

Fig.A.5.15 Band Edges (802.11n-HT40, Ch 10)

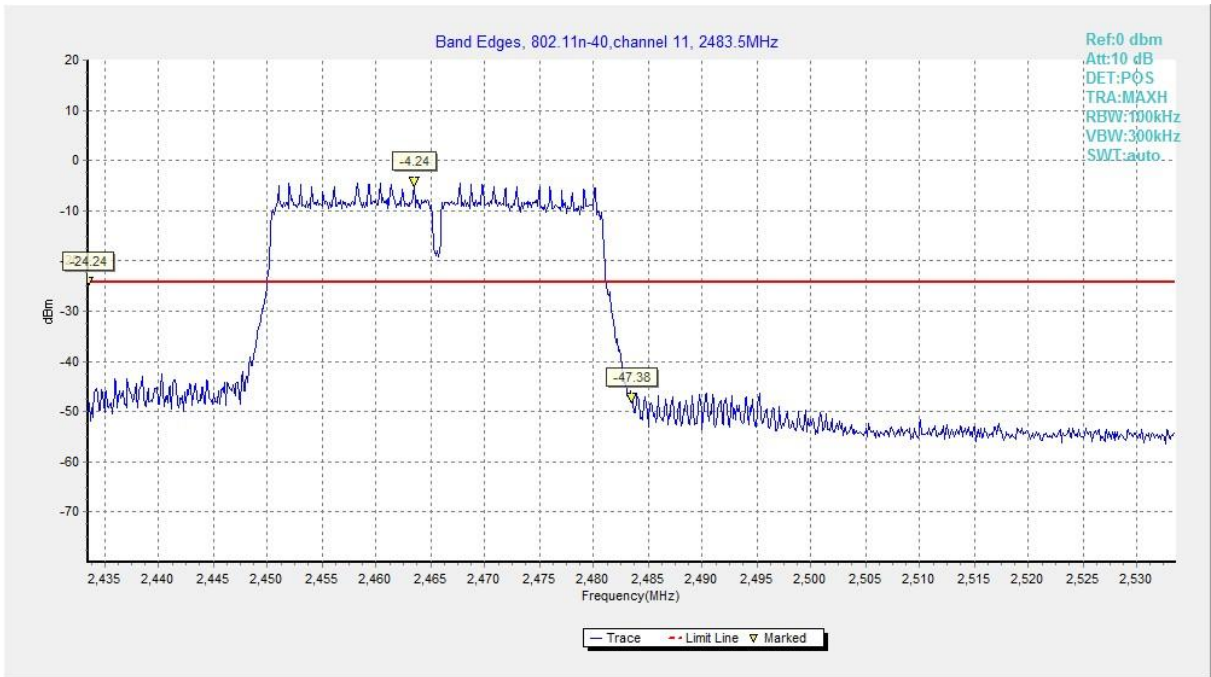


Fig.A.5.16 Band Edges (802.11 n-HT40, Ch 11)

## A.6. Transmitter Spurious Emission

### A.6.1 Transmitter Spurious Emission - Conducted

Method of Measurement: See KDB558074 section 12.2.

**Measurement Limit:**

Standard	Limit
FCC 47 CFR Part 15.247 (d)	20dB below peak output power in 100 kHz bandwidth

**EUT ID: EUT2**

**Modulation type and data rate tested:**

802.11b	802.11g	802.11n-HT20	802.11n-HT40
11Mbps(CCK)	54Mbps(OFDM)	MCS3(OFDM)	MCS3(OFDM)

**Measurement Results:**

802.11b mode

MODE	Channel	Frequency Range	Test Results	Conclusion
802.11b	1	2.412 GHz	Fig.A.6.1.1	P
		30 MHz ~ 1 GHz	Fig.A.6.1.2	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.3	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.4	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.5	P
		10 GHz ~ 15 GHz	Fig.A.6.1.6	P
		15 GHz ~ 20 GHz	Fig.A.6.1.7	P
		20 GHz ~ 26 GHz	Fig.A.6.1.8	P
	6	2.437 GHz	Fig.A.6.1.9	P
		30 MHz ~ 1 GHz	Fig.A.6.1.10	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.11	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.12	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.13	P
		10 GHz ~ 15 GHz	Fig.A.6.1.14	P
		15 GHz ~ 20 GHz	Fig.A.6.1.15	P
		20 GHz ~ 26 GHz	Fig.A.6.1.16	P
	11	2.462 GHz	Fig.A.6.1.17	P
		30 MHz ~ 1 GHz	Fig.A.6.1.18	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.19	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.20	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.21	P
		10 GHz ~ 15 GHz	Fig.A.6.1.22	P
		15 GHz ~ 20 GHz	Fig.A.6.1.23	P
		20 GHz ~ 26 GHz	Fig.A.6.1.24	P
	12	2.467 GHz	Fig.A.6.1.25	P
		30 MHz ~ 1 GHz	Fig.A.6.1.26	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.27	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.28	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.29	P
		10 GHz ~ 15 GHz	Fig.A.6.1.30	P
		15 GHz ~ 20 GHz	Fig.A.6.1.31	P
		20 GHz ~ 26 GHz	Fig.A.6.1.32	P
	13	2.472 GHz	Fig.A.6.1.33	P
		30 MHz ~ 1 GHz	Fig.A.6.1.34	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.35	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.36	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.37	P
		10 GHz ~ 15 GHz	Fig.A.6.1.38	P
		15 GHz ~ 20 GHz	Fig.A.6.1.39	P
		20 GHz ~ 26 GHz	Fig.A.6.1.40	P

802.11g mode

MODE	Channel	Frequency Range	Test Results	Conclusion
802.11g	1	2.412 GHz	Fig.A.6.1.41	P
		30 MHz ~ 1 GHz	Fig.A.6.1.42	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.43	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.44	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.45	P
		10 GHz ~ 15 GHz	Fig.A.6.1.46	P
		15 GHz ~ 20 GHz	Fig.A.6.1.47	P
		20 GHz ~ 26 GHz	Fig.A.6.1.48	P
	6	2.437 GHz	Fig.A.6.1.49	P
		30 MHz ~ 1 GHz	Fig.A.6.1.50	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.51	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.52	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.53	P
		10 GHz ~ 15 GHz	Fig.A.6.1.54	P
		15 GHz ~ 20 GHz	Fig.A.6.1.55	P
		20 GHz ~ 26 GHz	Fig.A.6.1.56	P
	11	2.462 GHz	Fig.A.6.1.57	P
		30 MHz ~ 1 GHz	Fig.A.6.1.58	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.59	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.60	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.61	P
		10 GHz ~ 15 GHz	Fig.A.6.1.62	P
		15 GHz ~ 20 GHz	Fig.A.6.1.63	P
		20 GHz ~ 26 GHz	Fig.A.6.1.64	P
	12	2.467 GHz	Fig.A.6.1.65	P
		30 MHz ~ 1 GHz	Fig.A.6.1.66	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.67	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.68	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.69	P
		10 GHz ~ 15 GHz	Fig.A.6.1.70	P
		15 GHz ~ 20 GHz	Fig.A.6.1.71	P
		20 GHz ~ 26 GHz	Fig.A.6.1.72	P
	13	2.472 GHz	Fig.A.6.1.73	P
		30 MHz ~ 1 GHz	Fig.A.6.1.74	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.75	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.76	P
7.5 GHz ~ 10 GHz		Fig.A.6.1.77	P	
10 GHz ~ 15 GHz		Fig.A.6.1.78	P	
15 GHz ~ 20 GHz		Fig.A.6.1.79	P	
20 GHz ~ 26 GHz		Fig.A.6.1.80	P	

802.11n-HT20 mode

MODE	Channel	Frequency Range	Test Results	Conclusion
802.11n (HT20)	1	2.412 GHz	Fig.A.6.1.81	P
		30 MHz ~ 1 GHz	Fig.A.6.1.82	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.83	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.84	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.85	P
		10 GHz ~ 15 GHz	Fig.A.6.1.86	P
		15 GHz ~ 20 GHz	Fig.A.6.1.87	P
		20 GHz ~ 26 GHz	Fig.A.6.1.88	P
	6	2.437 GHz	Fig.A.6.1.89	P
		30 MHz ~ 1 GHz	Fig.A.6.1.90	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.91	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.92	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.93	P
		10 GHz ~ 15 GHz	Fig.A.6.1.94	P
		15 GHz ~ 20 GHz	Fig.A.6.1.95	P
		20 GHz ~ 26 GHz	Fig.A.6.1.96	P
	11	2.462 GHz	Fig.A.6.1.97	P
		30 MHz ~ 1 GHz	Fig.A.6.1.98	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.99	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.100	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.101	P
		10 GHz ~ 15 GHz	Fig.A.6.1.102	P
		15 GHz ~ 20 GHz	Fig.A.6.1.103	P
		20 GHz ~ 26 GHz	Fig.A.6.1.104	P
	12	2.467 GHz	Fig.A.6.1.105	P
		30 MHz ~ 1 GHz	Fig.A.6.1.106	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.107	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.108	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.109	P
		10 GHz ~ 15 GHz	Fig.A.6.1.110	P
		15 GHz ~ 20 GHz	Fig.A.6.1.111	P
		20 GHz ~ 26 GHz	Fig.A.6.1.112	P
	13	2.472 GHz	Fig.A.6.1.113	P
		30 MHz ~ 1 GHz	Fig.A.6.1.114	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.115	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.116	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.117	P
		10 GHz ~ 15 GHz	Fig.A.6.1.118	P
		15 GHz ~ 20 GHz	Fig.A.6.1.119	P
		20 GHz ~ 26 GHz	Fig.A.6.1.120	P

802.11n-HT40 mode

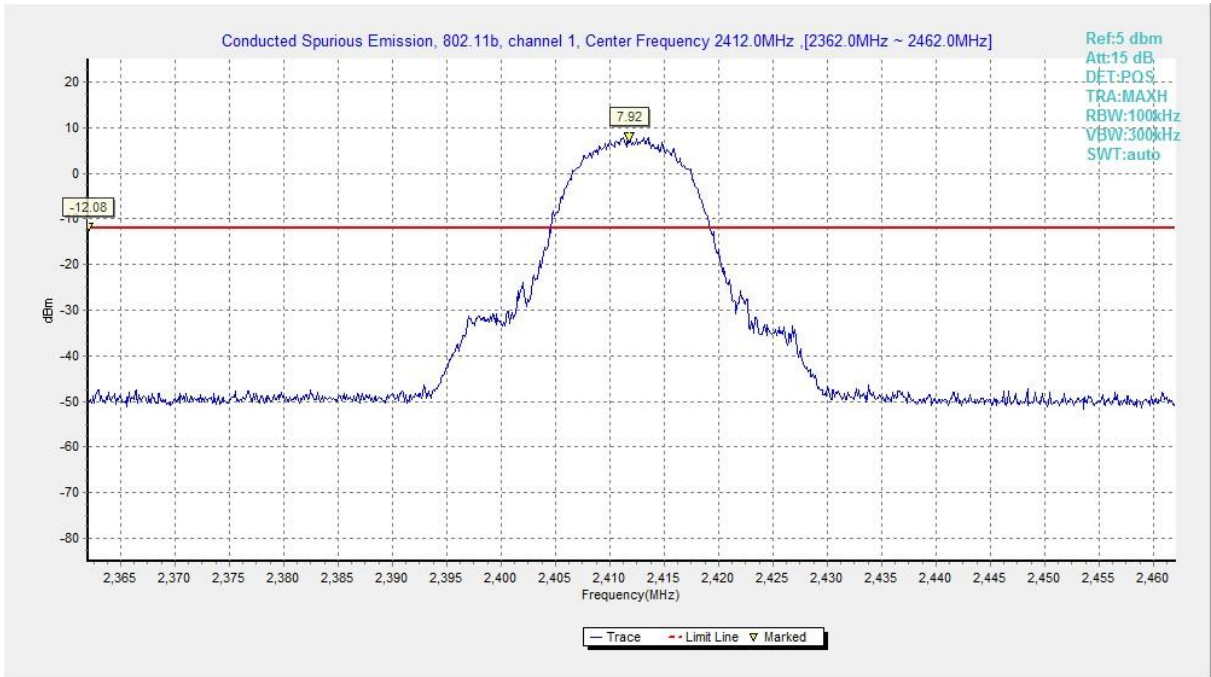
MODE	Channel	Frequency Range	Test Results	Conclusion
802.11n (HT40)	3	2.422 GHz	Fig.A.6.1.121	P
		30 MHz ~ 1 GHz	Fig.A.6.1.122	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.123	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.124	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.125	P
		10 GHz ~ 15 GHz	Fig.A.6.1.126	P
		15 GHz ~ 20 GHz	Fig.A.6.1.127	P
		20 GHz ~ 26 GHz	Fig.A.6.1.128	P
	6	2.437 GHz	Fig.A.6.1.129	P
		30 MHz ~ 1 GHz	Fig.A.6.1.130	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.131	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.132	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.133	P
		10 GHz ~ 15 GHz	Fig.A.6.1.134	P
		15 GHz ~ 20 GHz	Fig.A.6.1.135	P
		20 GHz ~ 26 GHz	Fig.A.6.1.136	P
	9	2.452 GHz	Fig.A.6.1.137	P
		30 MHz ~ 1 GHz	Fig.A.6.1.138	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.139	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.140	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.141	P
		10 GHz ~ 15 GHz	Fig.A.6.1.142	P
		15 GHz ~ 20 GHz	Fig.A.6.1.143	P
		20 GHz ~ 26 GHz	Fig.A.6.1.144	P
	10	2.457 GHz	Fig.A.6.1.145	P
		30 MHz ~ 1 GHz	Fig.A.6.1.146	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.147	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.148	P
		7.5 GHz ~ 10 GHz	Fig.A.6.1.149	P
		10 GHz ~ 15 GHz	Fig.A.6.1.150	P
		15 GHz ~ 20 GHz	Fig.A.6.1.151	P
		20 GHz ~ 26 GHz	Fig.A.6.1.152	P
	11	2.462 GHz	Fig.A.6.1.153	P
		30 MHz ~ 1 GHz	Fig.A.6.1.154	P
		1 GHz ~ 2.5 GHz	Fig.A.6.1.155	P
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.156	P
7.5 GHz ~ 10 GHz		Fig.A.6.1.157	P	
10 GHz ~ 15 GHz		Fig.A.6.1.158	P	
15 GHz ~ 20 GHz		Fig.A.6.1.159	P	
20 GHz ~ 26 GHz		Fig.A.6.1.160	P	

**Conclusion: Pass**

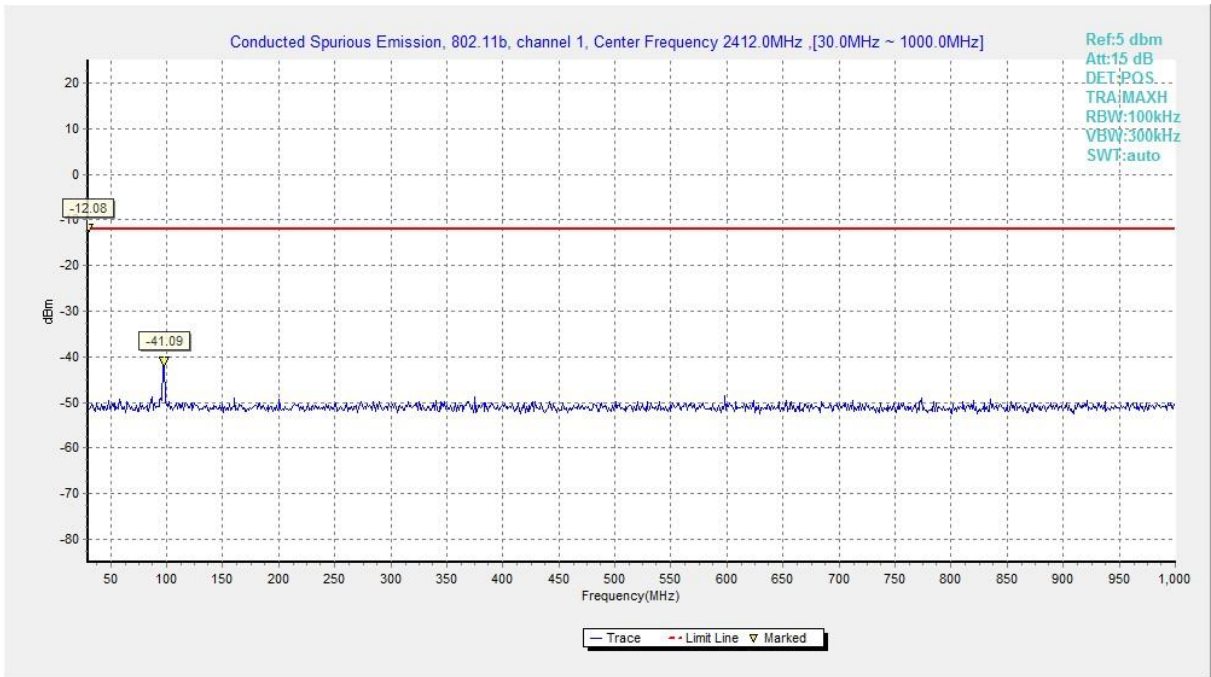
**Measurement Uncertainty:**

Frequency Range	Uncertainty(dB)
$30\text{MHz} \leq f \leq 2\text{GHz}$	0.63
$2\text{GHz} \leq f \leq 3.6\text{GHz}$	0.82
$3.6\text{GHz} \leq f \leq 8\text{GHz}$	1.55
$8\text{GHz} \leq f \leq 20\text{GHz}$	1.86
$20\text{GHz} \leq f \leq 22\text{GHz}$	1.90
$22\text{GHz} \leq f \leq 26\text{GHz}$	2.20

