

# **ANTENNA TEST REPORT**

Applicant	Shenzhen Qianyan Technology LTD			
Address	No. 3301, Block C, Section 1, Chuangzhi Yuncheng Building, Liuxian Avenue, Xili Community, Xili Street, Nanshan District, Shenzhen Guangdong China			
Manufacturer or Supplier	Shenzhen Qianyan Technology LTD			
Address	No. 3301, Block C, Section 1, Chuangzhi Yuncheng Building, Liuxian Avenue, Xili Community, Xili Street, Nanshan District, Shenzhen Guangdong China			
Product	Antenna			
Brand Name	N/A			
Model	H1199			
Max. Peak Gain	0.11 dBi			
Date of tests	Aug. 08, 2023			
Tested by Andy Zhu Supervisor / EMC Department		Approved by Glyn He Assistant Manager / EMC Department		
This report is governed by, and incorporates by reference, the Conditions of Testing as posted at the date of issuance of this report at http://www.bureauveritas.com/home/about-us/our-business/cps/about-us/terms-conditions/ and is intended for your exclusive use. Any copying replication of this report are of this report at the test samples identified herein. The results set forth in this report are not indicative or representative of t quality or characteristics of the lot from which a test samples identified herein. The results set forth in this report are not indicative or representative of t quality or characteristics of the lot from which a test samples identified herein. The results set forth in this report are not indicative or representative of t quality or characteristics of the lot from which a test samples identified herein. The results set forth in this report are not indicative or representative of t quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted. C report includes all of the tests requested by you and the results thereof based upon the information that you provided to us. Measurement uncertainty only provided upon request for accredited tests. Statements of conformity are based on simple acceptance criteria without taking measurement uncertainty into account, unless otherwise requested in writing. You have 60 days from date of issuance of this report to notify us of any material error or omissi caused by our negligence or if you require measurement uncertainty; provided, however, that such notice shall be in writing and shall specifically addre the issue you wish to raise. A failure to raise such issue within the prescribed time shall constitute your unqualified acceptance of the completeness of the report. Include 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



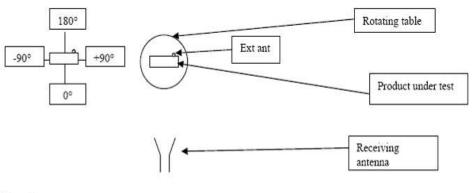
# TABLE OF CONTENTS

1.	MEASUREMENTS SETUP	3
2.	SIZE OF THE ANTENNA	4
3.	TEST INSTRUMENTS	5
4.	TEST RESULTS	6
5.	PHOTOGRAPHS OF THE TEST CONFIGURATION	13



## 1. MEASUREMENTS SETUP

#### Orientation



Top view

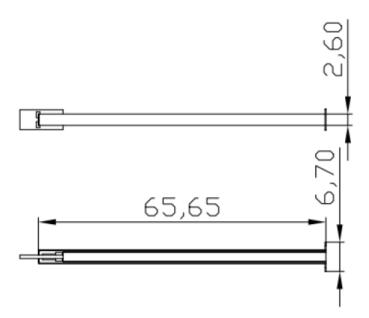
During the test, each emission was maximized by: having the EUT continuously working, investigated all operating modes, rotated about all 3 axis (X, Y & Z) and considered typical configuration to obtain worst position, manipulating interconnecting cables,

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: <u>customerservice.do@bureauveritas.com</u>

Page 3 of 13



### 2. SIZE OF THE ANTENNA



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: <u>customerservice.dg@bureauveritas.com</u>

Page 4 of 13



### 3. TEST INSTRUMENTS

Equipment	Manufacturer	Model No.	Serial No.	Next Cal.
Signal Generator	Agilent	N5183A	MY50140980	Jul. 11, 24
Spectrum Analyzer	Rohde&Schwarz	FSV40	101003	Jan. 11, 24
Broad-Band Horn Antenna	SCHWARZBECK	BBHA 9120 D	9120D-1247	Apr. 01, 24
Broad-Band Horn Antenna	SCHWARZBECK	BBHA 9120 B	00740	Jul. 20, 24
Turn Table	MF	MF-7802	MF780208191	N/A
Controller	MF	MF-7802	MF780208243	N/A
Test Software	BV ADT	BV ADT Antenna Pattern	V6.2	N/A

NOTE: 1. The test was performed in Fully Anechoic Room.

2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to CEPREI/CHINA, GRGT/CHINA and NIM/CHINA.



