

Appendix E. Output Power Measurement

<Bluetooth Conducted Power>

【Bluetooth】

Mode	Channel	Frequency (MHz)	Ant 1		
			Average Power (dBm)	Tune-Up Limit	Duty Cycle %
BR / EDR 1Mbps	0	2402	4.60	5.50	76.86
	39	2441	3.80	5.50	
	78	2480	4.30	5.50	
BR / EDR 2Mbps	0	2402	4.80	5.50	76.86
	39	2441	4.10	5.50	
	78	2480	4.70	5.50	
BR / EDR 3Mbps	0	2402	4.80	5.50	76.86
	39	2441	4.10	5.50	
	78	2480	4.70	5.50	
LE 125kbps	0	2402	4.40	5.50	82.67
	19	2440	3.80	5.50	
	39	2480	4.70	5.50	
LE 500kbps	0	2402	4.30	5.50	57.22
	19	2440	3.70	5.50	
	39	2480	4.60	5.50	
LE 1Mbps	0	2402	4.30	5.50	62.90
	19	2440	3.70	5.50	
	39	2480	4.60	5.50	
LE 2Mbps	0	2402	5.70	6.50	33.33
	19	2440	3.90	5.50	
	39	2480	7.50	8.50	

<WLAN Conducted Power>

【2.4GHz WLAN】

Mode	Channel	Frequency (MHz)	Ant 1+2(1)		Ant 1+2(2)		Ant 1+2		Duty Cycle %
			Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	
802.11b 1Mbps	1	2412	20.10	21.50	20.10	21.50	23.11	24.50	97.18
	6	2437	20.50	21.50	20.10	21.50	23.31	24.50	
	11	2462	20.20	21.50	20.20	21.50	23.21	24.50	
802.11g 6Mbps	1	2412	18.50	19.50	18.50	19.50	21.51	22.50	99.06
	6	2437	18.80	19.50	18.60	19.50	21.71	22.50	
	11	2462	18.60	19.50	18.60	19.50	21.61	22.50	
802.11n-HT20 MCS0	1	2412	18.00	19.50	18.00	19.50	21.01	22.50	99.74
	6	2437	18.20	19.50	18.00	19.50	21.11	22.50	
	11	2462	18.00	19.50	18.00	19.50	21.01	22.50	
802.11n-HT40 MCS0	3	2422	17.10	18.50	17.10	18.50	20.11	21.50	99.67
	6	2437	17.10	18.50	17.30	18.50	20.21	21.50	
	9	2452	17.20	18.50	17.00	18.50	20.11	21.50	
802.11ac-VHT20 MCS0	1	2412	18.00	19.50	18.00	19.50	21.01	22.50	99.63
	6	2437	18.10	19.50	18.00	19.50	21.06	22.50	
	11	2462	18.00	19.50	18.00	19.50	21.01	22.50	
802.11ac-VHT40 MCS0	3	2422	17.00	18.50	17.00	18.50	20.01	21.50	99.63
	6	2437	17.00	18.50	17.20	18.50	20.11	21.50	
	9	2452	17.10	18.50	17.00	18.50	20.06	21.50	
802.11ax-HE20 MCS0	1	2412	18.10	19.50	18.10	19.50	21.11	22.50	99.63
	6	2437	18.20	19.50	18.10	19.50	21.16	22.50	
	11	2462	18.10	19.50	18.10	19.50	21.11	22.50	
802.11ax-HE40 MCS0	3	2422	18.20	19.50	18.20	19.50	21.21	22.50	99.67
	6	2437	18.20	19.50	18.30	19.50	21.26	22.50	
	9	2452	18.30	19.50	18.10	19.50	21.21	22.50	
802.11be-EHT20 MCS0	1	2412	18.20	19.50	18.20	19.50	21.21	22.50	99.74

