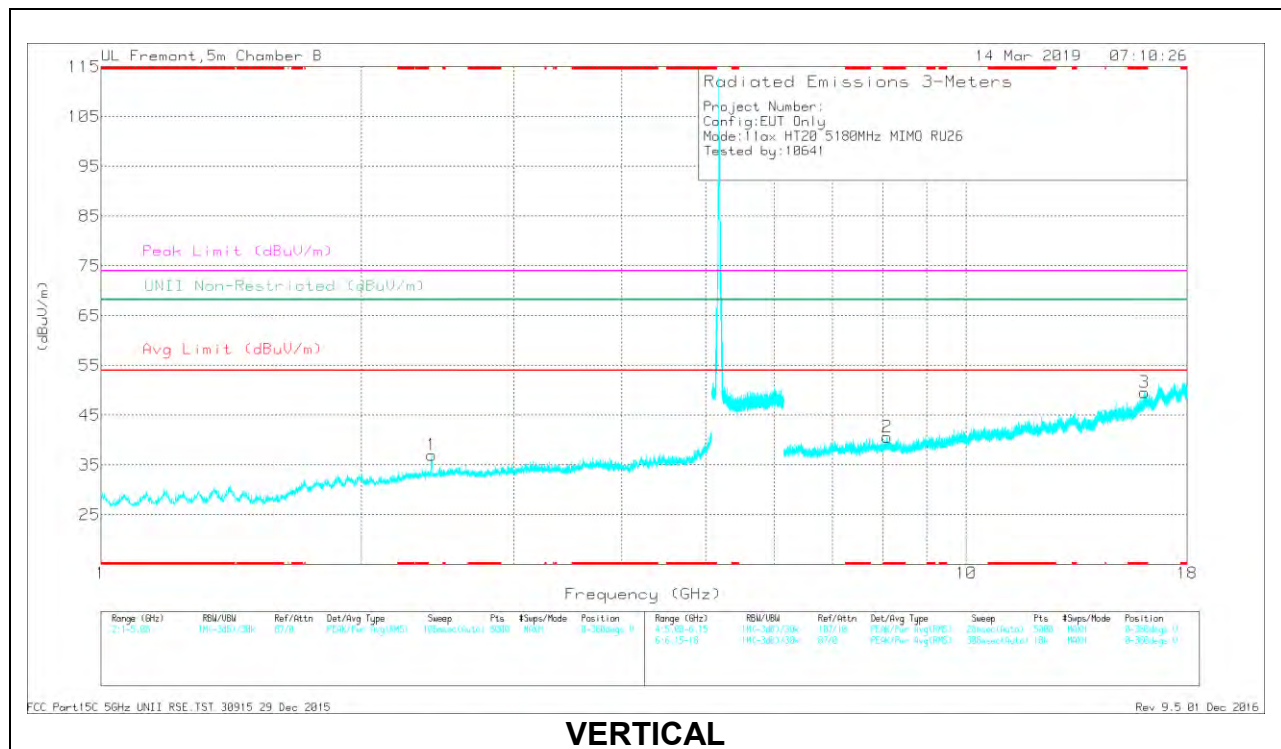


HARMONICS AND SPURIOUS EMISSIONS

LOW CHANNEL RESULTS



HORIZONTAL



VERTICAL

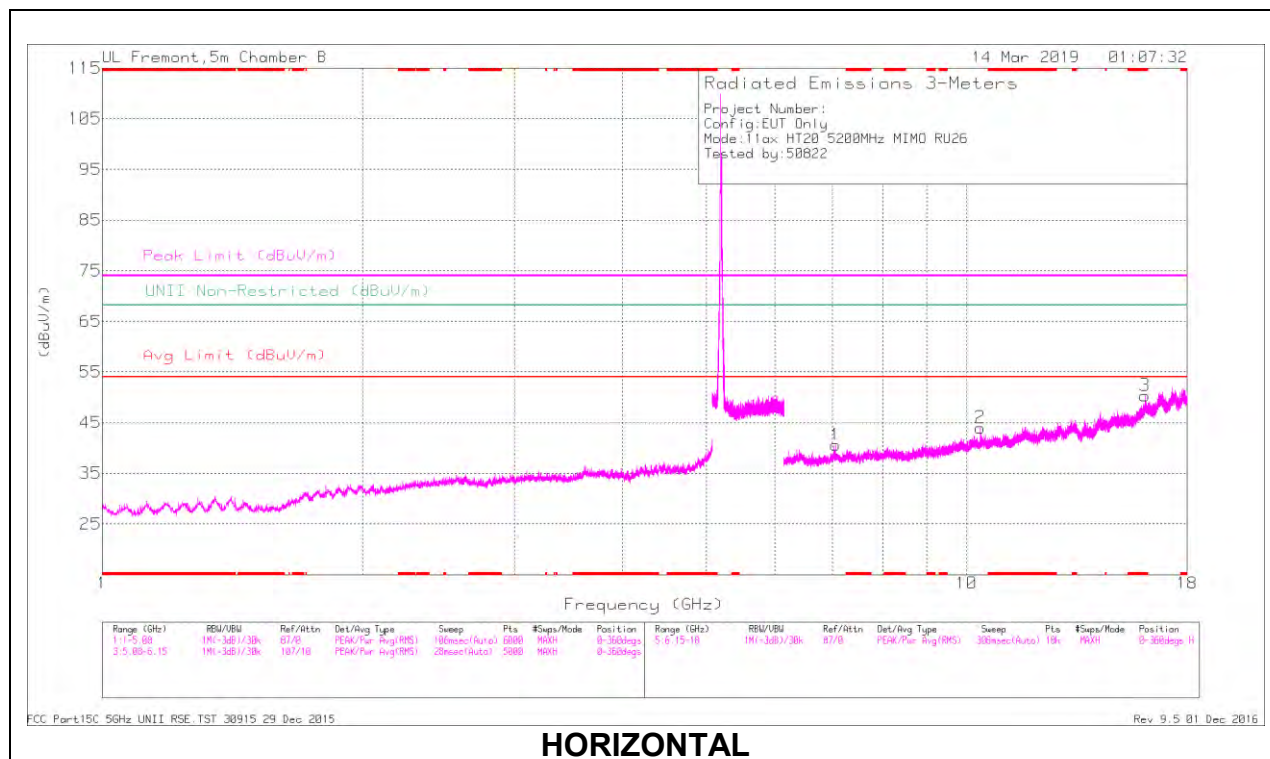


**RADIATED EMISSIONS**

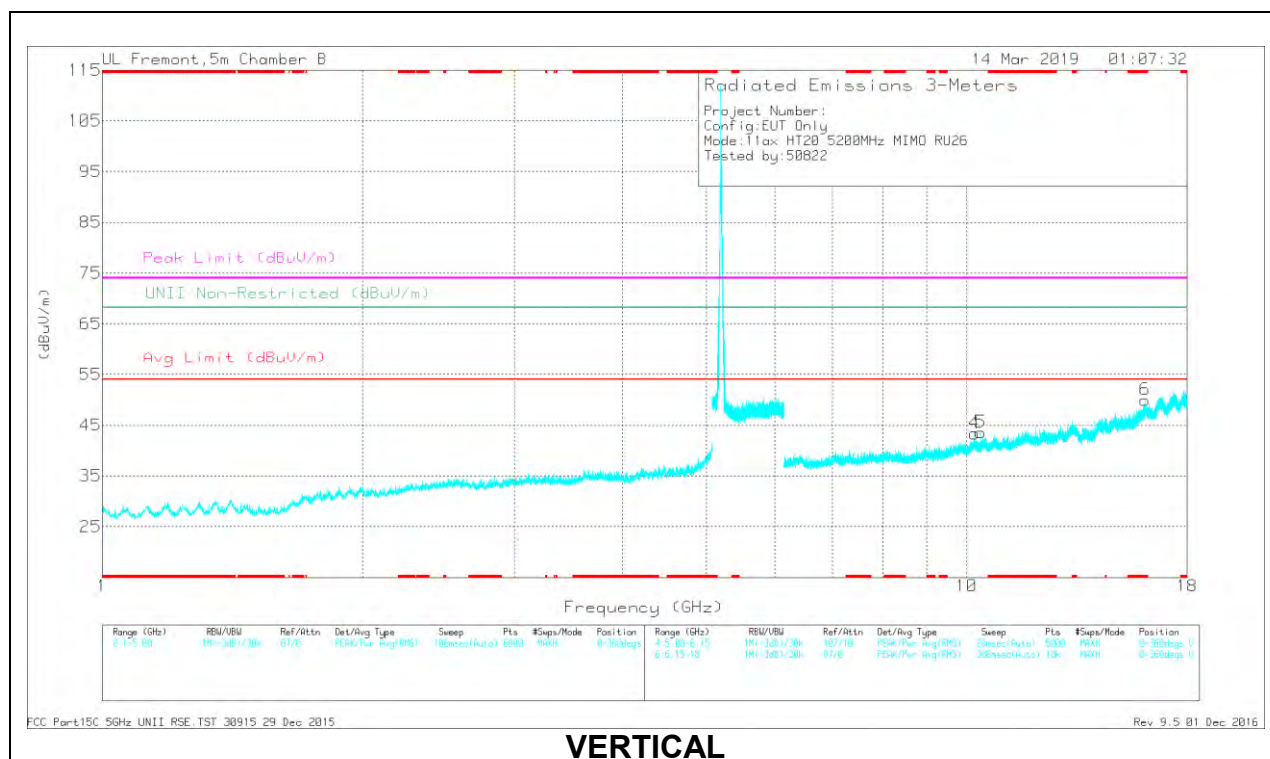
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cb/Filt/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	Margin (dB)	UNII Non-Restricted (dBuV/m)	Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	2.41	40.81	PK-U	32.4	-31.7	41.51	-	-	-	-	68.2	-26.69	33	314	V
2	* 8.106	35.26	PK-U	36.5	-24.6	47.16	-	-	74	-26.84	-	-	187	126	V
	* 8.107	23.07	ADR	36.5	-24.7	34.87	54	-19.13	-	-	-	-	187	126	V
3	* 16.068	32.38	PK-U	42.8	-17.9	57.28	-	-	74	-16.72	-	-	174	143	V
	* 16.07	17.81	ADR	42.8	-17.9	42.71	54	-11.29	-	-	-	-	174	143	V
4	2.41	42.7	PK-U	32.4	-31.7	43.4	-	-	-	-	68.2	-24.8	247	337	H
5	* 11.874	32.54	PK-U	39	-20.9	50.64	-	-	74	-23.36	-	-	183	156	H
	* 11.875	19.91	ADR	39	-20.9	38.01	54	-15.99	-	-	-	-	183	156	H
6	* 16.029	32.2	PK-U	42.6	-17.8	57	-	-	74	-17	-	-	162	121	H
	* 16.028	18.15	ADR	42.6	-17.8	42.95	54	-11.05	-	-	-	-	162	121	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

### MID CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

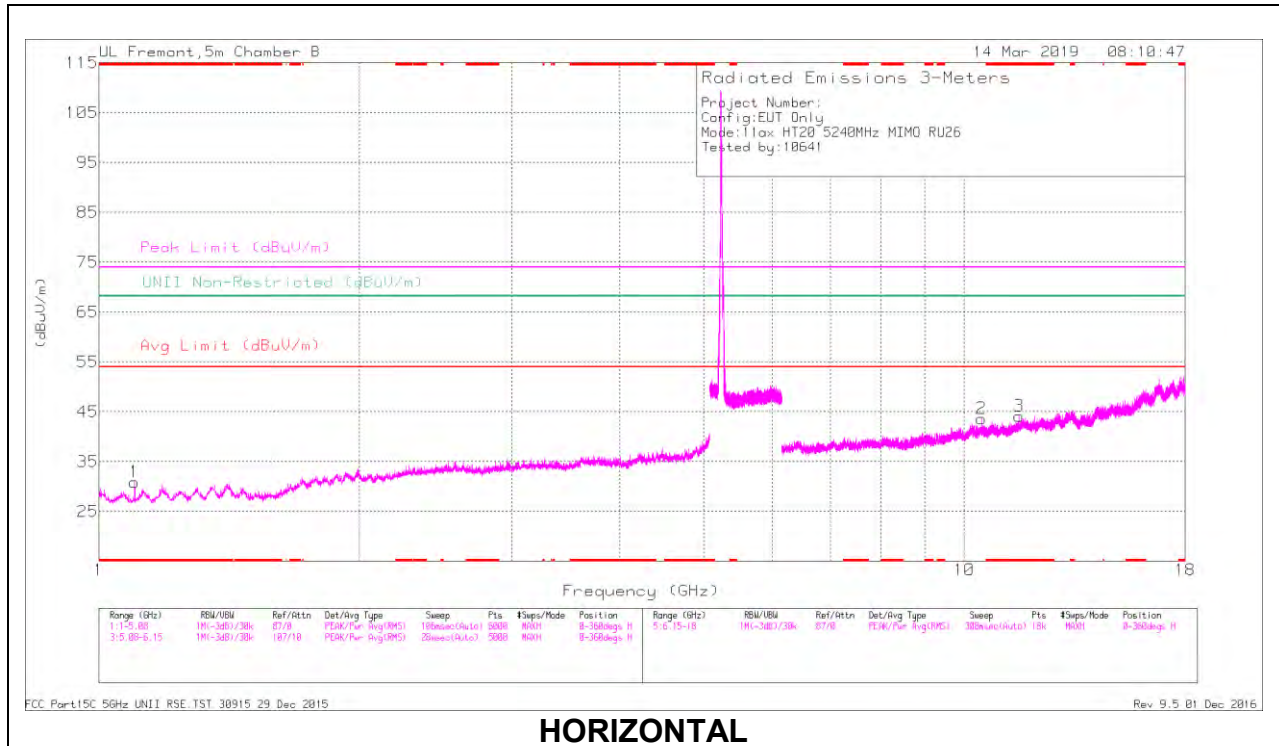
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Ch/Filtz/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	7.056	36.45	PK-U	35.9	-25	47.35	-	-	-	-	68.2	-20.85	56	116	H
2	10.382	35.02	PK-U	37.8	-22.2	50.62	-	-	-	-	68.2	-17.58	190	258	V
3	* 16.081	32.36	PK-U	42.9	-17.8	57.46	-	-	74	-16.54	-	-	112	131	H
	* 16.082	17.03	ADR	42.9	-17.8	42.13	54	-11.87	-	-	-	-	112	131	H
4	10.218	33.8	PK-U	37.8	-21.7	49.9	-	-	-	-	68.2	-18.3	96	120	V
5	10.383	36.17	PK-U	37.8	-22.2	51.77	-	-	-	-	68.2	-16.43	217	254	H
6	* 16.102	32.34	PK-U	43	-17.8	57.54	-	-	74	-16.46	-	-	213	130	V
	* 16.101	17.34	ADR	43	-17.8	42.54	54	-11.46	-	-	-	-	213	130	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