# 4. TEST RESULTS

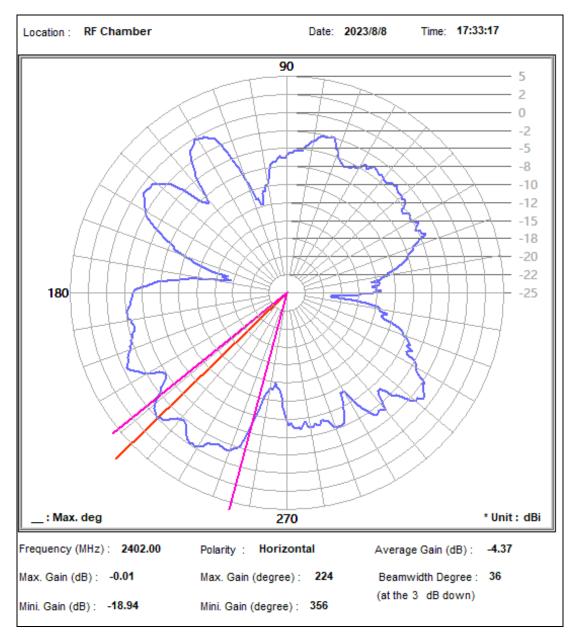
ANTENNA	FREQUENCY (MHz)	ANTENNA POLARITY	MAX. PEAK GAIN (dBi)
Metal ANT	2402	Horizontal	-0.01
		Vertical	-2.48
	2441	Horizontal	0.11
		Vertical	-2.13
	2480	Horizontal	-0.67
		Vertical	-2.75



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



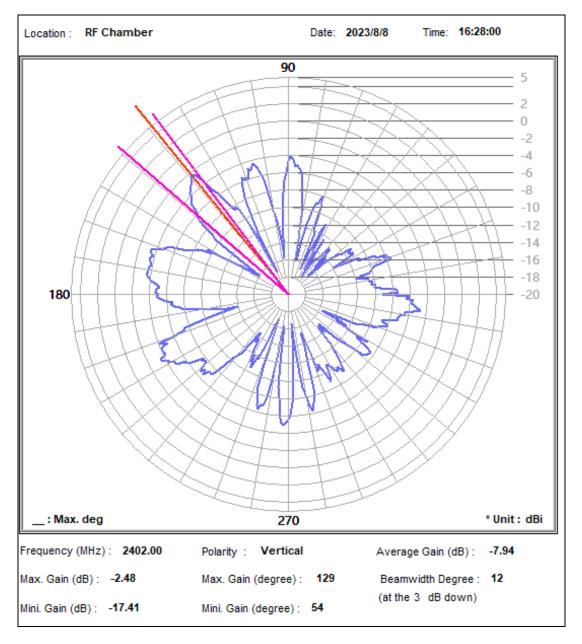
#### Frequency: 2402 MHz (Horizontal)



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



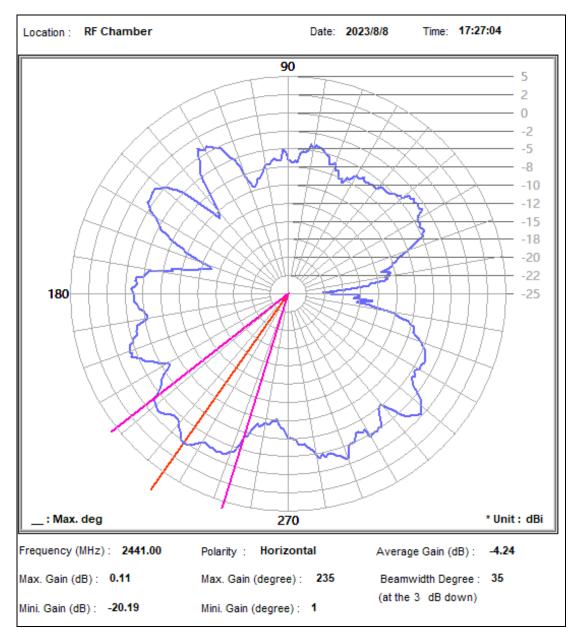
#### Frequency: 2402 MHz (Vertical)