**Test graphs as below:**

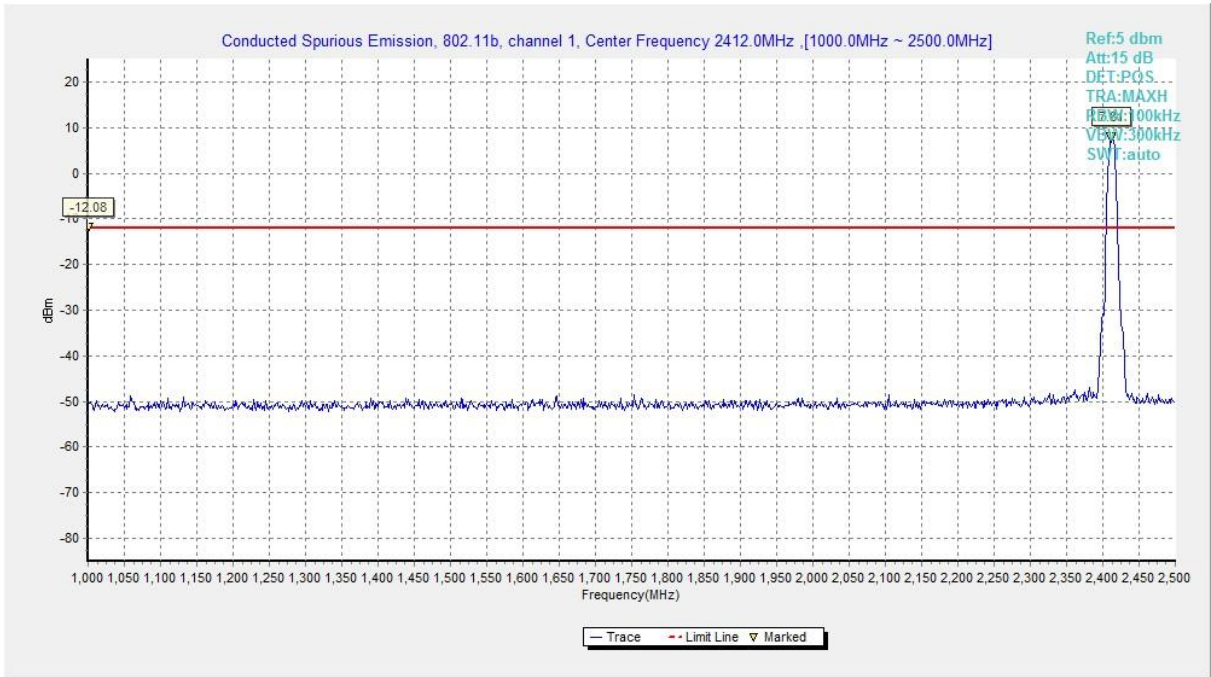


**Fig.A.6.1.1 Conducted Spurious Emission (802.11b, Ch1, Center Frequency)**

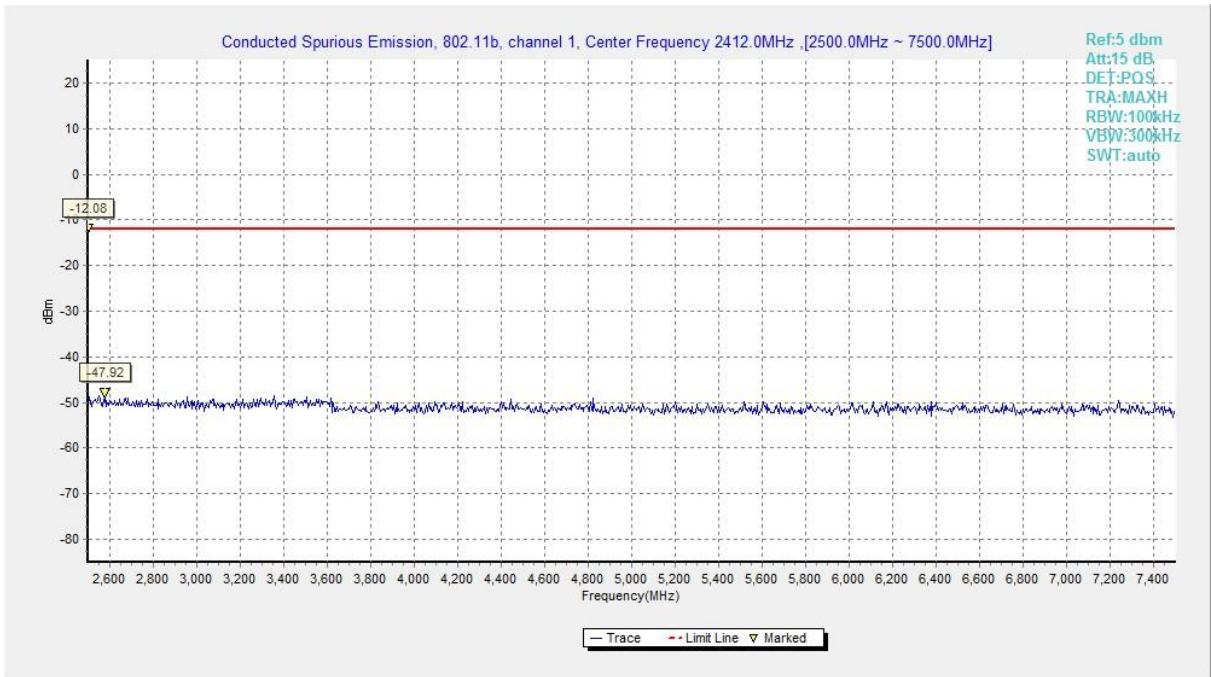


**Fig.A.6.1.2 Conducted Spurious Emission (802.11b, Ch1, 30 MHz-1 GHz)**

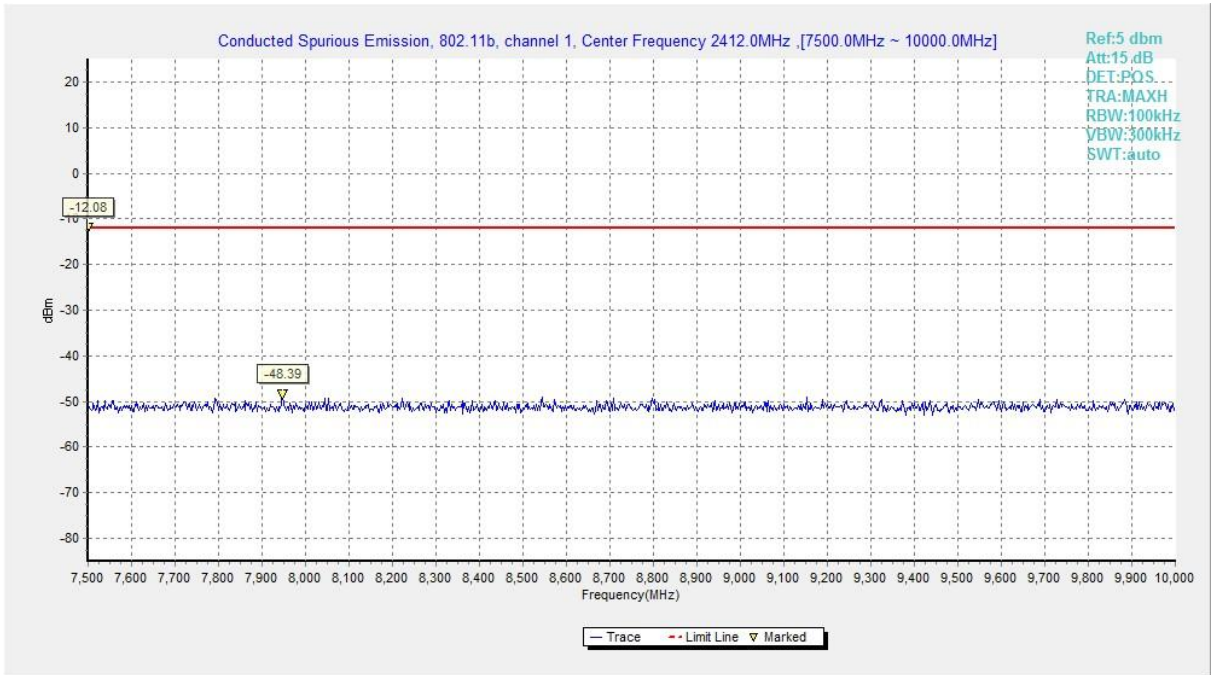




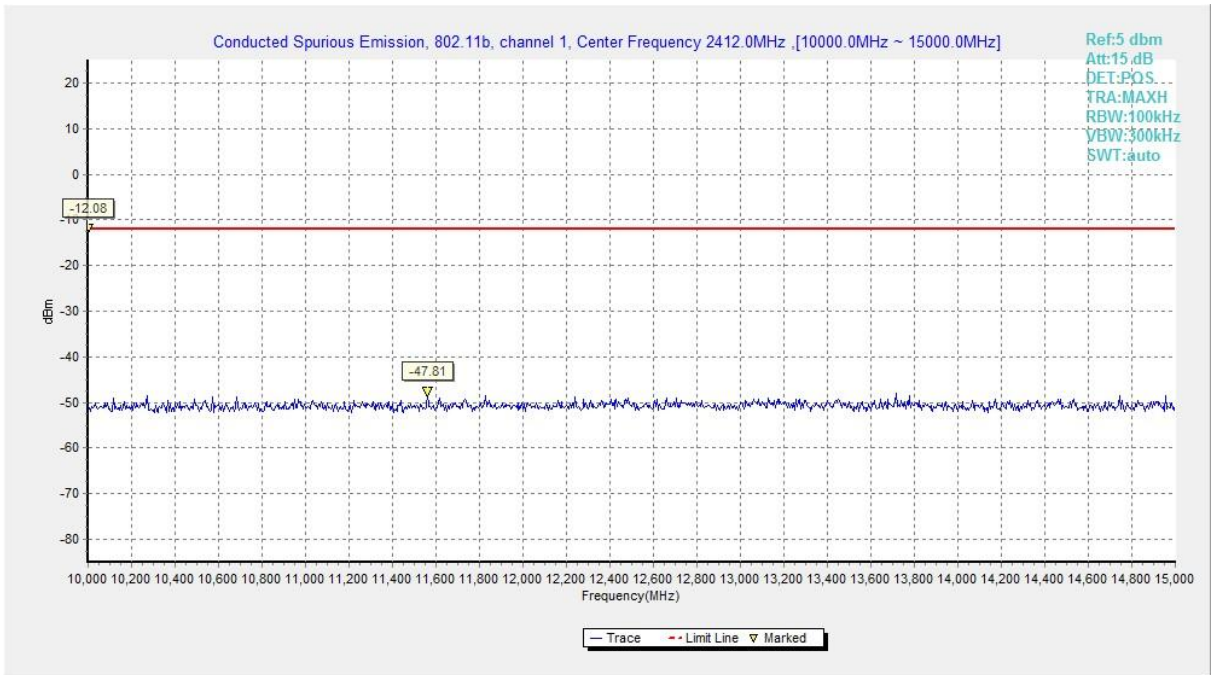
**Fig.A.6.1.3 Conducted Spurious Emission (802.11b, Ch1, 1 GHz-2.5 GHz)**



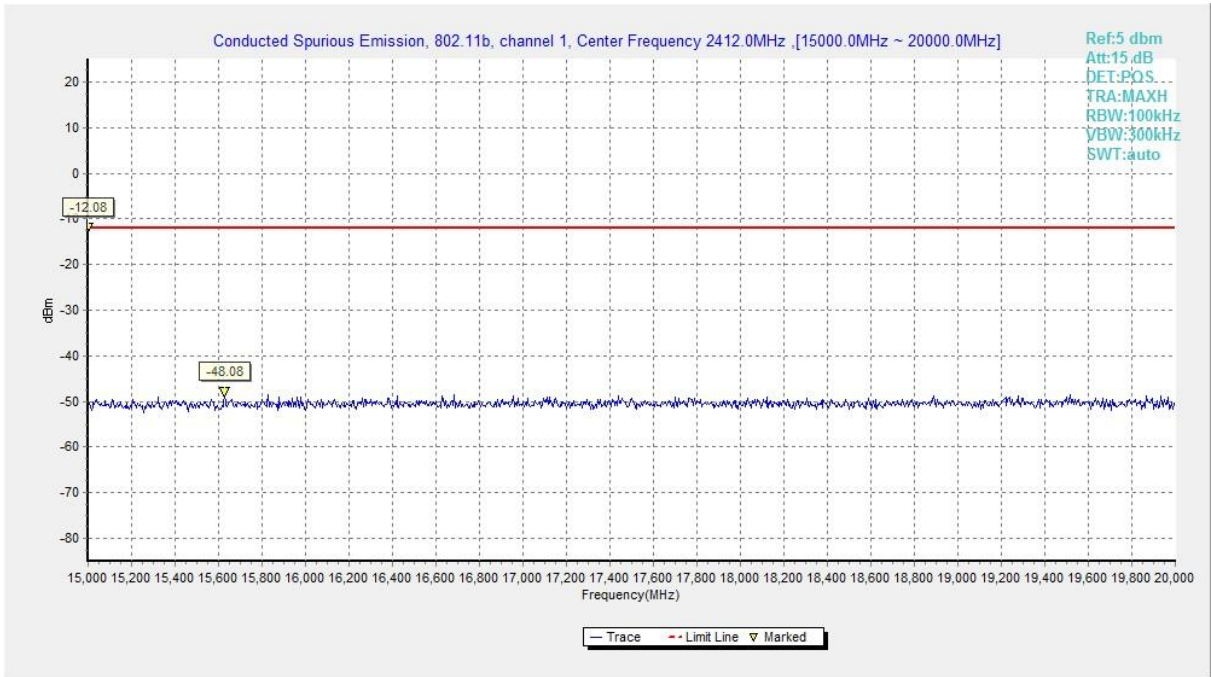
**Fig.A.6.1.4 Conducted Spurious Emission (802.11b, Ch1, 2.5 GHz-7.5 GHz)**



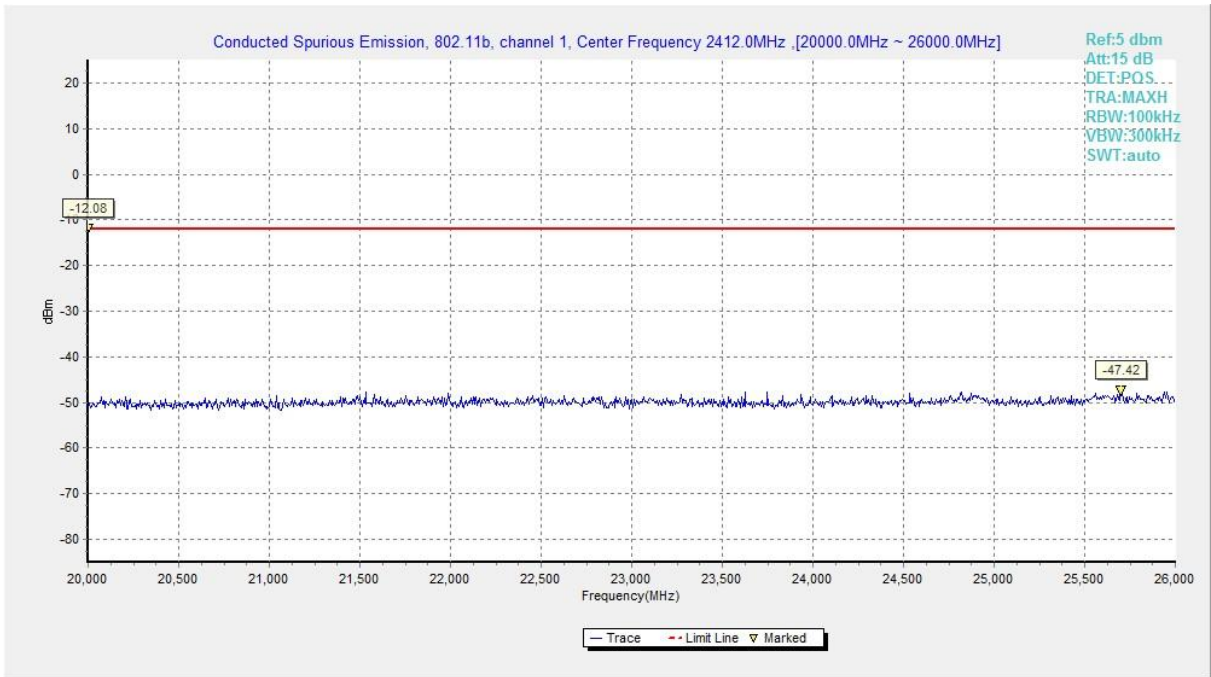
**Fig.A.6.1.5 Conducted Spurious Emission (802.11b, Ch1, 7.5 GHz-10 GHz)**



