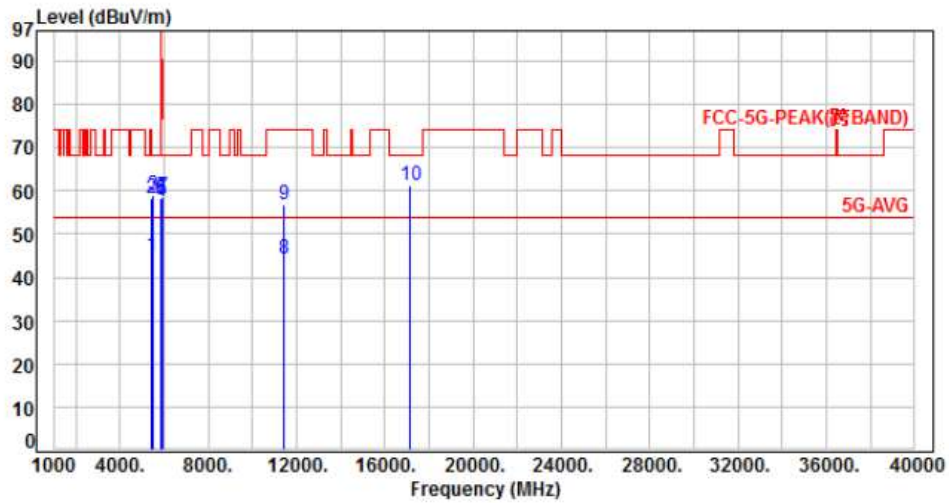




Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 1, Band 3 Straddle Channel, CH144		:

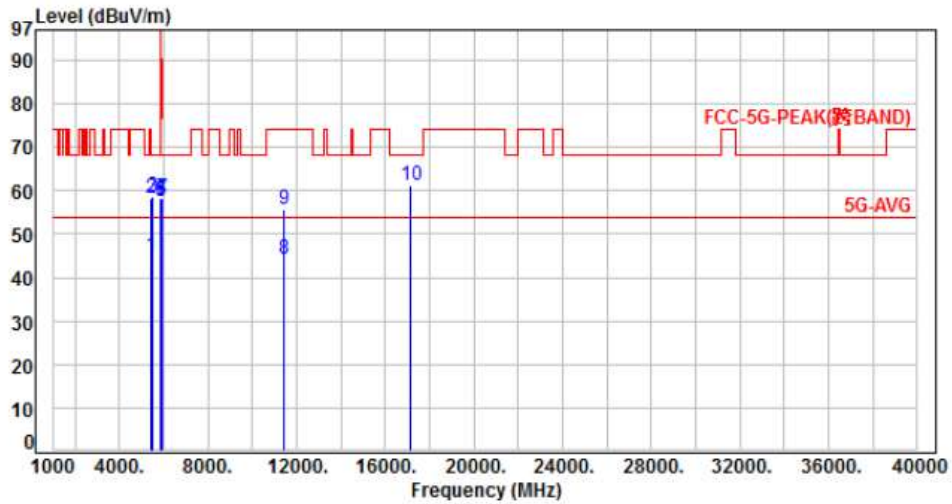


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.86	45.06	54.00	-8.94	Average	127	66	P
2	5460.00	5.20	53.16	58.36	74.00	-15.64	Peak	127	66	P
3	5470.00	5.20	53.76	58.96	68.20	-9.24	Peak	127	66	P
4	5850.00	5.21	52.32	57.53	122.20	-64.67	Peak	127	66	P
5	5855.00	5.23	52.53	57.76	110.80	-53.04	Peak	127	66	P
6	5875.00	5.31	52.91	58.22	105.20	-46.98	Peak	127	66	P
7	5925.00	5.49	53.08	58.57	68.20	-9.63	Peak	127	66	P
8	11440.00	13.08	31.23	44.31	54.00	-9.69	Average	114	200	P
9	11440.00	13.08	43.84	56.92	74.00	-17.08	Peak	114	200	P
10	17160.00	18.42	42.91	61.33	68.20	-6.87	Peak	100	315	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	:	From POE DC48V	Pol/Phase	:	HORIZONTAL
Test Mode	:	Mode 1, Band 3 Straddle Channel, CH144		:	

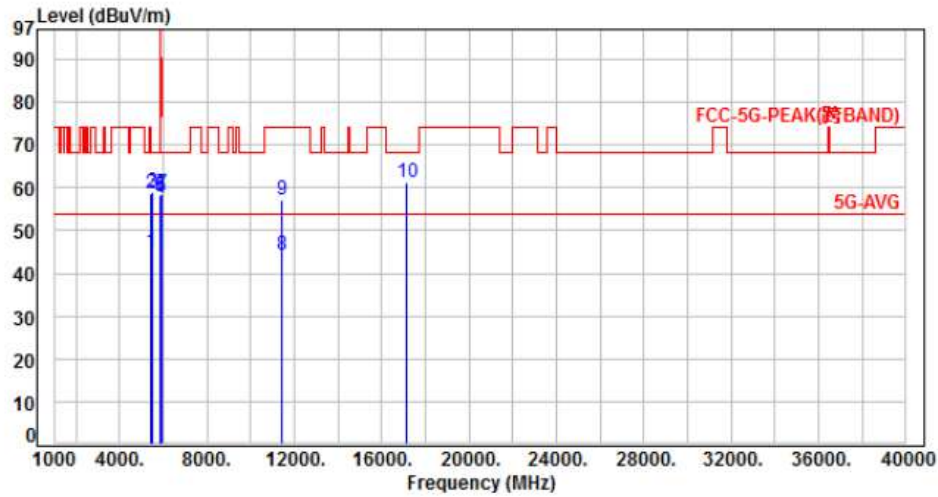


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.66	44.86	54.00	-9.14	Average	107	220	P
2	5460.00	5.20	53.10	58.30	74.00	-15.70	Peak	107	220	P
3	5470.00	5.20	53.60	58.80	68.20	-9.40	Peak	107	220	P
4	5850.00	5.21	53.07	58.28	122.20	-63.92	Peak	107	220	P
5	5855.00	5.23	52.21	57.44	110.80	-53.36	Peak	107	220	P
6	5875.00	5.31	52.55	57.86	105.20	-47.34	Peak	107	220	P
7	5925.00	5.49	52.96	58.45	68.20	-9.75	Peak	107	220	P
8	11440.00	13.08	31.03	44.11	54.00	-9.89	Average	100	204	P
9	11440.00	13.08	42.63	55.71	74.00	-18.29	Peak	100	204	P
10	17160.00	18.42	42.63	61.05	68.20	-7.15	Peak	100	77	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 4, Band 3 Straddle Channel, CH144		

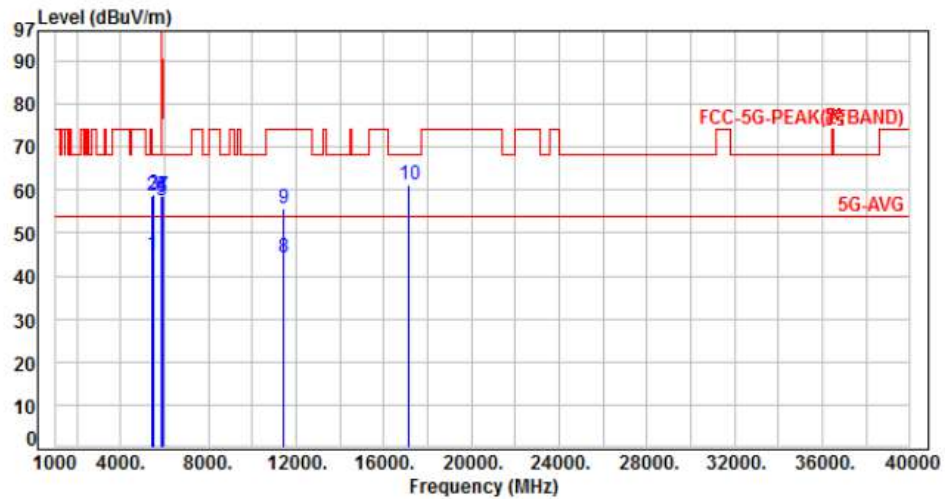


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.80	45.00	54.00	-9.00	Average	122	73	P
2	5460.00	5.20	53.34	58.54	74.00	-15.46	Peak	122	73	P
3	5470.00	5.20	53.94	59.14	68.20	-9.06	Peak	122	73	P
4	5850.00	5.21	52.44	57.65	122.20	-64.55	Peak	122	73	P
5	5855.00	5.23	52.76	57.99	110.80	-52.81	Peak	122	73	P
6	5875.00	5.31	53.09	58.40	105.20	-46.80	Peak	122	73	P
7	5925.00	5.49	53.29	58.78	68.20	-9.42	Peak	122	73	P
8	11440.00	13.08	31.36	44.44	54.00	-9.56	Average	113	198	P
9	11440.00	13.08	43.98	57.06	74.00	-16.94	Peak	113	198	P
10	17160.00	18.42	42.84	61.26	68.20	-6.94	Peak	100	311	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 4, Band 3 Straddle Channel, CH144		:

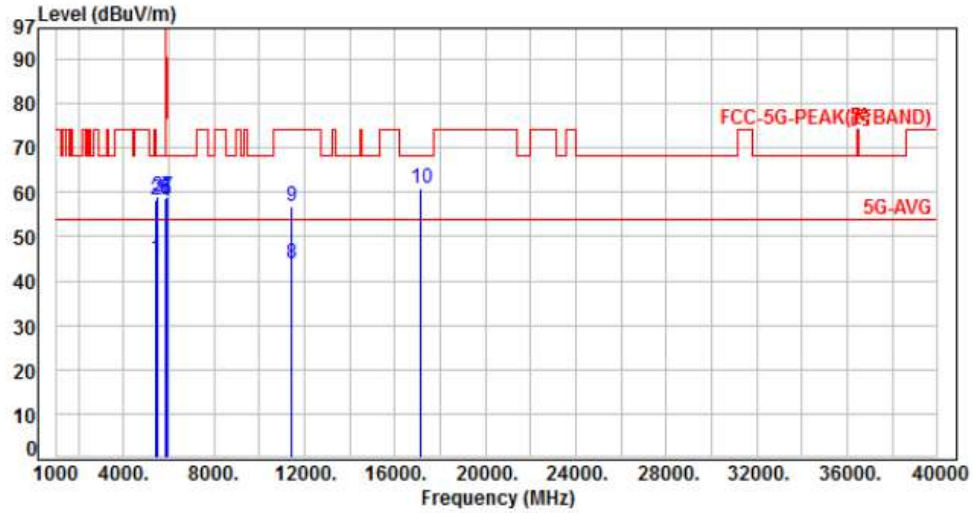


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.74	44.94	54.00	-9.06	Average	109	218	P
2	5460.00	5.20	53.45	58.65	74.00	-15.35	Peak	109	218	P
3	5470.00	5.20	53.81	59.01	68.20	-9.19	Peak	109	218	P
4	5850.00	5.21	53.32	58.53	122.20	-63.67	Peak	109	218	P
5	5855.00	5.23	52.45	57.68	110.80	-53.12	Peak	109	218	P
6	5875.00	5.31	52.79	58.10	105.20	-47.10	Peak	109	218	P
7	5925.00	5.49	53.11	58.60	68.20	-9.60	Peak	109	218	P
8	11440.00	13.08	31.16	44.24	54.00	-9.76	Average	100	198	P
9	11440.00	13.08	42.76	55.84	74.00	-18.16	Peak	100	198	P
10	17160.00	18.42	42.70	61.12	68.20	-7.08	Peak	100	82	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 5, Band 3 Straddle Channel, CH142		:

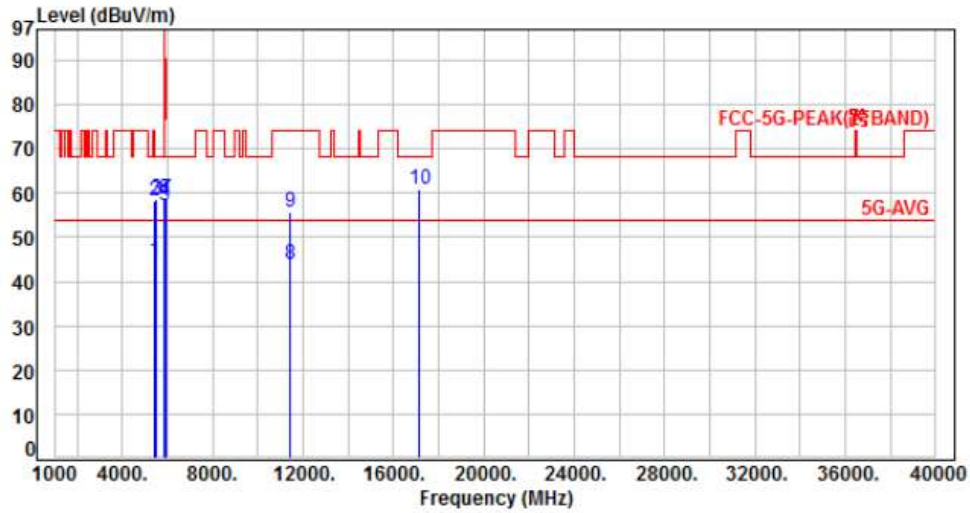


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.75	44.95	54.00	-9.05	Average	124	76	P
2	5460.00	5.20	53.21	58.41	74.00	-15.59	Peak	124	76	P
3	5470.00	5.20	53.81	59.01	68.20	-9.19	Peak	124	76	P
4	5850.00	5.21	52.55	57.76	122.20	-64.44	Peak	124	76	P
5	5855.00	5.23	52.88	58.11	110.80	-52.69	Peak	124	76	P
6	5875.00	5.31	53.18	58.49	105.20	-46.71	Peak	124	76	P
7	5925.00	5.49	53.37	58.86	68.20	-9.34	Peak	124	76	P
8	11420.00	13.01	31.03	44.04	54.00	-9.96	Average	115	201	P
9	11420.00	13.01	43.74	56.75	74.00	-17.25	Peak	115	201	P
10	17130.00	18.23	42.70	60.93	68.20	-7.27	Peak	100	315	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 5, Band 3 Straddle Channel, CH142		:

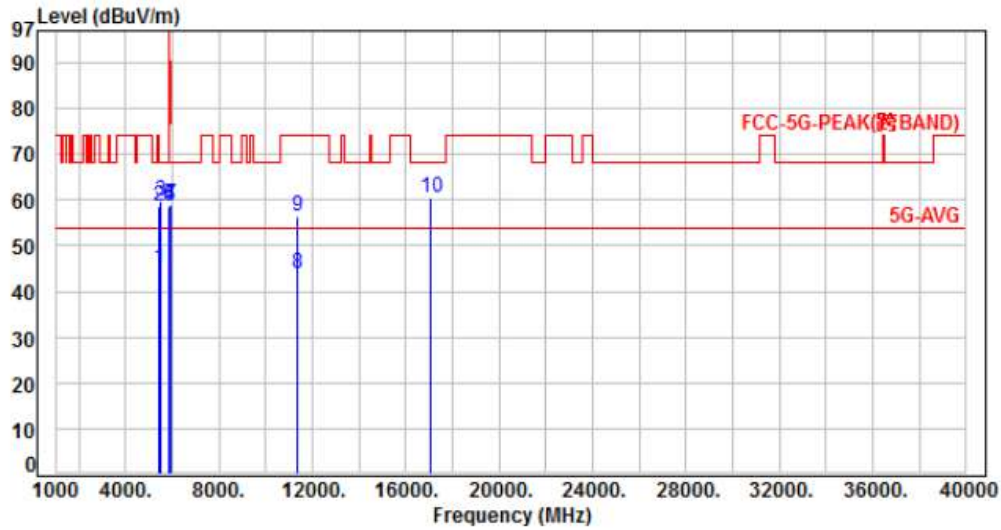


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.51	44.71	54.00	-9.29	Average	106	221	P
2	5460.00	5.20	53.04	58.24	74.00	-15.76	Peak	106	221	P
3	5470.00	5.20	53.33	58.53	68.20	-9.67	Peak	106	221	P
4	5850.00	5.21	53.05	58.26	122.20	-63.94	Peak	106	221	P
5	5855.00	5.23	52.10	57.33	110.80	-53.47	Peak	106	221	P
6	5875.00	5.31	53.28	58.59	105.20	-46.61	Peak	106	221	P
7	5925.00	5.49	53.32	58.81	68.20	-9.39	Peak	106	221	P
8	11420.00	13.01	30.86	43.87	54.00	-10.13	Average	100	189	P
9	11420.00	13.01	42.53	55.54	74.00	-18.46	Peak	100	189	P
10	17130.00	18.23	42.47	60.70	68.20	-7.50	Peak	100	88	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 6, Band 3 Straddle Channel, CH138		:

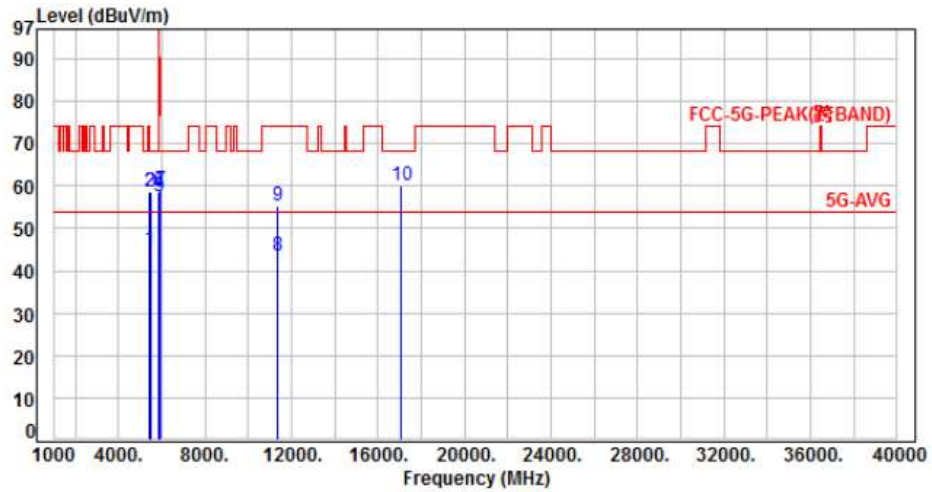


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.80	45.00	54.00	-9.00	Average	210	79	P
2	5460.00	5.20	53.29	58.49	74.00	-15.51	Peak	210	79	P
3	5470.00	5.20	54.46	59.66	68.20	-8.54	Peak	210	79	P
4	5850.00	5.21	53.58	58.79	122.20	-63.41	Peak	210	79	P
5	5855.00	5.23	53.29	58.52	110.80	-52.28	Peak	210	79	P
6	5875.00	5.31	53.43	58.74	105.20	-46.46	Peak	210	79	P
7	5925.00	5.49	53.44	58.93	68.20	-9.27	Peak	210	79	P
8	11380.00	12.91	30.89	43.80	54.00	-10.20	Average	112	196	P
9	11380.00	12.91	43.37	56.28	74.00	-17.72	Peak	112	196	P
10	17070.00	17.93	42.55	60.48	68.20	-7.72	Peak	100	322	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 6, Band 3 Straddle Channel, CH138		:



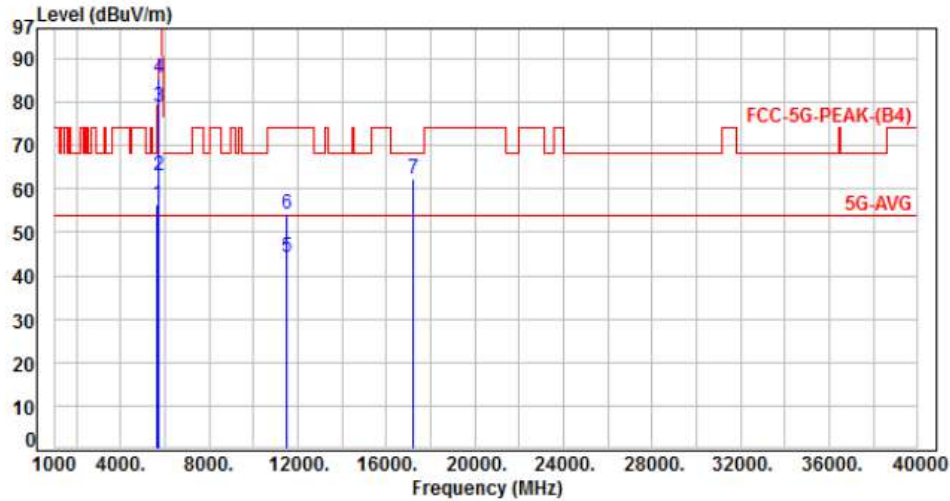
No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5460.00	5.20	39.63	44.83	54.00	-9.17	Average	102	205	P
2	5460.00	5.20	53.26	58.46	74.00	-15.54	Peak	102	205	P
3	5470.00	5.20	53.49	58.69	68.20	-9.51	Peak	102	205	P
4	5850.00	5.21	53.18	58.39	122.20	-63.81	Peak	102	205	P
5	5855.00	5.23	52.35	57.58	110.80	-53.22	Peak	102	205	P
6	5875.00	5.31	53.41	58.72	105.20	-46.48	Peak	102	205	P
7	5925.00	5.49	53.53	59.02	68.20	-9.18	Peak	102	205	P
8	11380.00	12.91	30.71	43.62	54.00	-10.38	Average	100	183	P
9	11380.00	12.91	42.31	55.22	74.00	-18.78	Peak	100	183	P
10	17070.00	17.93	42.25	60.18	68.20	-8.02	Peak	100	76	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor





Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 1, Band 4, CH149		:

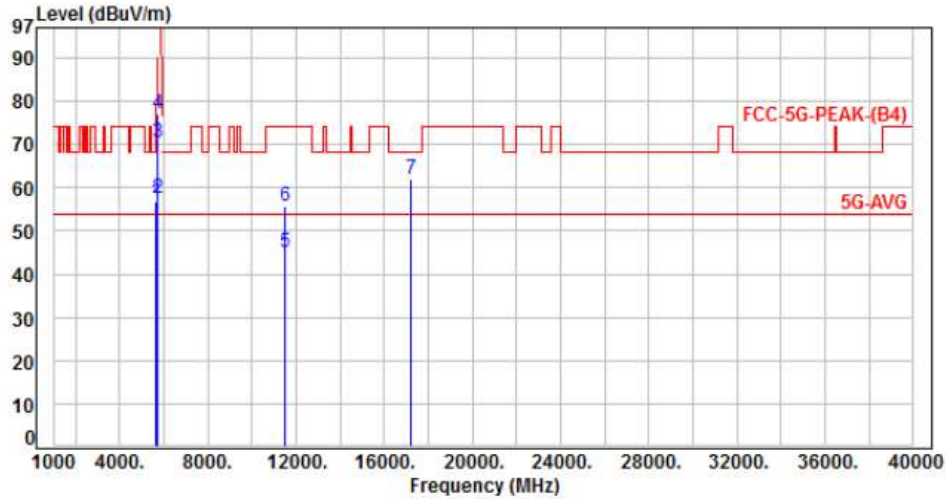


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	51.50	56.59	68.20	-11.61	Peak	248	273	P
2	5700.00	5.12	58.01	63.13	105.20	-42.07	Peak	248	273	P
3	5720.00	5.13	73.62	78.75	110.80	-32.05	Peak	248	273	P
4	5725.00	5.14	80.38	85.52	122.20	-36.68	Peak	248	273	P
5	11490.00	13.27	30.84	44.11	54.00	-9.89	Average	100	142	P
6	11490.00	13.27	41.08	54.35	74.00	-19.65	Peak	100	142	P
7	17235.00	18.83	43.55	62.38	68.20	-5.82	Peak	100	240	P

Note: Level=Reading+Factor  
Margin=Level-Limit  
Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 1, Band 4, CH149		:

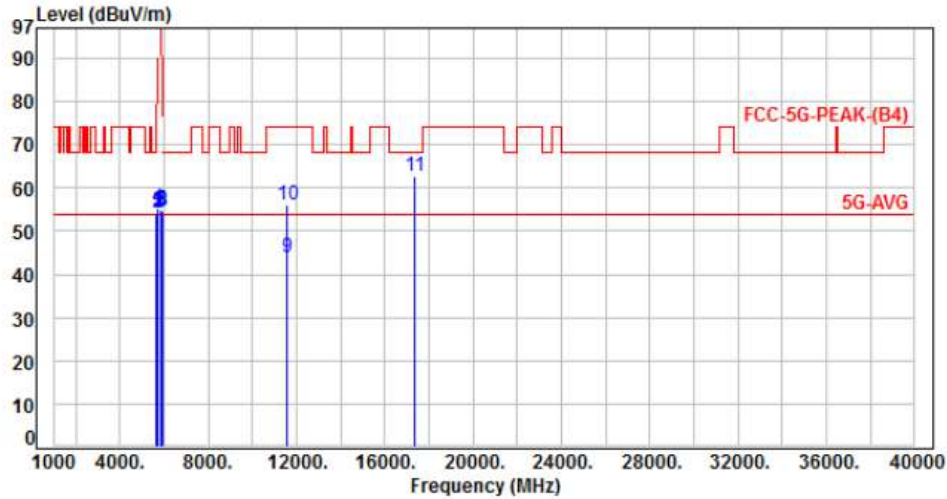


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	51.69	56.78	68.20	-11.42	Peak	119	146	P
2	5700.00	5.12	52.37	57.49	105.20	-47.71	Peak	119	146	P
3	5720.00	5.13	65.18	70.31	110.80	-40.49	Peak	119	146	P
4	5725.00	5.14	72.04	77.18	122.20	-45.02	Peak	119	146	P
5	11490.00	13.27	31.61	44.88	54.00	-9.12	Average	100	223	P
6	11490.00	13.27	42.37	55.64	74.00	-18.36	Peak	100	223	P
7	17235.00	18.83	43.25	62.08	68.20	-6.12	Peak	100	176	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 1, Band 4, CH157		:

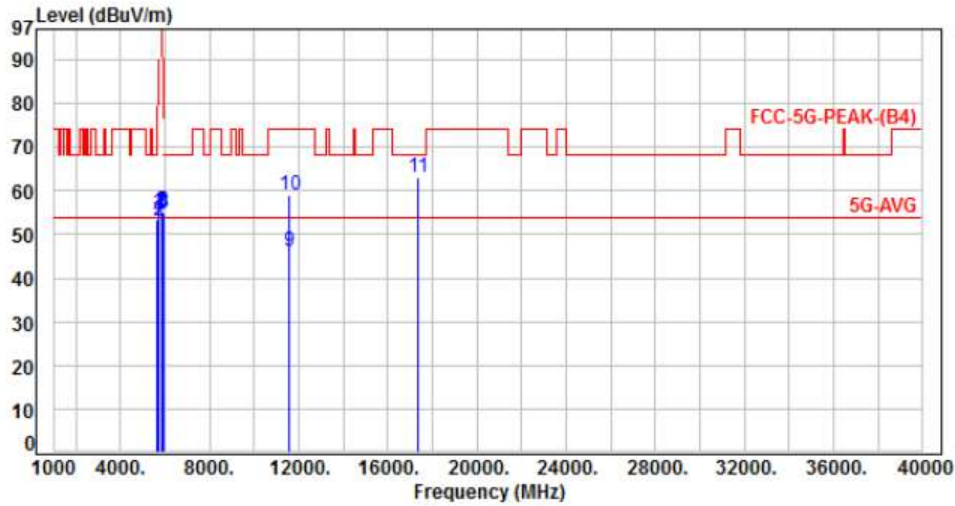


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	49.13	54.22	68.20	-13.98	Peak	224	259	P
2	5700.00	5.12	49.19	54.31	105.20	-50.89	Peak	224	259	P
3	5720.00	5.13	49.42	54.55	110.80	-56.25	Peak	224	259	P
4	5725.00	5.14	50.06	55.20	122.20	-67.00	Peak	224	259	P
5	5850.00	5.21	49.58	54.79	122.20	-67.41	Peak	224	259	P
6	5855.00	5.23	49.26	54.49	110.80	-56.31	Peak	224	259	P
7	5875.00	5.31	49.38	54.69	105.20	-50.51	Peak	224	259	P
8	5925.00	5.49	49.14	54.63	68.20	-13.57	Peak	224	259	P
9	11570.00	13.50	30.28	43.78	54.00	-10.22	Average	168	159	P
10	11570.00	13.50	42.56	56.06	74.00	-17.94	Peak	168	159	P
11	17355.00	19.47	43.22	62.69	68.20	-5.51	Peak	100	298	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 1, Band 4, CH157		:

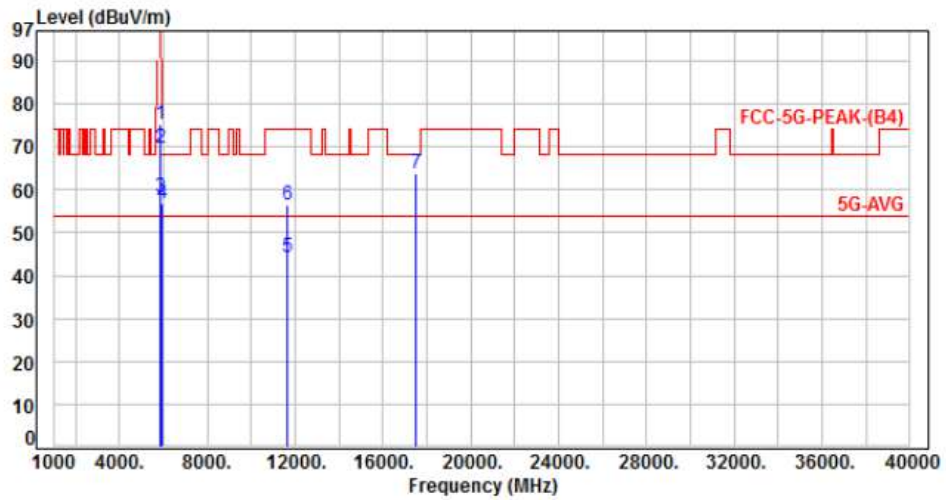


No.	Frequency (MHz)	Factor (dB)	Reading (dBUV)	Level (dBUV/m)	Limit (dBUV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	48.33	53.42	68.20	-14.78	Peak	100	146	P
2	5700.00	5.12	48.11	53.23	105.20	-51.97	Peak	100	146	P
3	5720.00	5.13	49.57	54.70	110.80	-56.10	Peak	100	146	P
4	5725.00	5.14	48.56	53.70	122.20	-68.50	Peak	100	146	P
5	5850.00	5.21	50.15	55.36	122.20	-66.84	Peak	100	146	P
6	5855.00	5.23	49.25	54.48	110.80	-56.32	Peak	100	146	P
7	5875.00	5.31	49.70	55.01	105.20	-50.19	Peak	100	146	P
8	5925.00	5.49	49.53	55.02	68.20	-13.18	Peak	100	146	P
9	11570.00	13.50	32.64	46.14	54.00	-7.86	Average	100	213	P
10	11570.00	13.50	45.39	58.89	74.00	-15.11	Peak	100	213	P
11	17355.00	19.47	43.63	63.10	68.20	-5.10	Peak	100	73	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 1, Band 4, CH165		:

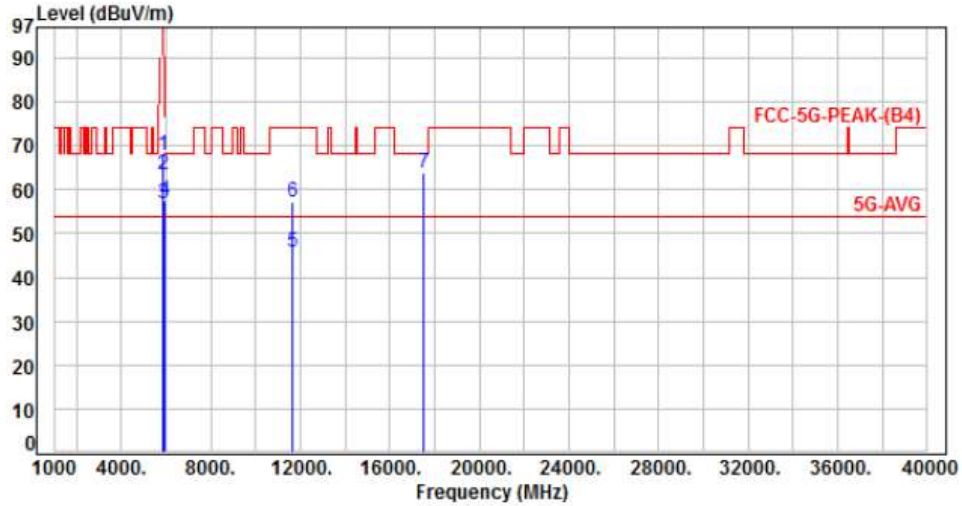


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5850.00	5.21	69.85	75.06	122.20	-47.14	Peak	224	277	P
2	5855.00	5.23	64.44	69.67	110.80	-41.13	Peak	224	277	P
3	5875.00	5.31	52.89	58.20	105.20	-47.00	Peak	224	277	P
4	5925.00	5.49	51.42	56.91	68.20	-11.29	Peak	224	277	P
5	11650.00	13.68	30.68	44.36	54.00	-9.64	Average	171	161	P
6	11650.00	13.68	42.70	56.38	74.00	-17.62	Peak	171	161	P
7	17475.00	20.39	43.29	63.68	68.20	-4.52	Peak	100	238	P

Note: Level=Reading+Factor  
Margin=Level-Limit  
Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 1, Band 4, CH165		:

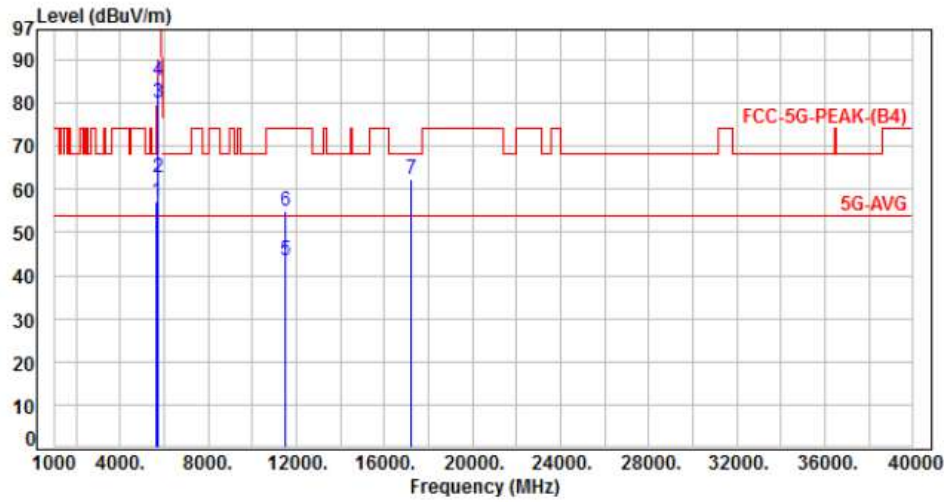


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5850.00	5.21	62.55	67.76	122.20	-54.44	Peak	102	146	P
2	5855.00	5.23	58.08	63.31	110.80	-47.49	Peak	102	146	P
3	5875.00	5.31	51.66	56.97	105.20	-48.23	Peak	102	146	P
4	5925.00	5.49	51.87	57.36	68.20	-10.84	Peak	102	146	P
5	11650.00	13.68	32.01	45.69	54.00	-8.31	Average	100	210	P
6	11650.00	13.68	43.38	57.06	74.00	-16.94	Peak	100	210	P
7	17475.00	20.39	43.28	63.67	68.20	-4.53	Peak	100	176	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 4, Band 4, CH149		:

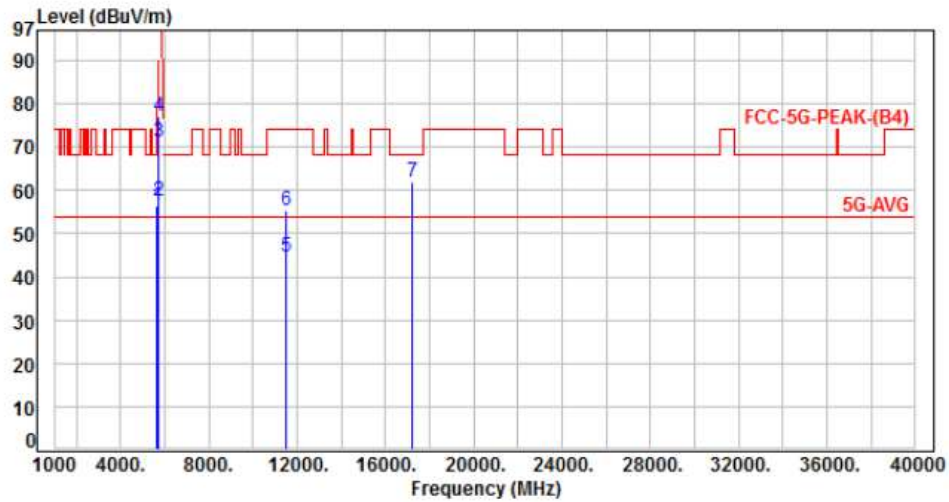


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	52.03	57.12	68.20	-11.08	Peak	240	274	P
2	5700.00	5.12	57.58	62.70	105.20	-42.50	Peak	240	274	P
3	5720.00	5.13	75.02	80.15	110.80	-30.65	Peak	240	274	P
4	5725.00	5.14	80.15	85.29	122.20	-36.91	Peak	240	274	P
5	11490.00	13.27	30.07	43.34	54.00	-10.66	Average	264	127	P
6	11490.00	13.27	41.73	55.00	74.00	-19.00	Peak	264	127	P
7	17235.00	18.83	43.58	62.41	68.20	-5.79	Peak	100	314	P

Note: Level=Reading+Factor  
Margin=Level-Limit  
Factor=Antenna Factor + cable loss - Amplifier Factor



Power	:	From POE DC48V	Pol/Phase	:	HORIZONTAL
Test Mode	:	Mode 4, Band 4, CH149		:	



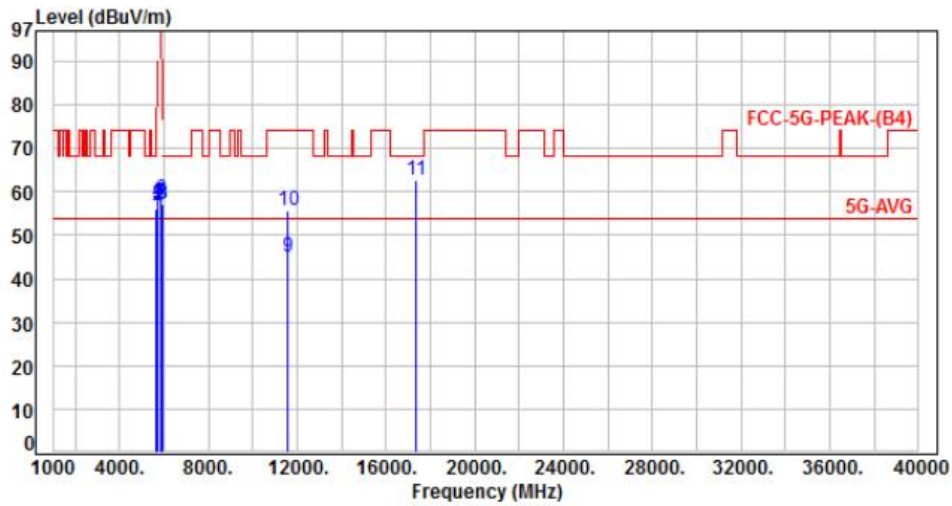
No.	Frequency (MHz)	Factor (dB)	Reading (dBUV)	Level (dBUV/m)	Limit (dBUV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	51.38	56.47	68.20	-11.73	Peak	100	143	P
2	5700.00	5.12	52.50	57.62	105.20	-47.58	Peak	100	143	P
3	5720.00	5.13	66.07	71.20	110.80	-39.60	Peak	100	143	P
4	5725.00	5.14	72.09	77.23	122.20	-44.97	Peak	100	143	P
5	11490.00	13.27	31.21	44.48	54.00	-9.52	Average	100	140	P
6	11490.00	13.27	42.20	55.47	74.00	-18.53	Peak	100	140	P
7	17235.00	18.83	43.24	62.07	68.20	-6.13	Peak	100	196	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor





Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 4, Band 4, CH157		:

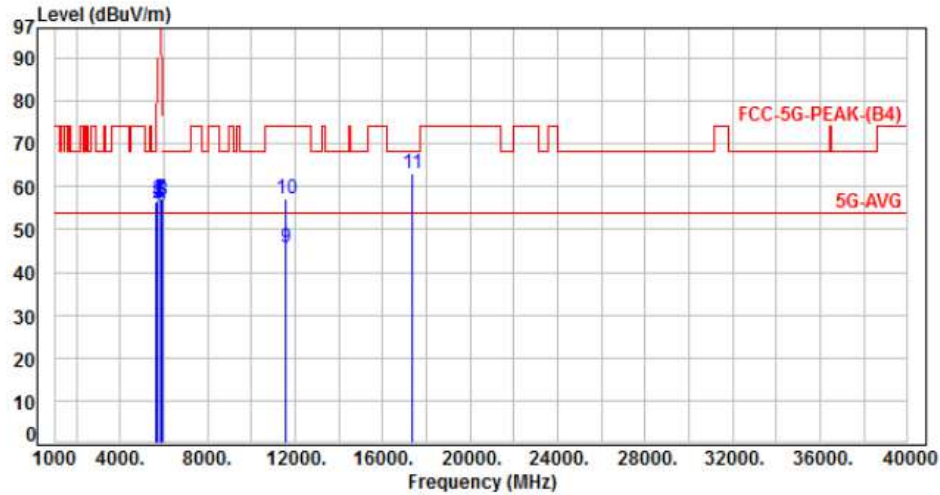


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	50.84	55.93	68.20	-12.27	Peak	230	277	P
2	5700.00	5.12	51.85	56.97	105.20	-48.23	Peak	230	277	P
3	5720.00	5.13	51.99	57.12	110.80	-53.68	Peak	230	277	P
4	5725.00	5.14	52.56	57.70	122.20	-64.50	Peak	230	277	P
5	5850.00	5.21	51.87	57.08	122.20	-65.12	Peak	230	277	P
6	5855.00	5.23	52.92	58.15	110.80	-52.65	Peak	230	277	P
7	5875.00	5.31	52.05	57.36	105.20	-47.84	Peak	230	277	P
8	5925.00	5.49	51.63	57.12	68.20	-11.08	Peak	230	277	P
9	11570.00	13.50	31.68	45.18	54.00	-8.82	Average	100	124	P
10	11570.00	13.50	42.32	55.82	74.00	-18.18	Peak	100	124	P
11	17355.00	19.47	43.08	62.55	68.20	-5.65	Peak	100	243	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 4, Band 4, CH157		:

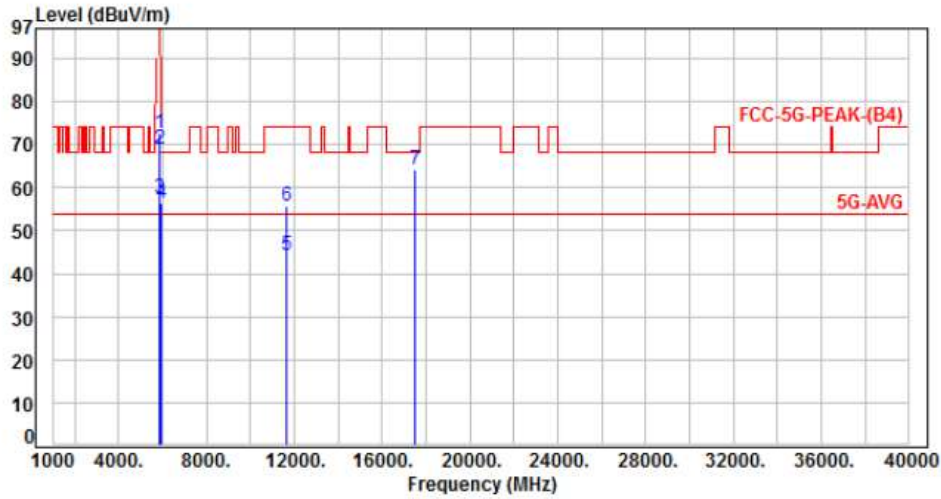


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	51.44	56.53	68.20	-11.67	Peak	107	146	P
2	5700.00	5.12	51.11	56.23	105.20	-48.97	Peak	107	146	P
3	5720.00	5.13	51.82	56.95	110.80	-53.85	Peak	107	146	P
4	5725.00	5.14	51.13	56.27	122.20	-65.93	Peak	107	146	P
5	5850.00	5.21	51.20	56.41	122.20	-65.79	Peak	107	146	P
6	5855.00	5.23	50.21	55.44	110.80	-55.36	Peak	107	146	P
7	5875.00	5.31	51.75	57.06	105.20	-48.14	Peak	107	146	P
8	5925.00	5.49	51.22	56.71	68.20	-11.49	Peak	107	146	P
9	11570.00	13.50	32.17	45.67	54.00	-8.33	Average	153	141	P
10	11570.00	13.50	43.67	57.17	74.00	-16.83	Peak	153	141	P
11	17355.00	19.47	43.47	62.94	68.20	-5.26	Peak	100	163	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 4, Band 4, CH165		:

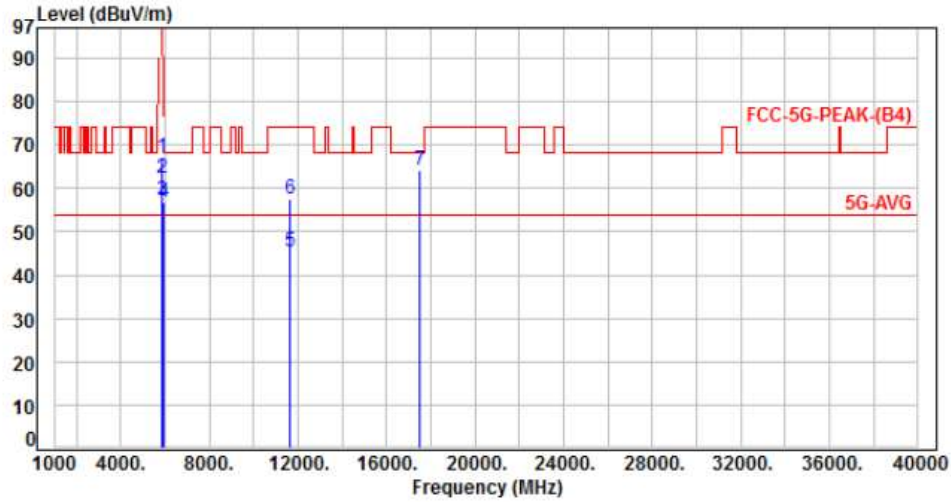


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5850.00	5.21	67.48	72.69	122.20	-49.51	Peak	232	263	P
2	5855.00	5.23	63.75	68.98	110.80	-41.82	Peak	232	263	P
3	5875.00	5.31	52.34	57.65	105.20	-47.55	Peak	232	263	P
4	5925.00	5.49	51.12	56.61	68.20	-11.59	Peak	232	263	P
5	11650.00	13.68	30.42	44.10	54.00	-9.90	Average	162	129	P
6	11650.00	13.68	42.13	55.81	74.00	-18.19	Peak	162	129	P
7	17475.00	20.39	43.69	64.08	68.20	-4.12	Peak	100	227	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 4, Band 4, CH165		:

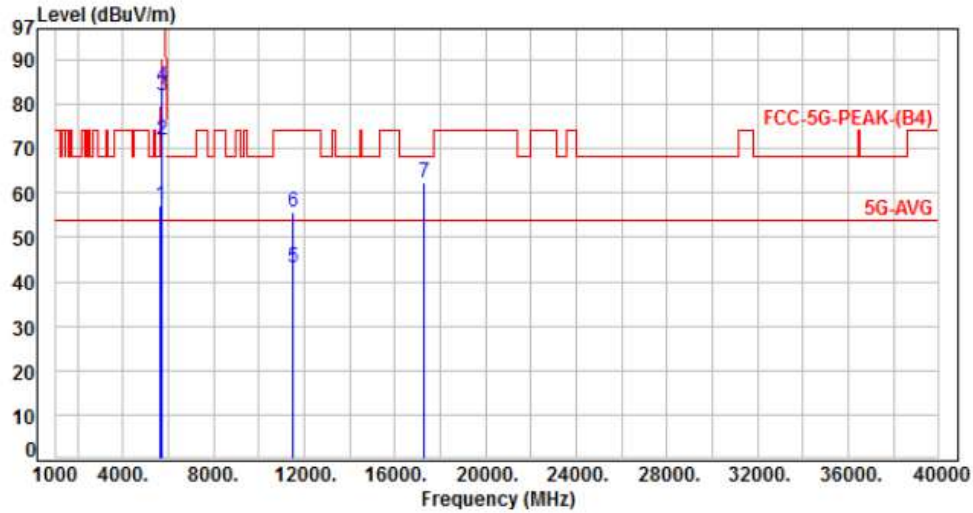


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5850.00	5.21	61.81	67.02	122.20	-55.18	Peak	100	142	P
2	5855.00	5.23	56.97	62.20	110.80	-48.60	Peak	100	142	P
3	5875.00	5.31	52.03	57.34	105.20	-47.86	Peak	100	142	P
4	5925.00	5.49	51.48	56.97	68.20	-11.23	Peak	100	142	P
5	11650.00	13.68	31.81	45.49	54.00	-8.51	Average	117	227	P
6	11650.00	13.68	43.80	57.48	74.00	-16.52	Peak	117	227	P
7	17475.00	20.39	43.76	64.15	68.20	-4.05	Peak	100	192	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 5, Band 4, CH151		:

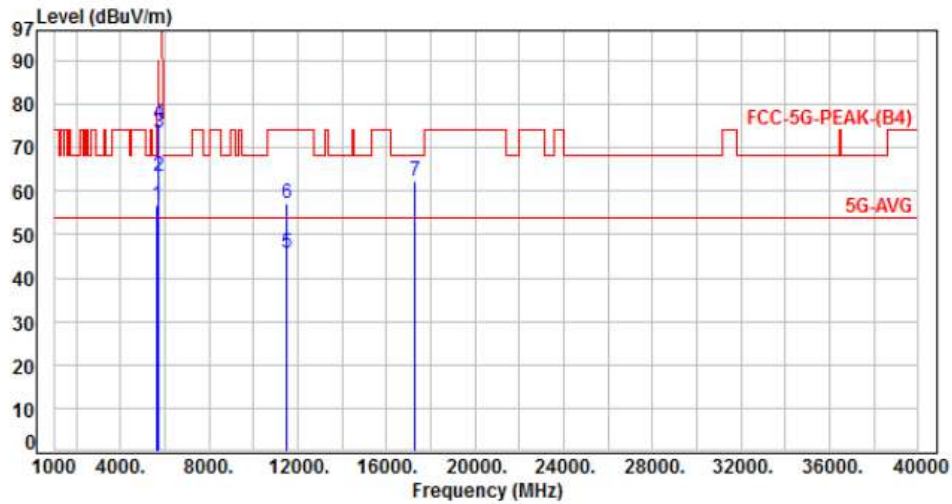


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	52.12	57.21	68.20	-10.99	Peak	229	282	P
2	5700.00	5.12	66.87	71.99	105.20	-33.21	Peak	229	282	P
3	5720.00	5.13	76.87	82.00	110.80	-28.80	Peak	229	282	P
4	5725.00	5.14	78.78	83.92	122.20	-38.28	Peak	229	282	P
5	11510.00	13.32	29.68	43.00	54.00	-11.00	Average	100	122	P
6	11510.00	13.32	42.20	55.52	74.00	-18.48	Peak	100	122	P
7	17265.00	18.96	43.26	62.22	68.20	-5.98	Peak	100	267	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 5, Band 4, CH151		:

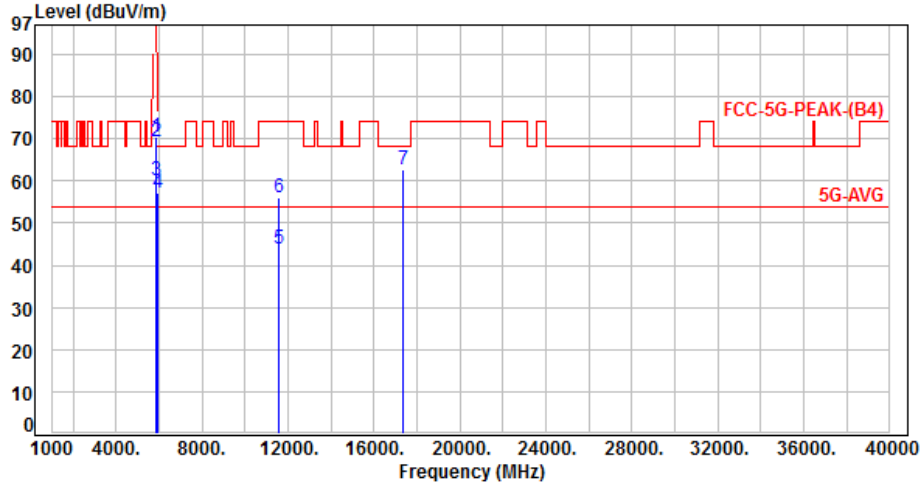


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	51.56	56.65	68.20	-11.55	Peak	112	147	P
2	5700.00	5.12	58.33	63.45	105.20	-41.75	Peak	112	147	P
3	5720.00	5.13	68.15	73.28	110.80	-37.52	Peak	112	147	P
4	5725.00	5.14	70.35	75.49	122.20	-46.71	Peak	112	147	P
5	11510.00	13.32	32.35	45.67	54.00	-8.33	Average	100	226	P
6	11510.00	13.32	44.02	57.34	74.00	-16.66	Peak	100	226	P
7	17265.00	18.96	43.36	62.32	68.20	-5.88	Peak	100	110	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 5, Band 4, CH159		