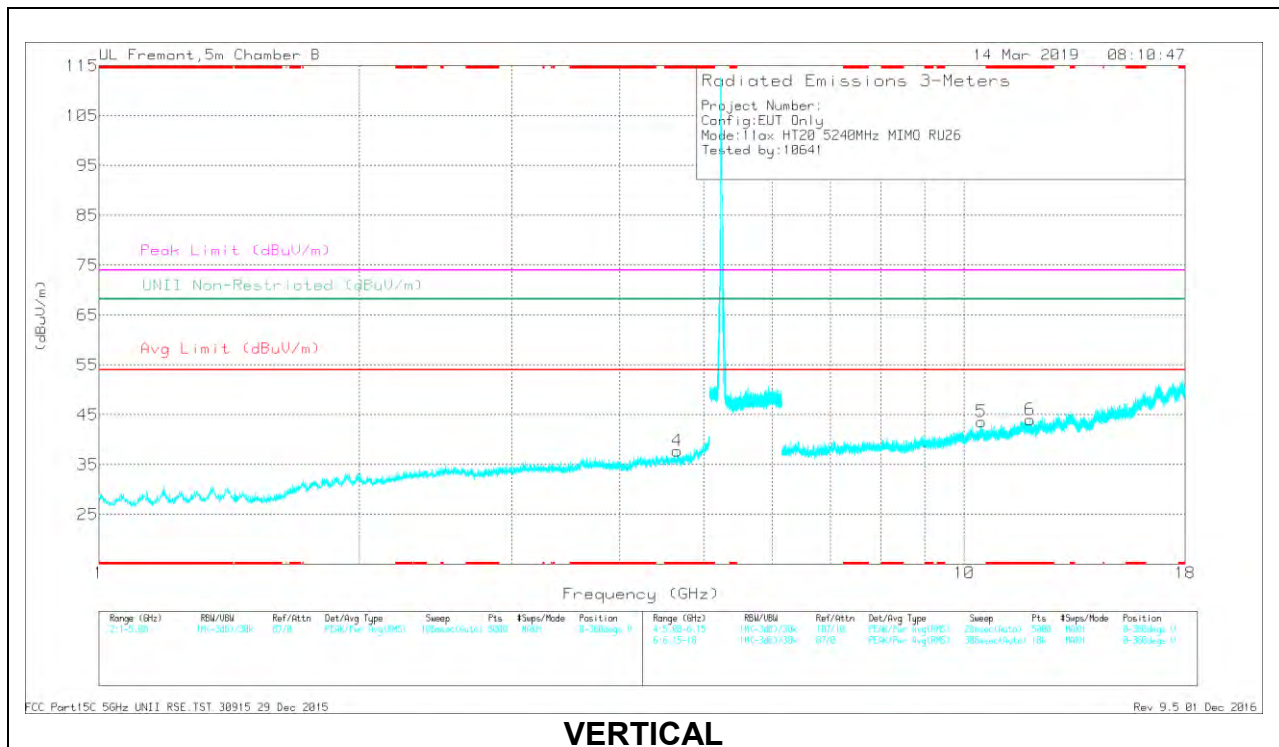
PK-U - U-NII: Maximum Peak

ADR - U-NII AD primary method, RMS average

### HIGH CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cb/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	Margin (dB)	UNII Non-Restricted (dBuV/m)	Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 1.1	41.47	PK-U	27.2	-33.2	35.47	-	-	74	-38.53	-	-	150	239	H
	* 1.101	29.15	ADR	27.2	-33.2	23.15	54	-30.85	-	-	-	-	150	239	H
2	10.463	33.65	PK-U	37.8	-21.5	49.95	-	-	-	-	68.2	-18.25	125	354	H
3	* 11.574	32.65	PK-U	38.6	-21	50.25	-	-	74	-23.75	-	-	110	109	H
	* 11.573	20.23	ADR	38.6	-21	37.83	54	-16.17	-	-	-	-	110	109	H
4	* 4.658	39.03	PK-U	34.1	-28.1	45.03	-	-	74	-28.97	-	-	144	216	V
	* 4.658	26.55	ADR	34.1	-28.1	32.55	54	-21.45	-	-	-	-	144	216	V
5	10.463	33.72	PK-U	37.8	-21.5	50.02	-	-	-	-	68.2	-18.18	123	179	V
6	* 11.91	33.02	PK-U	38.9	-20.9	51.02	-	-	74	-22.98	-	-	92	122	V
	* 11.909	19.86	ADR	38.9	-20.9	37.86	54	-16.14	-	-	-	-	92	122	V

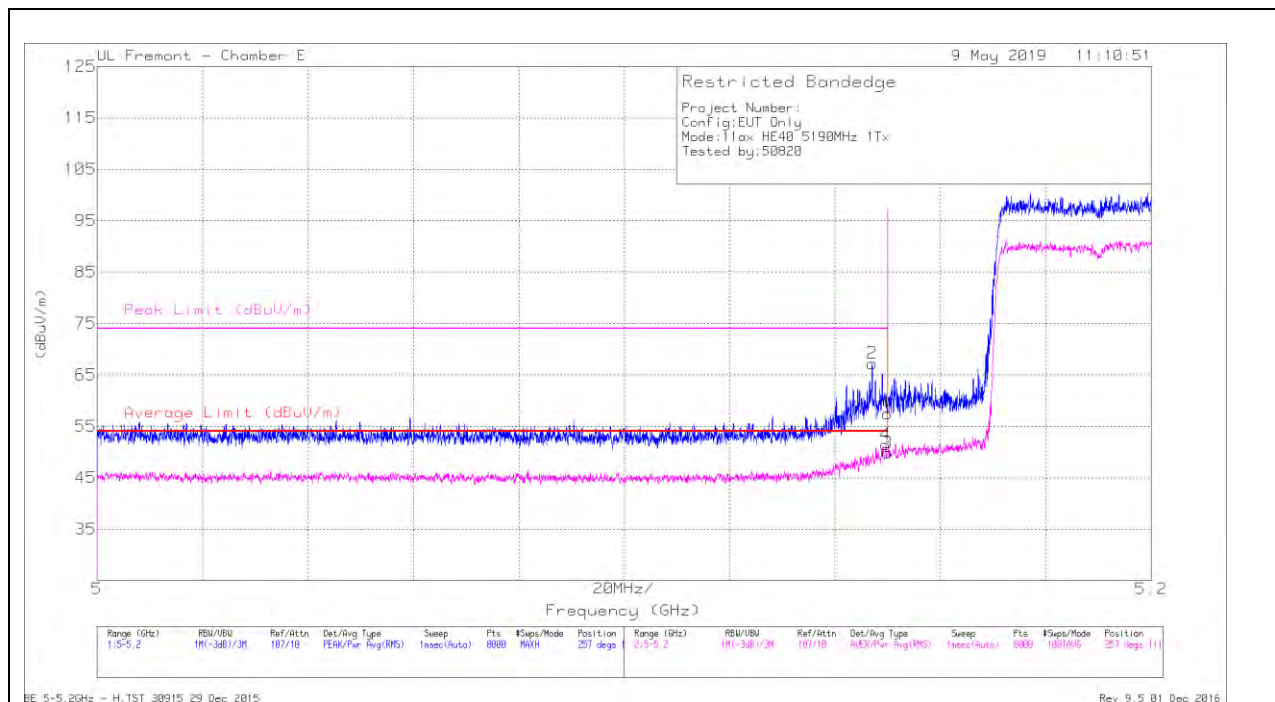
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

**1.1.5. TX ABOVE 1 GHz 802.11ax HE40 MODE IN THE 5.2 GHz BAND**

**1TX Antenna 4 MODE – 484 Tones, RU Index 65**

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Ftr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	45.18	Pk	34.3	-22	57.48	-	-	74	-16.52	257	111	H
2	* 5.147	54.94	Pk	34.3	-22	67.24	-	-	74	-6.76	257	111	H
3	* 5.15	37.55	RMS	34.3	-22	49.85	54	-4.15	-	-	257	111	H
4	* 5.15	39.16	RMS	34.3	-22	51.46	54	-2.54	-	-	257	111	H

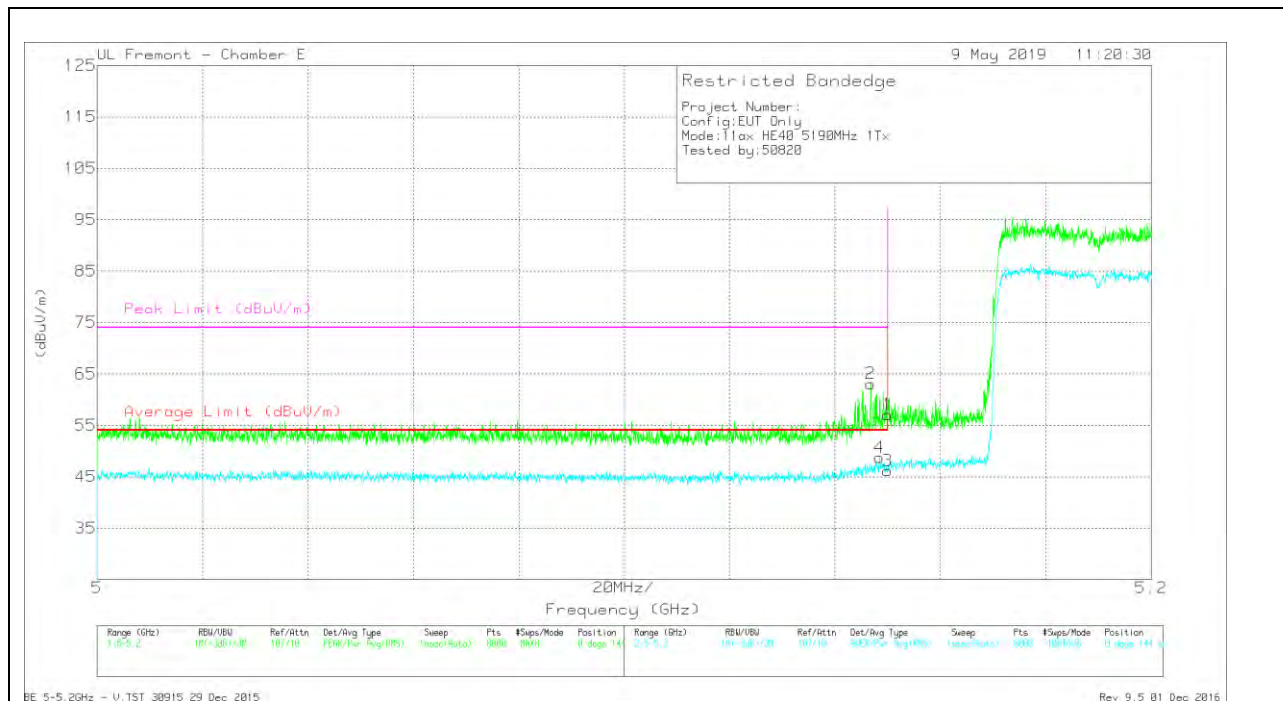
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection



### VERTICAL RESULT

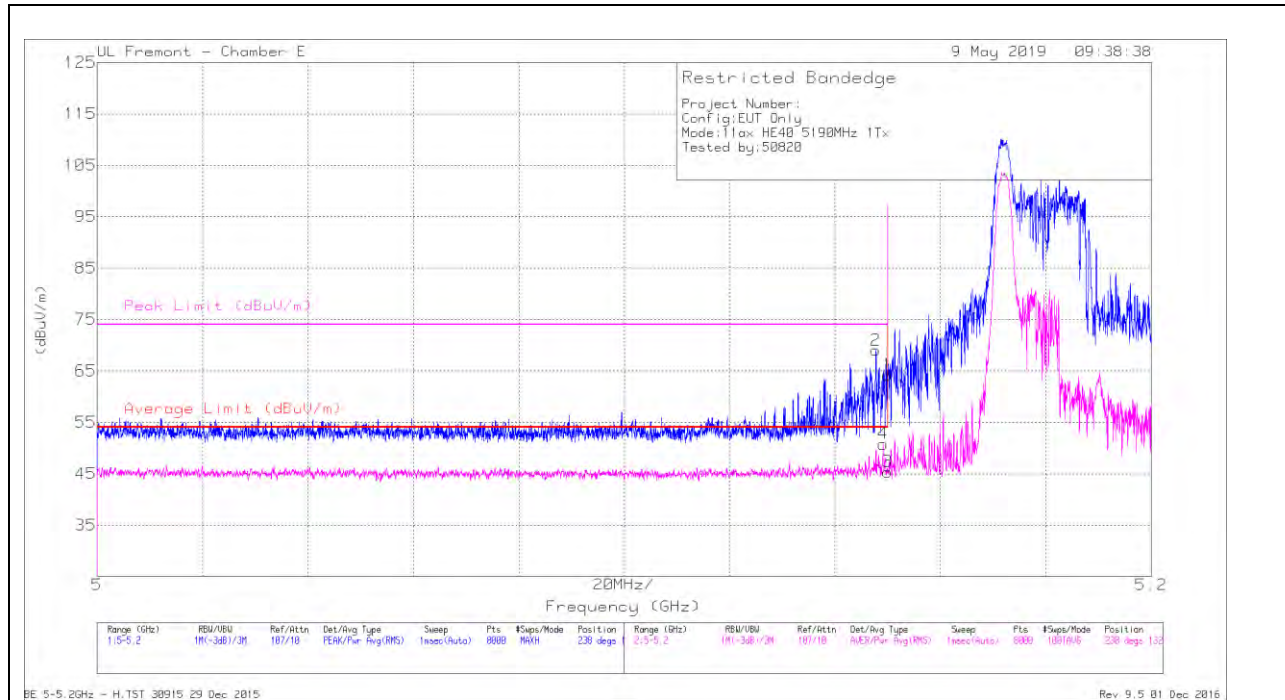


Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	44.77	Pk	34.3	-22	57.07	-	-	74	-16.93	0	144	V
2	* 5.147	50.79	Pk	34.3	-22	63.09	-	-	74	-10.91	0	144	V
3	* 5.15	33.85	RMS	34.3	-22	46.15	54	-7.85	-	-	0	144	V
4	* 5.148	36.42	RMS	34.3	-22	48.72	54	-5.28	-	-	0	144	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