802.11be-EHT40 MCS0	6	2437	18.30	19.50	18.20	19.50	21.26	22.50	99.74
	11	2462	18.20	19.50	18.20	19.50	21.21	22.50	
	3	2422	17.30	18.50	17.30	18.50	20.31	21.50	
	6	2437	17.30	18.50	17.60	18.50	20.46	21.50	
	9	2452	17.40	18.50	17.20	18.50	20.31	21.50	

【5.2GHz WLAN】

Mode	Channel	Frequency (MHz)	Ant 1+2(1)		Ant 1+2(2)		Ant 1+2		Duty Cycle %
			Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	
802.11a 6Mbps	36	5180	12.45	13.50	11.56	13.50	15.04	16.50	99.05
	40	5200	12.22	13.50	11.45	13.00	14.86	16.50	
	44	5220	12.09	13.50	11.53	13.50	14.83	16.50	
	48	5240	12.52	13.50	12.10	13.50	15.33	16.50	
802.11n-HT20 MCS0	36	5180	12.61	13.50	12.04	13.50	15.34	16.50	99.63
	40	5200	12.48	13.50	12.01	13.50	15.26	16.50	
	44	5220	12.45	13.50	12.11	13.50	15.29	16.50	
	48	5240	12.79	13.50	12.56	13.50	15.69	16.50	
802.11n-HT40 MCS0	38	5190	15.34	16.50	14.68	16.50	18.03	19.50	99.60
	46	5230	15.76	16.50	15.27	16.50	18.53	19.50	
802.11ac-VHT20 MCS0	36	5180	12.52	13.50	11.92	13.50	15.24	16.50	99.74
	40	5200	12.45	13.50	12.00	13.50	15.24	16.50	
	44	5220	12.34	13.50	12.01	13.50	15.19	16.50	
	48	5240	12.71	13.50	12.39	13.50	15.56	16.50	
802.11ac-VHT40 MCS0	38	5190	15.23	16.50	14.61	16.50	17.94	19.50	99.67
	46	5230	15.66	16.50	15.18	16.50	18.44	19.50	
802.11ac-VHT80 MCS0	42	5210	16.37	17.50	15.68	17.50	19.05	20.50	99.63
802.11ax-HE20 MCS0	36	5180	12.77	13.50	12.15	13.50	15.48	16.50	99.74
	40	5200	12.80	13.50	12.20	13.50	15.52	16.50	
	44	5220	12.59	13.50	12.24	13.50	15.43	16.50	
	48	5240	12.96	13.50	12.78	13.50	15.88	16.50	
802.11ax-HE40 MCS0	38	5190	15.34	16.50	14.69	16.50	18.04	19.50	99.67
	46	5230	15.75	16.50	15.26	16.50	18.52	19.50	
802.11ax-HE80 MCS0	42	5210	16.39	17.50	15.72	17.50	19.08	20.50	99.63
802.11be-EHT20 MCS0	36	5180	12.96	13.50	12.27	13.50	15.64	16.50	99.74
	40	5200	12.88	13.50	12.31	13.50	15.61	16.50	
	44	5220	12.77	13.50	12.38	13.50	15.59	16.50	
	48	5240	13.12	13.50	12.96	13.50	16.05	16.50	
802.11be-EHT40 MCS0	38	5190	15.42	16.50	14.78	16.50	18.12	19.50	99.71
	46	5230	15.84	16.50	15.36	16.50	18.62	19.50	
802.11be-EHT80 MCS0	42	5210	16.41	17.50	15.77	17.50	19.11	20.50	99.74