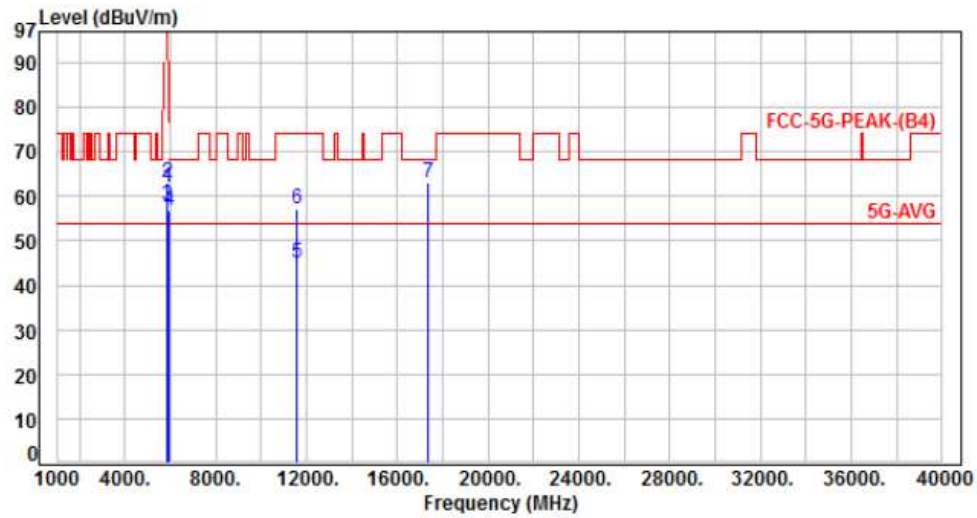


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5850.00	5.21	65.21	70.42	122.20	-51.78	Peak	213	273	P
2	5855.00	5.23	64.09	69.32	110.80	-41.48	Peak	213	273	P
3	5875.00	5.31	54.96	60.27	105.20	-44.93	Peak	213	273	P
4	5925.00	5.49	51.54	57.03	68.20	-11.17	Peak	213	273	P
5	11590.00	13.55	30.26	43.81	54.00	-10.19	Average	184	127	P
6	11590.00	13.55	42.40	55.95	74.00	-18.05	Peak	184	127	P
7	17385.00	19.66	43.21	62.87	68.20	-5.33	Peak	100	327	P

Note: Level=Reading+Factor  
Margin=Level-Limit  
Factor=Antenna Factor + cable loss - Amplifier Factor



Power	:	From POE DC48V	Pol/Phase	:	HORIZONTAL
Test Mode	:	Mode 5, Band 4, CH159		:	



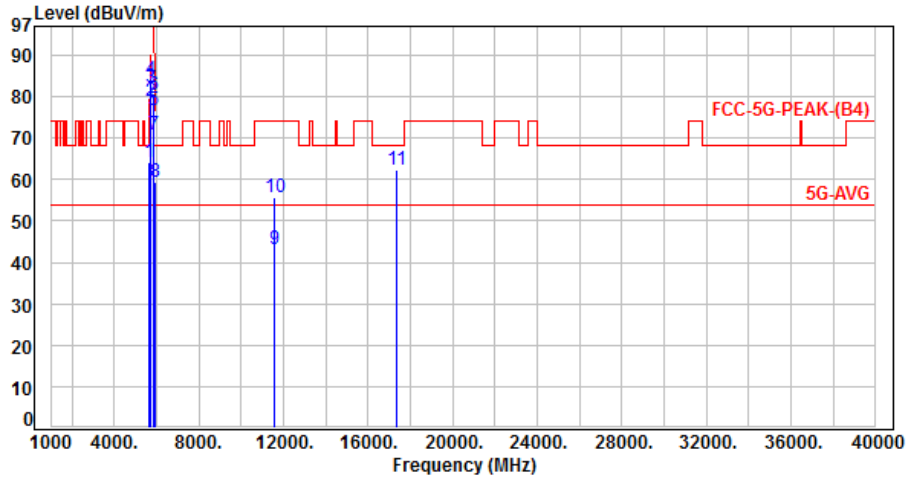
No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5850.00	5.21	56.58	61.79	122.20	-60.41	Peak	113	145	P
2	5855.00	5.23	57.85	63.08	110.80	-47.72	Peak	113	145	P
3	5875.00	5.31	52.70	58.01	105.20	-47.19	Peak	113	145	P
4	5925.00	5.49	51.46	56.95	68.20	-11.25	Peak	113	145	P
5	11590.00	13.55	31.37	44.92	54.00	-9.08	Average	298	224	P
6	11590.00	13.55	43.57	57.12	74.00	-16.88	Peak	298	224	P
7	17385.00	19.66	43.51	63.17	68.20	-5.03	Peak	100	199	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor





Power	: From POE DC48V	Pol/Phase	: VERTICAL
Test Mode	: Mode 6, Band 4, CH155		:

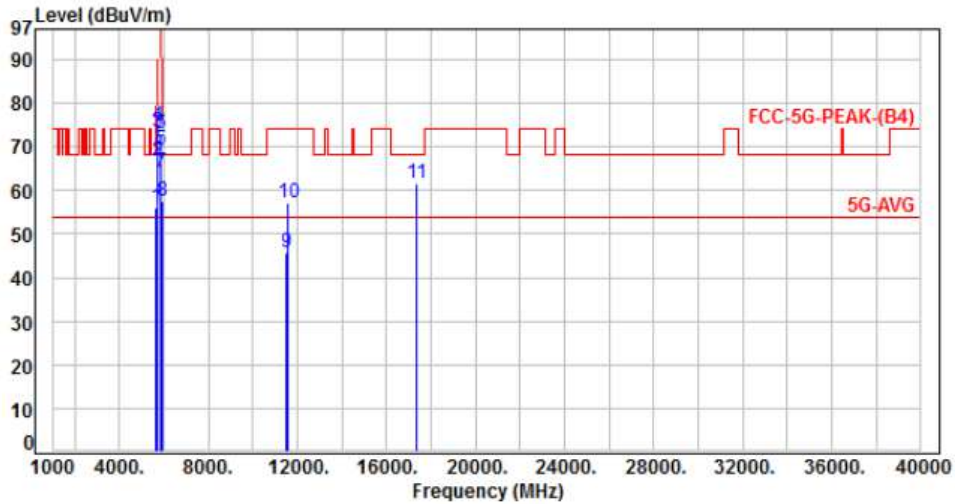


No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	59.05	64.14	68.20	-4.06	Peak	228	269	P
2	5700.00	5.12	73.74	78.86	105.20	-26.34	Peak	228	269	P
3	5720.00	5.13	76.99	82.12	110.80	-28.68	Peak	228	269	P
4	5725.00	5.14	79.07	84.21	122.20	-37.99	Peak	228	269	P
5	5850.00	5.21	71.32	76.53	122.20	-45.67	Peak	228	269	P
6	5855.00	5.23	75.28	80.51	110.80	-30.29	Peak	228	269	P
7	5875.00	5.31	65.37	70.68	105.20	-34.52	Peak	228	269	P
8	5925.00	5.49	53.73	59.22	68.20	-8.98	Peak	228	269	P
9	11550.00	13.44	29.75	43.19	54.00	-10.81	Average	266	124	P
10	11550.00	13.44	42.29	55.73	74.00	-18.27	Peak	266	124	P
11	17325.00	19.27	43.23	62.50	68.20	-5.70	Peak	100	292	P

Note: Level=Reading+Factor  
Margin=Level-Limit  
Factor=Antenna Factor + cable loss - Amplifier Factor



Power	: From POE DC48V	Pol/Phase	: HORIZONTAL
Test Mode	: Mode 6, Band 4, CH155		:



No.	Frequency (MHz)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg)	P/F
1	5650.00	5.09	51.06	56.15	68.20	-12.05	Peak	117	143	P
2	5700.00	5.12	61.78	66.90	105.20	-38.30	Peak	117	143	P
3	5720.00	5.13	68.35	73.48	110.80	-37.32	Peak	117	143	P
4	5725.00	5.14	69.87	75.01	122.20	-47.19	Peak	117	143	P
5	5850.00	5.21	64.29	69.50	122.20	-52.70	Peak	117	143	P
6	5855.00	5.23	67.69	72.92	110.80	-37.88	Peak	117	143	P
7	5875.00	5.31	58.84	64.15	105.20	-41.05	Peak	117	143	P
8	5925.00	5.49	52.16	57.65	68.20	-10.55	Peak	117	143	P
9	11500.00	13.30	32.31	45.61	54.00	-8.39	Average	100	224	P
10	11550.00	13.44	43.70	57.14	74.00	-16.86	Peak	100	224	P
11	17325.00	19.27	42.41	61.68	68.20	-6.52	Peak	100	257	P

Note: Level=Reading+Factor  
 Margin=Level-Limit  
 Factor=Antenna Factor + cable loss - Amplifier Factor



### 6.7. Restricted Bands of Operation

Only spurious emissions are permitted in any of the frequency bands listed below:

MHz	MHz	MHz	GHz
0.09000 – 0.11000	16.42000 – 16.42300	399.9 – 410.0	4.500 – 5.150
0.49500 – 0.505**	16.69475 – 16.69525	608.0 – 614.0	5.350 – 5.460
2.17350 – 2.19050	16.80425 – 16.80475	960.0 – 1240.0	7.250 – 7.750
4.12500 – 4.12800	25.50000 – 25.67000	1300.0 – 1427.0	8.025 – 8.500
4.17725 – 4.17775	37.50000 – 38.25000	1435.0 – 1626.5	9.000 – 9.200
4.20725 – 4.20775	73.00000 – 74.60000	1645.5 – 1646.5	9.300 – 9.500
6.21500 – 6.21800	74.80000 – 75.20000	1660.0 – 1710.0	10.600 – 12.700
6.26775 – 6.26825	108.00000 – 121.94000	1718.8 – 1722.2	13.250 – 13.400
6.31175 – 6.31225	123.00000 – 138.00000	2200.0 – 2300.0	14.470 – 14.500
8.29100 – 8.29400	149.90000 – 150.05000	2310.0 – 2390.0	15.350 – 16.200
8.36200 – 8.36600	156.52475 – 156.52525	2483.5 – 2500.0	17.700 – 21.400
8.37625 – 8.38675	156.70000 – 156.90000	2655.0 – 2900.0	22.010 – 23.120
8.41425 – 8.41475	162.01250 – 167.17000	3260.0 – 3267.0	23.600 – 24.000
12.29000 – 12.29300	167.72000 – 173.20000	3332.0 – 3339.0	31.200 – 31.800
12.51975 – 12.52025	240.00000 – 285.00000	3345.8 – 3358.0	36.430 – 36.500
12.57675 – 12.57725	322.00000 – 335.40000	3600.0 – 4400.0	Above 38.6
13.36000 – 13.41000			

\*\* : Until February 1, 1999, this restricted band shall be 0.490-0.510 MHz



## 7. On Time, Duty Cycle and Measurement methods

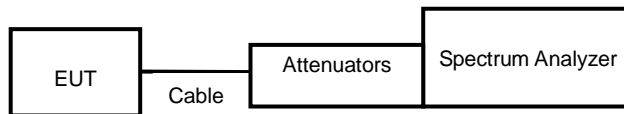
### 7.1. Test Limit

None; for reporting purposes only.

### 7.2. Test Procedure

KDB 789033 Zero-Span Spectrum Analyzer Method.

### 7.3. Test Setup Layout



### 7.4. Test Result and Data

Modulation Type	On Time (ms)	Period Time (ms)	Duty Cycle (%)
802.11a,6M	100.00	100.00	100.00%
802.11n HT20	100.00	100.00	100.00%
802.11n HT40	100.00	100.00	100.00%
802.11ac VHT20	100.00	100.00	100.00%
802.11ac VHT40	100.00	100.00	100.00%
802.11ac VHT80	100.00	100.00	100.00%

### 7.5. Measurement Methods

26 dB and 6dB Emission BW	KDB 789033 D02 v02r01, Section C
99% Occupied BW	KDB 789033 D02 v02r01, Section D
Conducted Output Power	KDB 789033 D02 v02r01, Section E.2.d and E.3.b (Method PM-G)
Power Spectral Density	KDB 789033 D02 v02r01, Section F
Unwanted emissions in restricted bands	KDB 789033 D02 v02r01, Sections G and H
Unwanted emissions in non-restricted bands	KDB 789033 D02 v02r01, Sections G and H



Modulation Type: 802.11a (6Mbps)



Modulation Type: 802.11ac VHT20 (6.5Mbps)



Modulation Type: 802.11n HT20 (6.5Mbps)



Modulation Type: 802.11ac VHT40 (13.5Mbps)



Modulation Type: 802.11n HT40 (13.5Mbps)



Modulation Type: 802.11ac VHT80 (29.3Mbps)





## 8. 6dB Bandwidth & 99% Occupied Bandwidth

### 8.1. Test Limit

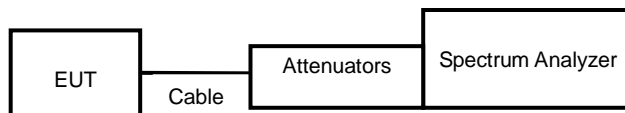
FCC §15.407

The minimum 6 dB bandwidth shall be at least 500 kHz.

### 8.2. Test Procedure

Reference to 789033 D02 General UNII Test Procedures New Rules v01: The transmitter output is connected to a spectrum analyzer with the RBW set to 100KHz, the VBW  $\geq 3 \times$  RBW, peak detector and max hold.