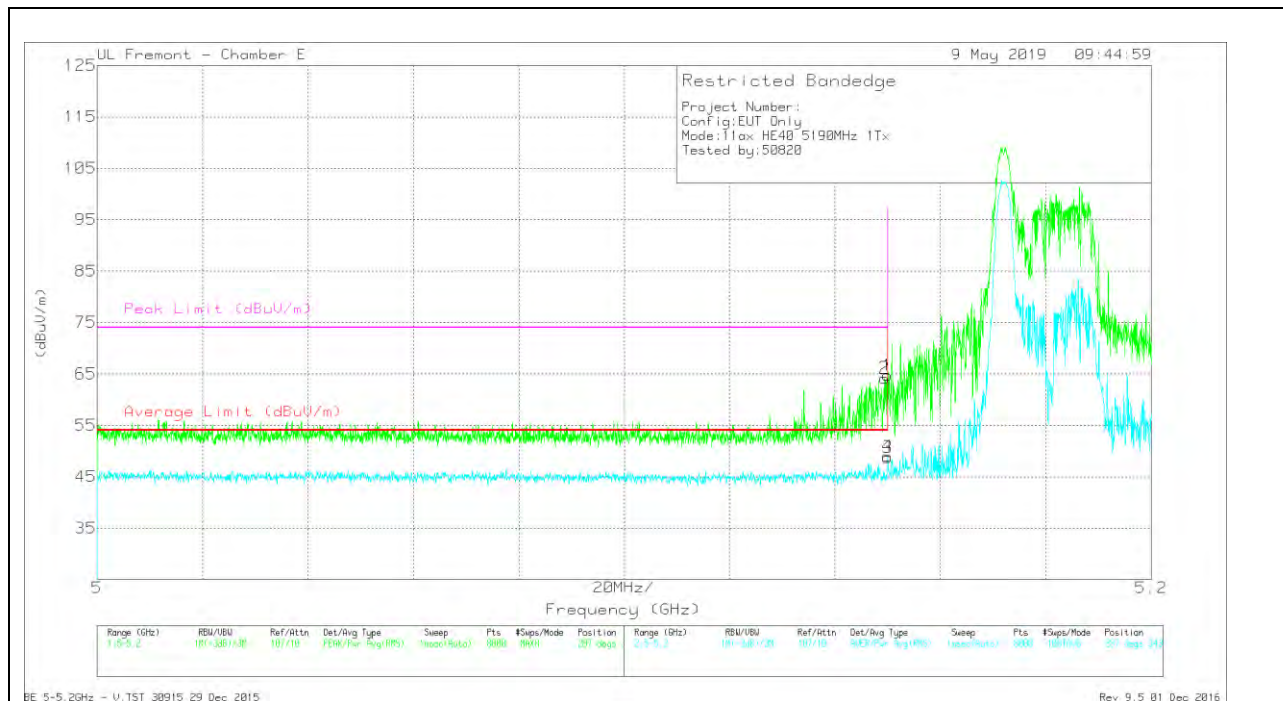
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	51.91	Pk	34.3	-22	64.21	-	-	74	-9.79	238	132	H
2	* 5.148	56.72	Pk	34.3	-22	69.02	-	-	74	-4.98	238	132	H
3	* 5.15	33.07	RMS	34.3	-22	45.37	54	-8.63	-	-	238	132	H
4	* 5.149	38.48	RMS	34.3	-22	50.78	54	-3.22	-	-	238	132	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT

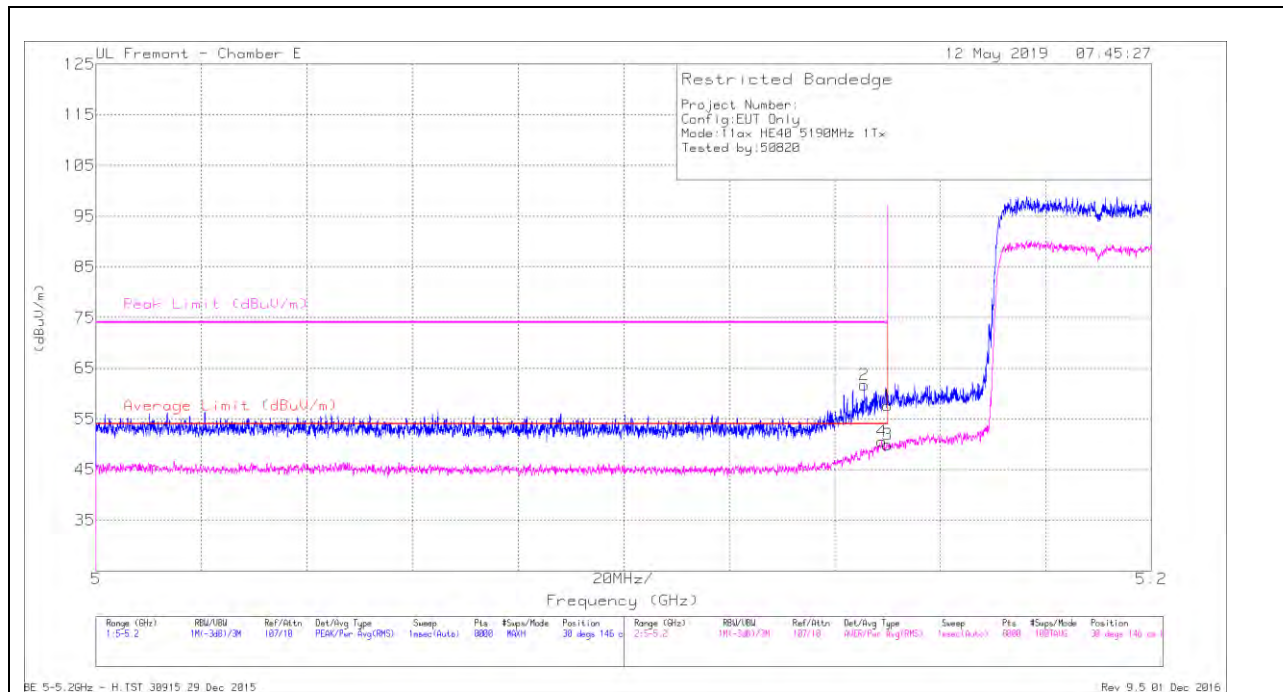


Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	52.44	Pk	34.3	-22	64.74	-	-	74	-9.26	287	343	V
2	* 5.149	51.87	Pk	34.3	-22	64.17	-	-	74	-9.83	287	343	V
3	* 5.15	36.46	RMS	34.3	-22	48.76	54	-5.24	-	-	287	343	V
4	* 5.15	36.65	RMS	34.3	-22	48.95	54	-5.05	-	-	287	343	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



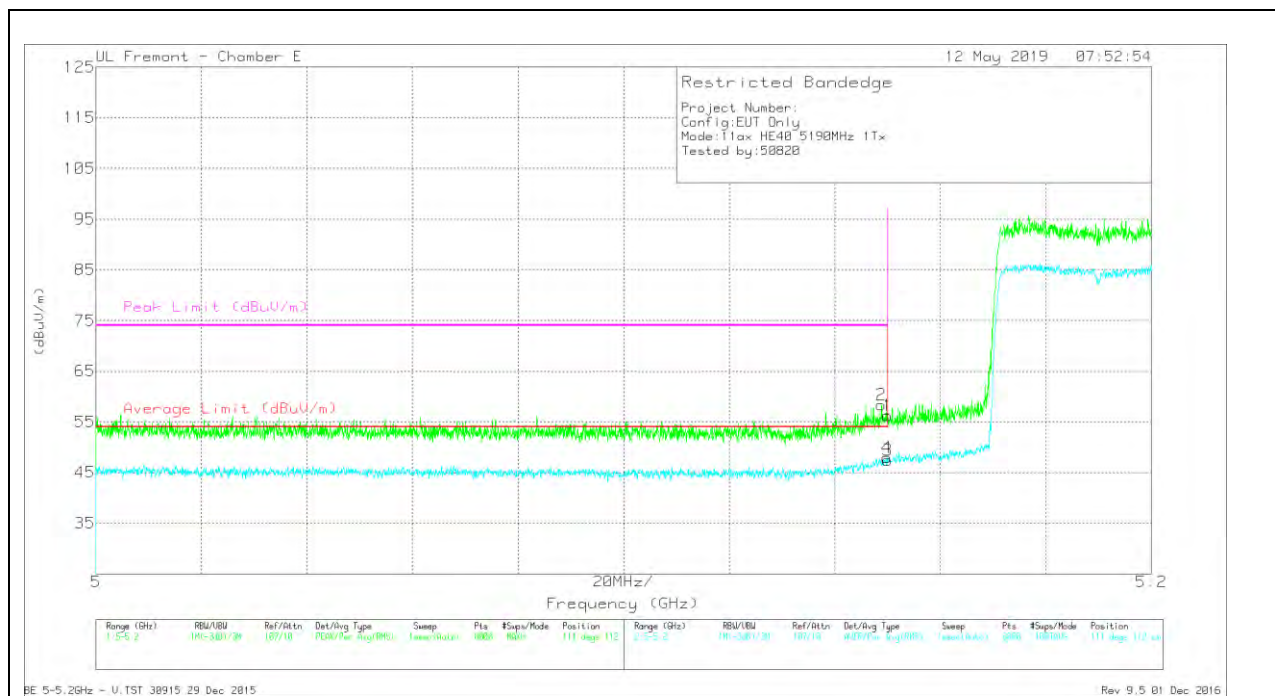
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cb/Ftr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	45.29	Pk	34.3	-22	57.59	-	-	74	-16.41	30	146	H
2	* 5.146	49.42	Pk	34.3	-22	61.72	-	-	74	-12.28	30	146	H
3	* 5.15	37.57	RMS	34.3	-22	49.87	54	-4.13	-	-	30	146	H
4	* 5.149	38.2	RMS	34.3	-22	50.5	54	-3.5	-	-	30	146	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbi/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	43.95	Pk	34.3	-22	56.25	-	-	74	-17.75	111	112	V
2	* 5.149	46.1	Pk	34.3	-22	58.4	-	-	74	-15.6	111	112	V
3	* 5.15	35.14	RMS	34.3	-22	47.44	54	-6.56	-	-	111	112	V
4	* 5.15	35.67	RMS	34.3	-22	47.97	54	-6.03	-	-	111	112	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

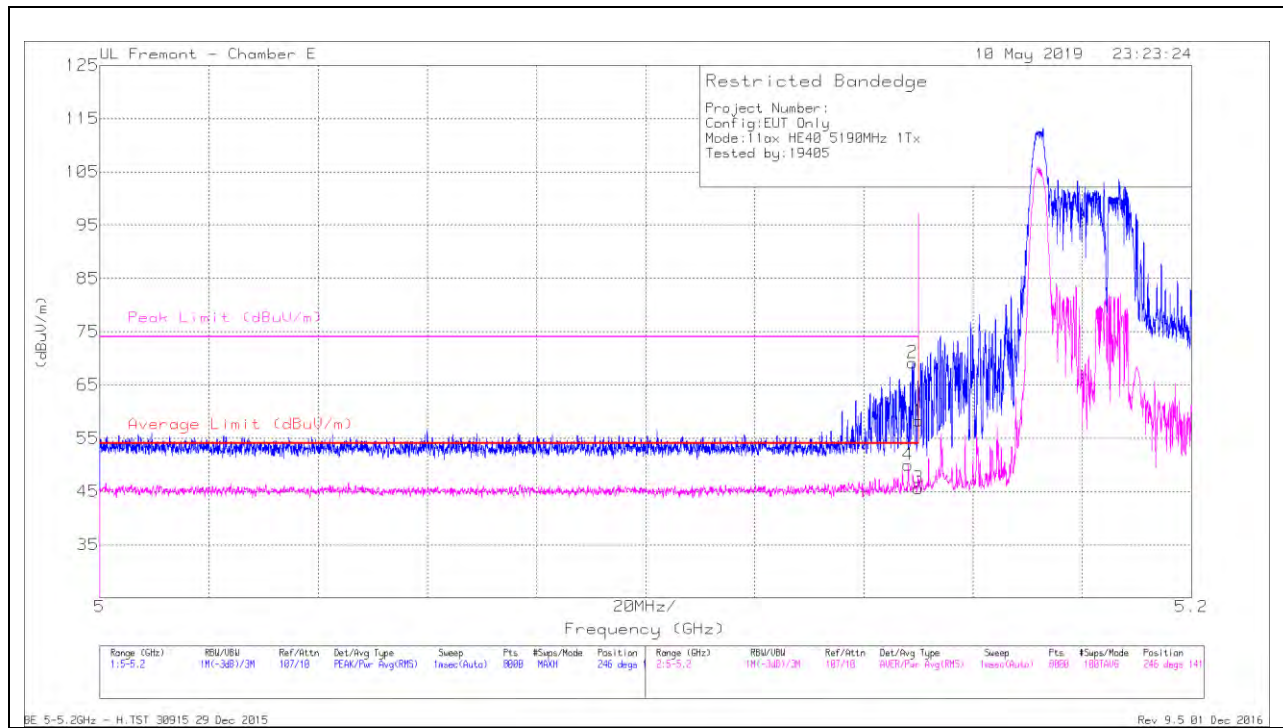
Pk - Peak detector

RMS - RMS detection



**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cb/Fltr/Par d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	45.95	Pk	34.3	-22	58.25	-	-	74	-15.75	246	141	H
2	* 5.149	56.89	Pk	34.3	-22	69.19	-	-	74	-4.81	246	141	H
3	* 5.15	33.34	RMS	34.3	-22	45.64	54	-8.36	-	-	246	141	H
4	* 5.148	37.68	RMS	34.3	-22	49.98	54	-4.02	-	-	246	141	H