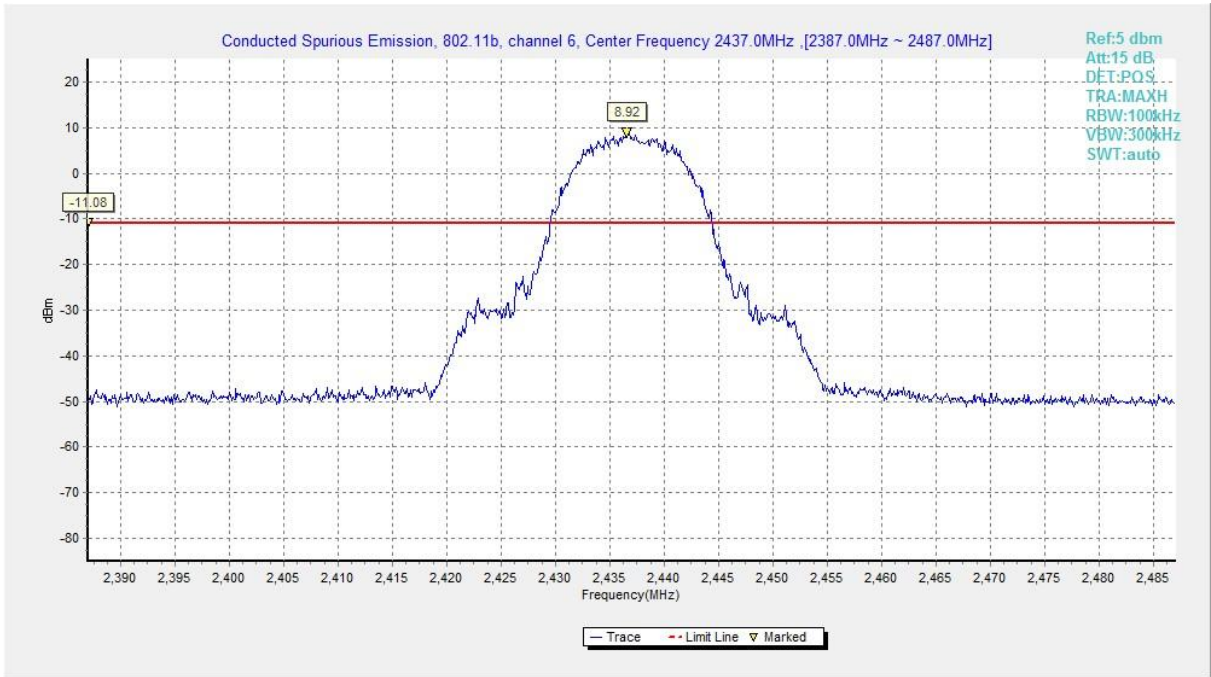
**Fig.A.6.1.6 Conducted Spurious Emission (802.11b, Ch1, 10 GHz-15 GHz)**



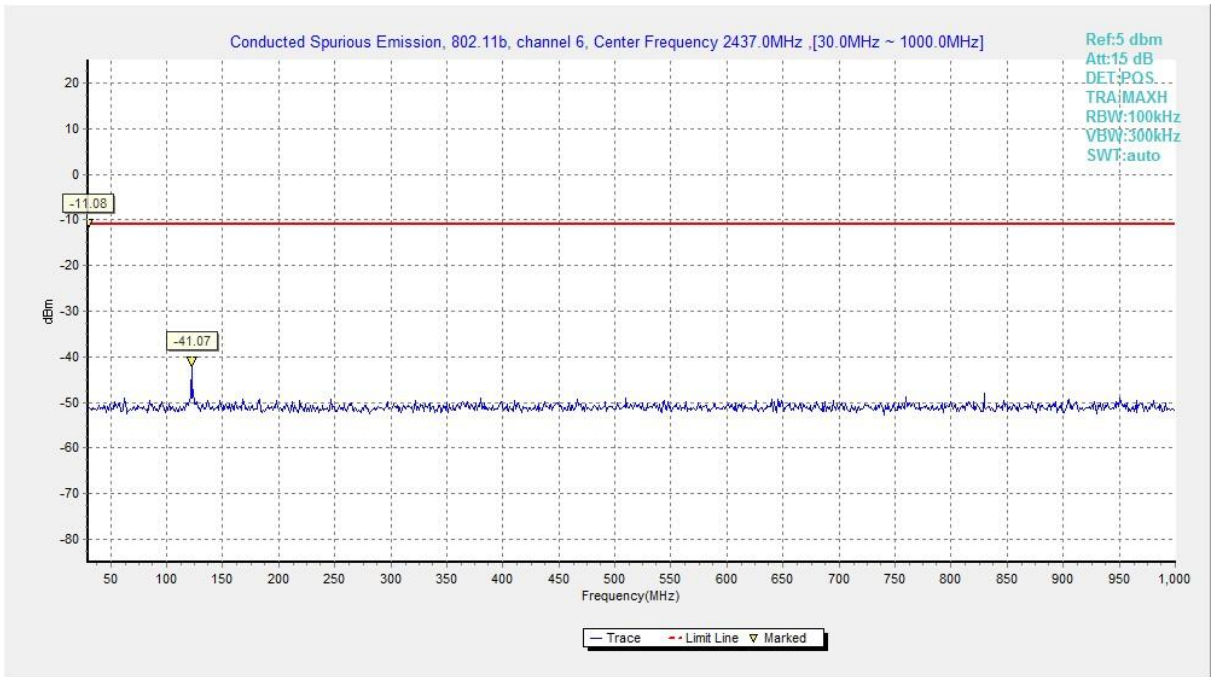
**Fig.A.6.1.7 Conducted Spurious Emission (802.11b, Ch1, 15 GHz-20 GHz)**



**Fig.A.6.1.8 Conducted Spurious Emission (802.11b, Ch1, 20 GHz-26 GHz)**

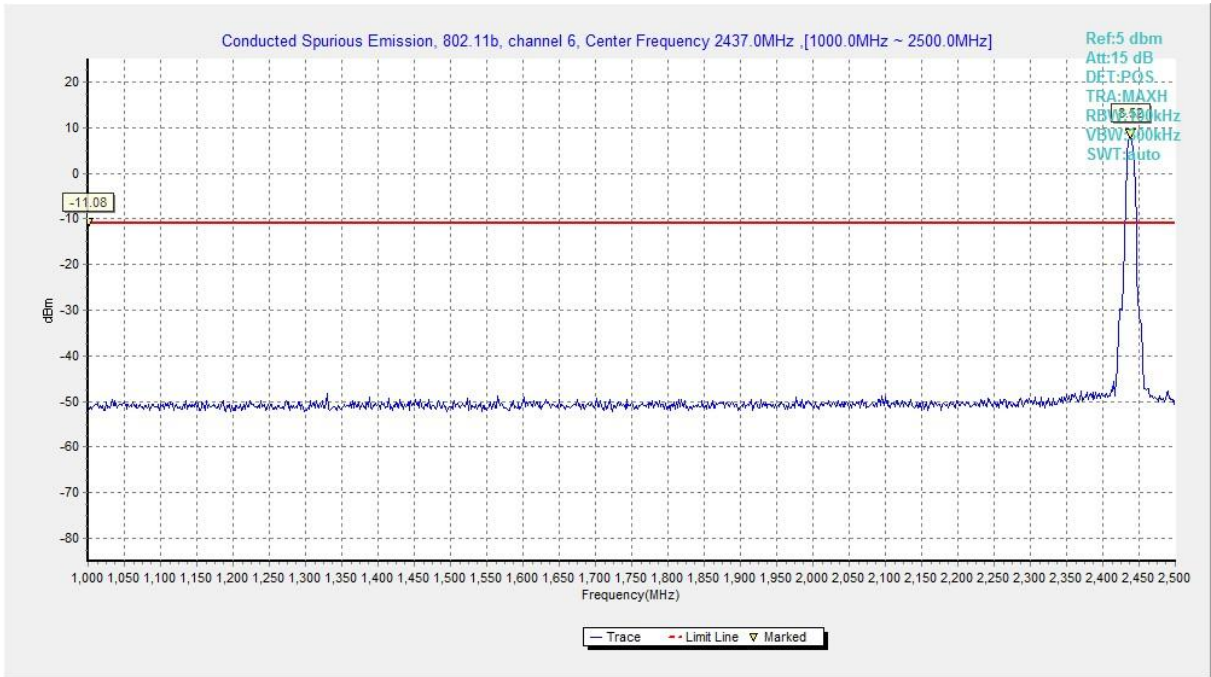


**Fig.A.6.1.9 Conducted Spurious Emission (802.11b, Ch6, Center Frequency)**

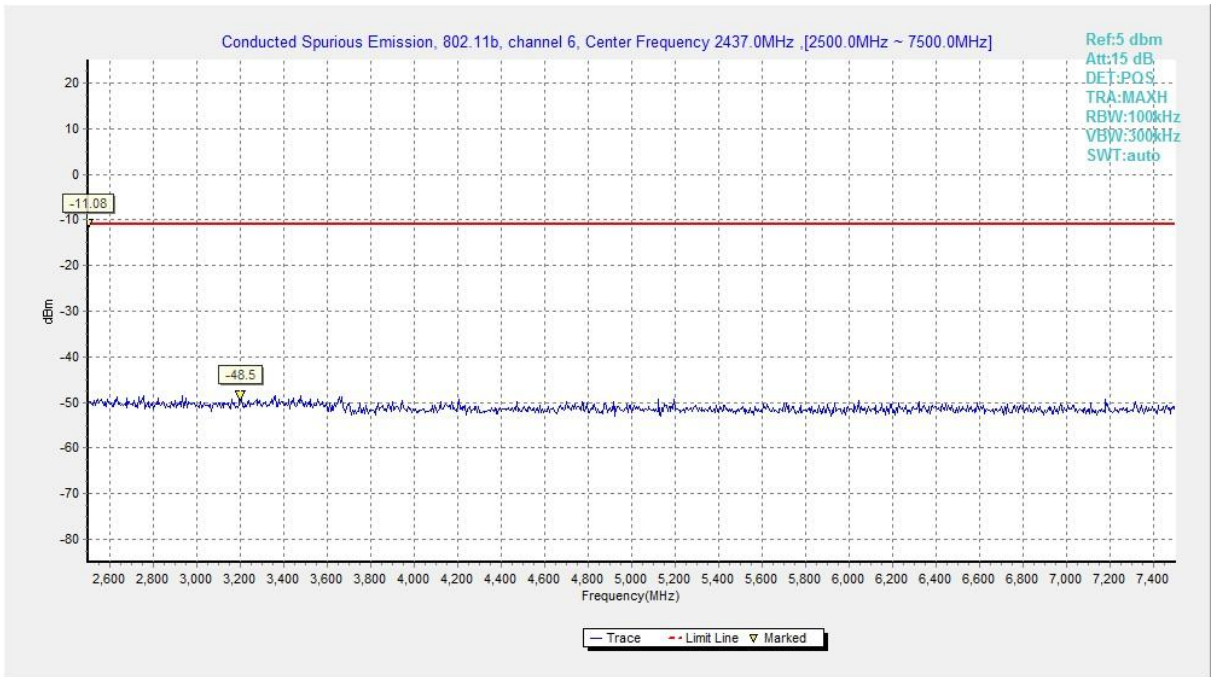


**Fig.A.6.1.10 Conducted Spurious Emission (802.11b, Ch6, 30 MHz-1 GHz)**

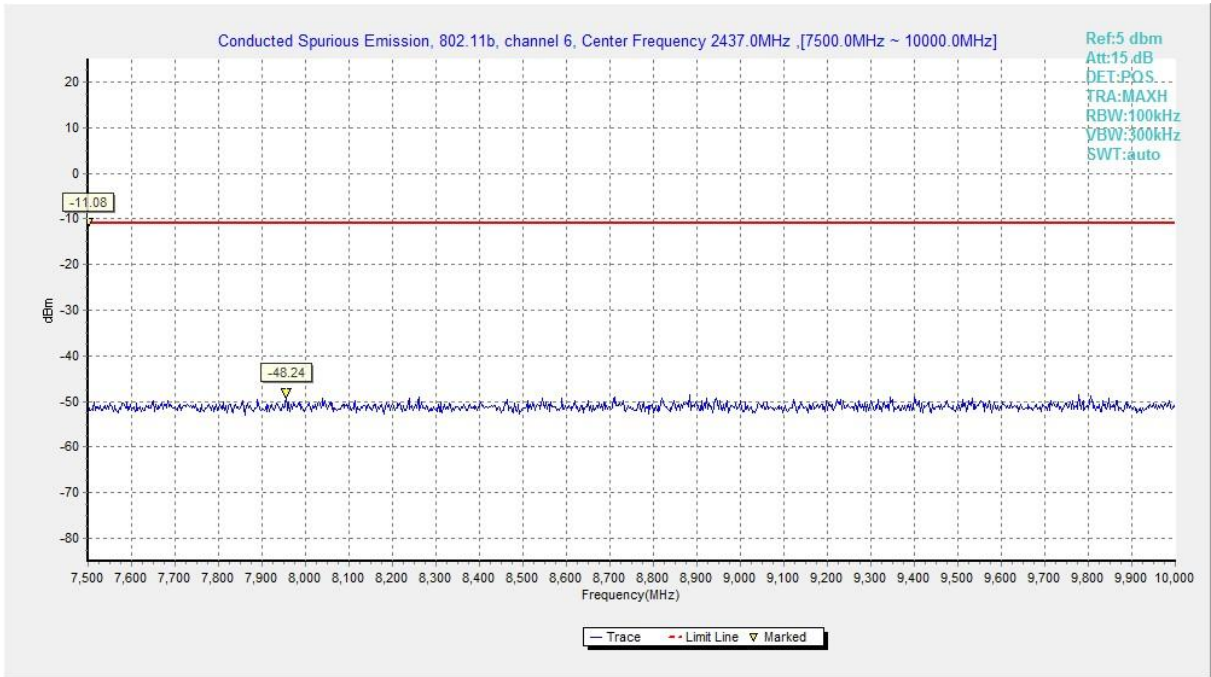




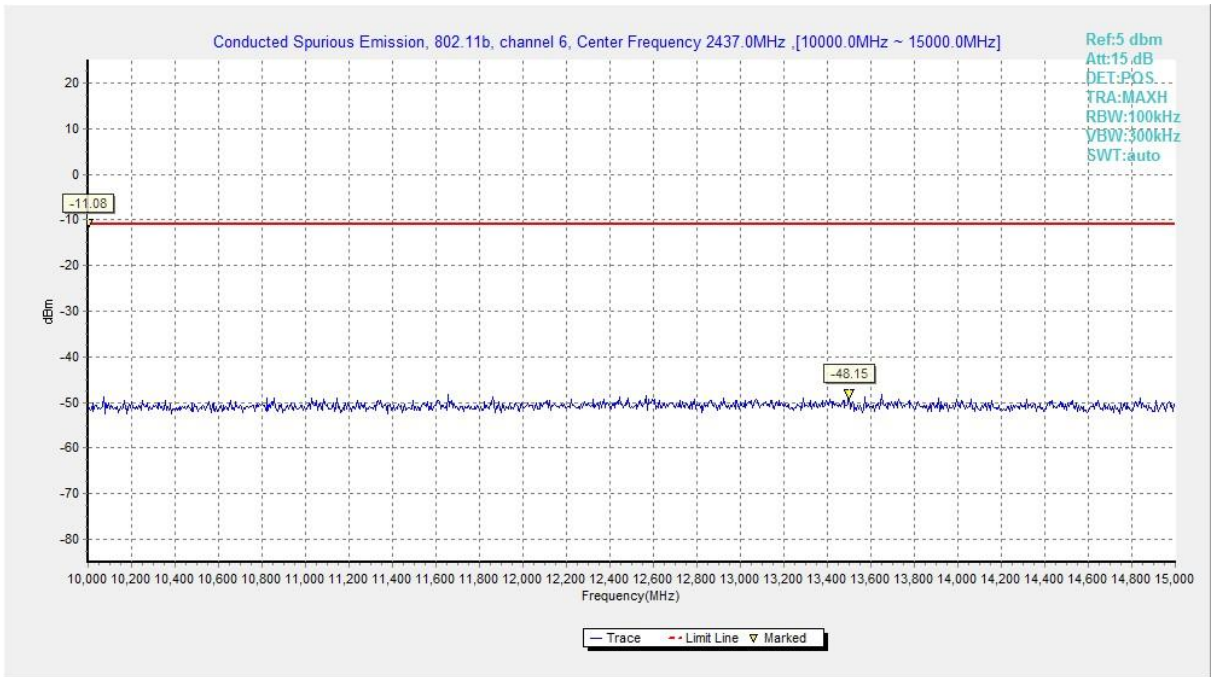
**Fig.A.6.1.11 Conducted Spurious Emission (802.11b, Ch6, 1 GHz-2.5 GHz)**



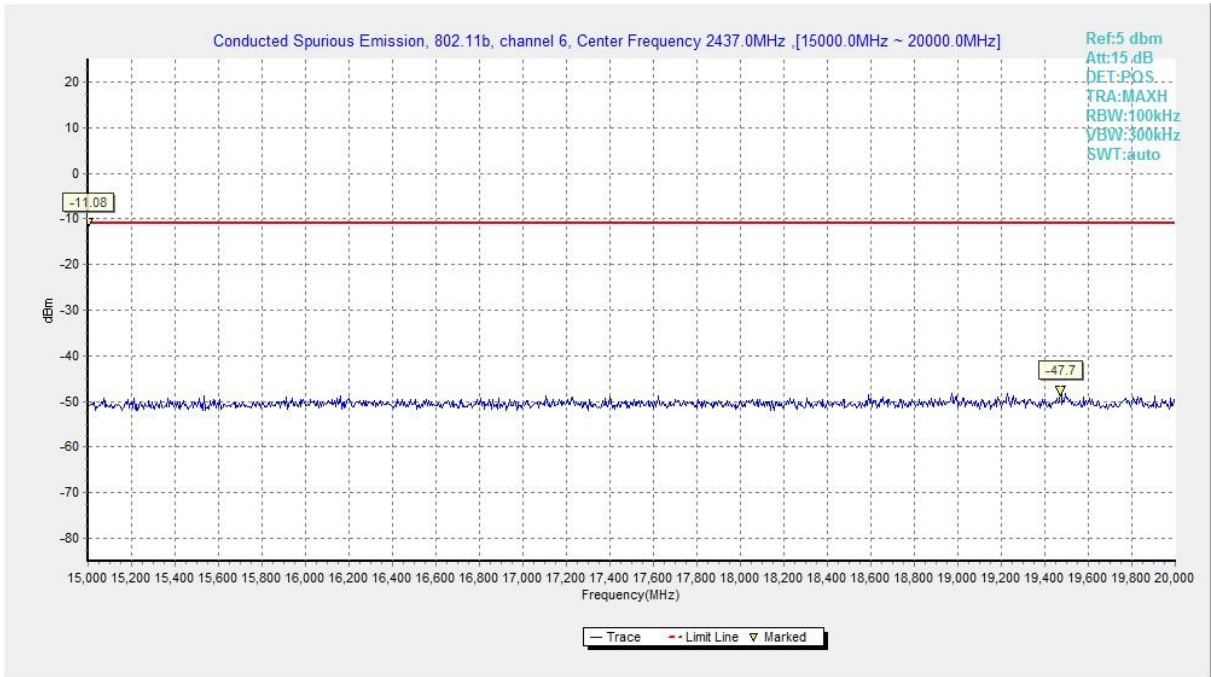
**Fig.A.6.1.12 Conducted Spurious Emission (802.11b, Ch6, 2.5 GHz-7.5 GHz)**