### 8.3. Test Setup Layout





**8.4. Test Result and Data (6dB Bandwidth)**

In the 5.8G Band

Modulation Type	Channel	Frequency (MHz)	6dB Bandwidth(MHz)	Minimum Limit (MHz)
			ANT A	
11a	149	5745	16.35	0.50
11a	157	5785	16.35	0.50
11a	165	5825	16.35	0.50
11ac VHT20	149	5745	17.55	0.50
11ac VHT20	157	5785	17.55	0.50
11ac VHT20	165	5825	17.58	0.50
11ac VHT40	151	5755	35.16	0.50
11ac VHT40	159	5795	35.16	0.50
11ac VHT80	155	5775	75.12	0.50

UNII Emission Bandwidth Result (Extends across 5725MHz band)			
Modulation Type	Data Rate / MCS	Frequency (MHz)	6dB Bandwidth(MHz)
			ANT A
11a	6 Mbps	5720	3.22
11n HT20	MCS 0	5720	3.84
11n HT40	MCS 0	5710	2.75
11ac VHT20	NSS1-MCS0	5720	3.82
11ac VHT40	NSS1-MCS0	5710	2.73
11ac VHT80	NSS1-MCS0	5690	2.70



**8.5. Test Result and Data (99% Occupied Bandwidth)**

In the 5.8G Band

Modulation Type	Channel	Frequency (MHz)	99% Bandwidth(MHz)
			ANT A
11a	149	5745	19.43
11a	157	5785	20.20
11a	165	5825	21.70
11ac VHT20	149	5745	20.07
11ac VHT20	157	5785	20.47
11ac VHT20	165	5825	21.76
11ac VHT40	151	5755	39.41
11ac VHT40	159	5795	39.02
11ac VHT80	155	5775	76.61

UNII Emission Bandwidth Result (Extends across 5725MHz band)			
Modulation Type	Data Rate / MCS	Frequency (MHz)	99% Bandwidth(MHz)
			ANT A
11a	6 Mbps	5720	11.53
11n HT20	MCS 0	5720	13.25
11n HT40	MCS 0	5710	25.83
11ac VHT20	NSS1-MCS0	5720	12.40
11ac VHT40	NSS1-MCS0	5710	24.86
11ac VHT80	NSS1-MCS0	5690	46.83





6dB Bandwidth  
Modulation Type: 802.11a (6Mbps)  
CH149

Modulation Type: 802.11ac, VHT20 (6.5Mbps)  
CH149



CH157



CH157



CH165



CH165





6dB Bandwidth  
Modulation Type: 802.11ac, VHT40 (13.5Mbps)  
CH151

Modulation Type: 802.11ac, VHT80 (29.3Mbps)  
CH155



CH159





6dB Bandwidth  
Extends across 5725MHz Band, Straddle Channel

Modulation Type: 802.11a (6Mbps)  
CH144

802.11ac VHT20 (6.5Mbps)  
CH144



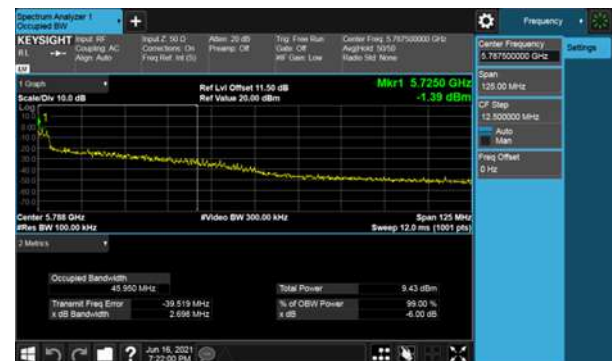
Modulation Type: 802.11n HT20 (6.5Mbps)  
CH144

Modulation Type: 802.11ac VHT40 (29.3Mbps)  
CH142



Modulation Type: 802.11n HT40 (13.5Mbps)  
CH142

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138

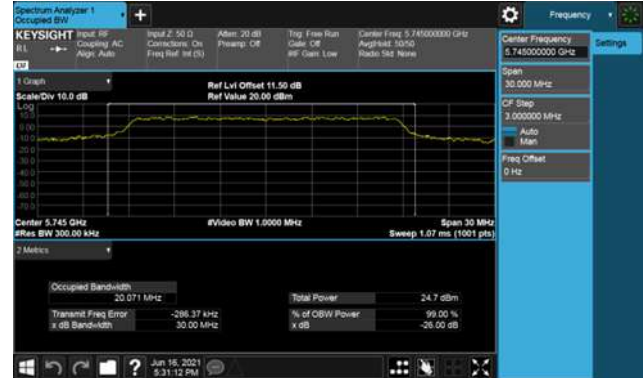




99% Occupied Bandwidth  
Modulation Type: 802.11a (6Mbps)  
CH149



Modulation Type: 802.11ac, VHT20 (6.5Mbps)  
CH149



CH157



CH157



CH165



CH165





99% Occupied Bandwidth  
Modulation Type: 802.11ac, VHT40 (13.5Mbps)  
CH151

Modulation Type: 802.11ac, VHT80 (29.3Mbps)  
CH155



CH159



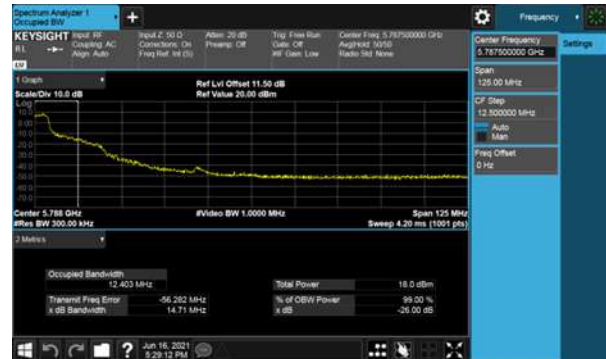


99% Bandwidth

Extends across 5725MHz Band, Straddle Channel

Modulation Type: 802.11a (6Mbps)  
CH144

802.11ac VHT20 (6.5Mbps)  
CH144



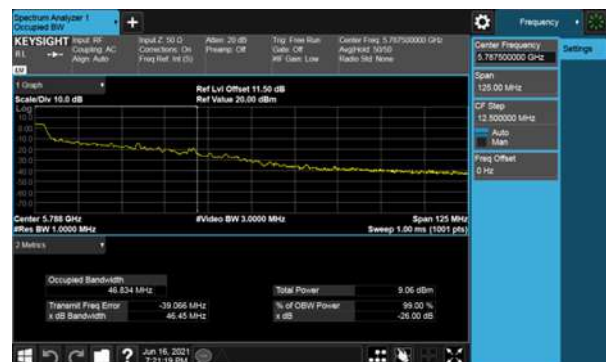
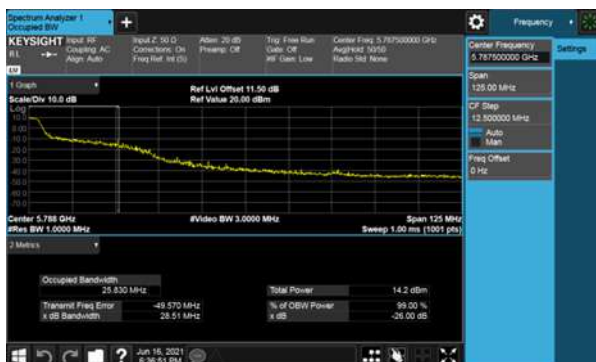
Modulation Type: 802.11n HT20 (6.5Mbps)  
CH144

Modulation Type: 802.11ac VHT40 (29.3Mbps)  
CH142



Modulation Type: 802.11n HT40 (13.5Mbps)  
CH142

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138





## 9. 26dB Bandwidth & 99% Occupied Bandwidth

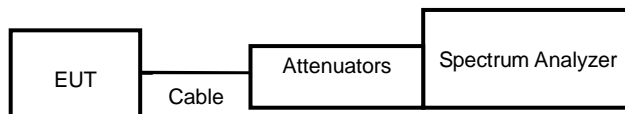
### 9.1. Test Limit

None; for reporting purposes only.

### 9.2. Test Procedure

Reference to 789033 D02 General UNII Test Procedures New Rules v01: The transmitter output is connected to a spectrum analyzer with the RBW = approximately 1% of the emission bandwidth, the VBW  $\geq 3 \times$  RBW, peak detector and max hold.

### 9.3. Test Setup Layout





### 9.4. Test Result and Data (26dB Bandwidth)

In the 5.2G Band

Mode	Channel	Frequency (MHz)	26dB Bandwidth(MHz)
			ANT A
11a	36	5180	30.93
11a	40	5200	30.89
11a	48	5240	29.21
11ac VHT20	36	5180	33.31
11ac VHT20	40	5200	33.07
11ac VHT20	48	5240	33.07
11ac VHT40	38	5190	49.80
11ac VHT40	46	5230	53.61
11ac VHT80	42	5210	91.87

In the 5.3G Band

Mode	Channel	Frequency (MHz)	26dB Bandwidth(MHz)
			ANT A
11a	52	5260	30.71
11a	60	5300	28.89
11a	64	5320	27.10
11ac VHT20	52	5260	28.48
11ac VHT20	60	5300	31.42
11ac VHT20	64	5320	28.05
11ac VHT40	54	5270	51.83
11ac VHT40	62	5310	51.72
11ac VHT80	58	5290	91.99

In the 5.5G Band

Mode	Channel	Frequency (MHz)	26dB Bandwidth(MHz)
			ANT A
11a	100	5500	25.68
11a	116	5580	33.23
11a	140	5700	27.16
11ac VHT20	100	5500	22.90
11ac VHT20	116	5580	33.78
11ac VHT20	140	5700	29.31
11ac VHT40	102	5510	45.16
11ac VHT40	110	5550	65.36
11ac VHT40	134	5670	60.40
11ac VHT80	106	5530	85.07
11ac VHT80	122	5610	85.49





UNII Emission Bandwidth Result (Within 5470-5725MHz band)			
Modulation Type	Data Rate / MCS	Frequency (MHz)	26dB Bandwidth(MHz)
			ANT A
11a	6 Mbps	5720	23.92
11n HT20	MCS 0	5720	25.91
11n HT40	MCS 0	5710	54.77
11ac VHT20	NSS1-MCS0	5720	25.03
11ac VHT40	NSS1-MCS0	5710	51.34
11ac VHT80	NSS1-MCS0	5690	92.49

**9.5. Test Result and Data (99% Occupied Bandwidth)**

In the 5.2G Band

Modulation Type	Channel	Frequency (MHz)	99% Bandwidth(MHz)
			ANT A
11a	36	5180	17.50
11a	40	5200	17.75
11a	48	5240	17.73
11ac VHT20	36	5180	18.33
11ac VHT20	40	5200	18.34
11ac VHT20	48	5240	18.36
11ac VHT40	38	5190	37.19
11ac VHT40	46	5230	37.27
11ac VHT80	42	5210	75.01

In the 5.3G Band

Modulation Type	Channel	Frequency (MHz)	99% Bandwidth(MHz)
			ANT A
11a	52	5260	17.64
11a	60	5300	17.50
11a	64	5320	17.43
11ac VHT20	52	5260	18.32
11ac VHT20	60	5300	18.29
11ac VHT20	64	5320	18.28
11ac VHT40	54	5270	37.27
11ac VHT40	62	5310	37.25
11ac VHT80	58	5290	75.04

In the 5.5G Band

Modulation Type	Channel	Frequency (MHz)	99% Bandwidth(MHz)
			ANT A
11a	100	5500	17.26
11a	116	5580	17.82
11a	140	5700	17.37
11ac VHT20	100	5500	18.20
11ac VHT20	116	5580	18.51
11ac VHT20	140	5700	18.21
11ac VHT40	102	5510	36.91
11ac VHT40	110	5550	37.44
11ac VHT40	134	5670	37.21
11ac VHT80	106	5530	74.96
11ac VHT80	122	5610	74.93



UNII Emission Bandwidth Result (Within 5470-5725MHz band)			
Modulation Type	Data Rate / MCS	Frequency (MHz)	99% Bandwidth(MHz)
			ANT A
11a	6 Mbps	5720	16.34
11n HT20	MCS 0	5720	17.13
11n HT40	MCS 0	5710	35.26
11ac VHT20	NSS1-MCS0	5720	17.89
11ac VHT40	NSS1-MCS0	5710	35.35
11ac VHT80	NSS1-MCS0	5690	72.70



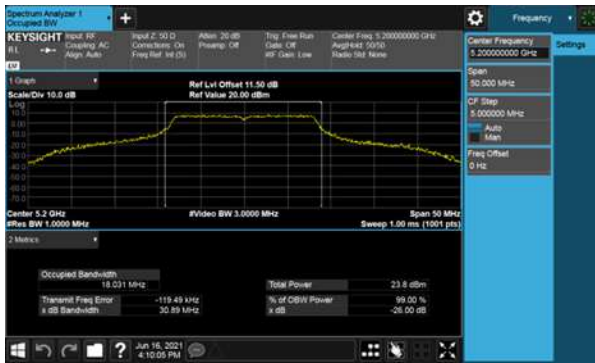
26dB Bandwidth Band 1  
Modulation Type: 802.11a (6Mbps)  
CH36

