

## 11.MPE ESTIMATION

### 11.1.Limit for General Population/ Uncontrolled Exposures

Frequency	Power density (mW/ cm <sup>2</sup> )	Averaging time(minutes)
300MHz----1.5GHz	F/1500	30
1.5GHz---100GHz	1.0	30

Frequency(MHz)	Power density (mW/ cm <sup>2</sup> )	Averaging time(minutes)
2412	1	30
2437	1	30
2462	1	30

Note: F= Frequency in MHz

### 11.2.Estimation Method

Have the power(P),and the antenna Gain(G),then calculate the MPE with below formula:

$$MPE=(P*G)/4\pi R^2$$

Note:R=Estimation distance (R=30cm)

### 11.3. Estimation Result

EUT: 2.4GHz High Power Wireless Outdoor Access Point		
M/N: AELPLDR4U1		
Test date: 2013-02-20	Pressure: 100.6±1 kpa	Humidity: 60±3%
Testd by: Leo Li	Test site: RF Site	Temperature : 26±0.6 °C

Antenna Type	Mode	CH	Frequency (MHz)	PK Output power (dBm)	Output power (mW)	antenna Gain (dBi)	antenna Gain (linear)	MPE
Vertical	11b	1	2412	25.30	338.84	12	15.85	0.4751
		6	2437	25.40	346.74	12	15.85	0.4861
		11	2462	23.80	239.88	12	15.85	0.3363
	11g	1	2412	25.37	344.35	12	15.85	0.4828
		6	2437	26.25	421.70	12	15.85	0.5912
		11	2462	24.02	252.35	12	15.85	0.3538
Horizontal	11b	1	2412	25.45	350.75	12	15.85	0.4918
		6	2437	24.72	296.48	12	15.85	0.4157
		11	2462	24.38	274.16	12	15.85	0.3844
	11g	1	2412	25.72	373.25	12	15.85	0.5233
		6	2437	25.90	389.05	12	15.85	0.5455
		11	2462	24.32	270.40	12	15.85	0.3791
External	11b	1	2412	24.27	267.30	9	7.94	0.1878
		6	2437	24.79	301.30	9	7.94	0.2117
		11	2462	23.58	228.03	9	7.94	0.1602
	11g	1	2412	25.81	381.07	9	7.94	0.2678
		6	2437	26.04	401.79	9	7.94	0.2823
		11	2462	24.27	267.30	9	7.94	0.1878