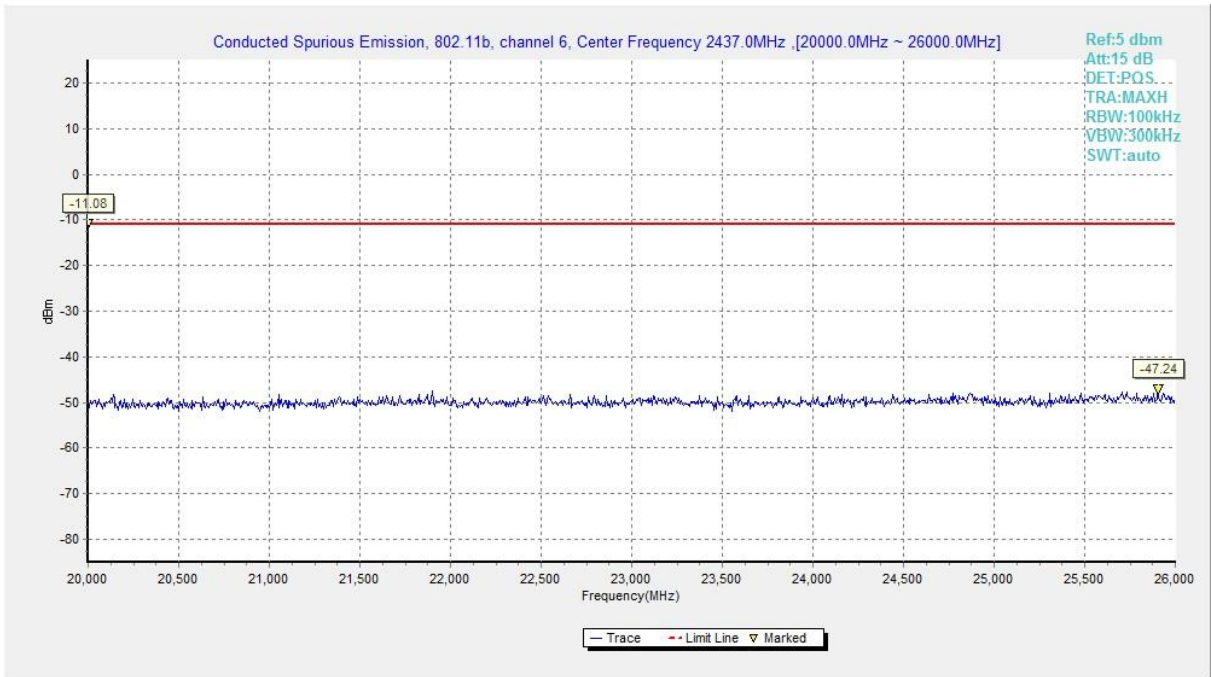
**Fig.A.6.1.13 Conducted Spurious Emission (802.11b, Ch6, 7.5 GHz-10 GHz)**



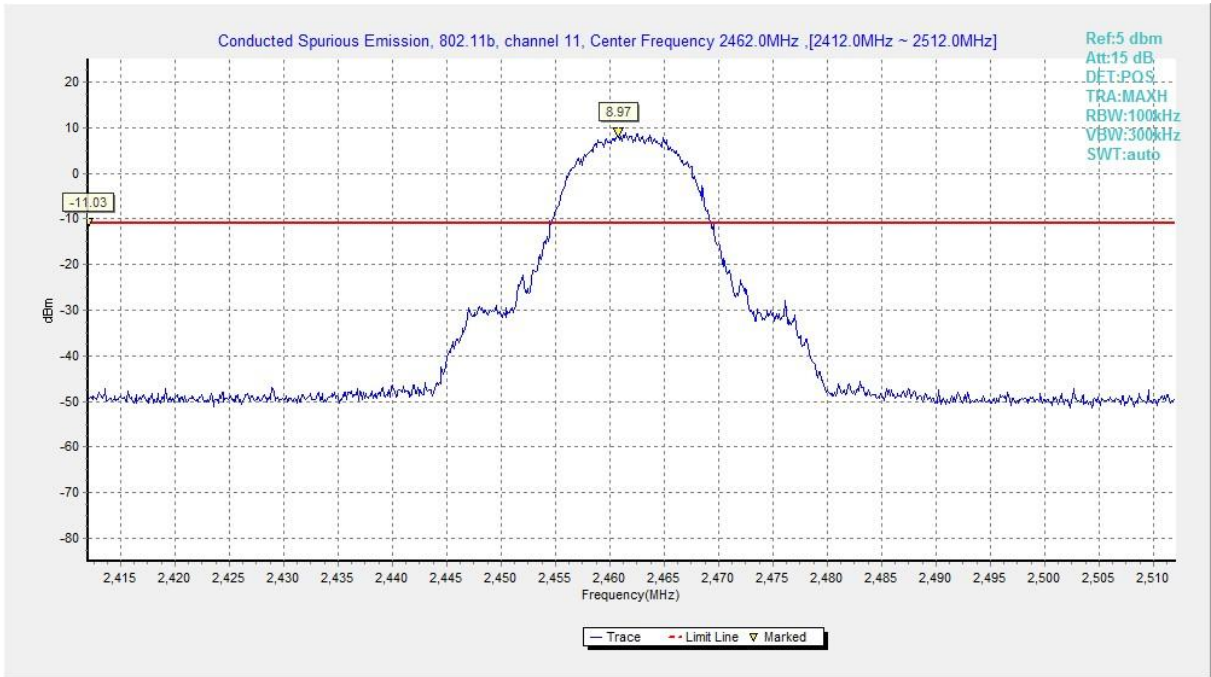
**Fig.A.6.1.14 Conducted Spurious Emission (802.11b, Ch6, 10 GHz-15 GHz)**



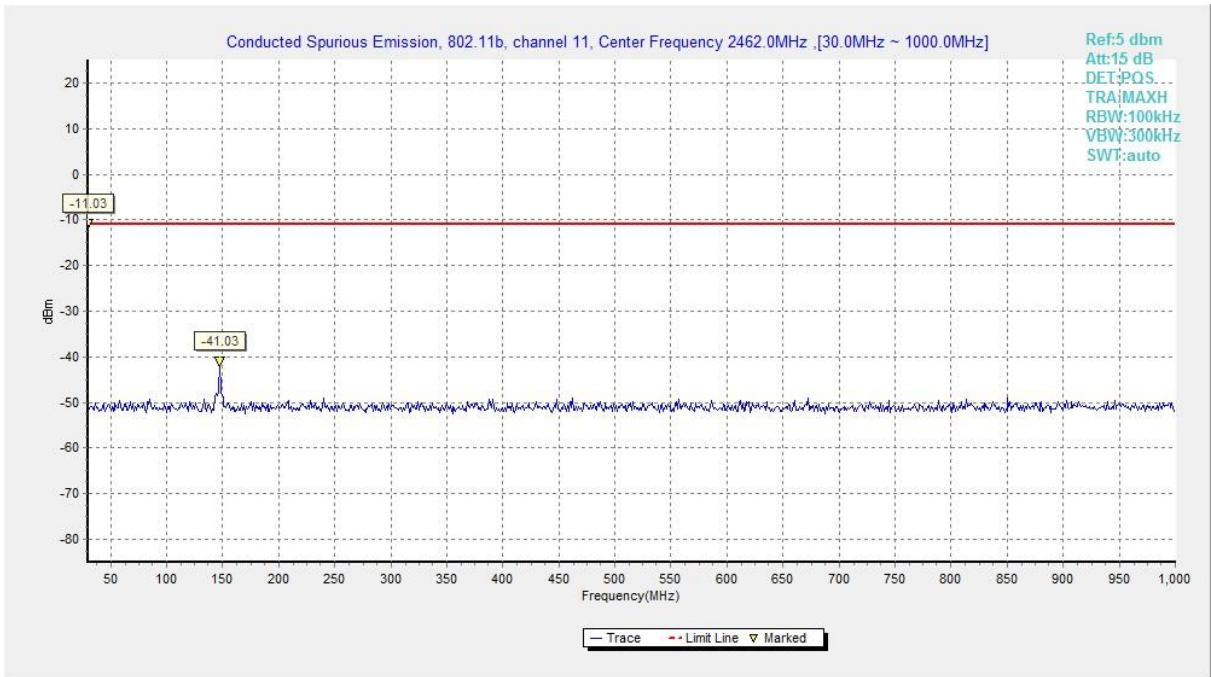
**Fig.A.6.1.15 Conducted Spurious Emission (802.11b, Ch6, 15 GHz-20 GHz)**



