

## RF Exposure evaluation

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  $\leq 50$   
mm are determined by:

$$\left[ \frac{\text{(max. power of channel, including tune-up tolerance, mW)}}{\text{(min. test separation distance, mm)}} \right] \cdot \left[ \sqrt{f \text{ (GHz)}} \right]$$
$$\leq 3.0 \text{ for 1-g SAR and } \leq 7.5 \text{ for 10-g extremity SAR,}$$
  
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

Worse case is as below: [ 2402MHz -2.13dBm ( 0.612 mW) output power]

$$\left( \frac{0.612 \text{ mW}}{5 \text{ mm}} \right) \cdot \left[ \sqrt{2.402 \text{ (GHz)}} \right] = 0.2 < 3 \text{ for 1-g SAR}$$

Then SAR evaluation is not required