

## RF EXPOSURE REPORT

Applicant	Avantree Technology Co., Ltd.
Address	The 4th Floor, Yuepeng Building, No.1019 Jiabin Rd, Luohu District, Shenzhen, China

	<u> </u>
Manufacturer or Supplier	ARKON ELECTRONICS (HUIZHOU) CO., LIMITED
Address	NO.4 Taihao Road, High-tech Industrial Park, Sandong Town, Huicheng District, Huizhou, Guangdong, China
Product	2.4GHz Digital Wireless Headphone
Brand Name	<b>№</b> Avantree°
Model	WSHT-280
Additional Model & Model Difference	N/A
Date of tests	July 08, 2020 ~ July 14, 2020

- **⊠ KDB 447498 D01**
- **⊠** IEEE C95.1

#### CONCLUSION: The submitted sample was found to COMPLY with the test requirement

Tested by Ryan Lu	Tested by Glyn He
Project Engineer / EMC Department	Assistant Manager / EMC Department
Ryan	Poto: Aug. 14, 2020

Date: Aug. 14, 2020

This report is governed by, and incorporates by reference, CPS Conditions of Service as posted at the date of issuance of this report at <a href="http://www.bureauveritas.com/home/about-us/our-business/cps/about-us/terms-conditions/and">http://www.bureauveritas.com/home/about-us/our-business/cps/about-us/terms-conditions/and</a> is intended for your exclusive use. Any copying or replication of this report to or for any other person or entity, or use of our name or trademark, is permitted only with our prior written permission. This report sets forth our findings solely with respect to the test samples identified herein. The results set forth in this report are not indicative or representative of the quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted. Our report includes all of the tests requested by you and the results thereof based upon the information that you provided to us. Measurement uncertainty is only provided upon request for accredited tests. You have 60 days from date of issuance of this report to notify us of any material error or omission caused by our negligence or if you require measurement uncertainty; provided, however, that such notice shall be in writing and shall specifically address the issue you wish to raise. A failure to raise such issue within the prescribed time shall constitute you unqualified acceptance of the completeness of this report, the tests conducted and the correctness of the report contents.

Bureau Veritas Shenzhen Co., Ltd. Dongguan Branch

No. 96, Guantai Road (Houjie Section), Houjie Town, Dongguan City, Guangdong Province. 523942. People's Republic of China.

Tel: +86 769 8998 2098 Fax: +86 769 8593 1080

Email: customerservice.dg@cn.bureauveritas.com



# **TABLE OF CONTENTS**

RELE	EASE CONTROL RECORD	3
1.	CERTIFICATION	4
	RF EXPOSURE LIMIT	
3.	MPE CALCULATION FORMULA	5
4.	CLASSIFICATION	5
	ANTENNA GAIN	
6	CALCULATION RESULT OF MAXIMUM CONDUCTED AV POWER	6

Tel: +86 769 8998 2098 Fax: +86 769 8593 1080

Email: customerservice.dg@cn.bureauveritas.com



## **RELEASE CONTROL RECORD**

ISSUE NO.	REASON FOR CHANGE	DATE ISSUED
FM200715N001	Original release	July 14, 2020
FM-BQOZ-WDG-P20080116	<ol> <li>Basic the above original release report:</li> <li>Change the applicant name and Brand</li> <li>The test model name DH1000K change to WSHT-280</li> <li>Change new FCC ID: 2AITF-WSHT-280-N</li> </ol>	Aug. 14, 2020

Tel: +86 769 8998 2098 Fax: +86 769 8593 1080

Email: <a href="mailto:customerservice.dg@cn.bureauveritas.com">customerservice.dg@cn.bureauveritas.com</a>



## 1. CERTIFICATION

FCC ID:	2AITF-WSHT-280-N		
PRODUCT:	2.4GHz Digital Wireless Headphone		
BRAND NAME:	<b>№ Avantree</b> °		
MODEL NO.:	WSHT-280		
ADDITIONAL NO.:	IONAL NO.: N/A		
APPLICANT: Avantree Technology Co., Ltd.			
	FCC Part 2 (Section 2.1091)		
STANDARDS:	KDB 447498 D01		
	IEEE C95.1		



## 2. RF EXPOSURE LIMIT

### LIMITS FOR MAXIMUM PERMISSIBLE EXPOSURE (MPE)

FREQUENCY RANGE (MHz)						
LIMITS FOR GENERAL POPULATION / UNCONTROLLED EXPOSURE						
300-1500 F/1500 30						
1500-100,000			1.0	30		

F = Frequency in MHz

#### 3. MPE CALCULATION FORMULA

 $Pd = (Pout*G) / (4*pi*r^2)$ 

Where

Pd = power density in mW/cm<sup>2</sup>

Pout = output power to antenna in mW

G = gain of antenna in linear scale

Pi = 3.1416

R = distance between observation point and center of the radiator in cm

#### 4. CLASSIFICATION

The antenna of this product, under normal use condition, is at least 20cm away from the body of the user. So, this device is classified as **Mobile Device**.



## 5. ANTENNA GAIN

The antennas provided to the EUT, please refer to the following table:

Function Transmitter Circuit		Peak Gain (dBi)	Antenna Type	
Wireless (GFSK)	Chain 0	0	PCB Antenna	

## 6. CALCULATION RESULT OF MAXIMUM CONDUCTED AV POWER

The tuned conducted Average Power (declared by client)

Mode	Frequency (MHz)	Target Power (dBm)	Tolerance (dBm)	Lower Tolerance (dBm)	Upper Tolerance (dBm)
Wireless (GFSK)	2406-2472	10	+-0.5	9.5	10.5

The measured conducted Average Power

Mode	Frequency (MHz)	Averaged Power (dBm)	
Wireless (GFSK)	2406~2472	9.97	

#### The final calculation results:

Frequency band (MHz)	Max average power (dBm)	Antenna gain (dBi)	Distance (cm)	Power density (mW/cm²)	Limit (mW/cm²)	
Wireless (GFSK)2406-2472	10.5	0	20	0.00223	1.0	

--- END ---