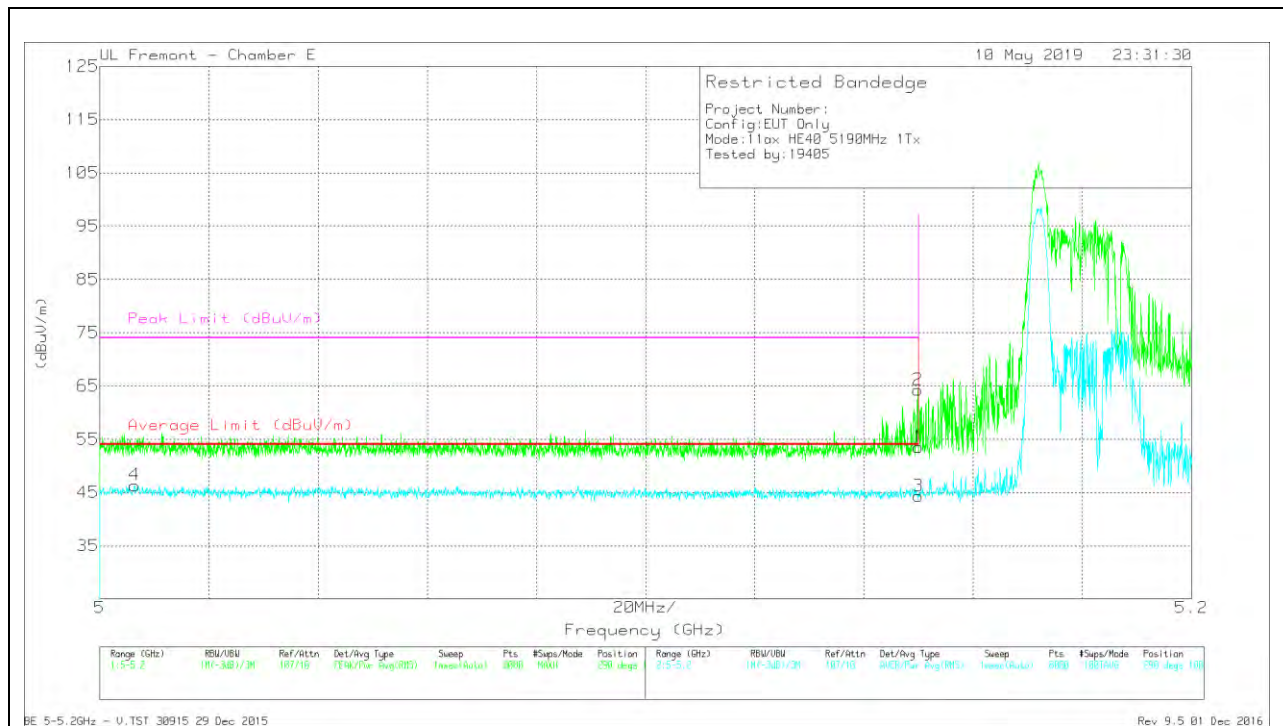
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection



### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	41.2	Pk	34.3	-22	53.5	-	-	74	-20.5	290	100	V
2	* 5.15	51.96	Pk	34.3	-22	64.26	-	-	74	-9.74	290	100	V
3	* 5.15	32.03	RMS	34.3	-22	44.33	54	-9.67	-	-	290	100	V
4	* 5.006	34.06	RMS	34.1	-21.8	46.36	54	-7.64	-	-	290	100	V

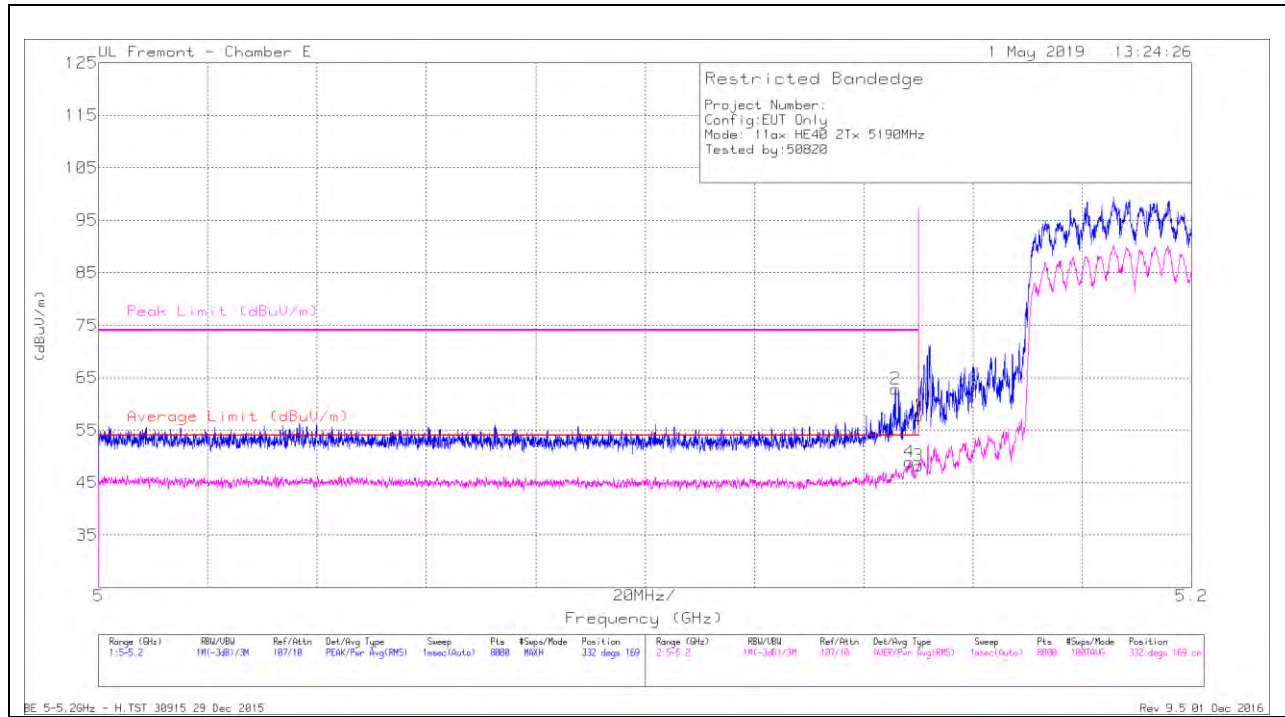
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



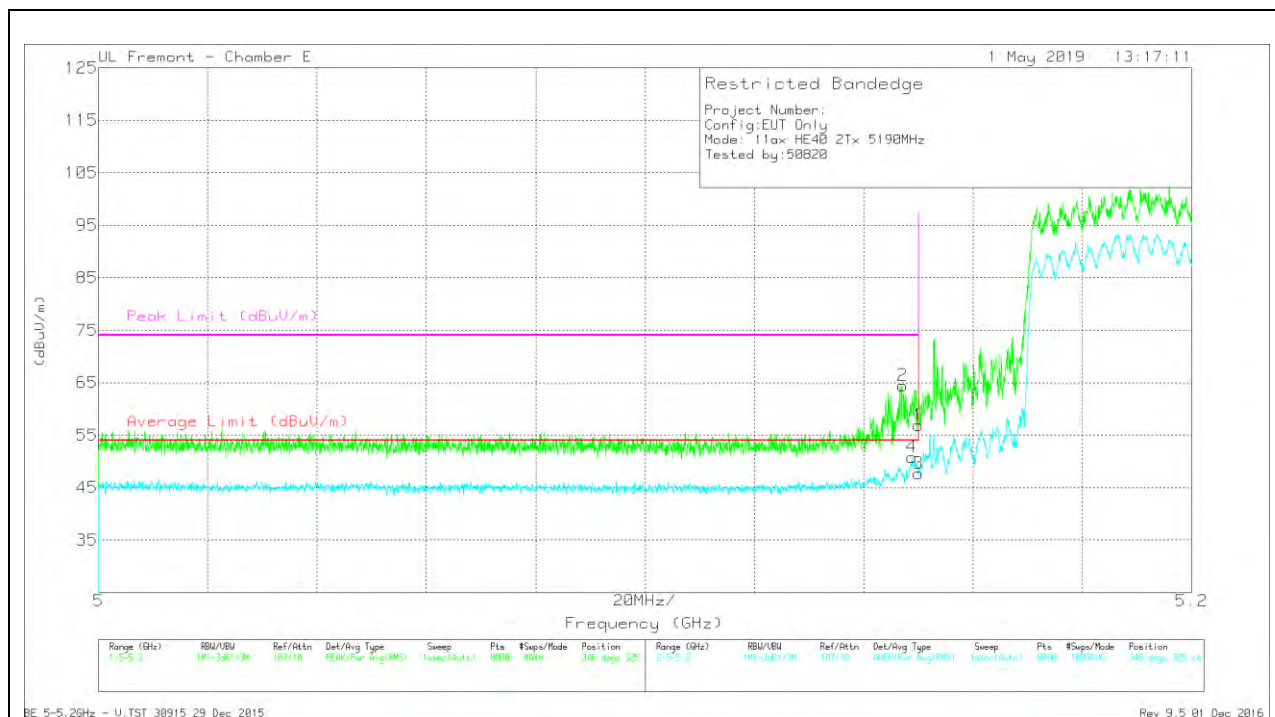
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cb/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	45.39	Pk	34.3	-22	57.69	-	-	74	-16.31	332	169	H
2	* 5.146	50.55	Pk	34.3	-22	62.85	-	-	74	-11.15	332	169	H
3	* 5.15	35.92	RMS	34.3	-22	48.22	54	-5.78	-	-	332	169	H
4	* 5.148	36.68	RMS	34.3	-22	48.98	54	-5.02	-	-	332	169	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Filtr/Path (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	44.52	Pk	34.3	-22	56.82	-	-	74	-17.18	346	325	V
2	* 5.147	52.12	Pk	34.3	-22	64.42	-	-	74	-9.58	346	325	V
3	* 5.15	35.35	RMS	34.3	-22	47.65	54	-6.35	-	-	346	325	V
4	* 5.149	38.47	RMS	34.3	-22	50.77	54	-3.23	-	-	346	325	V

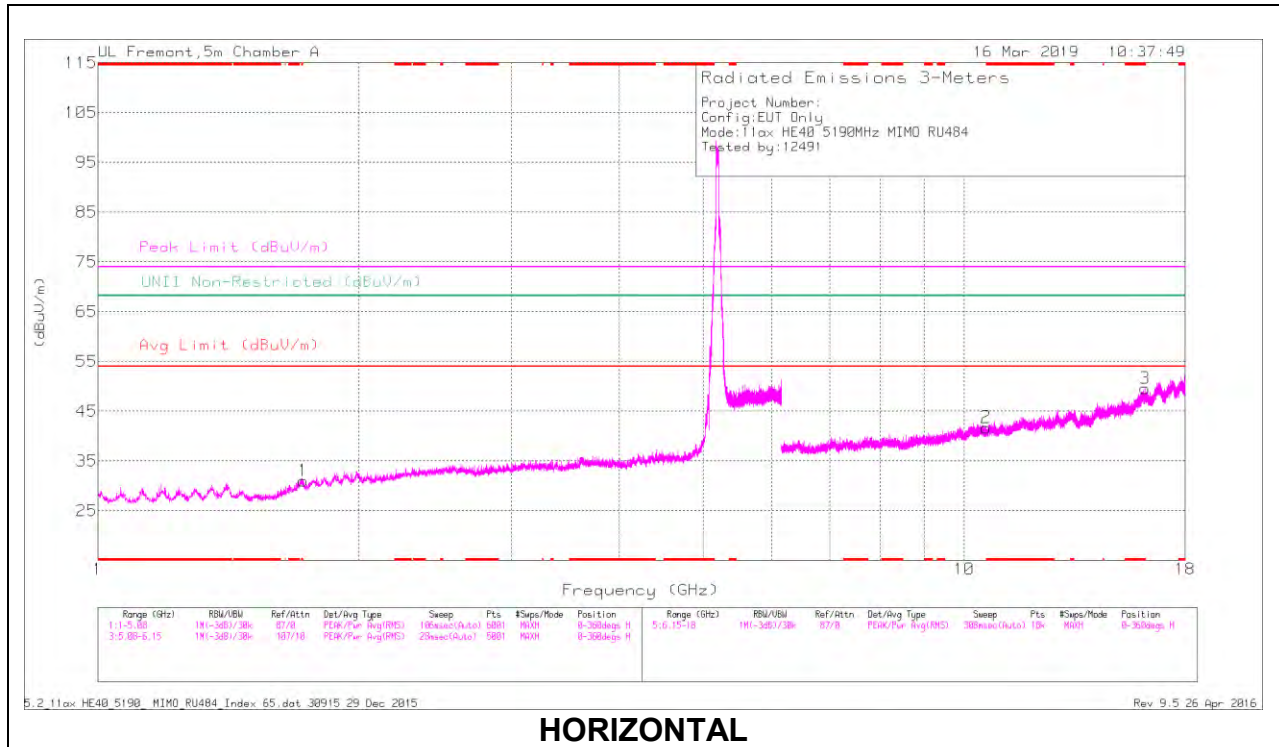
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

