

FCC ID : 2AXGMBL-YQD01

➤ **Test Standards and Limits**

1. According to KDB 447498 D01 v06, Section 4.3.1

2. FCC Radiofrequency radiation exposure limits:

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:

$[(\text{max power of channel})/(\text{min test separation distance})] \cdot [\sqrt{f(\text{GHz})}] \leq 3.0$ 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
- The result is rounded to one decimal place for comparison
- 3.0 and 7.5 are referred to as the numeric thresholds

The test exclusions are applicable only when the minimum test separation distance is ≤ 50 mm, and for transmission frequencies between 100 MHz and 6 GHz. When the minimum test separation

distance is < 5 mm, a distance of 5 mm according to 4.1 f) is applied to determine SAR test exclusion.

For 2.4G band device, the limit of worse case is

$$P_{\text{max}} \leq 3.0 \cdot D_{\text{min}} / f = 3.0 \cdot 5 / 2.480 = 9.525 \text{ mW}$$

➤ **Measurement and Calculation**

1. Maximum transmit power

BT, Antenna Gain: 0dBi

Operation Mode	Channel Number	Channel Frequency (MHz)	Measurement Level (dBm)	Limit (dBm)	Verdict
GFSK	0	2402	1.03	30	PASS
	39	2441	1.68	30	PASS
	78	2480	0.91	30	PASS
pi/4-DQPSK	0	2402	0.97	21	PASS
	39	2441	1.60	21	PASS
	78	2480	0.87	21	PASS
8DPSK	0	2402	0.95	21	PASS
	39	2441	1.63	21	PASS
	78	2480	0.91	21	PASS

BLE, Antenna Gain: 0dBi

Operation Mode	Data Rate	Channel Number	Channel Frequency (MHz)	Measurement Level (dBm)	Limit (dBm)	Verdict
Bluetooth DTS	1M	0	2402	0.10	30	PASS
		19	2440	-0.11	30	PASS
		39	2480	-0.13	30	PASS

2. MPE Calculation

Mode	Max Measured power (dBm)	Max tune-up power (dBm)	Antenna gain	Antenna Gain Numeric	Evaluation result (mW)	Limits
BT	1.68	2	0	1	1.47	< 9.525mW
BLE	0.10	1	0	1	1.26	< 9.525mW

So the SAR report is not required.

-End of the Report-

