

### 8.5. Test Result of Maximum Power Spectral Density

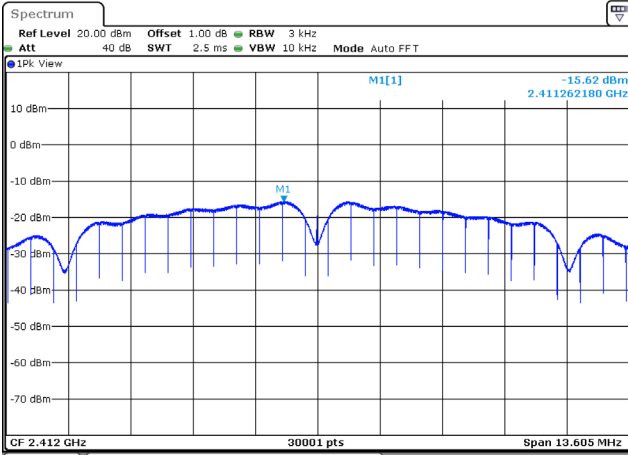
Modulation	Channel	Frequency (MHz)	Power Spectral Density (dBm / 3kHz)			Limit (dBm / 3kHz)	Result
			Ant. 0	Ant. 1	Total		
802.11b	1	2412	-15.620	-17.610	-13.492	$\leq 7.893$	Pass
	6	2437	-16.140	-16.100	-13.110	$\leq 7.893$	Pass
	11	2462	-16.040	-16.990	-13.479	$\leq 7.893$	Pass
802.11g	1	2412	-13.300	-13.230	-10.255	$\leq 7.893$	Pass
	6	2437	-13.410	-13.200	-10.293	$\leq 7.893$	Pass
	11	2462	-12.970	-13.110	-10.029	$\leq 7.893$	Pass
802.11n (20 MHz)	1	2412	-12.630	-13.340	-9.960	$\leq 7.893$	Pass
	6	2437	-12.360	-13.360	-9.821	$\leq 7.893$	Pass
	11	2462	-14.110	-11.270	-9.452	$\leq 7.893$	Pass
802.11n (40 MHz)	3	2422	-14.140	-14.930	-11.507	$\leq 7.893$	Pass
	6	2437	-14.430	-14.960	-11.677	$\leq 7.893$	Pass
	9	2452	-15.350	-12.460	-10.659	$\leq 7.893$	Pass

Note:

- Total power spectral density = power spectral density + duty factor, and the duty factor refer to section 1.10.
- Directional Gain =  $10 \log [(10^{G1/20} + 10^{G2/20} + \dots + 10^{GN/20})^2 / N_{Ant}] = 1.30 \text{dBi} < 6 \text{dBi}$ , so the limit doesn't reduce.

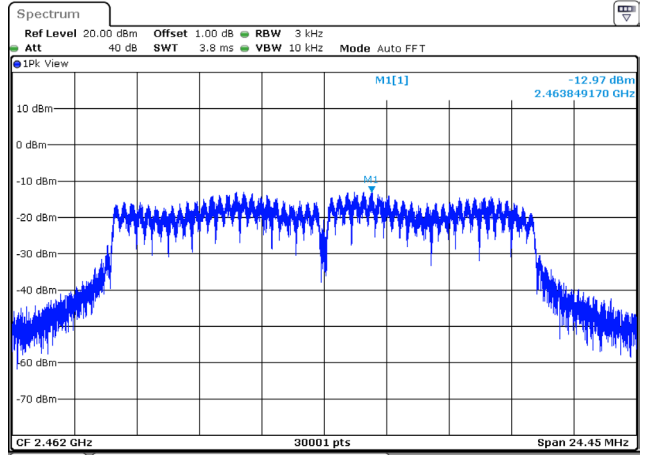
**Spectrum plot of worst value**

802.11b / Ant. 0 / 2412 MHz



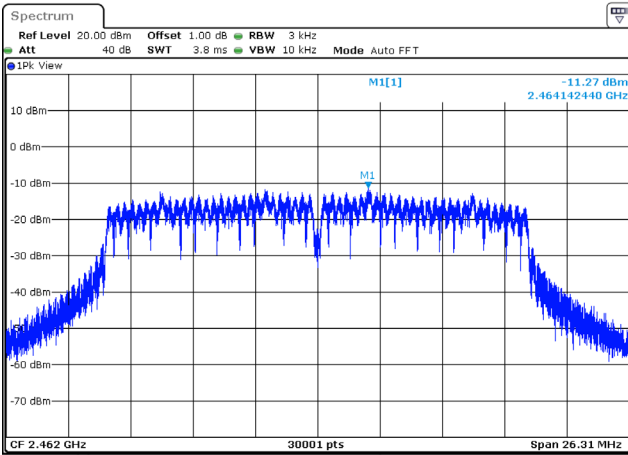
Date: 9.JUN.2022 11:55:05

802.11g / Ant. 0 / 2462 MHz



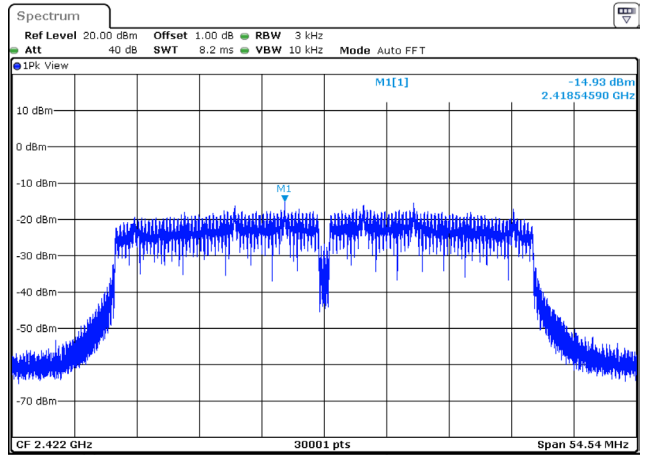
Date: 9.JUN.2022 13:24:35

802.11n (20 MHz) / Ant. 1 / 2462 MHz



Date: 9.JUN.2022 14:38:15

802.11n (40 MHz) / Ant. 1 / 2422 MHz



Date: 9.JUN.2022 14:43:56