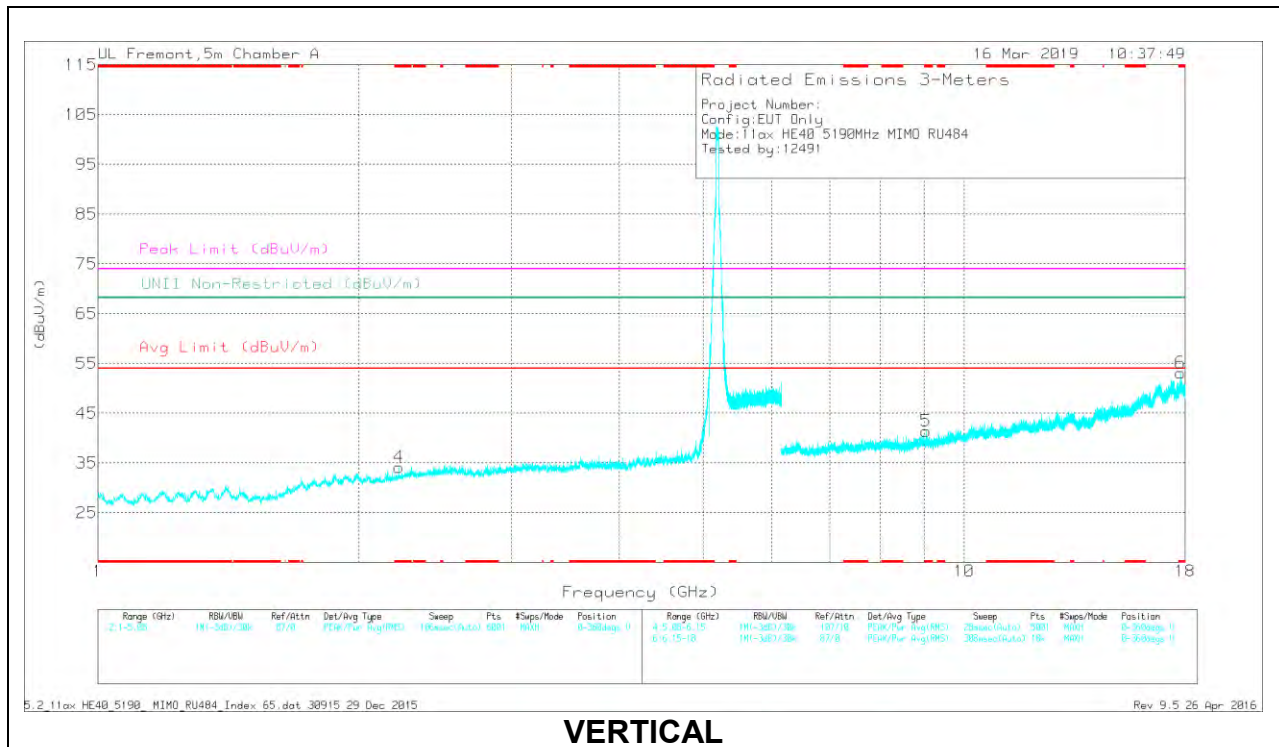
RMS - RMS detection

**HARMONICS AND SPURIOUS EMISSIONS**

**LOW CHANNEL RESULTS**



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Ch/Filtz/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	1.725	40.44	PK-U	29.9	-31.8	38.54	-	-	-	-	68.2	-29.66	250	178	H
2	* 10.615	33.86	PK-U	37.8	-21.9	49.76	-	-	74	-24.24	-	-	35	154	H
	* 10.613	20.83	ADR	37.8	-21.9	36.73	54	-17.27	-	-	-	-	35	154	H
3	* 16.184	32.72	PK-U	43	-18.5	57.22	-	-	74	-16.78	-	-	73	201	H
	* 16.187	18.14	ADR	43	-18.5	42.64	54	-11.36	-	-	-	-	73	201	H
4	* 2.225	40.26	PK-U	31.6	-31.6	40.26	-	-	74	-33.74	-	-	182	130	V
	* 2.227	28.31	ADR	31.6	-31.5	28.41	54	-25.59	-	-	-	-	182	130	V
5	* 9.044	34.76	PK-U	36.8	-23.8	47.76	-	-	74	-26.24	-	-	168	340	V
	* 9.046	22.37	ADR	36.8	-23.8	35.37	54	-18.63	-	-	-	-	168	340	V
6	* 17.779	32.57	PK-U	44.4	-17.5	59.47	-	-	74	-14.53	-	-	178	136	V
	* 17.778	18.66	ADR	44.4	-17.5	45.56	54	-8.44	-	-	-	-	178	136	V

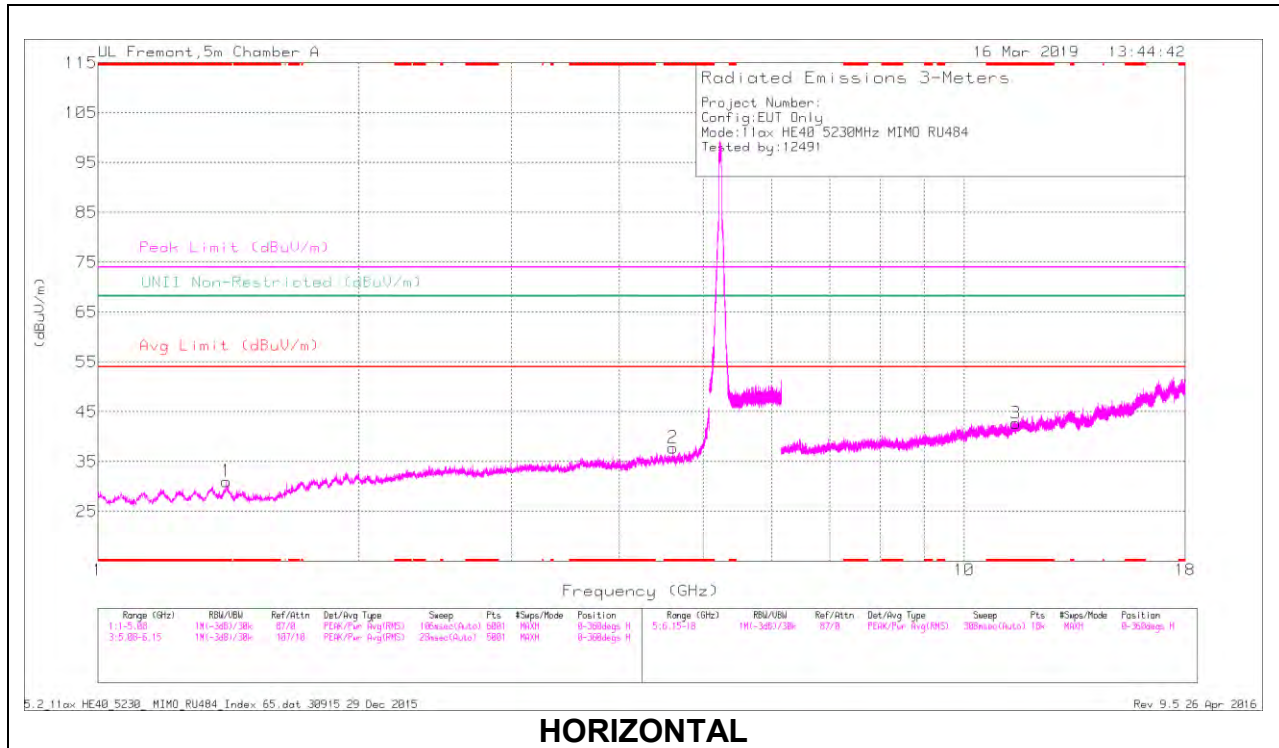
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

PK-U - U-NII: Maximum Peak

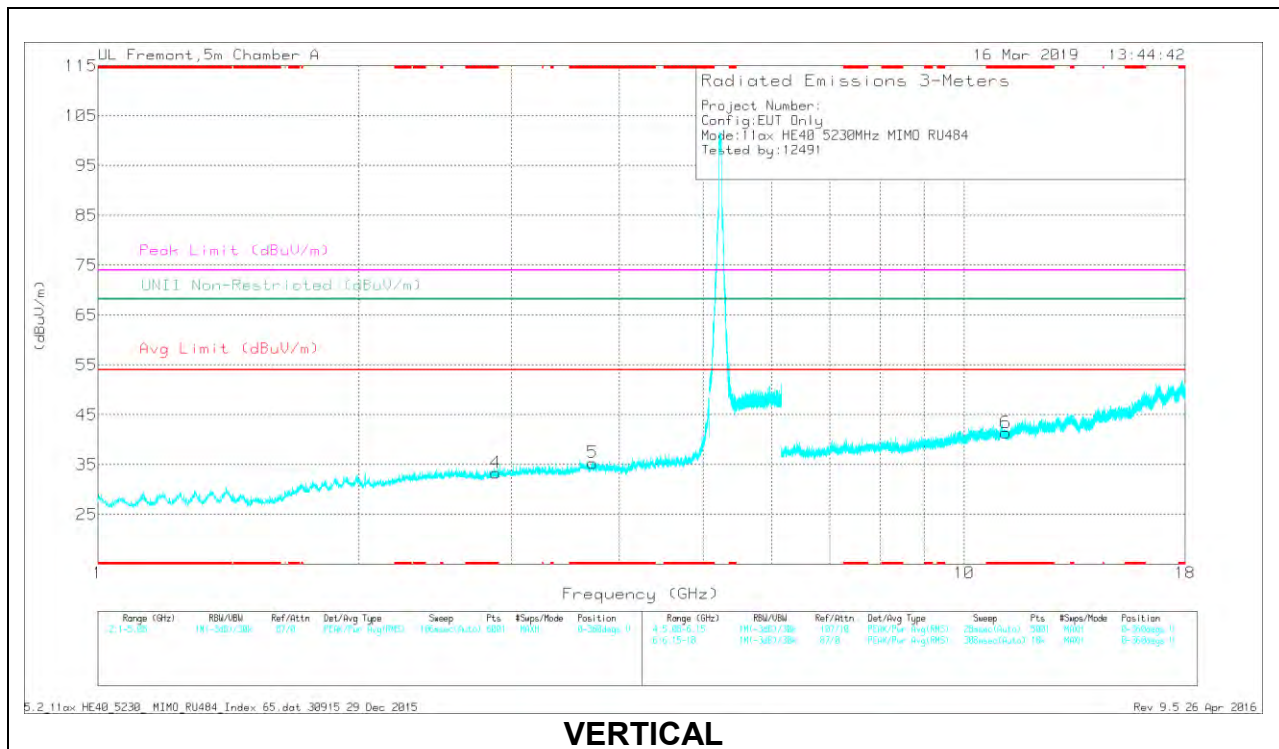
ADR - U-NII AD primary method, RMS average



### HIGH CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**



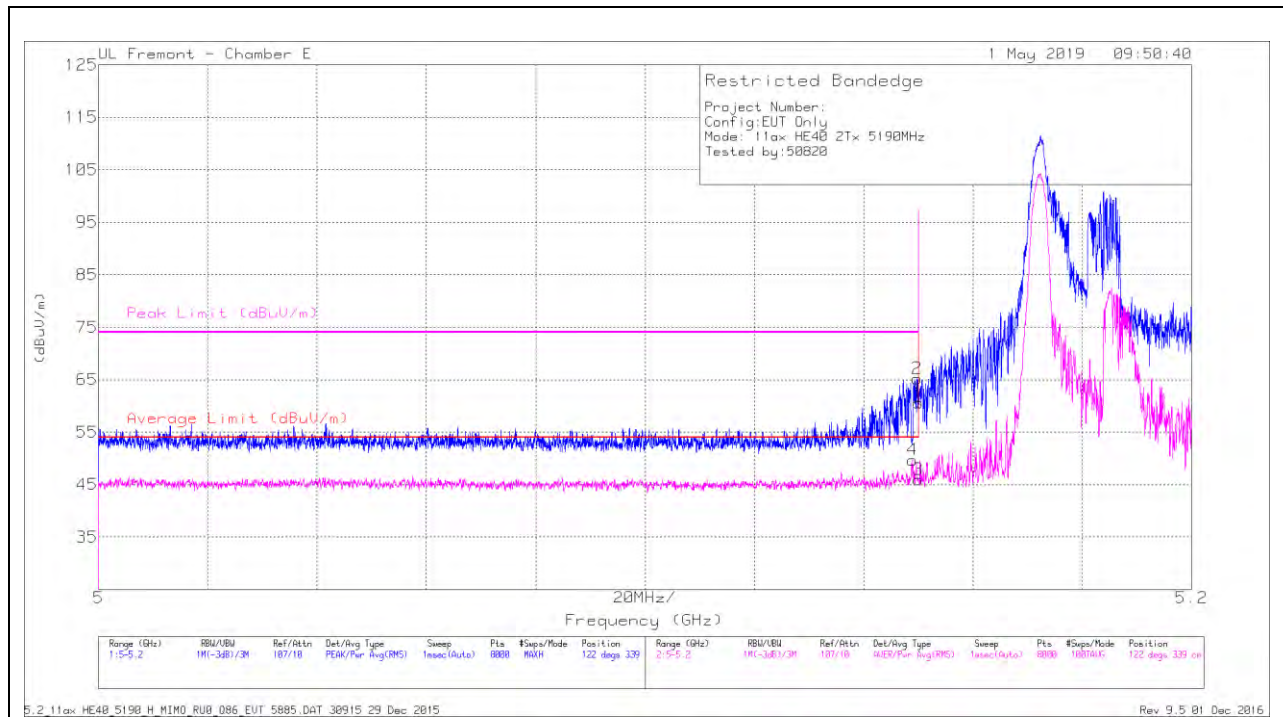
**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cbl/Filtr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 1.409	42.48	PK-U	28.4	-32.2	38.68	-	-	74	-35.32	-	-	342	212	H
	* 1.409	29.88	ADR	28.4	-32.2	26.08	54	-27.92	-	-	-	-	342	212	H
2	* 4.612	38.55	PK-U	34.1	-28.4	44.25	-	-	74	-29.75	-	-	40	190	H
	* 4.612	26.6	ADR	34.1	-28.5	32.2	54	-21.8	-	-	-	-	40	190	H
4	* 2.88	38.71	PK-U	32.6	-30.3	41.01	-	-	74	-32.99	-	-	155	186	V
	* 2.88	27.2	ADR	32.6	-30.3	29.5	54	-24.5	-	-	-	-	155	186	V
5	* 3.724	39.21	PK-U	33.3	-29.6	42.91	-	-	74	-31.09	-	-	55	206	V
	* 3.725	27.13	ADR	33.3	-29.6	30.83	54	-23.17	-	-	-	-	55	206	V
3	* 11.486	33.24	PK-U	38.4	-21.1	50.54	-	-	74	-23.46	-	-	90	270	H
	* 11.486	20.19	ADR	38.4	-21.1	37.49	54	-16.51	-	-	-	-	90	270	H
6	* 11.177	32.76	PK-U	38	-21.6	49.16	-	-	74	-24.84	-	-	234	104	V
	* 11.177	20.37	ADR	38	-21.6	36.77	54	-17.23	-	-	-	-	234	104	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 PK-U - U-NII: Maximum Peak  
 ADR - U-NII AD primary method, RMS average