802.11ac VHT20 (6.5Mbps)  
CH36



CH40

CH40



CH48

CH48





26dB Bandwidth Band 1

Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH38

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH42



CH46





26dB Bandwidth Band 2  
Modulation Type: 802.11a (6Mbps)  
CH52

802.11ac VHT20 (6.5Mbps)  
CH52



CH60

CH60



CH64

CH64





26dB Bandwidth Band 2

Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH54

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH58



CH62





26dB Bandwidth Band 3  
Modulation Type: 802.11a (6Mbps)  
CH100

802.11ac VHT20 (6.5Mbps)  
CH100



CH116

CH116



CH140

CH140



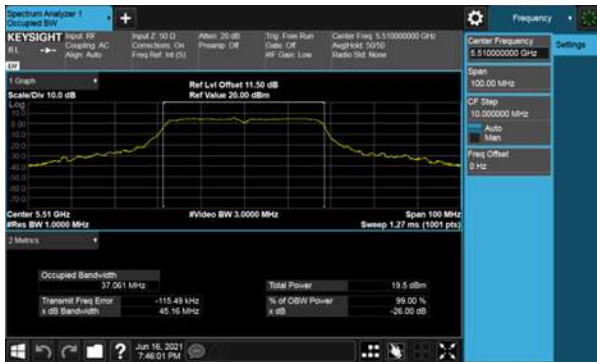




26dB Bandwidth Band 3

Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH102

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH102



CH110



CH122



CH134





26dB Bandwidth

Within 5470-5725MHz Band, Straddle Channel

Modulation Type: 802.11a (6Mbps)  
CH144

802.11ac VHT20 (6.5Mbps)  
CH144



Modulation Type: 802.11n HT20 (6.5Mbps)  
CH144

Modulation Type: 802.11ac VHT40 (29.3Mbps)  
CH142



Modulation Type: 802.11n HT40 (13.5Mbps)  
CH142

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138





99% Bandwidth Band 1  
Modulation Type: 802.11a (6Mbps)  
CH36

802.11ac VHT20 (6.5Mbps)  
CH36



CH40

CH40



CH48

CH48





99% Bandwidth Band 1

Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH38

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH42



CH46





99% Bandwidth Band 2  
Modulation Type: 802.11a (6Mbps)  
CH52

802.11ac VHT20 (6.5Mbps)  
CH52



CH60

CH60



CH64

CH64





99% Bandwidth Band 2

Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH54

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH58



CH62





99% Bandwidth Band 3  
Modulation Type: 802.11a (6Mbps)  
CH100

802.11ac VHT20 (6.5Mbps)  
CH100



CH116

CH116



CH140

CH140





99% Bandwidth Band 3

Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH102

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH102



CH110



CH122



CH134







99% Bandwidth

Within 5470-5725MHz Band, Straddle Channel

Modulation Type: 802.11a (6Mbps)  
CH144

802.11ac VHT20 (6.5Mbps)  
CH144



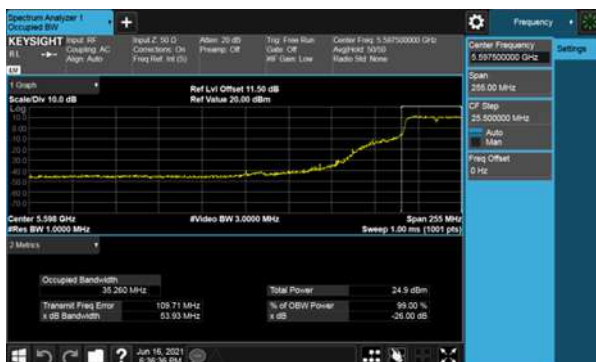
Modulation Type: 802.11n HT20 (6.5Mbps)  
CH144

Modulation Type: 802.11ac VHT40 (29.3Mbps)  
CH142



Modulation Type: 802.11n HT40 (13.5Mbps)  
CH142

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138





## 10. Average Power

### 10.1. Test Limit

**Output Power:**

Frequency Band	Limit	
<input checked="" type="checkbox"/> 5.15~5.25GHz		
Operating Mode		
<input type="checkbox"/>	Outdoor access point	The maximum conducted output power over the frequency band of operation shall not exceed 1 W (30dBm) provided the maximum antenna gain does not exceed 6 dBi. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. The maximum e.i.r.p. at any elevation angle above 30degrees as measured from the horizon must not exceed 125 mW (21 dBm).
<input type="checkbox"/>	Indoor access point	The maximum conducted output power over the frequency band of operation shall not exceed 1 W (30dBm) provided the maximum antenna gain does not exceed 6 dBi. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.
<input type="checkbox"/>	Fixed point-to-point access points	The maximum conducted output power over the frequency band of operation shall not exceed 1 W (30dBm). Fixed point-to-point U-NII devices may employ antennas with directional gain up to 23 dBi without any corresponding reduction in the maximum conducted output power or maximum power spectral density. For fixed point-to-point transmitters that employ a directional antenna gain greater than 23 dBi, a 1 dB reduction in maximum conducted output power and maximum power spectral density is required for each 1 dB of antenna gain in excess of 23 dBi.
<input checked="" type="checkbox"/>	client devices	The maximum conducted output power over the frequency band of operation shall not exceed 250 mW (24dBm) provided the maximum antenna gain does not exceed 6 dBi. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

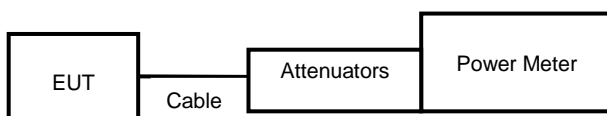


Frequency Band	Limit
<input checked="" type="checkbox"/> 5.25-5.35 GHz	The maximum conducted output power over the frequency bands of operation shall not exceed the lesser of 250 mW (24dBm) or 11 dBm 10 log B, where B is the 26 dB emission bandwidth in megahertz. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.
<input checked="" type="checkbox"/> 5.470-5.725 GHz	
<input checked="" type="checkbox"/> 5.725~5.85 GHz	

### 10.2.Test Procedure

The transmitter output is connected to a power meter.  
The cable assembly insertion loss of 11.5 dB (including 10 dB pad and 1.5 dB cable) was entered as an offset in the power meter to allow for direct reading of power.

### 10.3.Test Setup Layout





10.4. Test Result and Data

Modulation Type	Data Rate	Setting	Channel	Frequency (MHz)	Measured value of each antenna port (dBm)	Total power (dBm)	Total power (mW)	FCC Limit (dBm)
					ANT A			
11a	6 Mbps	16.5	36	5180	15.91	15.91	38.994	24.00
11a	6 Mbps	16.5	40	5200	16.15	16.15	41.210	24.00
11a	6 Mbps	16.5	48	5240	16.12	16.12	40.926	24.00
11n HT20	MCS 0	16.5	36	5180	16.15	16.15	41.210	24.00
11n HT20	MCS 0	16.5	40	5200	16.19	16.19	41.591	24.00
11n HT20	MCS 0	16.5	48	5240	16.14	16.14	41.115	24.00
11n HT40	MCS 0	15	38	5190	14.58	14.58	28.708	24.00
11n HT40	MCS 0	16.5	46	5230	16.09	16.09	40.644	24.00
11ac VHT20	NSS1-MCS0	16.5	36	5180	16.17	16.17	41.400	24.00
11ac VHT20	NSS1-MCS0	16.5	40	5200	16.21	16.21	41.783	24.00
11ac VHT20	NSS1-MCS0	16.5	48	5240	16.18	16.18	41.495	24.00
11ac VHT40	NSS1-MCS0	15	38	5190	14.61	14.61	28.907	24.00
11ac VHT40	NSS1-MCS0	16.5	46	5230	16.12	16.12	40.926	24.00
11ac VHT80	NSS1-MCS0	14.5	42	5210	14.71	14.71	29.580	24.00



Modulation Type	Data Rate	Setting	Channel	Frequency (MHz)	Measured value of each antenna port (dBm)	Total power (dBm)	Total power (mW)	FCC Limit (dBm)
					ANT A			
11a	6 Mbps	16.5	52	5260	16.16	16.16	41.305	24.00
11a	6 Mbps	16.5	60	5300	16.22	16.22	41.879	24.00
11a	6 Mbps	16.5	64	5320	16.21	16.21	41.783	24.00
11n HT20	MCS 0	16.5	52	5260	16.20	16.20	41.687	24.00
11n HT20	MCS 0	16.5	60	5300	16.24	16.24	42.073	24.00
11n HT20	MCS 0	16.5	64	5320	16.25	16.25	42.170	24.00
11n HT40	MCS 0	16.5	54	5270	16.11	16.11	40.832	24.00
11n HT40	MCS 0	14.5	62	5310	14.52	14.52	28.314	24.00
11ac VHT20	NSS1-MCS0	16.5	52	5260	16.21	16.21	41.783	24.00
11ac VHT20	NSS1-MCS0	16.5	60	5300	16.26	16.26	42.267	24.00
11ac VHT20	NSS1-MCS0	16.5	64	5320	16.27	16.27	42.364	24.00
11ac VHT40	NSS1-MCS0	16.5	54	5270	16.13	16.13	41.020	24.00
11ac VHT40	NSS1-MCS0	14.5	62	5310	14.55	14.55	28.510	24.00
11ac VHT80	NSS1-MCS0	14	58	5290	13.93	13.93	24.717	24.00



Modulation Type	Data Rate	Setting	Channel	Frequency (MHz)	Measured value of each antenna port (dBm)	Total power (dBm)	Total power (mW)	FCC Limit (dBm)
					ANT A			
11a	6 Mbps	14.5	100	5500	14.71	14.71	29.580	24.00
11a	6 Mbps	17.5	116	5580	16.61	16.61	45.814	24.00
11a	6 Mbps	15.5	140	5700	15.88	15.88	38.726	24.00
11n HT20	MCS 0	15	100	5500	15.45	15.45	35.075	24.00
11n HT20	MCS 0	17.5	116	5580	16.57	16.57	45.394	24.00
11n HT20	MCS 0	15	140	5700	15.49	15.49	35.400	24.00
11n HT40	MCS 0	11	102	5510	11.84	11.84	15.276	24.00
11n HT40	MCS 0	17	110	5550	16.10	16.10	40.738	24.00
11n HT40	MCS 0	17.5	134	5670	16.72	16.72	46.989	24.00
11ac VHT20	NSS1-MCS0	15	100	5500	15.49	15.49	35.400	24.00
11ac VHT20	NSS1-MCS0	17.5	116	5580	16.59	16.59	45.604	24.00
11ac VHT20	NSS1-MCS0	15	140	5700	15.51	15.51	35.563	24.00
11ac VHT40	NSS1-MCS0	11	102	5510	11.86	11.86	15.346	24.00
11ac VHT40	NSS1-MCS0	17	110	5550	16.12	16.12	40.926	24.00
11ac VHT40	NSS1-MCS0	17.5	134	5670	16.74	16.74	47.206	24.00
11ac VHT80	NSS1-MCS0	12.5	106	5530	12.68	12.68	18.535	24.00
11ac VHT80	NSS1-MCS0	17.5	122	5610	16.48	16.48	44.463	24.00



FCC Maximum Conducted Output Power (Within 5470-5725MHz band) RF Output Power(dBm)								
Modulation Type	Data Rate	Frequency (MHz)	W/O Duty Factor Measured value of each antenna port (dBm)	W/O duty factor Total power (dBm)	Duty Factor (dB)	With duty factor Total power (mW)	With duty factor Total power (dBm)	FCC Limit (dBm)
			ANT A					
11a	6M	5720	16.44	16.44	0.00	44.055	16.44	24.00
11n HT20	MCS0	5720	16.30	16.30	0.00	42.658	16.30	24.00
11n HT40	MCS0	5710	16.99	16.99	0.00	50.003	16.99	24.00
11ac VHT20	NSS1-MCS0	5720	16.35	16.35	0.00	43.152	16.35	24.00
11ac VHT40	NSS1-MCS0	5710	17.11	17.11	0.00	51.404	17.11	24.00
11ac VHT80	NSS1-MCS0	5690	17.16	17.16	0.00	52.000	17.16	24.00

FCC Maximum Conducted Output Power (Extends across 5725MHz band) RF Output Power(dBm)								
Modulation Type	Data Rate	Frequency (MHz)	W/O Duty Factor Measured value of each antenna port (dBm)	W/O duty factor Total power (dBm)	Duty Factor (dB)	With duty factor Total power (mW)	With duty factor Total power (dBm)	FCC Limit (dBm)
			ANT A					
11a	6M	5720	10.74	10.74	0.00	11.858	10.74	30.00
11n HT20	MCS0	5720	11.08	11.08	0.00	12.823	11.08	30.00
11n HT40	MCS0	5710	6.23	6.23	0.00	4.198	6.23	30.00
11ac VHT20	NSS1-MCS0	5720	11.12	11.12	0.00	12.942	11.12	30.00
11ac VHT40	NSS1-MCS0	5710	6.34	6.34	0.00	4.305	6.34	30.00
11ac VHT80	NSS1-MCS0	5690	1.32	1.32	0.00	1.355	1.32	30.00



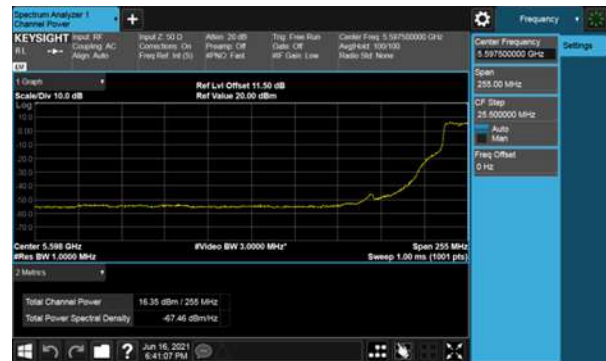
Modulation Type	Data Rate	Setting	Channel	Frequency (MHz)	Measured value of each antenna port (dBm)	Total power (dBm)	Total power (mW)	FCC Limit (dBm)
					ANT A			
11a	6 Mbps	18.5	149	5745	17.47	17.47	55.847	30.00
11a	6 Mbps	18.5	157	5785	17.26	17.26	53.211	30.00
11a	6 Mbps	19	165	5825	17.36	17.36	54.450	30.00
11n HT20	MCS 0	18.5	149	5745	17.49	17.49	56.105	30.00
11n HT20	MCS 0	18.5	157	5785	17.32	17.32	53.951	30.00
11n HT20	MCS 0	19	165	5825	17.38	17.38	54.702	30.00
11n HT40	MCS 0	18.5	151	5755	17.25	17.25	53.088	30.00
11n HT40	MCS 0	18.5	159	5795	17.14	17.14	51.761	30.00
11ac VHT20	NSS1-MCS0	18.5	149	5745	17.51	<b>17.51</b>	56.364	30.00
11ac VHT20	NSS1-MCS0	18.5	157	5785	17.34	17.34	54.200	30.00
11ac VHT20	NSS1-MCS0	19	165	5825	17.41	17.41	55.081	30.00
11ac VHT40	NSS1-MCS0	18.5	151	5755	17.29	17.29	53.580	30.00
11ac VHT40	NSS1-MCS0	18.5	159	5795	17.17	17.17	52.119	30.00
11ac VHT80	NSS1-MCS0	18.5	155	5775	17.16	17.16	52.000	30.00





