

TEST REPORT

FCC ID. :	2BFEP-CAM2	
Test Report No..... :	TCT240719E028	
Date of issue..... :	Jul. 29, 2024	
Testing laboratory	SHENZHEN TONGCE TESTING LAB	
Testing location/ address:	2101 & 2201, Zhenchang Factory, Renshan Industrial Zone, Fuhai Subdistrict, Bao'an District, Shenzhen, Guangdong, 518103, People's Republic of China	
Applicant's name..... :	CONVERGE BEAUTY LIMITED	
Address..... :	FLAT/RM C 22/F FORD GLORY PLAZA 37 WING HONG STREET LAI CHI KOK KOWLOON, HONG KONG, China	
Manufacturer's name ... :	Eken Innovation (Shenzhen) Co., Ltd	
Address..... :	201 Building E, No.1 LingXia Road FengHuang Community, FuYong Street BaoAn District, Shenzhen Guangdong	
Standard(s)	FCC CFR Title 47 Part 1.1307	
Product Name..... :	1080p Wi-Fi Security Camera	
Trade Mark	N/A	
Model/Type reference..... :	M9, M5, R5, R7, R8, R9, Q4, Q5, Q7, Q8, Q9	
Rating(s)..... :	Rechargeable Li-ion Battery DC 3.7V	
Date of receipt of test item	Jul. 19, 2024	
Date (s) of performance of test..... :	Jul. 19, 2024 ~ Jul. 29, 2024	
Tested by (+signature) ... :	Ronaldo LUO	
Check by (+signature).... :	Beryl ZHAO	
Approved by (+signature):	Tomsin	

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1. General Product Information

1.1. EUT description

Product Name.....:	1080p Wi-Fi Security Camera
Model/Type reference.....:	M9
Sample Number.....:	TCT240719E002 -0101
Operation Frequency	For BLE: 2402MHz~2480MHz For 2.4G WIFI: 2412MHz~2462MHz (802.11b/802.11g/802.11n(HT20))
Modulation Type	For BLE: GFSK For 2.4G WIFI: 802.11b: Direct Sequence Spread Spectrum (DSSS) 802.11g/802.11n: Orthogonal Frequency Division Multiplexing(OFDM)
Antenna Type.....:	Internal Antenna
Antenna Gain.....:	2.99dBi
Rating(s).....:	Rechargeable Li-ion Battery DC 3.7V

Note: The antenna gain listed in this report is provided by applicant, and the test laboratory is not responsible for this parameter.

1.2. Model(s) list

No.	Model No.	Tested with
1	M9	☒
Other models	M5, R5, R7, R8, R9, Q4, Q5, Q7, Q8, Q9	☐

Note: M9 is tested model, other models are derivative models. The models are identical in circuit and PCB layout, only different on the model names. So the test data of M9 can represent the remaining models.

2. General Information

2.1. Test environment and mode

Item	Normal condition
Temperature	+25°C
Voltage	DC 3.7V
Humidity	56%
Atmospheric Pressure:	1008 mbar
Test Mode:	
Transmitting Mode:	Keep the EUT in continuous transmitting by select channel

2.2. Description of Support Units

The EUT has been tested as an independent unit together with other necessary accessories or support units. The following support units or accessories were used to form a representative test configuration during the tests.

Equipment	Model No.	Serial No.	FCC ID	Trade Name
/	/	/	/	/

Note:

1. All the equipment/cables were placed in the worst-case configuration to maximize the emission during the test.
2. Grounding was established in accordance with the manufacturer's requirements and conditions for the intended use.
3. For conducted measurements (Output Power, 20dB Occupied Bandwidth, Carrier Frequencies Separation, Hopping Channel Number, Dwell Time, Spurious Emissions), the antenna of EUT is connected to the test equipment via temporary antenna connector, the antenna connector is soldered on the antenna port of EUT, and the temporary antenna connector is listed in the Test Instruments.

3. Facilities and Accreditations

3.1. Facilities

The test facility is recognized, certified, or accredited by the following organizations:

- FCC - Registration No.: 645098

SHENZHEN TONGCE TESTING LAB

Designation Number: CN1205

The testing lab has been registered and fully described in a report with the (FCC) Federal Communications Commission. The acceptance letter from the FCC is maintained in our files.

- IC - Registration No.: 10668A-1

SHENZHEN TONGCE TESTING LAB

CAB identifier: CN0031

The testing lab has been registered by Certification and Engineering Bureau of Industry Canada for radio equipment testing.

3.2. Location

SHENZHEN TONGCE TESTING LAB

Address: 2101 & 2201, Zhenchang Factory Renshan Industrial Zone, Fuhai Subdistrict,
Bao'an District, Shenzhen, Guangdong, 518103, People's Republic of China

TEL: +86-755-27673339

4. Test Results and Measurement Data

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

- Remark: 1) **For BLE:** The maximum output power for antenna is 5.89dBm (3.88mW) at 2480MHz, 2.99dBi antenna gain(with 1.99 numeric antenna gain.)
For 2.4G WIFI: The maximum output power for antenna is 14.34dBm (27.16mW) at 2462MHz, 2.99dBi antenna gain(with 1.99 numeric antenna gain.)
2) For mobile or fixed location transmitters, no SAR consideration applied. The minimum separation generally be used is at least 20cm, even if the calculation indicate that the MPE distance would be lesser.

Calculation

Given $E = \frac{\sqrt{30 \times P \times G}}{d}$ & $S = \frac{E^2}{3770}$

Where E = Field Strength in Volts / meter

P = Power in Watts

G = Numeric antenna gain

d = Distance in meters

S = Power Density in milliwatts / square centimeter

Substituting the MPE safe distance using $d=20\text{cm}$ into above equation.

Yields: $S=0.000199 \times P \times G$

Mode	Power (dBm)	Power(mW)	numeric antenna gain	Power density (mW/cm ²)	Limit (mW/cm ²)	Result
BLE	5.89	3.88	1.99	0.001537	1.00	PASS
2.4G WIFI	14.34	27.16	1.99	0.010708	1.00	

Note: BLE/2.4G WIFI Can be transmitted simultaneously, MPE calculate is as follow,
 $MPE=0.001537/1.0+0.010708/1.0=0.012245<1$.

*******END OF REPORT*******