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



#### Frequency: 2441 MHz (Horizontal)

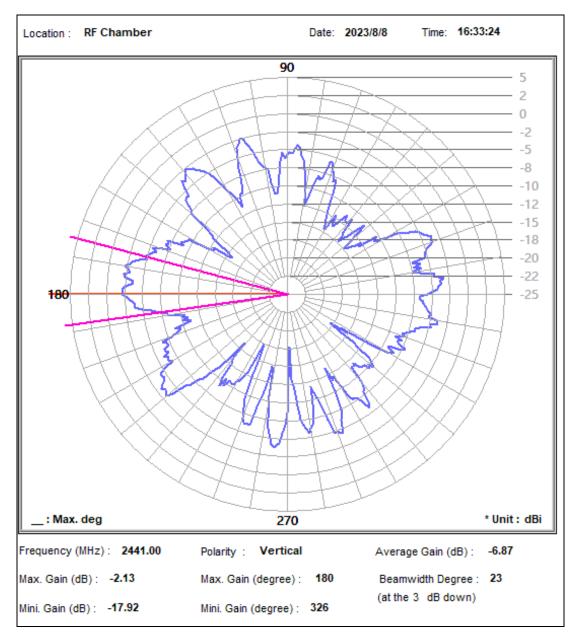


Bureau Veritas Shenzhen Co., Ltd. Dongguan Branch No. 96, Guantai Road (Houjie Section), Houjie Town, Dongguan City, Guangdong Province. 523942. People's Republic of China. Tel.: +86 769 8998 2098 Fax: +86 769 8593 1080

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



#### Frequency: 2441 MHz (Vertical)

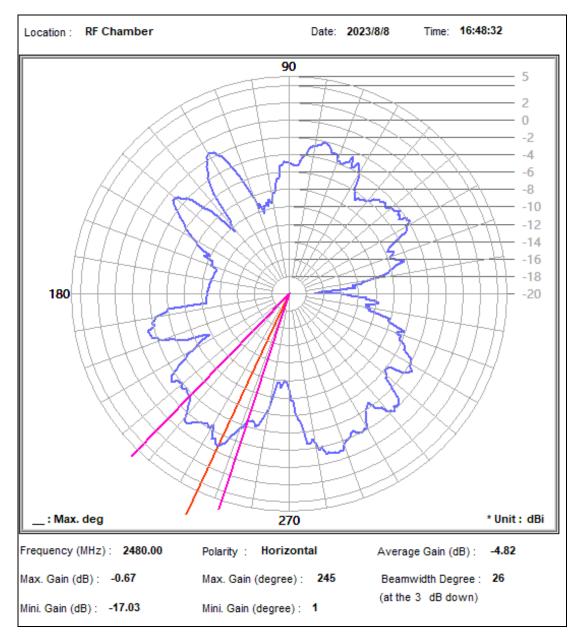


Bureau Veritas Shenzhen Co., Ltd. Dongguan Branch No. 96, Guantai Road (Houjie Section), Houjie Town, Dongguan City, Guangdong Province. 523942. People's Republic of China. Tel.: +86 769 8998 2098 Fax: +86 769 8593 1080 Email: <u>customerservice.dg@bureauveritas.com</u>

Page 10 of 13



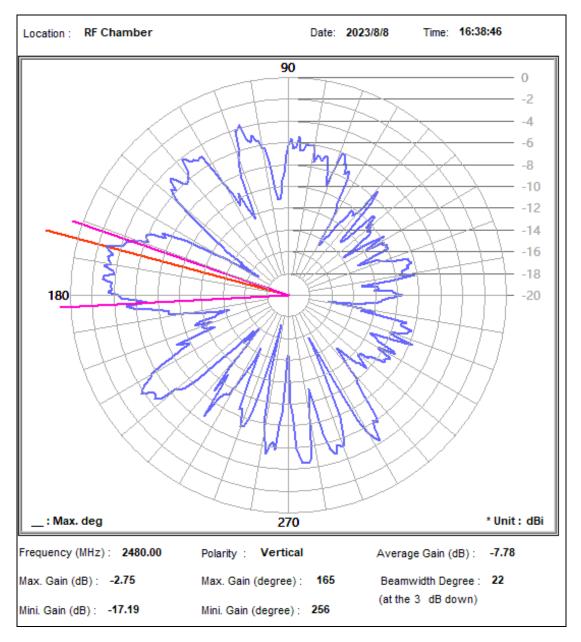
#### Frequency: 2480 MHz (Horizontal)



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



#### Frequency: 2480 MHz (Vertical)



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: <u>customerservice.dg@bureauveritas.com</u>

Page 12 of 13



### 5. PHOTOGRAPHS OF THE TEST CONFIGURATION



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: <u>customerservice.dg@bureauveritas.com</u>

Page 13 of 13