Within 5470-5725MHz Band, Straddle Channel  
Modulation Type: 802.11a (6Mbps)  
CH144

802.11ac VHT20 (6.5Mbps)  
CH144



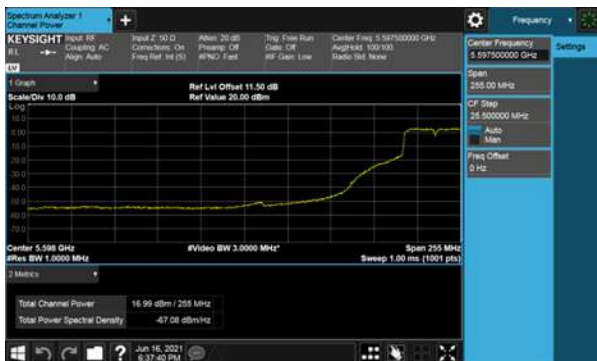
Modulation Type: 802.11n HT20 (6.5Mbps)  
CH144

802.11ac VHT40 (13.5Mbps)  
CH142



Modulation Type: 802.11n HT40 (13.5Mbps)  
CH142

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138

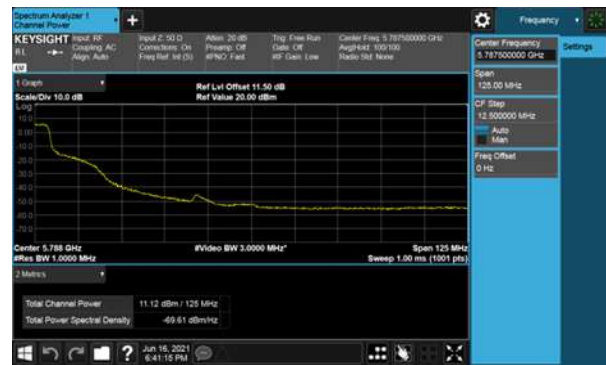




Extends across 5725MHz band, Straddle Channel  
Modulation Type: 802.11a (6Mbps)  
CH144



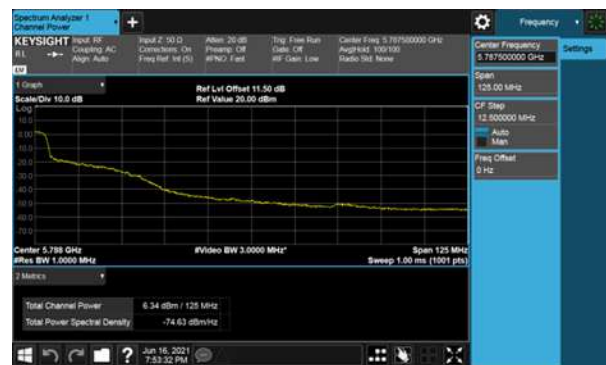
802.11ac VHT20 (6.5Mbps)  
CH144



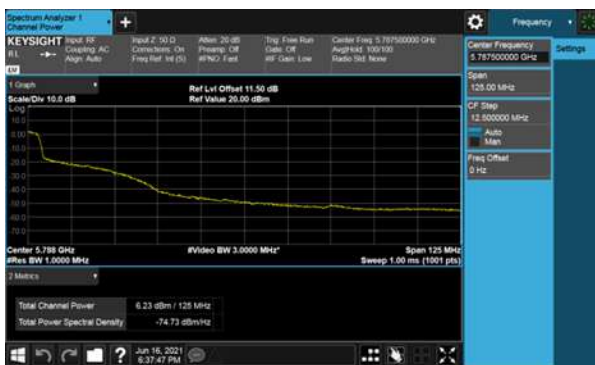
Modulation Type: 802.11n HT20 (6.5Mbps)  
CH144



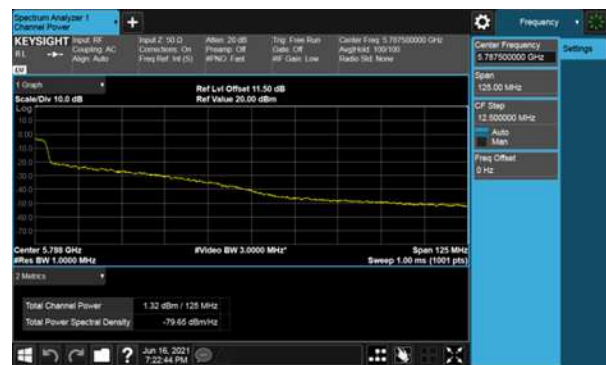
802.11ac VHT40 (13.5Mbps)  
CH142



Modulation Type: 802.11n HT40 (13.5Mbps)  
CH142



Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138





## 11. Power Spectral Density

### 11.1. Test Limit

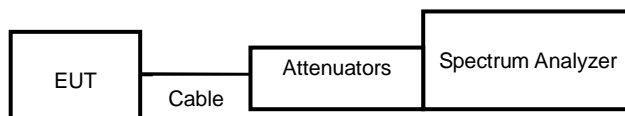
#### PSD:

Frequency Band		Limit
<input checked="" type="checkbox"/>	5.15~5.25GHz	
	Operating Mode	
<input type="checkbox"/>	Outdoor access point	17 dBm/MHz
<input type="checkbox"/>	Indoor access point	17 dBm/MHz
<input type="checkbox"/>	Fixed point-to-point access points	17 dBm/MHz
<input checked="" type="checkbox"/>	Mobile and portable client devices	11 dBm/MHz
<input checked="" type="checkbox"/>	5.725~5.85 GHz	11 dBm/MHz
<input checked="" type="checkbox"/>	5.470-5.725 GHz	11 dBm/MHz
<input checked="" type="checkbox"/>	5.725~5.85 GHz	30 dBm/500kHz

### 11.2. Test Procedure

Reference to KDB789033 D02 General UNII Test Procedures New Rules v02r01

### 11.3. Test Setup Layout



**11.4. Test Result and Data**

In the 5.2G Band

Modulation Type	Channel	Frequency (MHz)	Meas PSD (dBm/MHz)	Sum chain (dBm)	Duty Cycle CF(dB)	Total Corr'd PSD (dBm/MHz)	PSD Limit (dBm/MHz)
			ANT A				
11a	36	5180	5.23	5.23	0.00	5.23	11.00
11a	40	5200	5.49	5.49	0.00	5.49	11.00
11a	48	5240	5.16	5.16	0.00	5.16	11.00
11ac VHT20	36	5180	4.95	4.95	0.00	4.95	11.00
11ac VHT20	40	5200	4.76	4.76	0.00	4.76	11.00
11ac VHT20	48	5240	4.93	4.93	0.00	4.93	11.00
11ac VHT40	38	5190	0.88	0.88	0.00	0.88	11.00
11ac VHT40	46	5230	1.62	1.62	0.00	1.62	11.00
11ac VHT80	42	5210	-3.42	-3.42	0.00	-3.42	11.00

In the 5.3G Band

Modulation Type	Channel	Frequency (MHz)	Meas PSD (dBm/MHz)	Sum chain (dBm)	Duty Cycle CF(dB)	Total Corr'd PSD (dBm/MHz)	PSD Limit (dBm/MHz)
			ANT A				
11a	52	5260	5.34	5.34	0.00	5.34	11.00
11a	60	5300	4.78	4.78	0.00	4.78	11.00
11a	64	5320	4.61	4.61	0.00	4.61	11.00
11ac VHT20	52	5260	4.37	4.37	0.00	4.37	11.00
11ac VHT20	60	5300	4.53	4.53	0.00	4.53	11.00
11ac VHT20	64	5320	4.63	4.63	0.00	4.63	11.00
11ac VHT40	54	5270	1.36	1.36	0.00	1.36	11.00
11ac VHT40	62	5310	1.62	1.62	0.00	1.62	11.00
11ac VHT80	58	5290	-3.89	-3.89	0.00	-3.89	11.00



## In the 5.5G Band

Modulation Type	Channel (MHz)	Frequency (MHz)	Meas PSD (dBm/MHz)	Sum chain (dBm)	Duty Cycle CF(dB)	Total Corr'd PSD (dBm/MHz)	PSD Limit (dBm/MHz)
			ANT A				
11a	100	5500	3.51	3.51	0.00	3.51	11.00
11a	116	5580	5.69	5.69	0.00	5.69	11.00
11a	140	5700	4.36	4.36	0.00	4.36	11.00
11a	144	5720	6.27	6.27	0.00	6.27	11.00
11ac VHT20	100	5500	4.06	4.06	0.00	4.06	11.00
11ac VHT20	116	5580	5.42	5.42	0.00	5.42	11.00
11ac VHT20	140	5700	4.07	4.07	0.00	4.07	11.00
11ac VHT20	144	5720	6.15	6.15	0.00	6.15	11.00
11ac VHT40	102	5510	-2.83	-2.83	0.00	-2.83	11.00
11ac VHT40	110	5550	2.12	2.12	0.00	2.12	11.00
11ac VHT40	134	5670	1.79	1.79	0.00	1.79	11.00
11ac VHT40	142	5710	3.32	3.32	0.00	3.32	11.00
11ac VHT80	106	5530	-4.99	-4.99	0.00	-4.99	11.00
11ac VHT80	122	5610	-5.56	-5.56	0.00	-5.56	11.00
11ac VHT80	138	5690	-0.14	-0.14	0.00	-0.14	11.00

## In the 5.8G Band

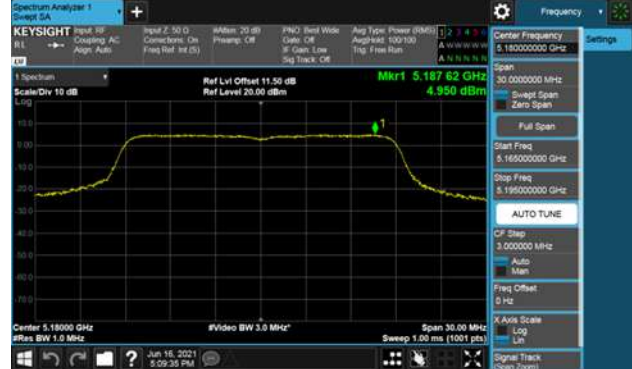
Modulation Type	Channel (MHz)	Frequency (MHz)	Meas PSD (dBm/MHz)	Sum chain (dBm)	Duty Cycle CF(dB)	10log(500KHz/RBW) CF (dB)	Total Corr'd PSD (dBm/500kHz)	PSD Limit (dBm/500kHz)
			ANT A					
11a	149	5745	6.38	6.38	0.00	-3.01	3.37	30.00
11a	157	5785	6.10	6.10	0.00	-3.01	3.09	30.00
11a	165	5825	6.62	6.62	0.00	-3.01	3.61	30.00
11ac VHT20	149	5745	6.30	6.30	0.00	-3.01	3.29	30.00
11ac VHT20	157	5785	5.95	5.95	0.00	-3.01	2.94	30.00
11ac VHT20	165	5825	6.40	6.40	0.00	-3.01	3.39	30.00
11ac VHT40	151	5755	3.29	3.29	0.00	-3.01	0.28	30.00
11ac VHT40	159	5795	2.86	2.86	0.00	-3.01	-0.15	30.00
11ac VHT80	155	5775	0.08	0.08	0.00	-3.01	-2.93	30.00



Modulation Type: 802.11a (6Mbps)  
CH36



Modulation Type: 802.11ac VHT20 (6.5Mbps)  
CH36



CH40



CH40



CH48



CH48





Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH38

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH42



CH46





Modulation Type: 802.11a (6Mbps)  
CH52



802.11ac VHT20 (6.5Mbps)  
CH52



CH60



CH60



CH64



CH64



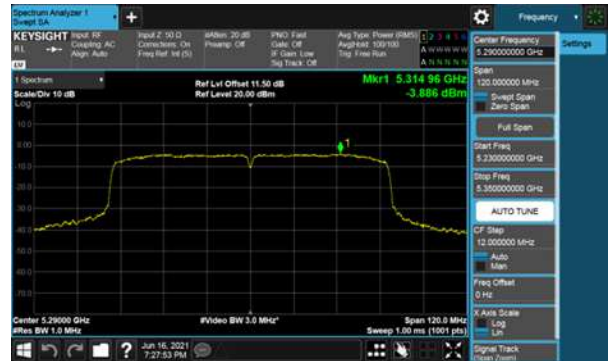




Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH54



Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH58



CH62





Modulation Type: 802.11a (6Mbps)  
CH100



802.11ac VHT20 (6.5Mbps)  
CH100



CH116



CH116



CH140



CH140

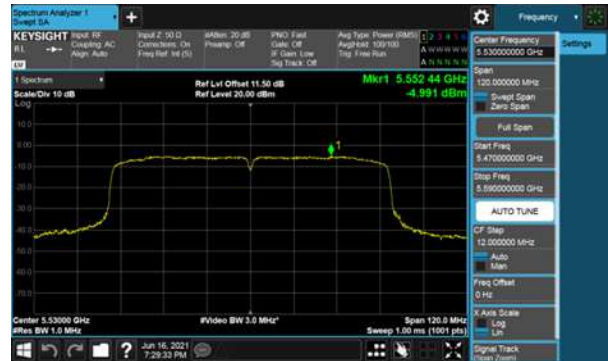




Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH102



Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH106



CH110



CH122



CH134





Straddle Channel  
Modulation Type: 802.11a (6Mbps)  
CH144



Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH138



Modulation Type: 802.11ac VHT20 (6.5Mbps)  
CH144



Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH142





Modulation Type: 802.11a (6Mbps)  
CH149



Modulation Type: 802.11ac VHT20 (6.5Mbps)  
CH149



CH157



CH157



CH165



CH165





Modulation Type: 802.11ac VHT40 (13.5Mbps)  
CH151

Modulation Type: 802.11ac VHT80 (29.3Mbps)  
CH155



CH159