【5.3GHz WLAN】

Mode	Channel	Frequency (MHz)	Ant 1+2(1)		Ant 1+2(2)		Ant 1+2		Duty Cycle %
			Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	
802.11a 6Mbps	52	5260	19.56	20.50	19.13	20.50	22.36	23.50	99.05
	56	5280	19.35	20.50	19.04	20.50	22.21	23.50	
	60	5300	19.36	20.50	19.26	20.50	22.32	23.50	
	64	5320	19.45	20.50	19.32	20.50	22.40	23.50	
802.11n-HT20 MCS0	52	5260	18.37	19.50	18.14	19.50	21.27	22.50	99.63
	56	5280	18.17	19.50	18.10	19.50	21.15	22.50	
	60	5300	18.19	19.50	18.13	19.50	21.17	22.50	
	64	5320	18.21	19.50	18.18	19.50	21.21	22.50	
802.11n-HT40 MCS0	54	5270	18.73	19.50	18.27	19.50	21.52	22.50	99.60
	62	5310	18.42	19.50	18.24	19.50	21.34	22.50	
802.11ac-VHT20 MCS0	52	5260	18.31	19.50	18.07	19.50	21.20	22.50	99.74
	56	5280	18.11	19.50	18.02	19.50	21.08	22.50	
	60	5300	18.11	19.50	18.06	19.50	21.10	22.50	
	64	5320	18.15	19.50	18.04	19.50	21.11	22.50	
802.11ac-VHT40 MCS0	54	5270	18.70	19.50	18.21	19.50	21.47	22.50	99.67
	62	5310	18.33	19.50	18.19	19.50	21.27	22.50	
802.11ac-VHT80 MCS0	58	5290	18.51	19.50	18.29	19.50	21.41	22.50	99.63
802.11ac-VHT160 MCS0	50	5250	16.28	17.50	15.67	17.50	19.00	20.50	99.63
802.11ax-HE20 MCS0	52	5260	18.50	19.50	18.21	19.50	21.37	22.50	99.74
	56	5280	18.44	19.50	18.19	19.50	21.33	22.50	
	60	5300	18.32	19.50	18.21	19.50	21.28	22.50	
	64	5320	18.33	19.50	18.25	19.50	21.30	22.50	
802.11ax-HE40 MCS0	54	5270	18.79	19.50	18.31	19.50	21.57	22.50	99.67
	62	5310	18.49	19.50	18.29	19.50	21.40	22.50	

802.11ax-HE80 MCS0	58	5290	18.53	19.50	18.34	19.50	21.45	22.50	99.63
802.11ax-HE160 MCS0	50	5250	16.31	17.50	15.72	17.50	19.04	20.50	99.63
802.11be-EHT20 MCS0	52	5260	18.65	19.50	18.36	19.50	21.52	22.50	99.74
	56	5280	18.61	19.50	18.33	19.50	21.48	22.50	
	60	5300	18.49	19.50	18.37	19.50	21.44	22.50	
	64	5320	18.48	19.50	18.40	19.50	21.45	22.50	
802.11be-EHT40 MCS0	54	5270	18.87	19.50	18.41	19.50	21.66	22.50	99.71
	62	5310	18.58	19.50	18.40	19.50	21.50	22.50	
802.11be-EHT80 MCS0	58	5290	18.67	19.50	18.42	19.50	21.56	22.50	99.74
802.11be-EHT160 MCS0	50	5250	16.37	17.50	15.78	17.50	19.10	20.50	99.71