**Fig.A.6.1.16 Conducted Spurious Emission (802.11b, Ch6, 20 GHz-26 GHz)**

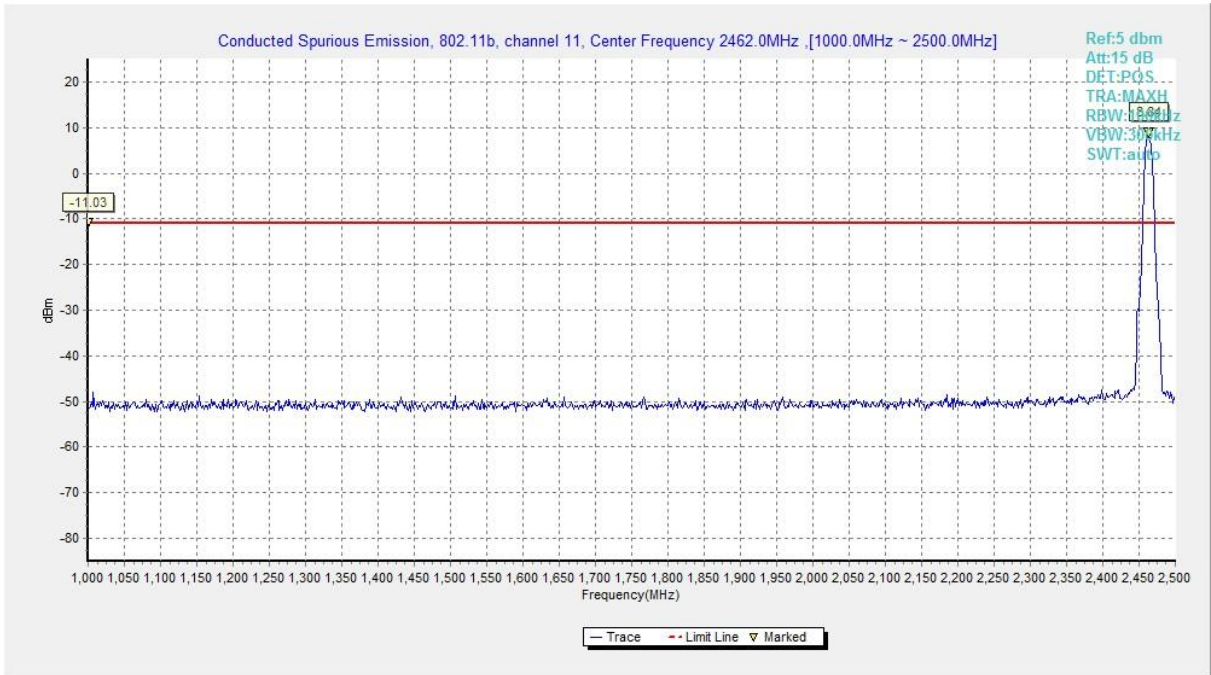


**Fig.A.6.1.17 Conducted Spurious Emission (802.11b, Ch11, Center Frequency)**

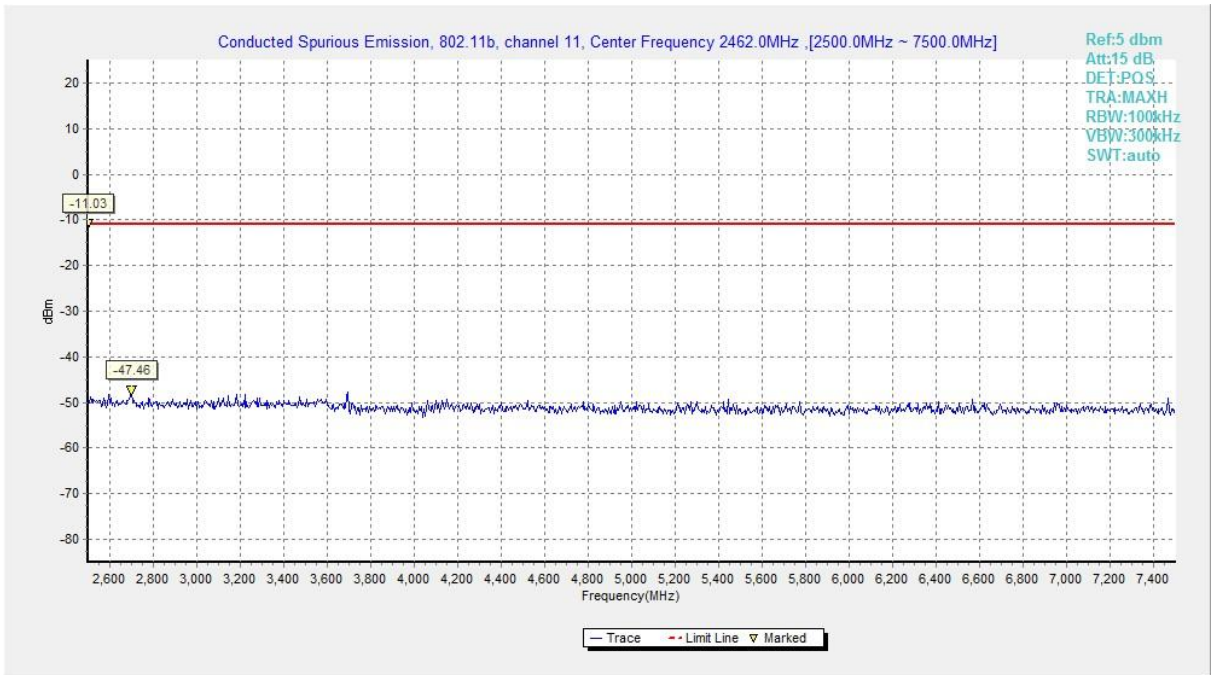


**Fig.A.6.1.18 Conducted Spurious Emission (802.11b, Ch11, 30 MHz-1 GHz)**

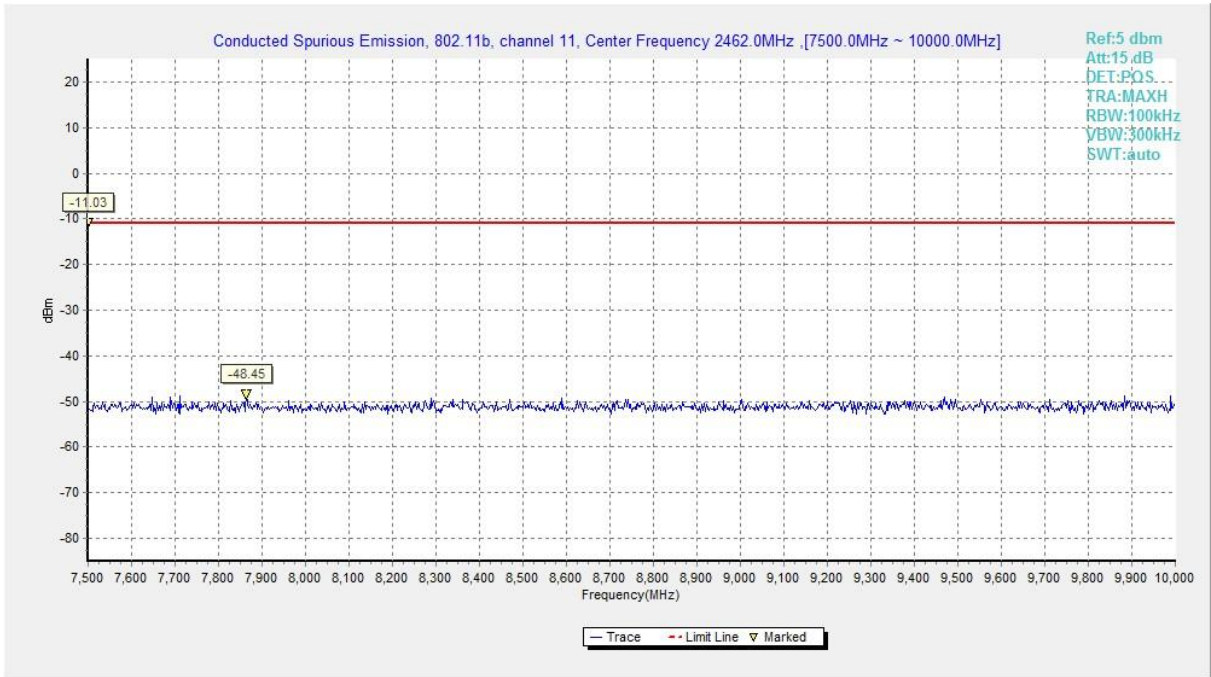




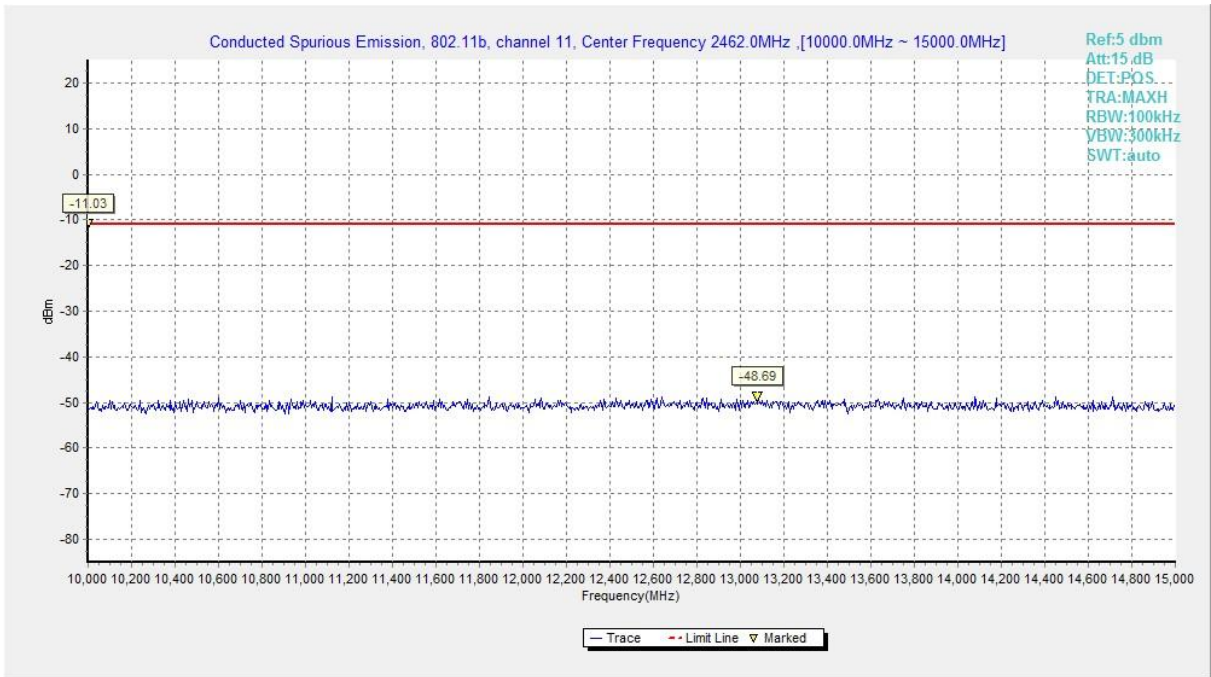
**Fig.A.6.1.19 Conducted Spurious Emission (802.11b, Ch11, 1 GHz-2.5 GHz)**



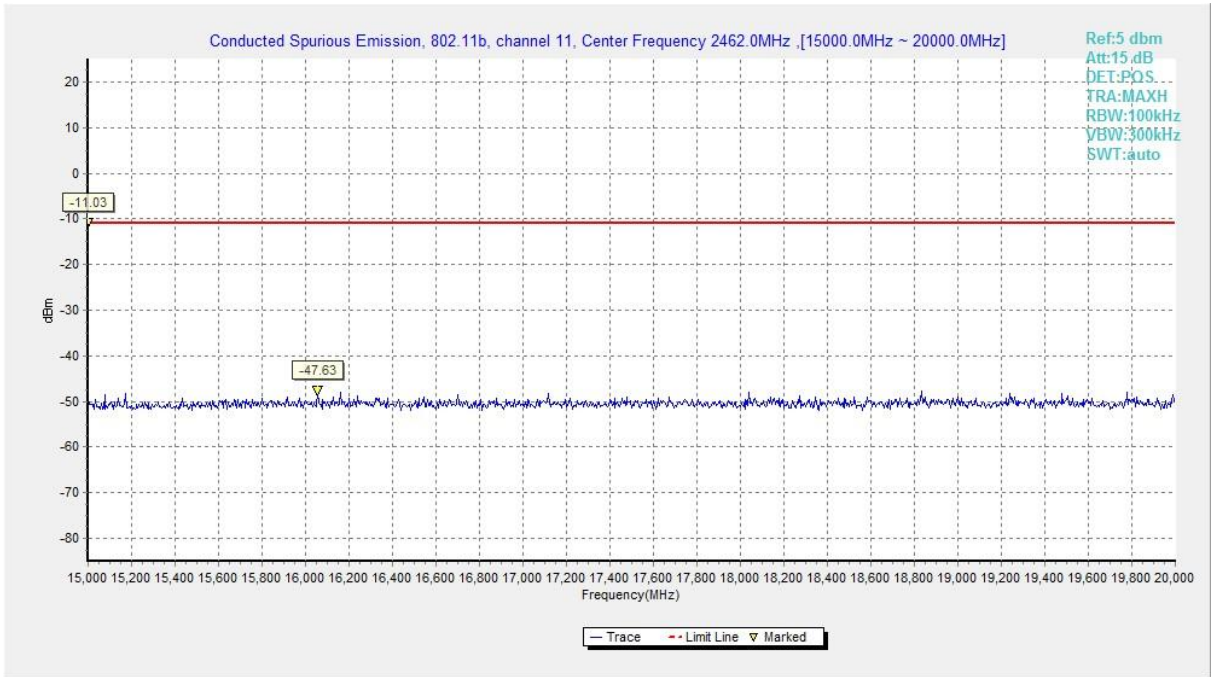
**Fig.A.6.1.20 Conducted Spurious Emission (802.11b, Ch11, 2.5 GHz-7.5 GHz)**



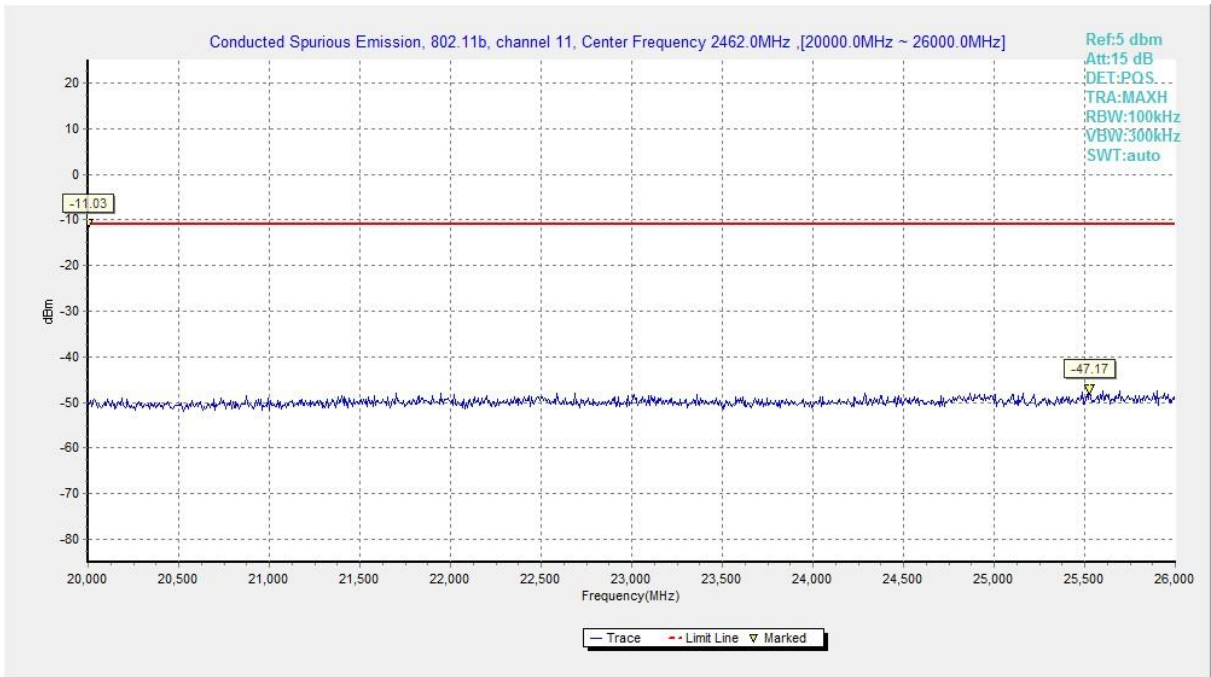
**Fig.A.6.1.21 Conducted Spurious Emission (802.11b, Ch11, 7.5 GHz-10 GHz)**



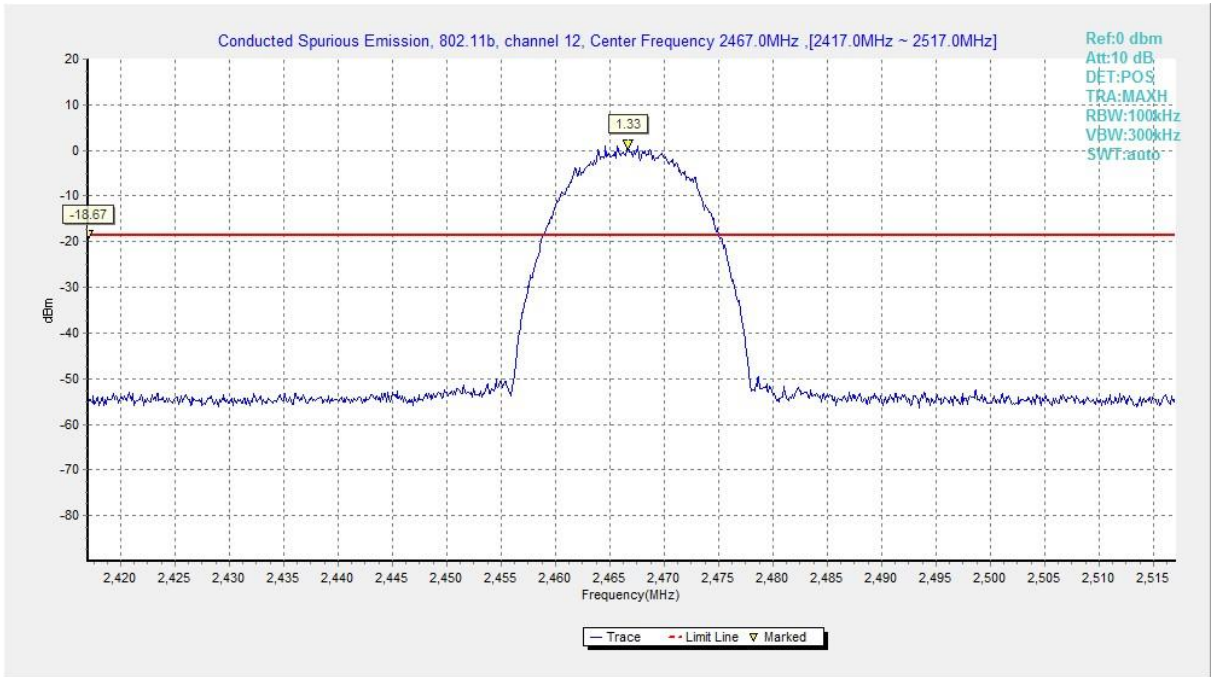
**Fig.A.6.1.22 Conducted Spurious Emission (802.11b, Ch11, 10 GHz-15 GHz)**



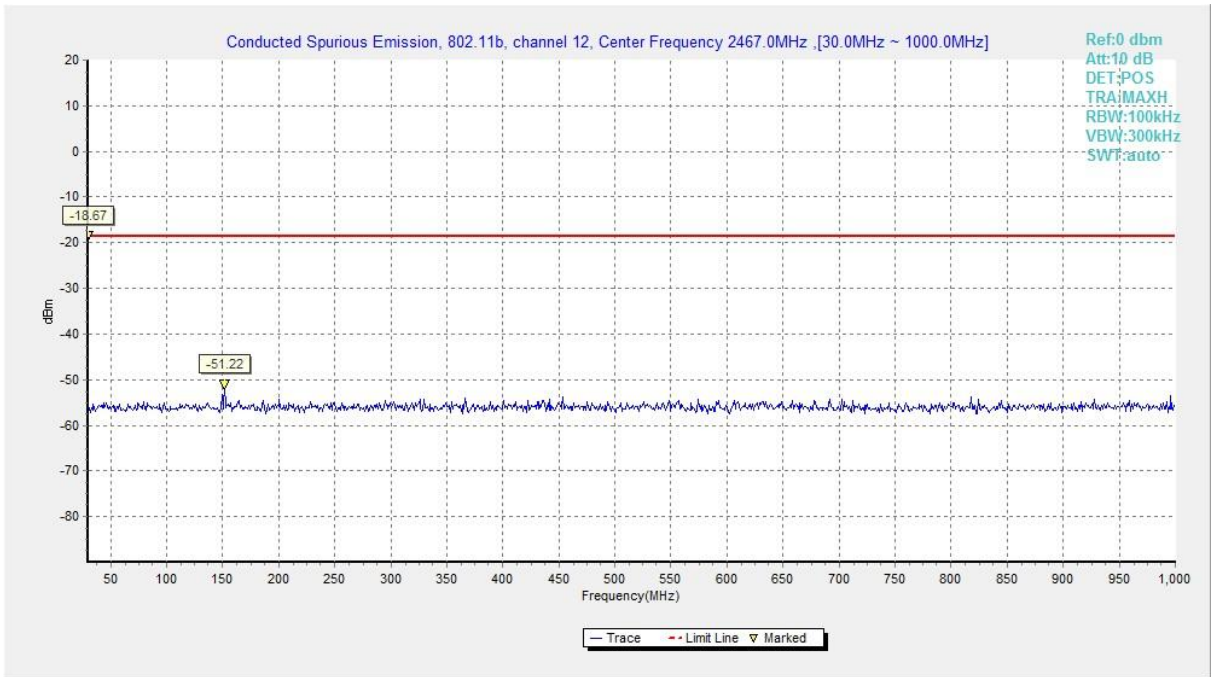
**Fig.A.6.1.23 Conducted Spurious Emission (802.11b, Ch11, 15 GHz-20 GHz)**