**BANDEDGE (LOW CHANNEL)**

**HORIZONTAL RESULT**



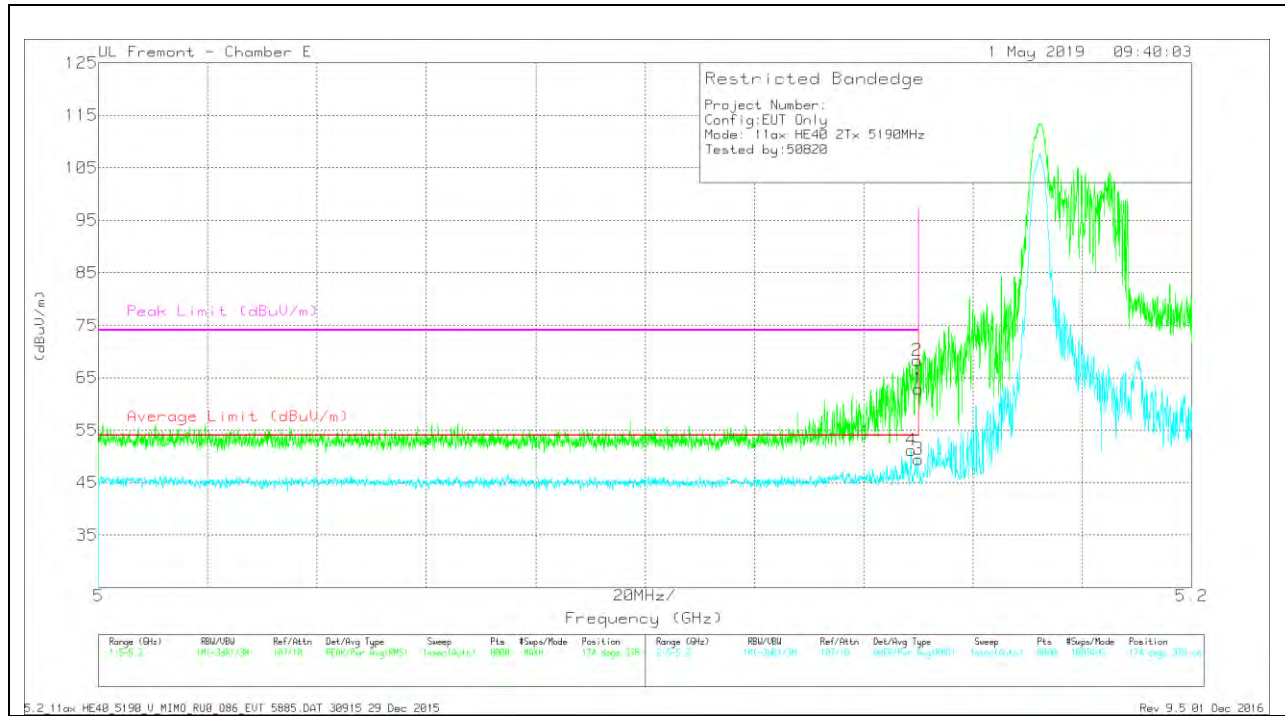
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cb/Ftr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	48.25	Pk	34.3	-22	60.55	-	-	74	-13.45	122	339	H
2	* 5.15	52.85	Pk	34.3	-22	65.15	-	-	74	-8.85	122	339	H
3	* 5.15	33.69	RMS	34.3	-22	45.99	54	-8.01	-	-	122	339	H
4	* 5.149	37.39	RMS	34.3	-22	49.69	54	-4.31	-	-	122	339	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

**VERTICAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Paid (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	50.52	Pk	34.3	-22	62.82	-	-	74	-11.18	174	378	V
2	* 5.15	56	Pk	34.3	-22	68.3	-	-	74	-5.7	174	378	V
3	* 5.15	37.18	RMS	34.3	-22	49.48	54	-4.52	-	-	174	378	V
4	* 5.149	38.81	RMS	34.3	-22	51.11	54	-2.89	-	-	174	378	V

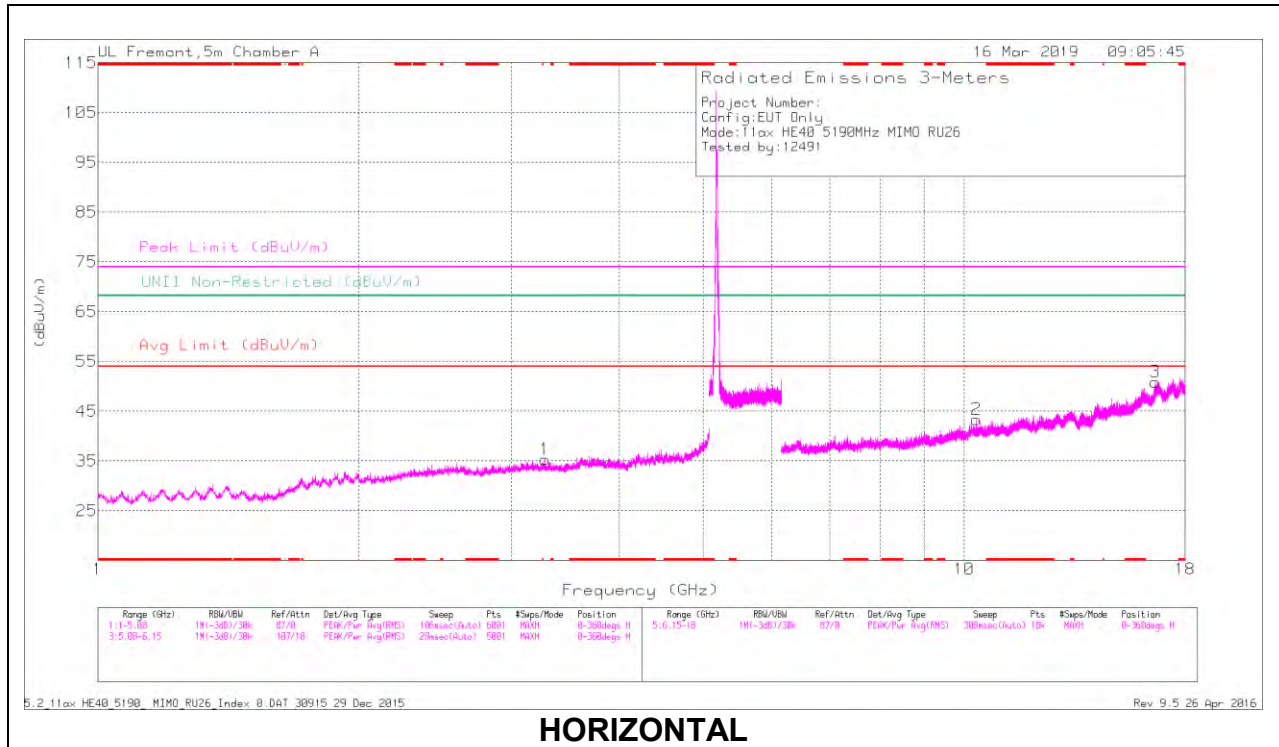
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

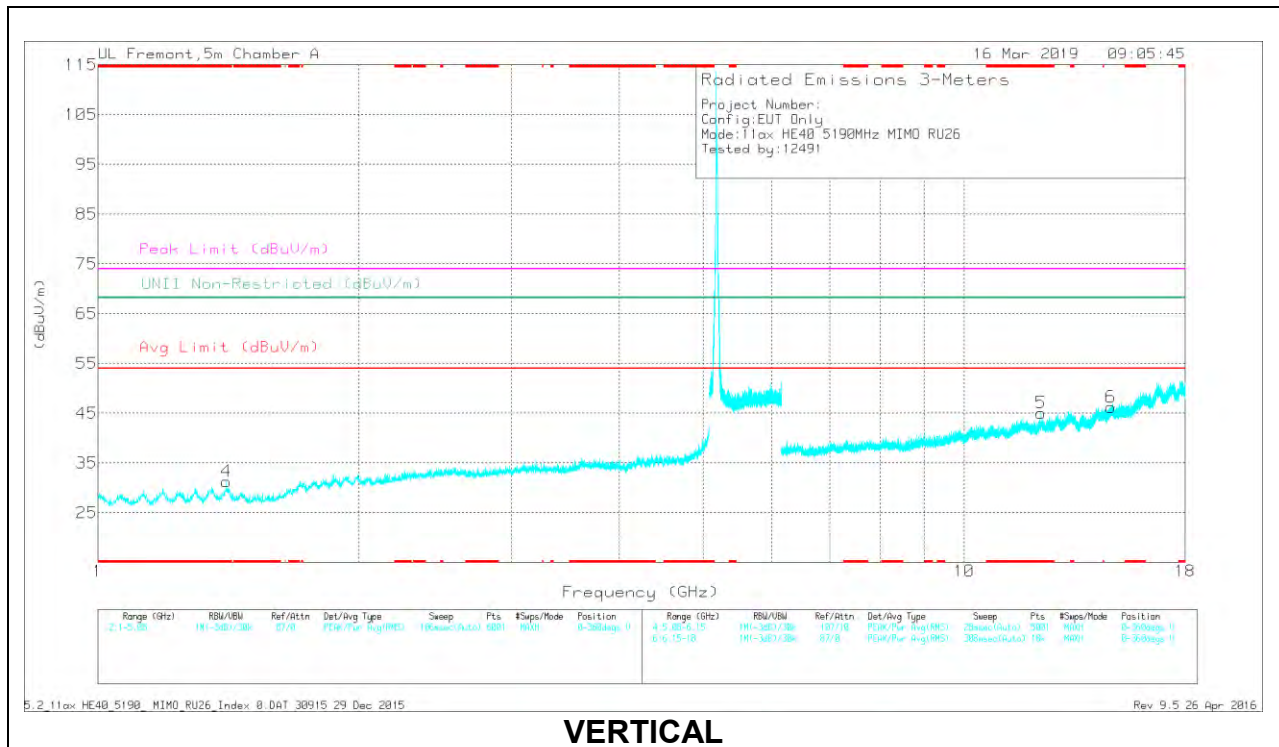
RMS - RMS detection

**HARMONICS AND SPURIOUS EMISSIONS**

**LOW CHANNEL RESULTS**



**HORIZONTAL**



**VERTICAL**

**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Cbl/Filr/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	3.283	39.17	PK-U	32.9	-29.8	42.27	-	-	-	-	68.2	-25.93	66	167	H
2	10.345	34.18	PK-U	37.8	-22.3	49.68	-	-	-	-	68.2	-18.52	236	190	H
3	16.627	32.2	PK-U	43.6	-17.7	58.1	-	-	-	-	68.2	-10.1	179	125	H
4	* 1.409	41.61	PK-U	28.4	-32.2	37.81	-	-	74	-36.19	-	-	130	202	V
	* 1.406	30.02	ADR	28.5	-32.2	26.32	54	-27.68	-	-	-	-	130	202	V
5	* 12.279	32.81	PK-U	39.1	-20.1	51.81	-	-	74	-22.19	-	-	129	185	V
	* 12.281	19.5	ADR	39.1	-20.1	38.5	54	-15.5	-	-	-	-	129	185	V
6	14.765	33.34	PK-U	40.9	-20	54.24	-	-	-	-	68.2	-13.96	271	155	V