【5.5GHz WLAN】

Mode	Channel	Frequency (MHz)	Ant 1+2(1)		Ant 1+2(2)		Ant 1+2		Duty Cycle %
			Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	
802.11a 6Mbps	100	5500	19.48	20.50	19.27	20.50	22.39	23.50	99.05
	116	5580	19.37	20.50	18.70	20.50	22.06	23.50	
	124	5620	19.80	20.50	19.01	20.50	22.43	23.50	
	132	5660	19.64	20.50	19.00	20.50	22.34	23.50	
	144	5720	19.96	20.50	19.08	20.50	22.55	23.50	
802.11n-HT20 MCS0	100	5500	18.40	19.50	18.24	19.50	21.33	22.50	99.63
	116	5580	18.63	19.50	18.19	19.50	21.43	22.50	
	124	5620	18.62	19.50	18.17	19.50	21.41	22.50	
	132	5660	18.60	19.50	18.10	19.50	21.37	22.50	
	144	5720	18.58	19.50	18.13	19.50	21.37	22.50	
802.11n-HT40 MCS0	102	5510	18.66	19.50	18.45	19.50	21.57	22.50	99.60
	110	5550	18.77	19.50	18.67	19.50	21.73	22.50	
	126	5630	18.60	19.50	18.14	19.50	21.39	22.50	
	134	5670	18.77	19.50	18.16	19.50	21.49	22.50	
	142	5710	18.84	19.50	18.14	19.50	21.51	22.50	
802.11ac-VHT20 MCS0	100	5500	18.34	19.50	18.12	19.50	21.24	22.50	99.74
	116	5580	18.51	19.50	18.10	19.50	21.32	22.50	
	124	5620	18.49	19.50	18.02	19.50	21.27	22.50	
	132	5660	18.42	19.50	18.01	19.50	21.23	22.50	
	144	5720	18.43	19.50	18.06	19.50	21.26	22.50	
802.11ac-VHT40 MCS0	102	5510	18.61	19.50	18.40	19.50	21.52	22.50	99.67
	110	5550	18.73	19.50	18.60	19.50	21.68	22.50	
	126	5630	18.56	19.50	18.10	19.50	21.35	22.50	
	134	5670	18.73	19.50	18.11	19.50	21.44	22.50	
	142	5710	18.80	19.50	18.09	19.50	21.47	22.50	
802.11ac-VHT80 MCS0	106	5530	18.86	19.50	18.39	19.50	21.64	22.50	99.63
	122	5610	18.87	19.50	18.33	19.50	21.62	22.50	
	138	5690	18.88	19.50	18.13	19.50	21.53	22.50	
802.11ac-VHT160 MCS0	114	5570	17.76	18.50	17.48	18.50	20.63	21.50	99.63
802.11ax-HE20 MCS0	100	5500	18.53	19.50	18.35	19.50	21.45	22.50	99.74
	116	5580	18.79	19.50	18.31	19.50	21.57	22.50	
	124	5620	18.70	19.50	18.28	19.50	21.51	22.50	
	132	5660	18.72	19.50	18.14	19.50	21.45	22.50	
	144	5720	18.71	19.50	18.16	19.50	21.45	22.50	
802.11ax-HE40 MCS0	102	5510	18.72	19.50	18.49	19.50	21.62	22.50	99.67
	110	5550	18.83	19.50	18.69	19.50	21.77	22.50	
	126	5630	18.17	19.50	18.16	19.50	21.18	22.50	
	134	5670	18.84	19.50	18.18	19.50	21.53	22.50	
	142	5710	18.90	19.50	18.16	19.50	21.56	22.50	
802.11ax-HE80 MCS0	106	5530	18.89	19.50	18.43	19.50	21.68	22.50	99.63
	122	5610	18.90	19.50	18.38	19.50	21.66	22.50	
	138	5690	18.90	19.50	18.17	19.50	21.56	22.50	
802.11ax-HE160 MCS0	114	5570	17.81	18.50	17.53	18.50	20.68	21.50	99.63
802.11be-EHT20 MCS0	100	5500	18.68	19.50	18.50	19.50	21.60	22.50	99.74
	116	5580	18.96	19.50	18.46	19.50	21.73	22.50	
	124	5620	18.80	19.50	18.32	19.50	21.58	22.50	
	132	5660	18.86	19.50	18.15	19.50	21.53	22.50	
	144	5720	18.99	19.50	18.18	19.50	21.61	22.50	
802.11be-EHT40 MCS0	102	5510	18.83	19.50	18.59	19.50	21.72	22.50	99.71
	110	5550	18.96	19.50	18.79	19.50	21.89	22.50	
	126	5630	18.88	19.50	18.20	19.50	21.56	22.50	
	134	5670	18.93	19.50	18.23	19.50	21.60	22.50	
	142	5710	18.99	19.50	18.19	19.50	21.62	22.50	
802.11be-EHT80 MCS0	106	5530	18.97	19.50	18.54	19.50	21.77	22.50	99.74
	122	5610	18.99	19.50	18.46	19.50	21.74	22.50	
	138	5690	18.98	19.50	18.21	19.50	21.62	22.50	
802.11be-EHT160 MCS0	114	5570	17.87	18.50	17.55	18.50	20.72	21.50	99.71

