

RF Exposure Evaluation Declaration

Product Name : SMART CLOTHING OF HEART RATE MONITOR
Model No. : A10-AHG01
FCC ID. : 2AJNX-A10AHG01

Applicant : King's Metal Fiber Technologies Co., Ltd.
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The declaration results relate only to the samples calculated.

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1. RF Exposure Evaluation

1.1. Limits

According to 1.1307(b)(1), system operating under the previsions of this section shall be operated in manner that ensure that the public is not exposed is not exposed to radio frequency energy level in excess of the Commission's guideline.

No SAR required for output power as below thresholds:

$f = \text{GHz}$, $d = \text{Distance (between radiated device and the body)}$

$[(\text{max. power of channel, including tune-up tolerance, mW}) / (\text{min. test separation distance, mm})] \times [\sqrt{f_{(\text{GHz})}}] \leq 3.0 \text{ for 1-g SAR}$

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.

$$\begin{aligned} \text{Ex: } f &= 2.402 \text{ GHz, Output Power threshold} &= (\text{max power}/5) \times [\sqrt{f_{(\text{GHz})}}] \\ &= (1.40/5) \times 1.54 \\ &= 0.43 \leq 3.0 \end{aligned}$$

1.2. Test Procedure

Software provided by client enabled the EUT to transmit and receive data at lowest, middle and highest channel individually.

The temperature and related humidity: 18°C and 78% RH.

1.3. Test Result of RF Exposure Evaluation

Product	SMART CLOTHING OF HEART RATE MONITOR
Test Mode	Mode 1: Transmit
Test Condition	RF Exposure Evaluation

Antenna Gain

Antenna Gain: The maximum Gain measured in fully anechoic chamber is 0dBi or 1.00 in linear scale.

Output Power into Antenna

Channel	Channel Frequency (MHz)	Output Power to Antenna (mW)	EIRP (mW)	Output Power threshold (mW) (d <5mm)
00	2402	2.1717	2.1717	10
19	2440	1.9458	1.9458	10
39	2480	1.9418	1.9418	10

Channel	Channel Frequency (MHz)	Output Power to Antenna (mW)	EIRP (mW)	Output Power threshold (mW) (d <5mm)
00	2457	4.1601	4.1601	8

Conclusion:

No SAR evaluation required, since transmitter output power is below threshold.