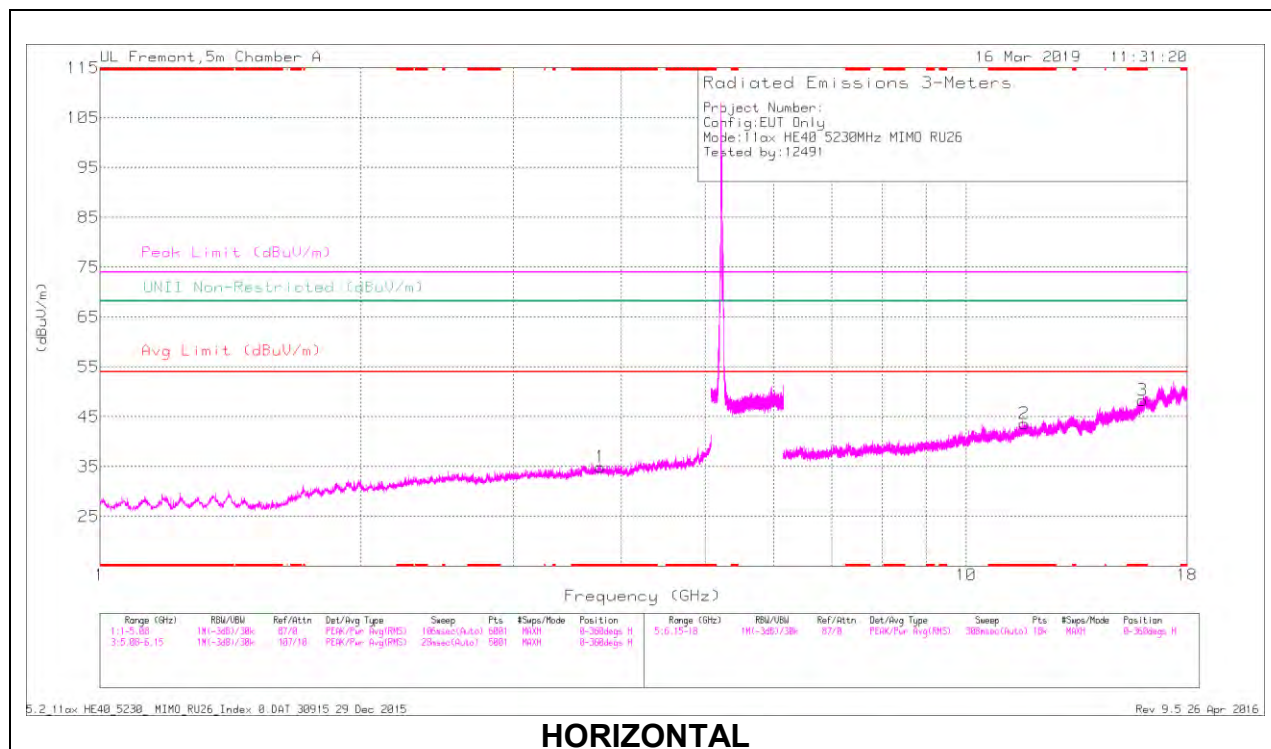
\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

PK-U - U-NII: Maximum Peak

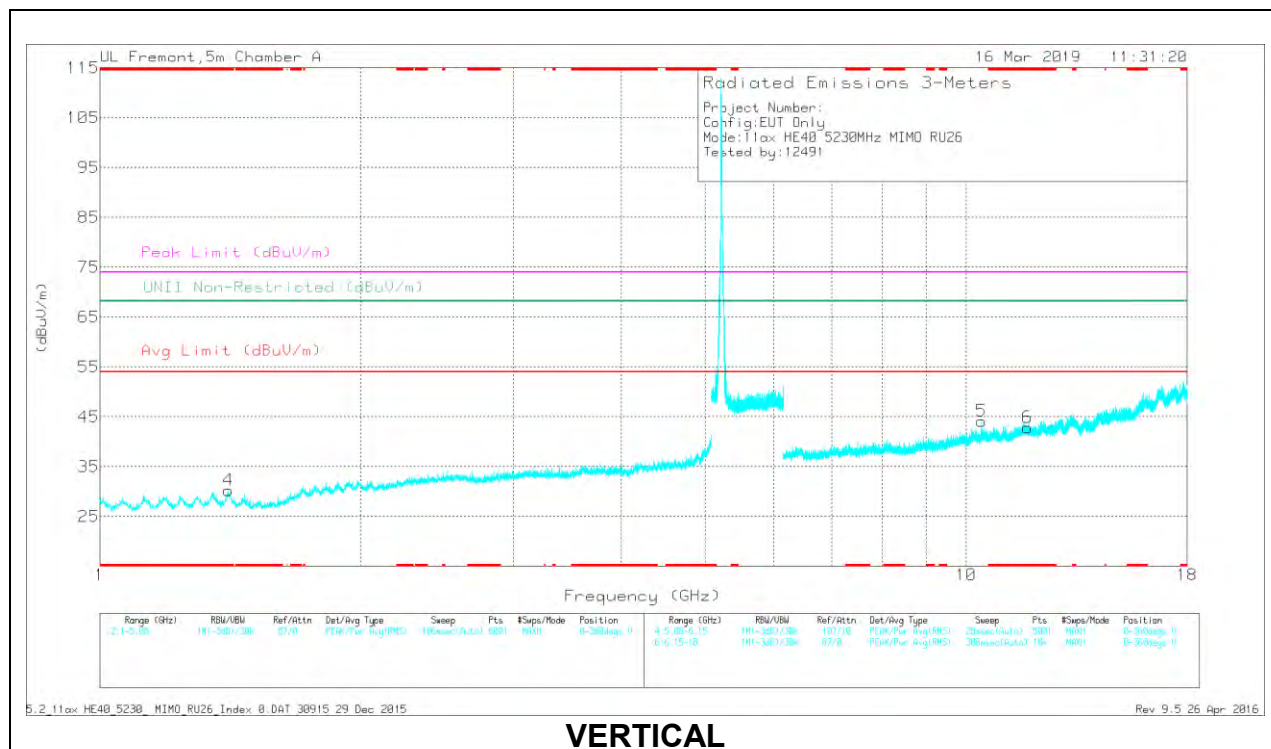
ADR - U-NII AD primary method, RMS average



### HIGH CHANNEL RESULTS



**HORIZONTAL**



**VERTICAL**



**RADIATED EMISSIONS**

Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T863 (dB/m)	Amp/Chl/Filt/Pad (dB)	Corrected Reading (dBuV/m)	Avg Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	UNII Non-Restricted (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 3.783	39.41	PK-U	33.4	-29.4	43.41	-	-	74	-30.59	-	-	131	247	H
	* 3.783	26.81	ADR	33.4	-29.4	30.81	54	-23.19	-	-	-	-	131	247	H
4	* 1.406	41.35	PK-U	28.5	-32.2	37.65	-	-	74	-36.35	-	-	122	334	V
	* 1.409	29.66	ADR	28.4	-32.2	25.86	54	-28.14	-	-	-	-	122	334	V
2	* 11.67	32.11	PK-U	38.9	-20.2	50.81	-	-	74	-23.19	-	-	37	180	H
	* 11.671	19.04	ADR	38.9	-20.2	37.74	54	-16.26	-	-	-	-	37	180	H
3	* 15.982	32.62	PK-U	42.4	-18.3	56.72	-	-	74	-17.28	-	-	214	139	H
	* 15.98	18.52	ADR	42.4	-18.3	42.62	54	-11.38	-	-	-	-	214	139	H
6	* 11.769	32.51	PK-U	39.1	-20.9	50.71	-	-	74	-23.29	-	-	51	238	V
	* 11.769	19.78	ADR	39.1	-20.9	37.98	54	-16.02	-	-	-	-	51	238	V
5	10.423	33.45	PK-U	37.9	-21.5	49.85	-	-	-	-	68.2	-18.35	336	184	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

PK-U - U-NII: Maximum Peak

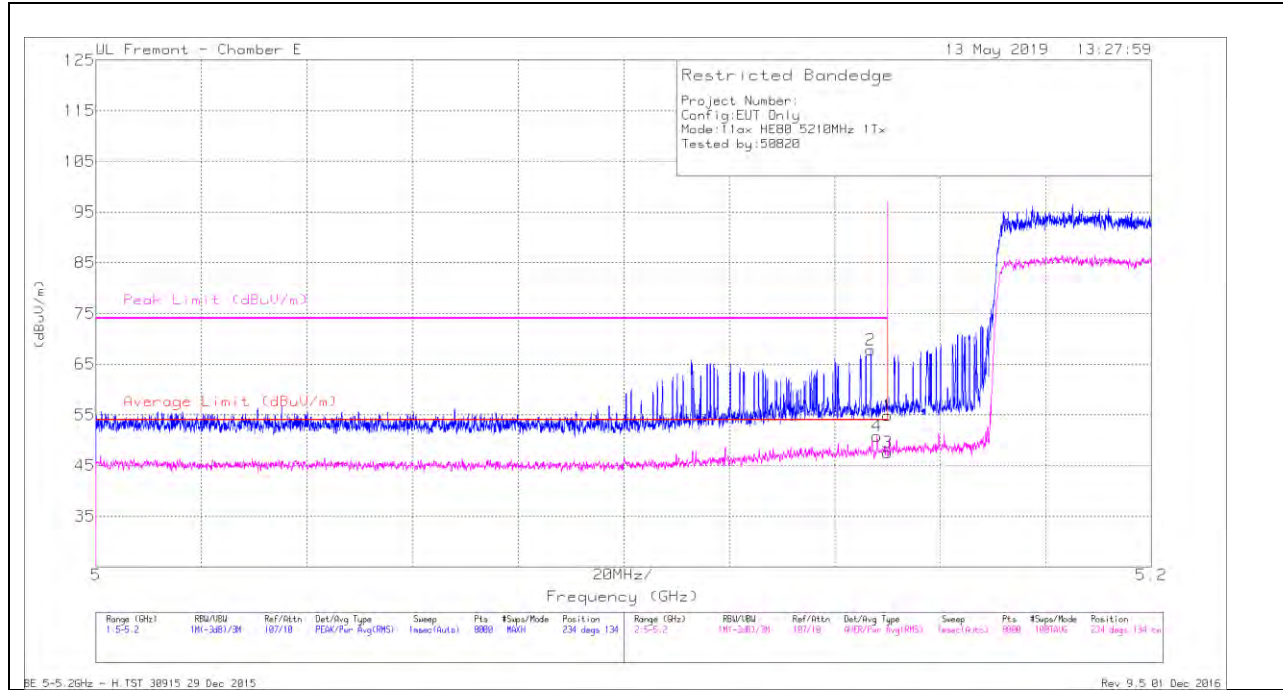
ADR - U-NII AD primary method, RMS average

**1.1.6. TX ABOVE 1 GHz 802.11ax HE80 MODE IN THE 5.2 GHz BAND**

**1TX Antenna 4 MODE – 996 Tones, RU Index 67**

**BANDEDGE (MID CHANNEL)**

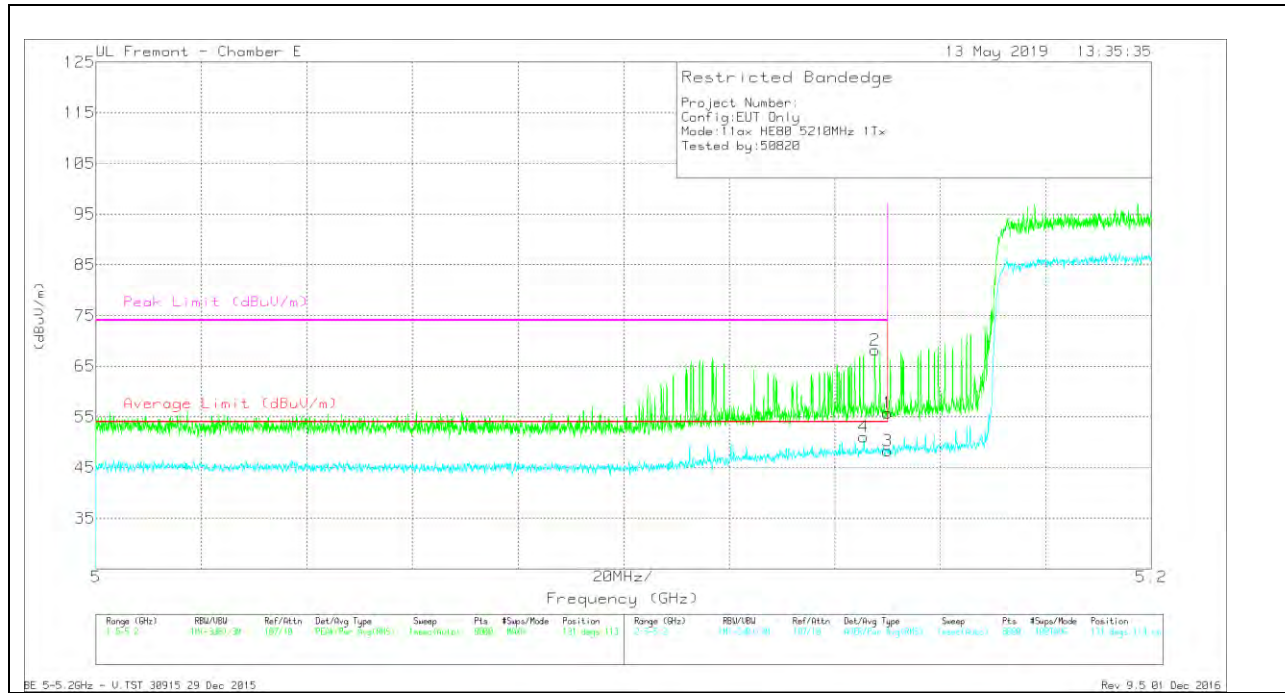
**HORIZONTAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbi/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	42.57	Pk	34.3	-22	54.87	-	-	74	-19.13	234	134	H
2	* 5.147	55.55	Pk	34.3	-22	67.85	-	-	74	-6.15	234	134	H
3	* 5.15	35.28	RMS	34.3	-22	47.58	54	-6.42	-	-	234	134	H
4	* 5.148	38.49	RMS	34.3	-22	50.79	54	-3.21	-	-	234	134	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**VERTICAL RESULT**

