RF EXPOSURE EVALUATION

MPE-Based Exemption

Applicable Standard

According to subpart 15.247 (i) and subpart 2.1091 systems operating under the provisions of this section shall be operated in a manner that ensures the public is not exposed to RF energy level in excess of the communication guidelines.

According to KDB 447498 D04 Interim General RF Exposure Guidance V01

MPE-Based Exemption:

General frequency and separation-distance dependent MPE-based effective radiated power(ERP) thresholds are in Table B.1 [Table 1 of § 1.1307(b)(3)(i)(C)] to support an exemptionfrom further evaluation from 300 kHz through 100 GHz.

Table 1 to § $1.1307(b)(3)(i)(C)$ - Single RF Sources Subject to Routine Environmental Evaluation					
RF Source frequency (MHz)	Threshold ERP (watts)				
0.3-1.34	1,920 R ² .				
1.34-30	3,450 R ² /f ² .				
30-300	3.83 R ² .				
300-1,500	0.0128 R ² f.				
1,500-100,000	19.2R ² .				

R is the minimum separation distance in meters f = frequency in MHz

Result

Mode	Frequency (MHz)	Tune up conducted power [#] (dBm)	Antenna Gain [#]		ERP		Evaluation Distance	ERP Limit
			(dBi)	(dBd)	(dBm)	(mW)	(m)	(mW)
BLE	2402-2480	5.5	-2.89	-5.04	0.46	1.11	0.2	768
2.4G Wi-Fi	2412-2462	19.5	-2.89	-5.04	14.46	27.93	0.2	768

Note: 1. The tune up conducted power[#] and antenna gain[#] was declared by the applicant. 2. The BLE and 2.4G Wi-Fi cannot transmit at same time.

To maintain compliance with the FCC's RF exposure guidelines, place the equipment at least 20cm from nearby persons.

Result: Compliant