**Fig.A.6.1.24 Conducted Spurious Emission (802.11b, Ch11, 20 GHz-26 GHz)**

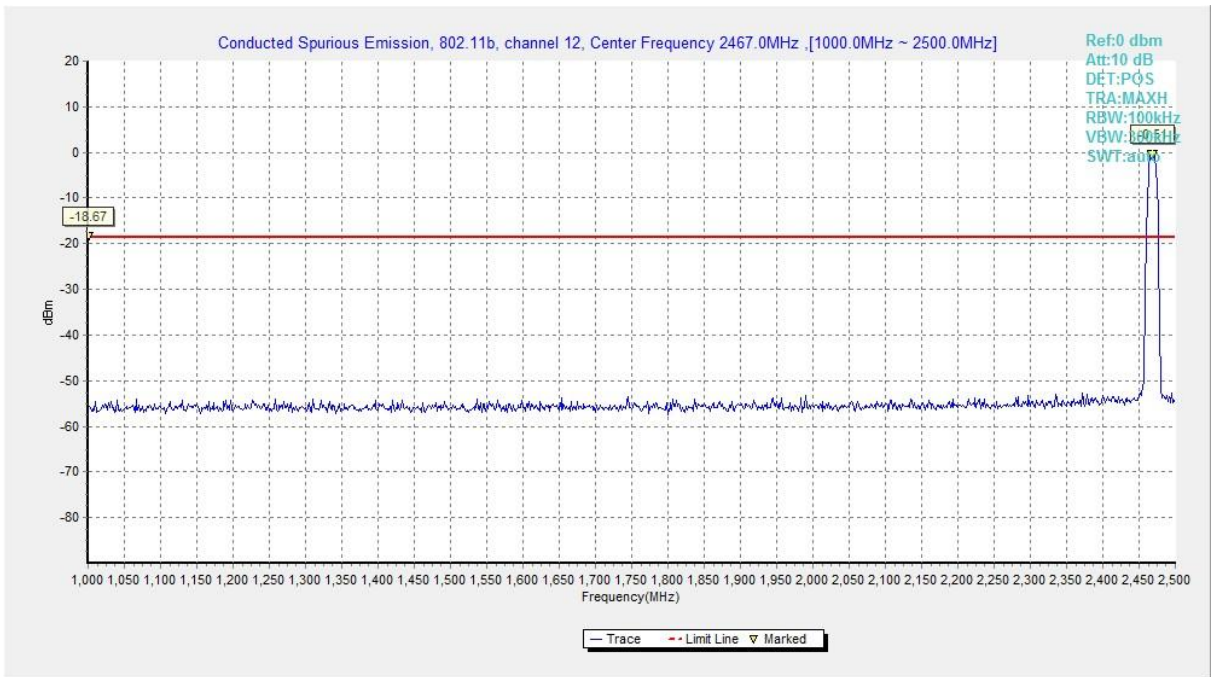


**Fig.A.6.1.25 Conducted Spurious Emission (802.11b, Ch12, Center Frequency)**

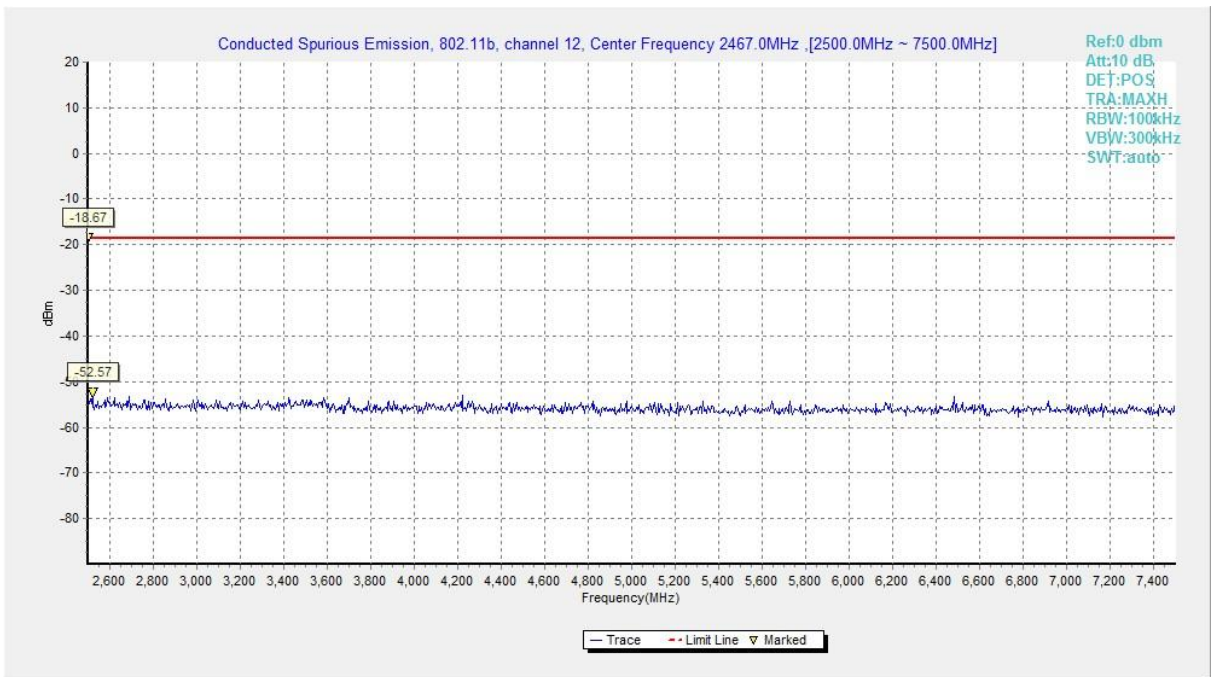


**Fig.A.6.1.26 Conducted Spurious Emission (802.11b, Ch12, 30 MHz-1 GHz)**

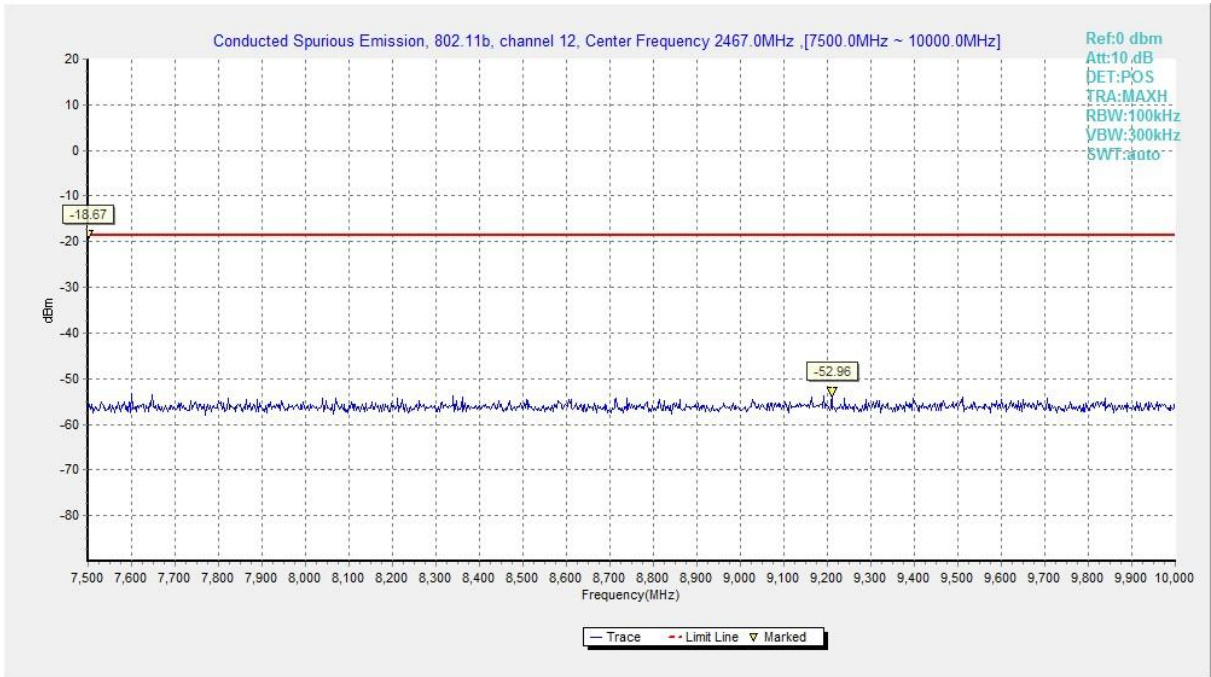




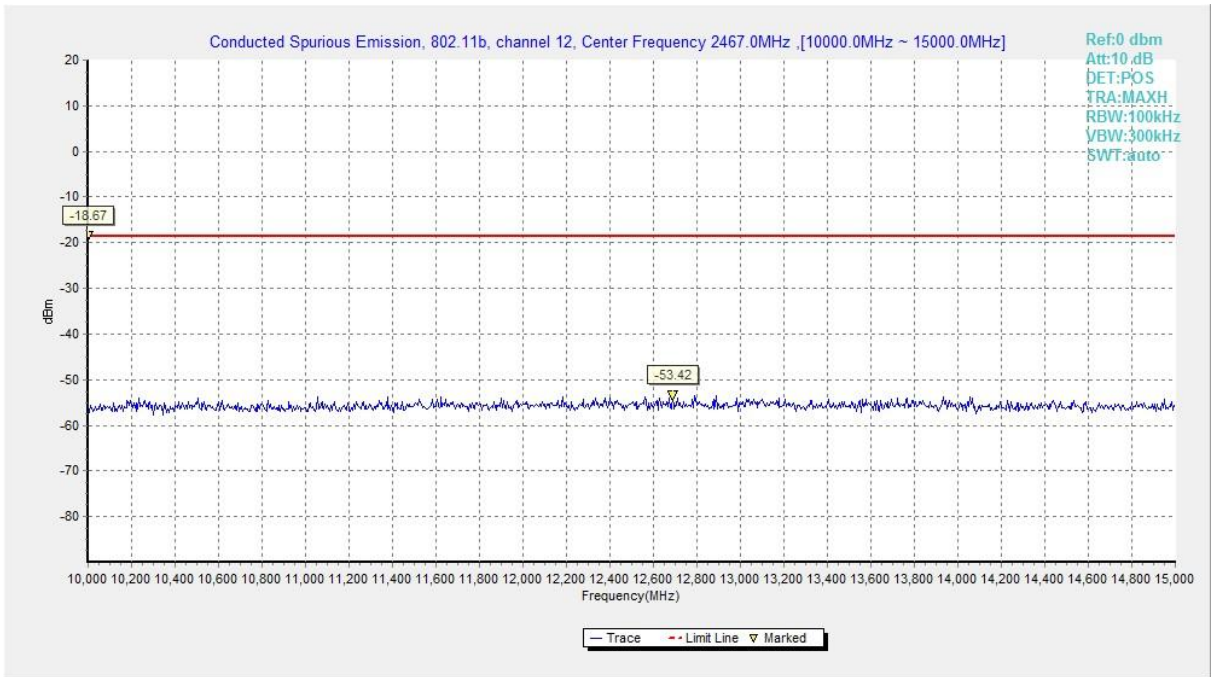
**Fig.A.6.1.27 Conducted Spurious Emission (802.11b, Ch12, 1 GHz-2.5 GHz)**



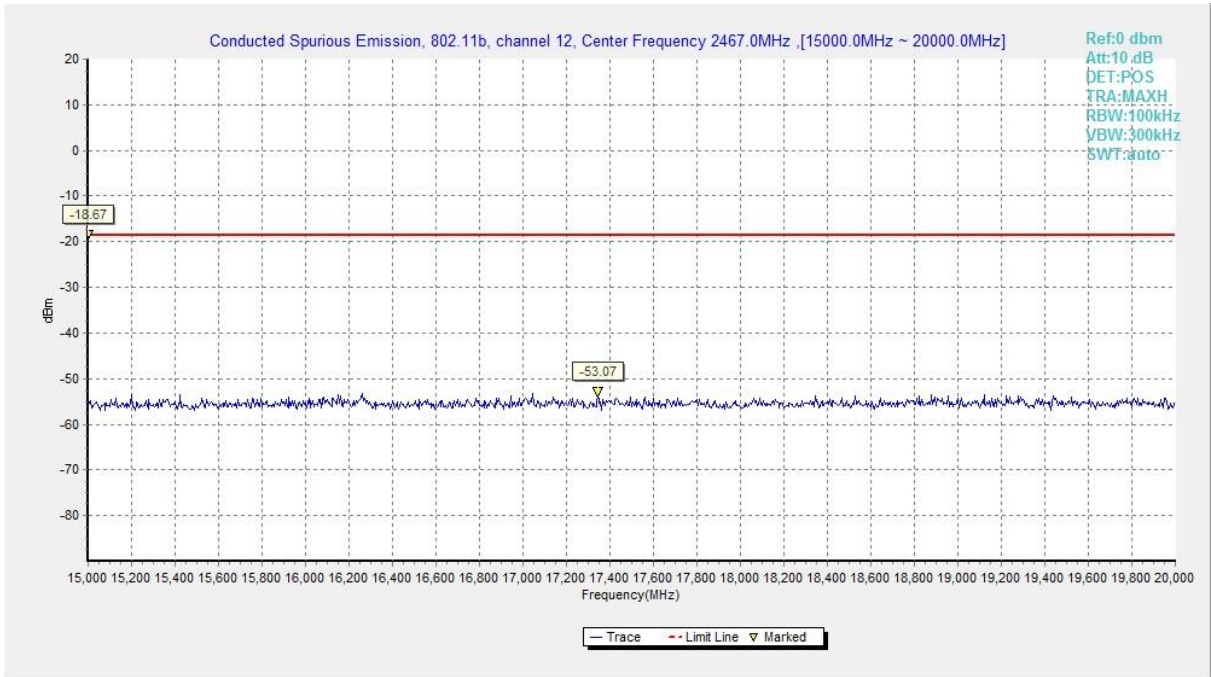
**Fig.A.6.1.28 Conducted Spurious Emission (802.11b, Ch12, 2.5 GHz-7.5 GHz)**



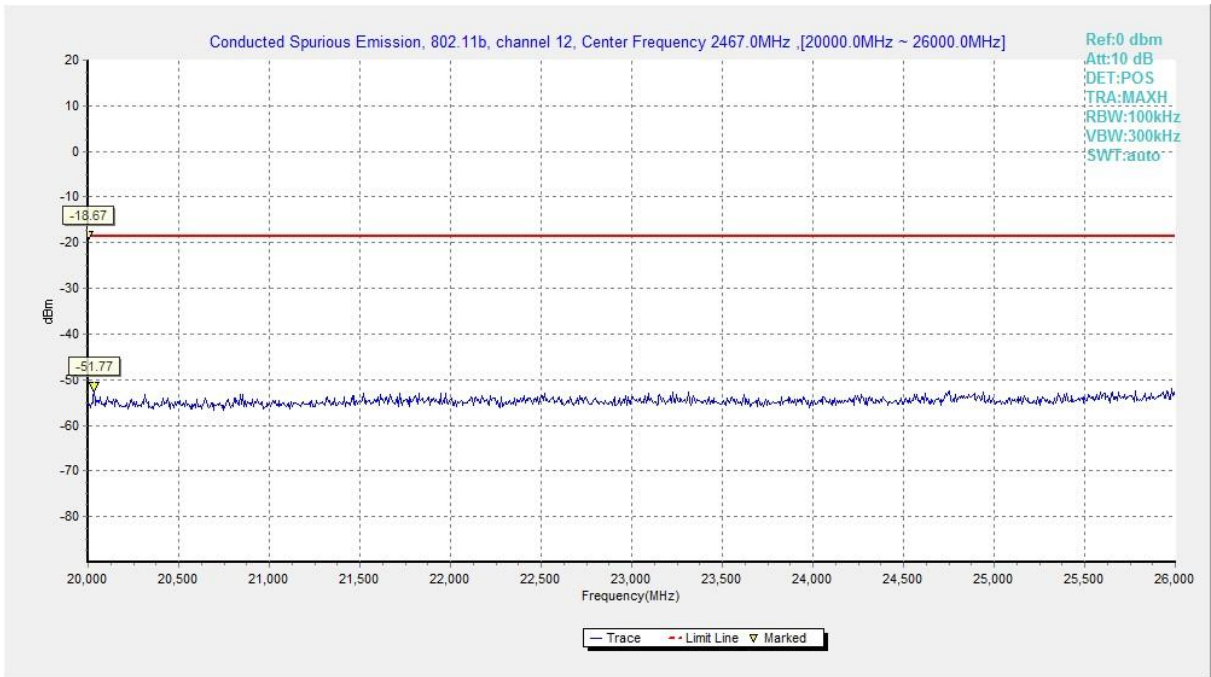
**Fig.A.6.1.29 Conducted Spurious Emission (802.11b, Ch12, 7.5 GHz-10 GHz)**



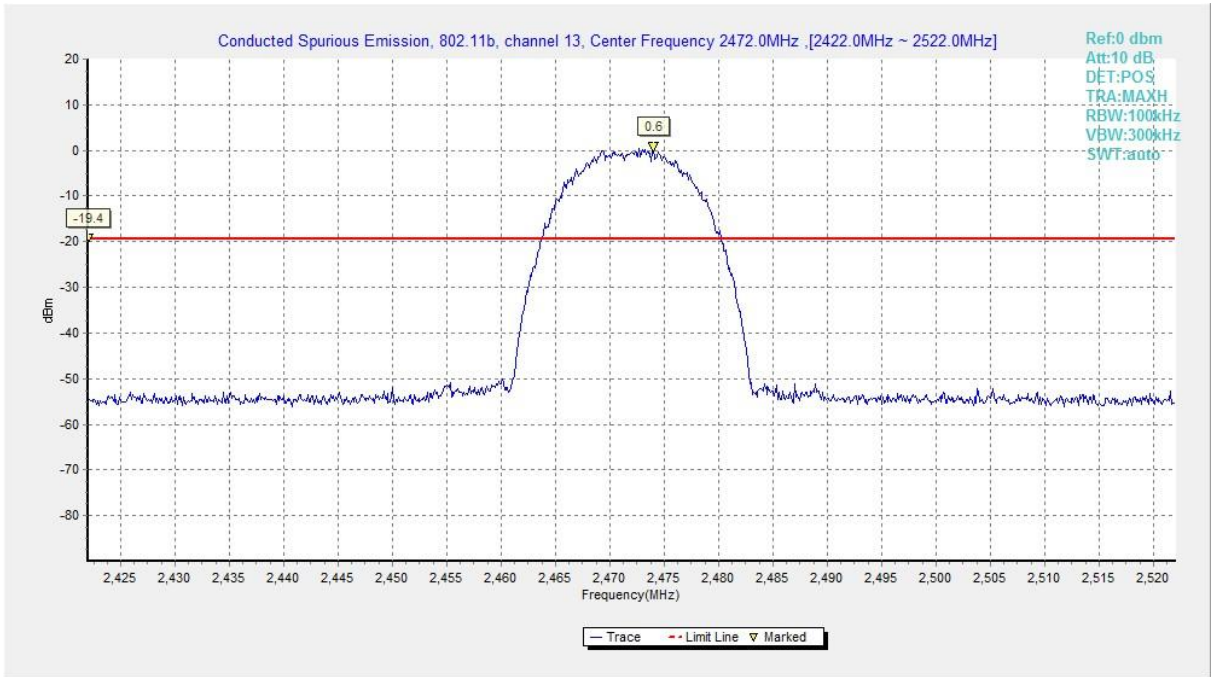
**Fig.A.6.1.30 Conducted Spurious Emission (802.11b, Ch12, 10 GHz-15 GHz)**



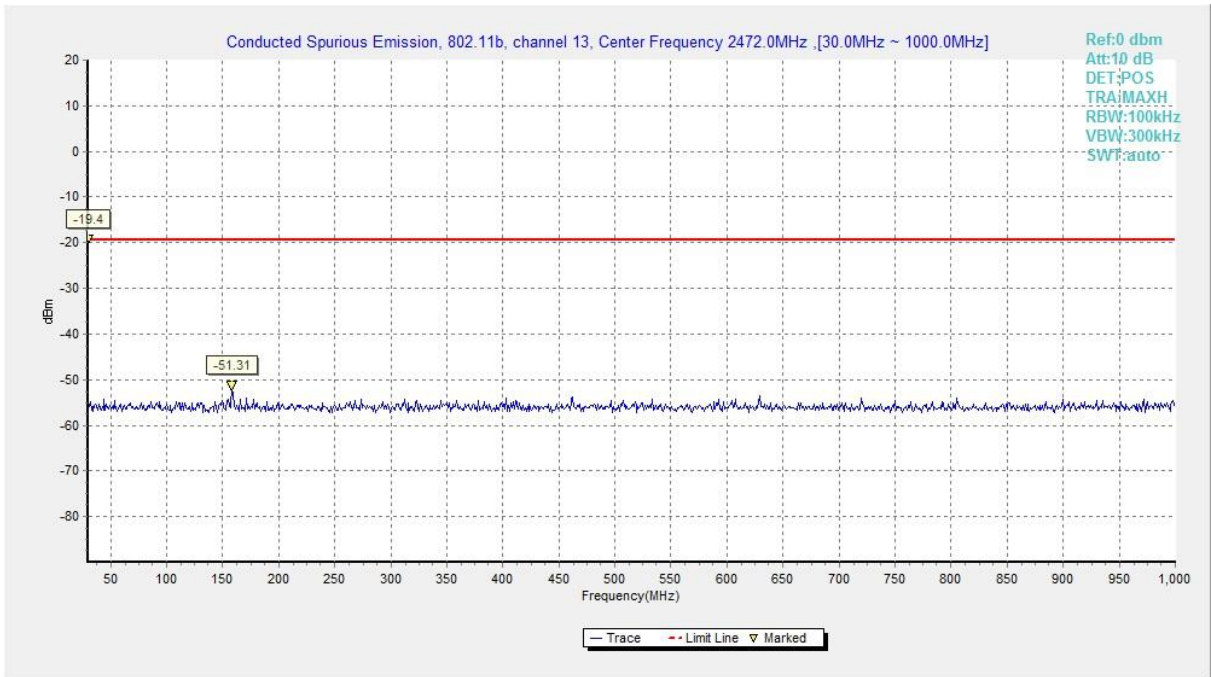
**Fig.A.6.1.31 Conducted Spurious Emission (802.11b, Ch12, 15 GHz-20 GHz)**



