

Test Result of RF Exposure Evaluation

According to the KDB-447498 D01 V06, FCC 47CFR § 2.1091 the following RF exposure evaluation shall to demonstrate RF exposure compliance.

Friis transmission formula: $P_d = (P_{out} * G) / (4 * \pi * r^2)$

Where

P_d = power density in mW/cm², P_{out} = output power to antenna in mW;

G = gain of antenna in linear scale, $\pi = 3.1416$;

$R = 20\text{cm}$ (distance between observation point and center of the radiator in cm)

BT3.0

Frequency	Output Power (dBm)	Target power W/ tolerance (dBm)	Max tune up power tolerance (dBm)	Output power to antenna (mW)	Antenna Gain(dBi)	Power Density at R=20cm (mW/cm ²)	Limit (mW/cm ²)	Result
1Mbps								
2402	7.721	7.5 ±1.0	8.5	5.917	0	0.00118	1.0	Pass
2441	8.031	7.5 ±1.0	8.5	6.355	0	0.00126	1.0	Pass
2480	7.873	7.5 ±1.0	8.5	6.128	0	0.00122	1.0	Pass
2Mbps								
2402	5.715	6.0 ±1.0	7.0	3.728	0	0.00074	1.0	Pass
2441	6.342	6.0 ±1.0	7.0	4.307	0	0.00086	1.0	Pass
2480	6.291	6.0 ±1.0	7.0	4.257	0	0.00085	1.0	Pass
3Mbps								
2402	6.180	6.0 ±1.0	7.0	4.150	0	0.00083	1.0	Pass
2441	6.761	6.0 ±1.0	7.0	4.744	0	0.00094	1.0	Pass
2480	6.688	6.0 ±1.0	7.0	4.664	0	0.00093	1.0	Pass

Conclusion:

So no SAR is required.