

RF Exposure Evaluation

Test report
On Behalf of
VTIN TECHNOLOGY Co.,Limited
For
wireless keyboard

Model No.: PC238A

FCC ID: 2AIL4-PC238A

Prepared for : **VTIN TECHNOLOGY Co.,Limited**
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Date of Report: **Nov. 25, 2019**

1 General Description of EUT

Equipment	wireless keyboard
Model Name	PC238A
Serial No.	N/A
Model Difference	N/A
Trade Mark	VICTSING
FCC ID	2AIL4-PC238A
Hardware Version:	V3.0
Software Version:	V1.6
Operation frequency	2403.8MHz -- 2479.8MHz
Number of Channels	16
Antenna Type	PCB antenna
Antenna Gain	0dBi
Modulation Type	GFSK
Power Source	DC 3.0V from AA*2 battery

2 RF Exposure Compliance Requirement

2.1 Standard Requirement

According to KDB447498D01 General RF Exposure Guidance v06

4.3.1. Standalone SAR test exclusion considerations

Unless specifically required by the published RF exposure KDB procedures, standalone 1-g head or body and 10-g extremity SAR evaluation for general population exposure conditions, by measurement or numerical simulation, is not required when the corresponding SAR Exclusion Threshold condition, listed below, is satisfied.

2.2 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:

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

$f(\text{GHz})$ is the RF channel transmit frequency in GHz

Power and distance are rounded to the nearest mW and mm before calculation¹⁷

The result is rounded to one decimal place for comparison

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 is applied to determine SAR test exclusion

3 EUT RF Exposure

GFSK						
Channel	Maximum Peak Conducted Output Power (dBm)	Tune up tolerance (dBm)	Maximum tune-up Power		Calculated value	Exclusion threshold
			(dBm)	(mW)		
Lowest (2403.8MHz)	-6.226	-6±1	-5	0.316	0.098	3.0
Middle (2441.8MHz)	-6.462	-6±1	-5	0.316	0.099	
Highest (2479.8MHz)	-6.608	-6±1	-5	0.316	0.100	
Conclusion: the calculated value ≤ 3.0 , SAR is exempted.						

Remark: The Max Conducted Peak Output Power data refer to report Report No.: HK1911182926-E