【5.8GHz WLAN】

Mode	Channel	Frequency (MHz)	Ant 1+2(1)		Ant 1+2(2)		Ant 1+2		Duty Cycle %
			Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	
802.11a 6Mbps	149	5745	20.45	21.50	19.13	20.00	22.85	24.00	99.05
	157	5785	20.22	21.50	19.00	20.00	22.66	24.00	
	165	5825	19.93	21.50	19.05	20.00	22.52	24.00	
802.11n-HT20 MCS0	149	5745	20.51	21.50	19.35	20.00	22.98	24.00	99.63
	157	5785	20.24	21.50	19.02	20.00	22.68	24.00	
	165	5825	19.85	21.50	19.00	20.00	22.46	24.00	
802.11n-HT40 MCS0	151	5755	18.20	19.50	18.17	19.50	21.20	22.50	99.60
	159	5795	18.08	19.50	18.07	19.50	21.09	22.50	
802.11ac-VHT20 MCS0	149	5745	19.50	20.50	18.18	19.50	21.90	23.00	99.74
	157	5785	18.74	20.50	18.11	19.50	21.45	23.00	
	165	5825	18.82	20.50	18.06	19.50	21.47	23.00	
802.11ac-VHT40 MCS0	151	5755	18.14	19.50	18.11	19.50	21.14	22.50	99.67
	159	5795	18.03	19.50	18.02	19.50	21.04	22.50	
802.11ac-VHT80 MCS0	155	5775	18.75	20.50	18.12	19.50	21.46	23.00	99.63
802.11ax-HE20 MCS0	149	5745	19.57	20.50	18.30	19.50	21.99	23.00	99.74
	157	5785	18.81	19.50	18.17	19.50	21.51	22.50	
	165	5825	18.88	19.50	18.15	19.50	21.54	22.50	
802.11ax-HE40 MCS0	151	5755	18.81	19.50	18.22	19.50	21.54	22.50	99.67
	159	5795	18.50	19.50	18.13	19.50	21.33	22.50	
802.11ax-HE80 MCS0	155	5775	18.79	19.50	18.17	19.50	21.50	22.50	99.63
802.11be-EHT20 MCS0	149	5745	19.66	20.50	18.34	19.50	22.06	23.00	99.74
	157	5785	18.87	19.50	18.24	19.50	21.58	22.50	
	165	5825	18.92	19.50	18.25	19.50	21.61	22.50	
802.11be-EHT40 MCS0	151	5755	18.85	19.50	18.27	19.50	21.58	22.50	99.71
	159	5795	18.54	19.50	18.21	19.50	21.39	22.50	
802.11be-EHT80 MCS0	155	5775	18.85	19.50	18.26	19.50	21.58	22.50	99.74

