

RF Exposure Letter

According to 447498 D01 General RF Exposure Guidance v05 The 1 - g and 10 - g SAR test

exclusion thresholds for 100 MHz to 6 GHz at test separation distances ≤ 50 mm are determined by: $[(\text{max. power of channel, including tune - up tolerance, mW})/(\text{min. test separation distance, mm})] \cdot [\sqrt{f(\text{GHz})}] \leq 3.0$ for 1 - g SAR and ≤ 7.5 for 10 - g extremity SAR, where

$f(\text{GHz})$ 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

$$\text{dBm} = \text{dB } \mu \text{V/m} - 95.2$$

$$\text{mW} = 10^{(\text{dBm}/10)}$$

$$P_t = 81.63 - 95.2 = -13.57 \text{ dBm} = 0.044 \text{ mW at } 433.92 \text{ MHz}$$

$$\text{So } (0.044 \text{ mW}/5 \text{ mm}) \times \sqrt{0.43392 \text{ GHz}} = 0.0058 < 3$$

Then SAR evaluation is not required