**Fig.A.6.1.32 Conducted Spurious Emission (802.11b, Ch12, 20 GHz-26 GHz)**

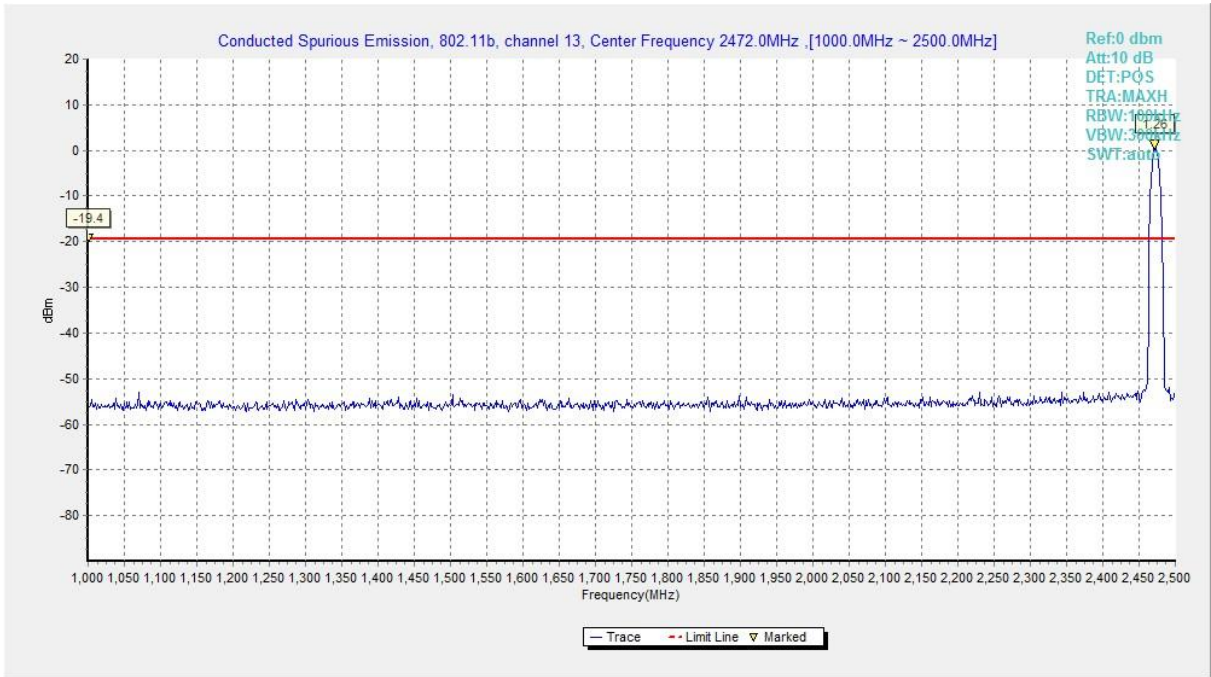


**Fig.A.6.1.33 Conducted Spurious Emission (802.11b, Ch13, Center Frequency)**

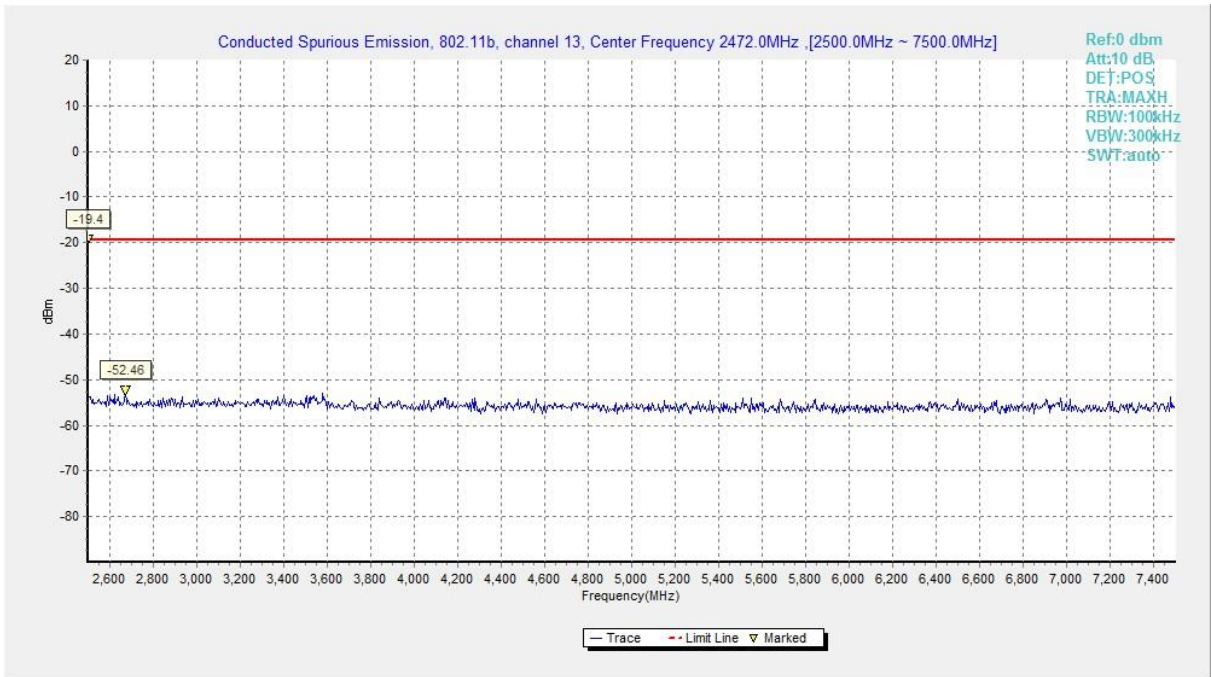


**Fig.A.6.1.34 Conducted Spurious Emission (802.11b, Ch13, 30 MHz-1 GHz)**

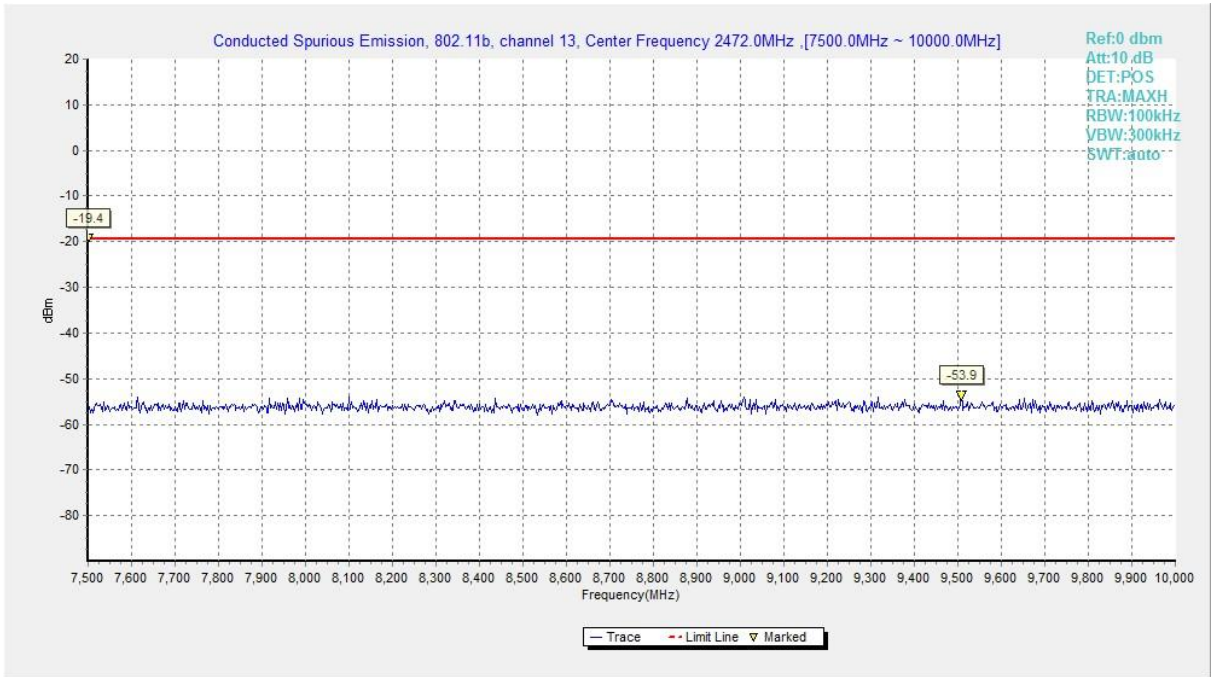




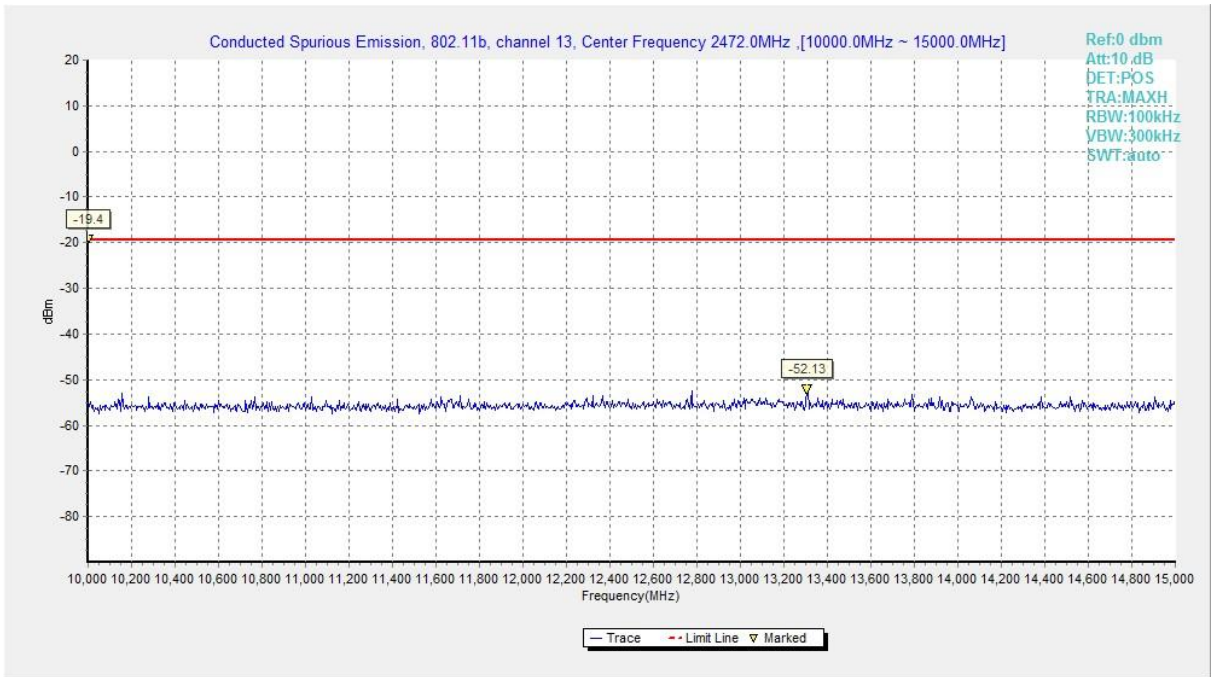
**Fig.A.6.1.35 Conducted Spurious Emission (802.11b, Ch13, 1 GHz-2.5 GHz)**



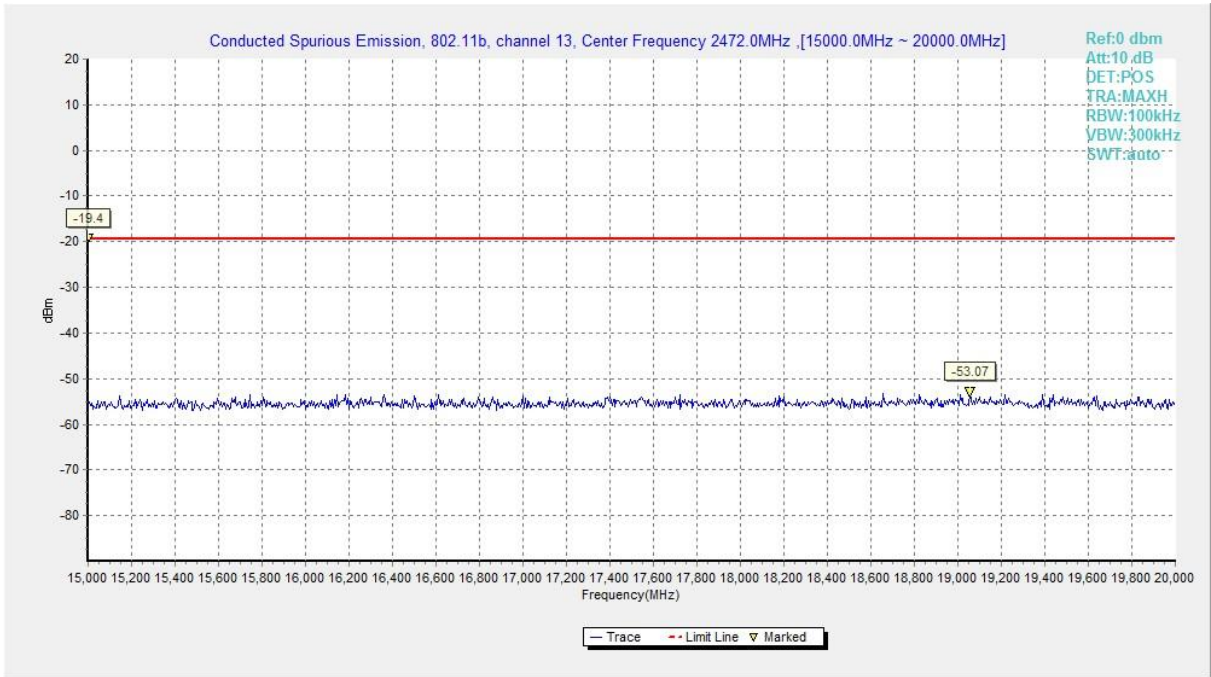
**Fig.A.6.1.36 Conducted Spurious Emission (802.11b, Ch13, 2.5 GHz-7.5 GHz)**



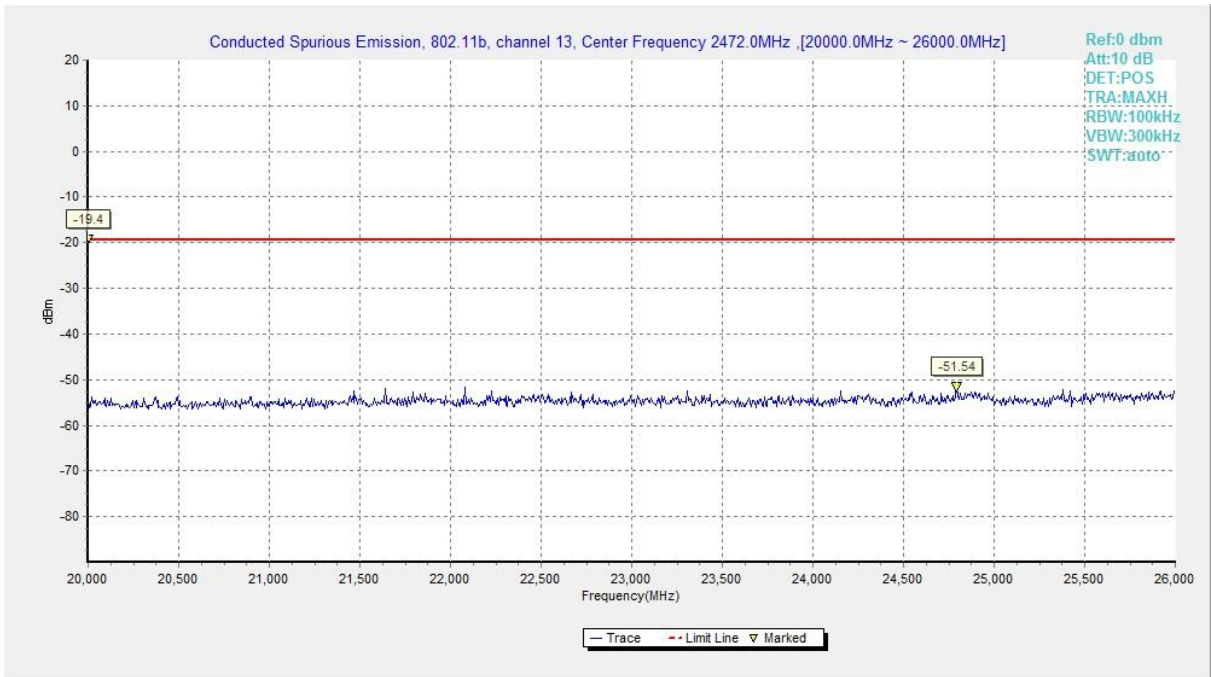
**Fig.A.6.1.37 Conducted Spurious Emission (802.11b, Ch13, 7.5 GHz-10 GHz)**



