## 5. RF EXPOSURE EVALUATION

## 5.1 Applicable Standard

According to §15.247(i) and §1.1310, systems operating under the provisions of this section shall be operated in a manner that ensure that the public is not exposed to radio frequency energy level in excess of the Commission's guideline.

According to KDB447498 D01 General RF Exposure Guidance v06:

The 1-g and 10-g SAR test exclusion thresholds for 100 MHz to 6 GHz at test separation distances  $\leq$  50 mm are determined by:

[(max. power of channel, including tune-up tolerance, mW)/(min. test separation distance, mm)] •  $[\sqrt{f(GHz)}] \le 3.0$  for 1-g SAR and  $\le 7.5$  for 10-g extremity SAR, where

- f(GHz) is the RF channel transmit frequency in GHz
- Power and distance are rounded to the nearest mW and mm before calculation
- The result is rounded to one decimal place for comparison
- 3.0 and 7.5 are referred to as the numeric thresholds in the step 2 below

The test exclusions are applicable only when the minimum test separation distance is  $\leq$  50 mm and for transmission frequencies between 100 MHz and 6 GHz. When the minimum test separation distance is  $\leq$  5 mm, a distance of 5 mm according to 5) in section 4.1 is applied to determine SAR test exclusion.

## **5.2** Measurement Result

Frequency (MHz)	Conducted Output Power Including Tolerance		Distance (mm)	Calculated value	Threshold (1-g)	SAR Test Exclusion
(14112)	(dBm)	(mW)	()	varae	(1 5)	Exclusion
2402-2480	1.5	1.41	5	0.4	3	Yes

Note: The Maximum Conducted Power including Tune-up Tolerance was declared by manufacturer.

Result: Compliant. The stand-alone SAR test is not necessary.