【6GHz WLAN_For FCC】

Mode	Channel	Frequency (MHz)	Ant 1+2(1)		Ant 1+2(2)		Ant 1+2		Duty Cycle %
			Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	Average Power (dBm)	Tune-Up Limit	
802.11a 6Mbps	1	5955	3.18	4.00	2.04	3.00	5.66	6.50	99.52
	57	6235	2.88	4.00	2.00	3.00	5.47	6.50	
	113	6515	2.91	4.00	2.71	4.00	5.82	7.00	
	173	6815	3.77	4.50	3.42	4.50	6.61	7.50	
	233	7115	4.93	6.00	3.89	5.00	7.45	8.50	
802.11ax-HE20 MCS0	1	5955	3.62	4.50	2.52	3.50	6.12	7.00	99.82
	57	6235	3.45	4.50	2.46	3.50	5.99	7.00	
	113	6515	2.88	4.00	3.30	4.00	6.11	7.00	
	173	6815	3.72	5.00	4.18	5.00	6.97	8.00	
802.11ax-HE40 MCS0	233	7115	5.29	6.00	4.16	5.00	7.77	8.50	99.63
	3	5965	6.38	7.50	6.31	7.50	9.36	10.50	
	59	6245	6.32	7.50	6.22	7.50	9.28	10.50	
	107	6485	6.37	7.50	6.60	7.50	9.50	10.50	
	171	6805	6.83	8.00	7.37	8.00	10.12	11.00	
802.11ax-HE80 MCS0	227	7085	7.70	9.00	7.00	8.00	10.37	11.50	99.82
	7	5985	9.18	10.00	9.29	10.00	12.25	13.00	
	71	6305	9.11	10.00	9.20	10.00	12.17	13.00	
	119	6545	9.24	10.50	9.89	10.50	12.59	13.50	
	167	6785	9.46	10.50	9.32	10.50	12.40	13.50	
802.11ax-HE160 MCS0	215	7025	10.24	11.50	10.73	11.50	13.50	14.50	99.63
	15	6025	12.27	13.00	12.99	14.00	15.66	16.50	
	47	6185	12.21	13.00	13.28	14.00	15.79	16.50	
	111	6505	11.83	13.00	12.64	14.00	15.26	16.50	
	143	6665	11.76	13.00	13.11	14.00	15.50	16.50	
802.11be-EHT20 MCS0	207	6985	12.86	14.00	13.38	15.00	16.14	17.50	99.63
	1	5955	3.77	4.50	2.65	3.50	6.26	7.00	
	57	6235	3.52	4.50	2.61	3.50	6.10	7.00	
	113	6515	2.99	4.00	3.43	4.50	6.23	7.50	
	173	6815	3.80	5.00	4.29	5.00	7.06	8.00	
802.11be-EHT40 MCS0	233	7115	5.40	6.50	4.27	5.50	7.88	9.00	99.63
	3	5965	6.51	7.50	6.45	7.50	9.49	10.50	
	59	6245	6.45	7.50	6.40	7.50	9.44	10.50	
	107	6485	6.50	7.50	6.74	7.50	9.63	10.50	
	171	6805	6.89	8.00	7.44	8.50	10.18	11.50	

802.11be-EHT80 MCS0	227	7085	7.83	9.00	7.12	8.00	10.50	11.50	99.63
	7	5985	9.32	10.50	9.45	10.50	12.40	13.50	
	71	6305	9.23	10.50	9.38	10.50	12.32	13.50	
	119	6545	9.40	10.50	10.03	11.00	12.74	14.00	
	167	6785	9.62	10.50	10.46	11.50	13.07	14.00	
802.11be-EHT160 MCS0	215	7025	10.38	11.50	10.87	12.00	13.64	15.00	99.63
	15	6025	12.42	13.50	13.12	14.50	15.79	17.00	
	47	6185	12.32	13.50	13.39	14.50	15.90	17.00	
	111	6505	11.94	13.00	12.75	14.00	15.37	16.50	
	143	6665	11.87	13.00	13.22	14.50	15.61	17.00	
802.11be-EHT320 MCS0	207	6985	12.97	14.00	13.49	14.50	16.25	17.50	99.82
	31	6105	15.31	16.50	16.27	17.50	18.83	20.00	
	63	6265	15.00	16.00	16.01	17.00	18.54	19.50	
	95	6425	14.11	15.00	14.88	16.00	17.52	18.50	
	127	6585	14.99	16.00	16.06	17.00	18.57	19.50	
	159	6745	15.23	16.50	16.27	17.50	18.79	20.00	
	191	6905	14.11	15.00	14.82	16.00	17.49	18.50	