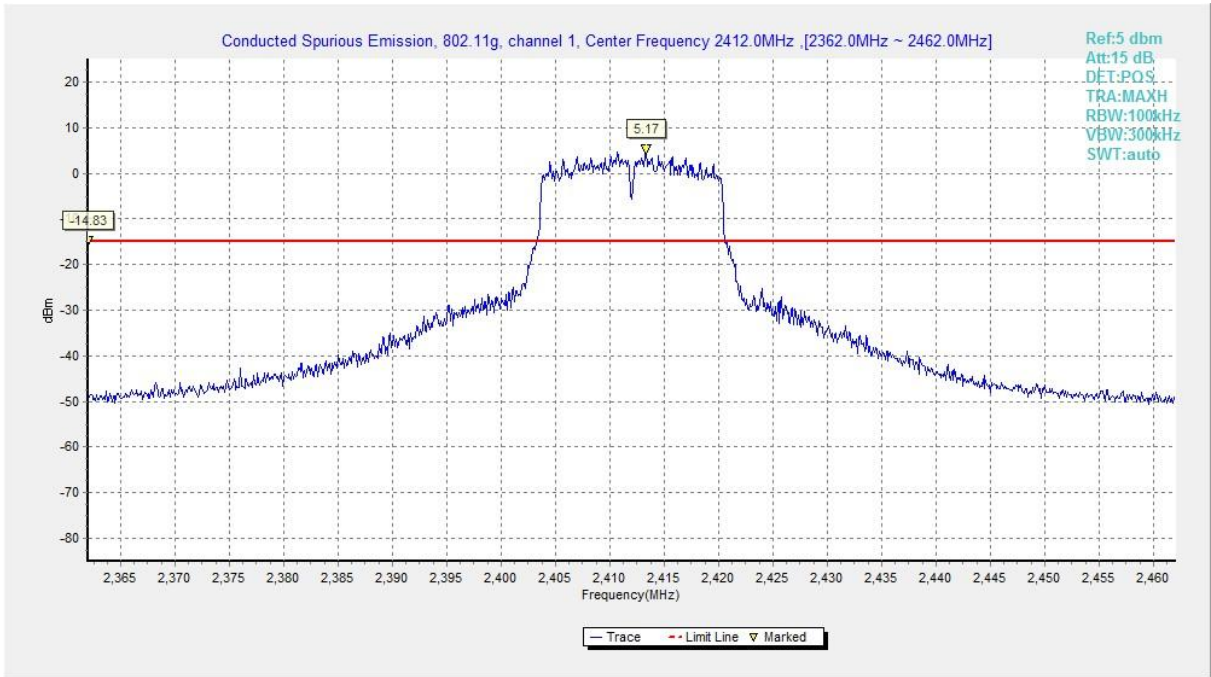
**Fig.A.6.1.38 Conducted Spurious Emission (802.11b, Ch13, 10 GHz-15 GHz)**



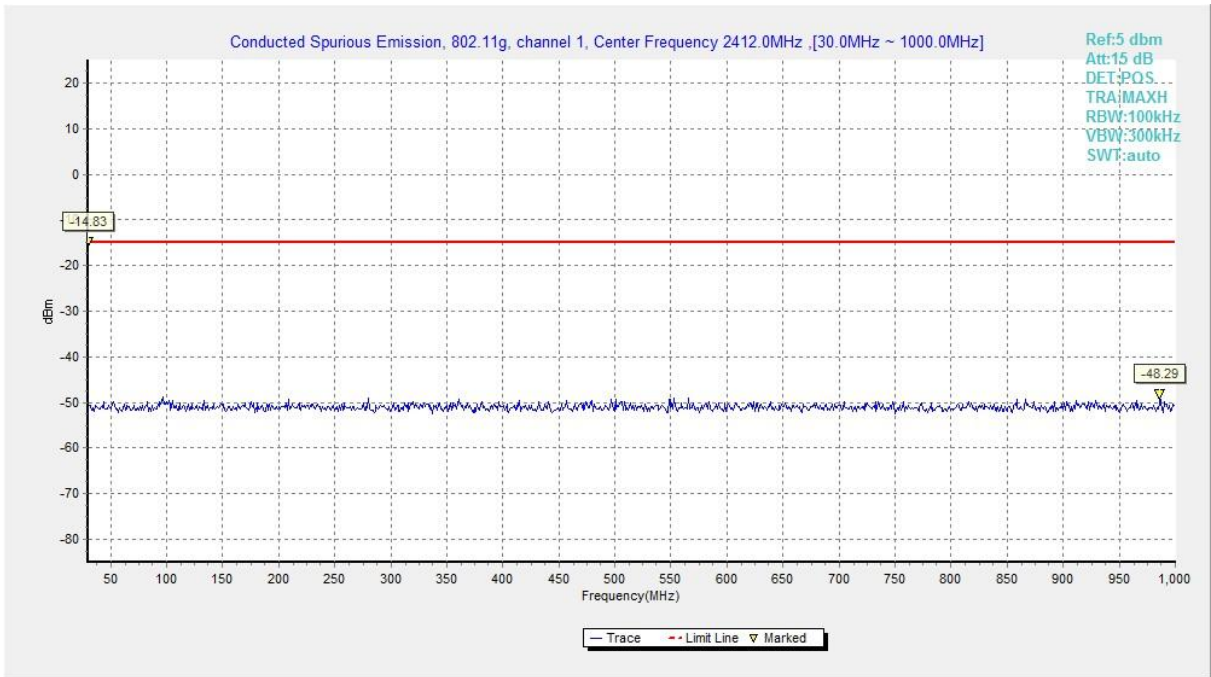
**Fig.A.6.1.39 Conducted Spurious Emission (802.11b, Ch13, 15 GHz-20 GHz)**



**Fig.A.6.1.40 Conducted Spurious Emission (802.11b, Ch13, 20 GHz-26 GHz)**

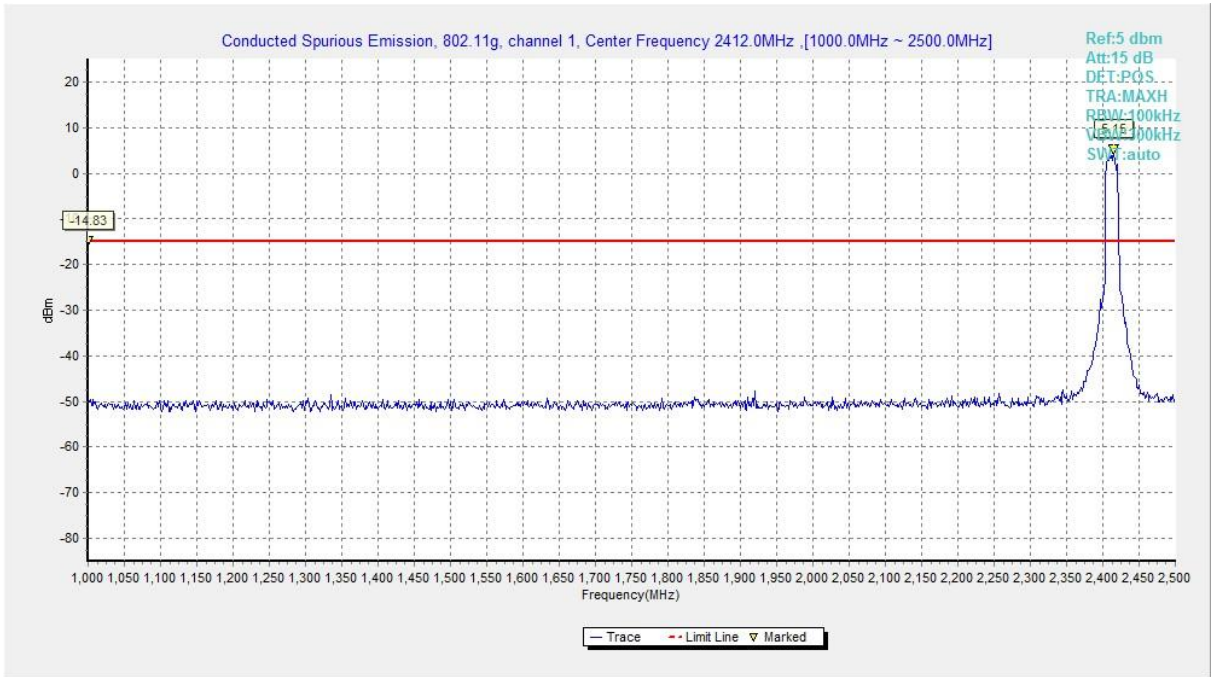


**Fig.A.6.1.41 Conducted Spurious Emission (802.11g, Ch1, Center Frequency)**

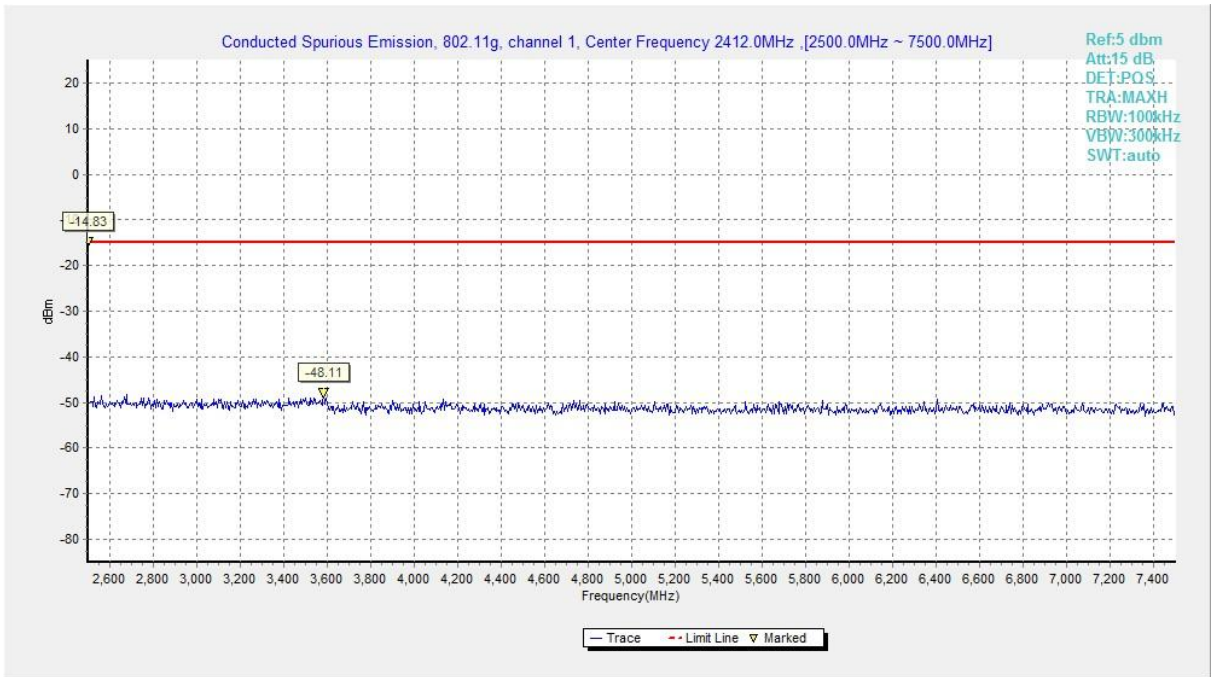


**Fig.A.6.1.42 Conducted Spurious Emission (802.11g, Ch1, 30 MHz-1 GHz)**

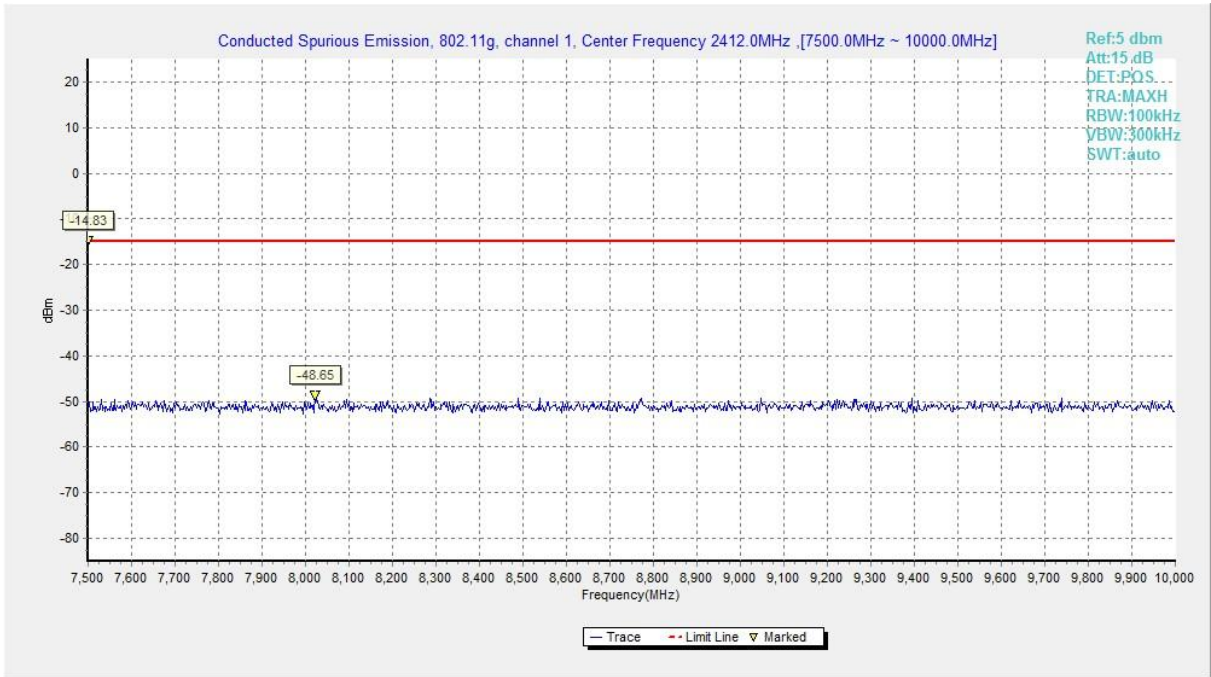




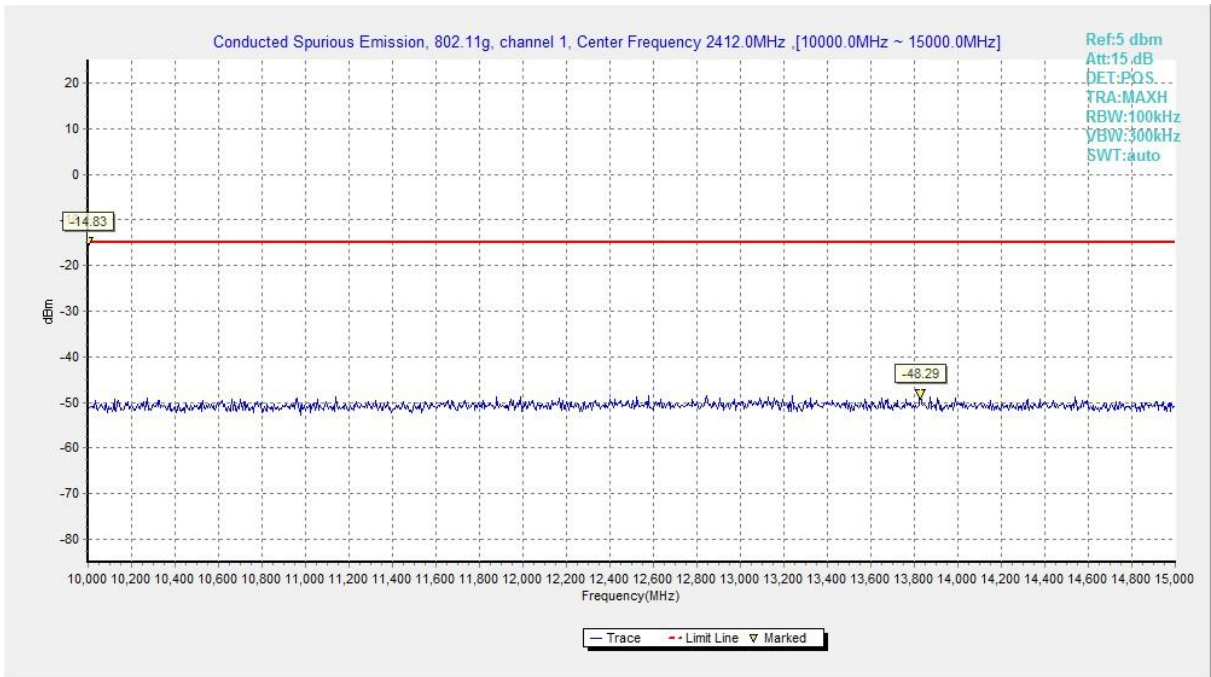
**Fig.A.6.1.43 Conducted Spurious Emission (802.11g, Ch1, 1 GHz-2.5 GHz)**



**Fig.A.6.1.44 Conducted Spurious Emission (802.11g, Ch1, 2.5 GHz-7.5 GHz)**



**Fig.A.6.1.45 Conducted Spurious Emission (802.11g, Ch1, 7.5 GHz-10 GHz)**



**Fig.A.6.1.46 Conducted Spurious Emission (802.11g, Ch1, 10 GHz-15 GHz)**