




TEST REPORT

FCC ID :	2AUCLLD-500	
Test Report No :	TCT220505E049	
Date of issue :	Aug. 10, 2022	
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 :	FX Technology Limited	
Address :	2 Stone Buildings, Lincoln's Inn, London WC2A 3TH, United Kingdom	
Manufacturer's name ... :	Shenzhen Eternity Technology Co., Ltd	
Address :	Building A2, YingZhan Industrial Park, LongTian Street, PingShan, ShenZhen, China	
Standard(s)	FCC CFR Title 47 Part 1.1307 KDB 447498 D04 Interim General RF Exposure Guidance v01	
Product Name :	Linxdot Hotspot	
Trade Mark	Linxdot	
Model/Type reference :	LD-500	
Rating(s)	Adapter Information: Model: TPQ-228F120200UW01 Input: AC 100-240V, 50/60Hz, 0.8A Output: DC 12.0V, 2.0A	
Date of receipt of test item	May 05, 2022	
Date (s) of performance of test :	May 05, 2022 - Aug. 10, 2022	
Tested by (+signature) ... :	Rleo LIU	
Check by (+signature) :	Beryl ZHAO	
Approved by (+signature) :	Tomsin	
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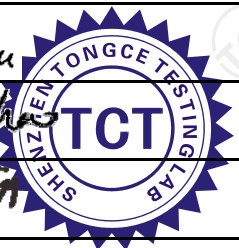


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1. General Product Information

1.1. EUT description

Product Name:	Linxdot Hotspot
Model/Type reference:	LD-500
Sample Number:	TCT220505E042-0101
Operation Frequency	For BT: 2402MHz~2480MHz For WIFI: 2412MHz~2462MHz (802.11b/802.11g/802.11n(HT20)) For LoRa: 125KHz: 902.3MHz~914.9MHz 500KHz: 923.3MHz~927.5MHz
Modulation Type:	For BT: GFSK, $\pi/4$ -DQPSK, 8DPSK For WIFI: DSSS(802.11b), OFDM (802.11g/802.11n) For LoRa: LoRa
Antenna Type:	For BT/WIFI: Chip Antenna For LoRa: External Antenna
Antenna Gain:	For BT/WIFI: 3.2dBi For LoRa: 2dBi
Rating(s)	Adapter Information: Model: TPQ-228F120200UW01 Input: AC 100-240V, 50/60Hz, 0.8A Output: DC 12.0V, 2.0A

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

None.

2. General Information

2.1. Test environment and mode

Item	Normal condition
Temperature	+25°C
Voltage	AC 120V/60Hz
Humidity	56%
Atmospheric Pressure:	1008 mbar
Test Mode:	
Engineering 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 BT:** The maximum output power for antenna is 4.43dBm (2.77mW) at 2480MHz, 3.2dBi antenna gain(with 2.09 numeric antenna gain.)
For WIFI: The maximum output power for antenna is 17.35dBm (54.33mW) at 2437MHz, 3.2dBi antenna gain(with 2.09 numeric antenna gain.)
For LoRa-DSS: The maximum output power for antenna is 21.62dBm (145.21mW) at 902.3MHz, 2dBi antenna gain(with 1.58 numeric antenna gain.)
For LoRa-DTS: The maximum output power for antenna is 27.40dBm (549.54mW) at 923.3MHz, 2dBi antenna gain(with 1.58 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 $E = \frac{\sqrt{30 \cdot P \cdot G}}{d}$ & $S = \frac{E^2}{3770}$

- 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=20cm into above equation.
 Yields: $S=0.000199 \cdot P \cdot G$

Mode	Power(mW)	numeric antenna gain	Power density (mW/cm ²)	Limit (mW/cm ²)	Result
BT	2.77	2.09	0.001152	1.0	PASS
WIFI	54.33	2.09	0.022596		
LoRa-DSS	145.21	1.58	0.045657		
LoRa-DTS	549.54	1.58	0.172786		

The device contain transmitters (BT & LoRa-DSS BT & LoRa-DTS WIFI & LoRa-DSS WIFI & LoRa-DTS) can transmit multiple transmission modes at the same time.

Maximum Emissions Level			
Mode	Power density	Limit	Result
BT& LoRa-DSS	0.046809	1.0	PASS
BT & LoRa-DTS	0.173938		
WIFI & LoRa-DSS	0.068253		
WIFI & LoRa-DTS	0.195382		

Result:

Base on the calculation value, No SAR measurement is required.

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