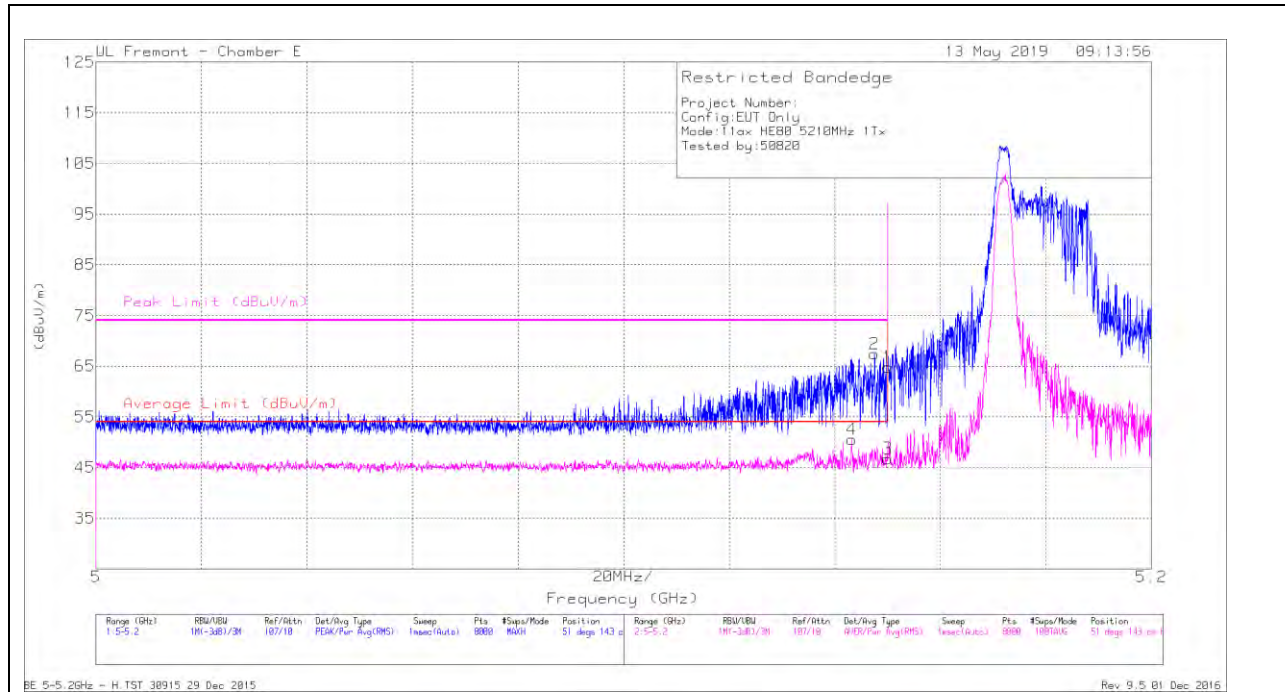


Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	43.42	Pk	34.3	-22	55.72	-	-	74	-18.28	131	113	V
2	* 5.148	55.87	Pk	34.3	-22	68.17	-	-	74	-5.83	131	113	V
3	* 5.15	36.01	RMS	34.3	-22	48.31	54	-5.69	-	-	131	113	V
4	* 5.146	38.76	RMS	34.3	-22	51.06	54	-2.94	-	-	131	113	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection

**BANDEDGE (MID CHANNEL)**

**HORIZONTAL RESULT**



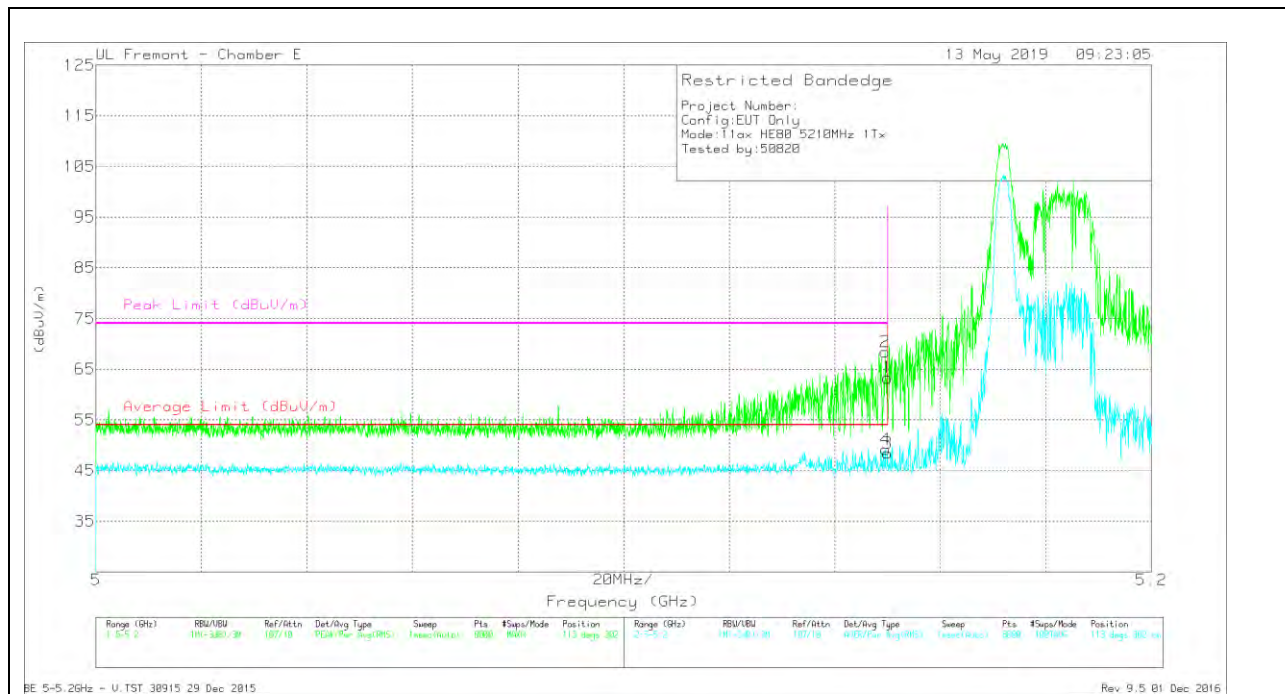
Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AFT119 (dB/m)	Amp/Cbl/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	52.49	Pk	34.3	-22	64.79	-	-	74	-9.21	51	143	H
2	* 5.148	55.07	Pk	34.3	-22	67.37	-	-	74	-6.63	51	143	H
3	* 5.15	34.45	RMS	34.3	-22	46.75	54	-7.25	-	-	51	143	H
4	* 5.143	38.32	RMS	34.2	-22	50.52	54	-3.48	-	-	51	143	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

Pk - Peak detector

RMS - RMS detection

### VERTICAL RESULT



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbi/Fitr/Pa d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	50.97	Pk	34.3	-22	63.27	-	-	74	-10.73	113	302	V
2	* 5.15	56.08	Pk	34.3	-22	68.38	-	-	74	-5.62	113	302	V
3	* 5.15	36.12	RMS	34.3	-22	48.42	54	-5.58	-	-	113	302	V
4	* 5.15	36.85	RMS	34.3	-22	49.15	54	-4.85	-	-	113	302	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band

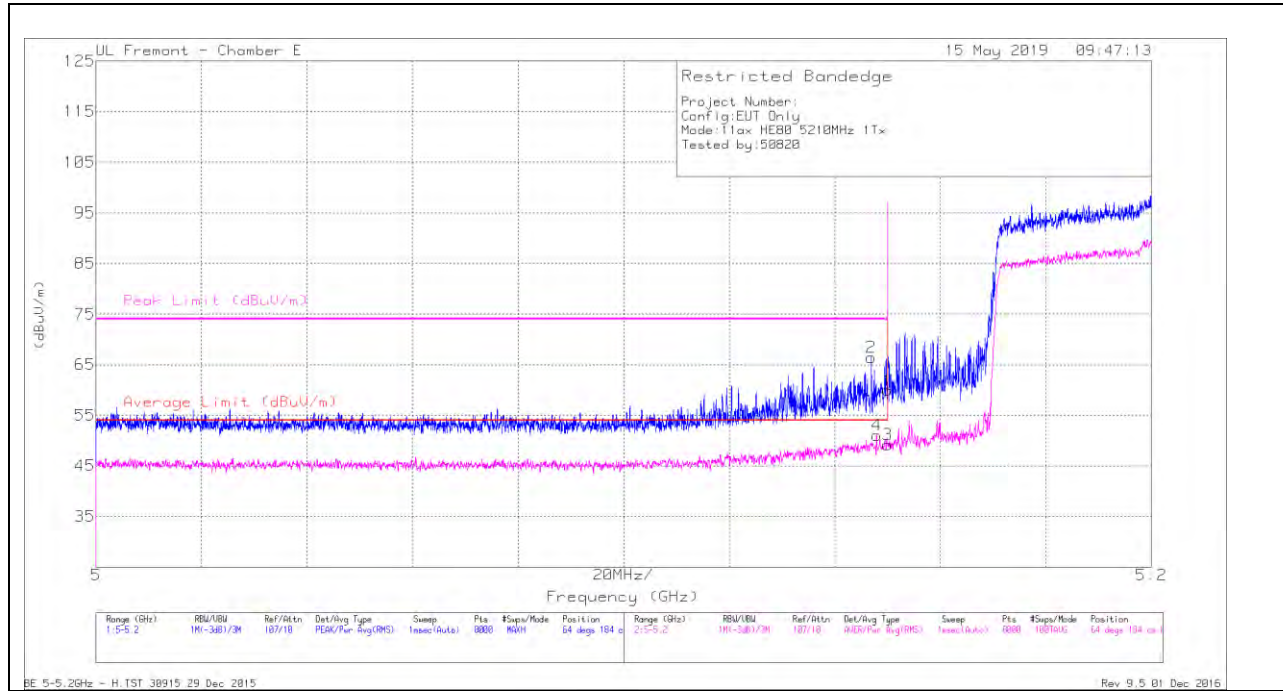
Pk - Peak detector

RMS - RMS detection

**1TX Antenna 5 MODE – 996 Tones, RU Index 67**

**BANDEDGE (MID CHANNEL)**

**HORIZONTAL RESULT**

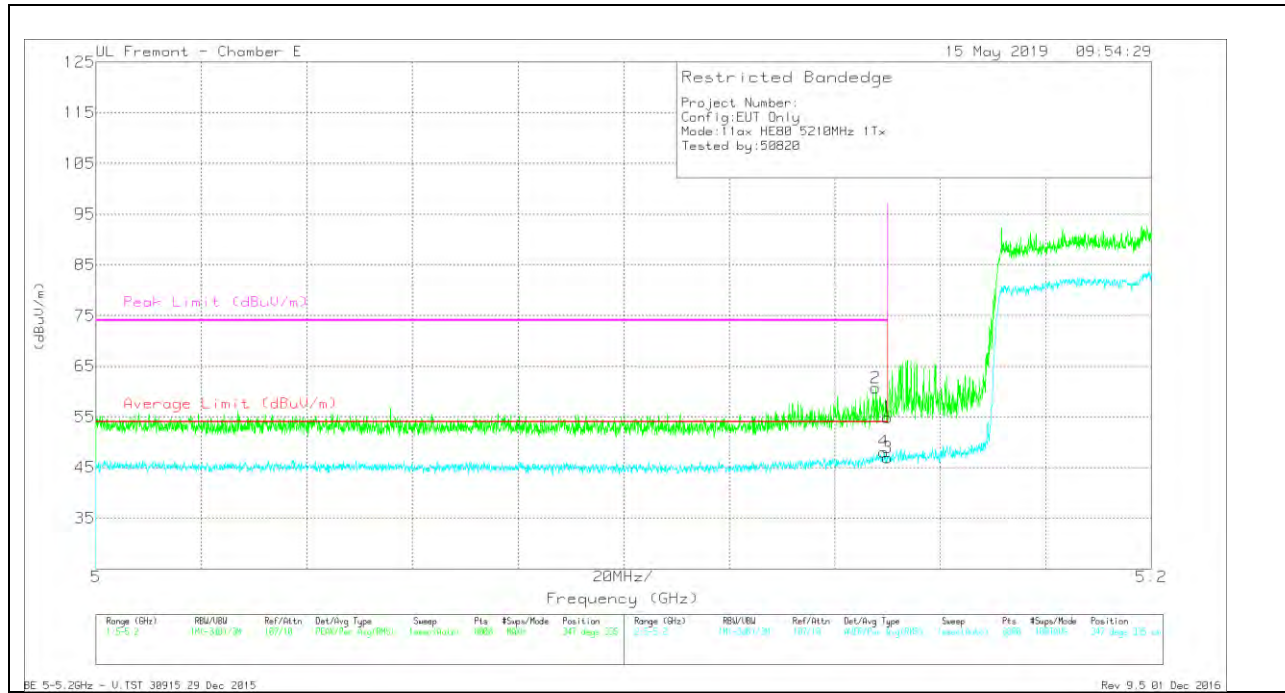


Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Fitr/Par d (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	47.63	Pk	34.3	-22	59.93	-	-	74	-14.07	64	184	H
2	* 5.147	54.18	Pk	34.3	-22	66.48	-	-	74	-7.52	64	184	H
3	* 5.15	36.91	RMS	34.3	-22	49.21	54	-4.79	-	-	64	184	H
4	* 5.148	38.7	RMS	34.3	-22	51	54	-3	-	-	64	184	H

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection



**VERTICAL RESULT**



Marker	Frequency (GHz)	Meter Reading (dBuV)	Det	AF T119 (dB/m)	Amp/Cbl/Fitr/Pad (dB)	Corrected Reading (dBuV/m)	Average Limit (dBuV/m)	Margin (dB)	Peak Limit (dBuV/m)	PK Margin (dB)	Azimuth (Degs)	Height (cm)	Polarity
1	* 5.15	42.64	Pk	34.3	-22	54.94	-	-	74	-19.06	347	335	V
2	* 5.148	48.39	Pk	34.3	-22	60.69	-	-	74	-13.31	347	335	V
3	* 5.15	34.69	RMS	34.3	-22	46.99	54	-7.01	-	-	347	335	V
4	* 5.149	35.82	RMS	34.3	-22	48.12	54	-5.88	-	-	347	335	V

\* - indicates frequency in CFR47 Pt 15 / IC RSS-Restricted Band  
 Pk - Peak detector  
 RMS - RMS detection