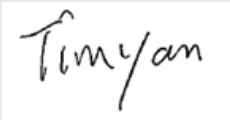


Test report No: 4955464.56

TEST REPORT

Radio Spectrum Matters (RF)

Identification of item tested	Cync Direct Connect Strip
Trademark	GE
Model and /or type reference	CSTR16CBDM, CSTR32CBDM
FCC/IC ID	FCC ID: PUU-STR-CBDMI; IC: 10798A-STRCBDMI
HVIN	CSTR16CBDMA, CSTR32CBDMA
Features	120Vac, 60Hz
Applicant's name / address	Savant Technologies LLC dba GE Lighting, a Savant company 1975 Noble Road, Cleveland, Ohio, United States, 44112
Test method requested, standard	FCC CFR Title 47 Part15 Subpart C Section 15.247; KDB558074 D01v05r02; RSS-Gen Issue 5; RSS-247 Issue 4
Verdict Summary	COMPLIANCE
Tested by (name & signature)	Johnny Bo 
Approved by (name & signature)	Tim Yan 
Date of issue	2026-06-08
Report template No	TRF_EMC 2017-06- FCC_Exposure

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GENERAL CONDITIONS

1. This report is only referred to the item that has undergone the test.
2. This report does not constitute or imply on its own an approval of the product by the Certification Bodies or Competent Authorities.
3. This document is only valid if complete; no partial reproduction can be made without previous written permission of DEKRA.
4. This test report cannot be used partially or in full for publicity and/or promotional purposes without previous written permission of DEKRA.
5. This report will not be used for social proof function in China market.

UNCERTAINTY

For all measurements where guidance for the calculation of the instrumentation uncertainty of a measurement is specified in EN 55016-4-2 (CISPR 16-4-2), EN/IEC 61000-4 series or a product standard, the measurement instrumentation uncertainty has been calculated and applied in accordance with these standards.

Uncertainties have been calculated according to the DEKRA internal document. The reported expanded uncertainties are based on a standard uncertainty multiplied by a coverage factor of $k=2$, providing a level of confidence of approximately 95%.

ENVIRONMENTAL CONDITIONS

The climatic conditions during the tests are within the limits specified by the manufacturer for the operation of the EUT and the test equipment. The climatic conditions during the tests were within the following limits:

Ambient temperature	15 °C – 35 °C
Relative Humidity air	30% - 60%
Atmospheric pressure	86 kPa – 106 kPa

If explicitly required in the basic standard or applied product / product family standard the climatic values are recorded and documented separately in this test report.

POSSIBLE TEST CASE VERDICTS

Test case does not apply to test object	N/A
Test object does meet requirement	P (Pass) / PASS
Test object does not meet requirement	F (Fail) / FAIL
Not measured	N/M

DEFINITION OF SYMBOLS USED IN THIS TEST REPORT

☒ Indicates that the listed condition, standard or equipment is applicable for this report/test/EUT.			
☐ Indicates that the listed condition, standard or equipment is not applicable for this report/test/EUT.			
Decimal separator used in this report	☐	Comma (,)	☒ Point (.)

ABBREVIATIONS

For the purposes of the present document, the following abbreviations apply:

EUT	: Equipment Under Test
QP	: Quasi-Peak
CAV	: CISPR Average
AV	: Average
CDN	: Coupling Decoupling Network
SAC	: Semi-Anechoic Chamber
OATS	: Open Area Test Site
BW	: Bandwidth
AM	: Amplitude Modulation
PM	: Pulse Modulation
HCP	: Horizontal Coupling Plane
VCP	: Vertical Coupling Plane
U_N	: Nominal voltage
T_x	: Transmitter
R_x	: Receiver
N/A	: Not Applicable
N/M	: Not Measured

DOCUMENT HISTORY

Report nr.	Date	Description
4955464.56	2026-06-08	First release.

REMARKS AND COMMENTS

The equipment under test (EUT) does meet the essential requirements of the stated standard(s)/test(s).

1 GENERAL INFORMATION

1.1 General Description of the Item(s)

Description of the item	Cync Direct Connect Strip
Trademark.....	GE
Model / Type number	CSTR16CBDM, CSTR32CBDM
FCC/IC ID.....	FCC ID: PUU-STR-CBDMI; IC: 10798A-STRCBDMI
HVIN.....	CSTR16CBDMA, CSTR32CBDMA
Ratings	120Vac, 60Hz
Manufacturer	Savant Technologies LLC,dba GE Lighting, a Savant company 1975 Noble Road, Cleveland, OH, 44112-1719, US
Factory 1	Foshan Lighting Chanchang Optoelectronics Co., Ltd. Hecheng Street, Cangjiang Industrial Park, Gaoming District, Foshan City, Guangdong Province, P. R. China
Factory 2	Foshan Electrical And Lighting Co.,Ltd.Gaoming Fitting Branch Fuwan Industrial Zone, Hecheng Street, Gaoming District, Foshan, Guangdong, China
Factory 3	Foshan Electrical and Lighting Co.,Ltd. Gaoming Branch No.19, Hengchang Road, Fuwan Industrial Park, Hecheng Street, Gaoming District, Foshan, Guangdong, P.R.China
Factory 4	FSL OPTOTECH (THAILAND)CO.,LTD. No.24, Moo.13, Bang Ya Phraek, Phra Pradaeng, Samut Prakan, Thailand 10130
Factory 5	NINGBO DONGXING (CAMBODIA) ELECTRIC CO.,LTD. Prey Taphem Village, Por Angkrong Commune, Bor Set District, Kampong Speu Province,Kingdom of Cambodia

Rated power supply	Voltage and Frequency		Reference poles				
			L1	L2	L3	N	PE
	☒	AC: 120 V, 60Hz	☒	☐	☐	☒	☐
	☐	DC:					
	☐	Battery:					
Mounting position	☐	Table top equipment					
	☒	Wall/Ceiling mounted equipment					
	☐	Floor standing equipment					
	☐	Hand-held equipment					
	☐	Other: Built-in					

According to customer's declaration, the product contains RF module and the characteristics of radio module:
 BLE

Operating frequency range(s)	2402 MHz – 2480 MHz
Type of Modulation	GFSK
Maximum e.i.r.p	7.7 dBm
Antenna type	PCB Antenna
Operating Temperature Range	-20 °C – 40 °C
Antenna gain	0.5 dBi

WIFI

Frequency Band	2412 MHz-2462 MHz
Type of Modulation	IEEE 802.11b: DSSS(CCK, DQPSK, DBPSK) IEEE 802.11g: OFDM(64-QAM, 16-QAM, QPSK, BPSK) IEEE 802.11n-HT20: OFDM(64-QAM, 16-QAM, QPSK, BPSK)
Data Rate	IEEE 802.11b: Up to 11 Mbps IEEE 802.11g: Up to 54 Mbps IEEE 802.11n-HT20: Up to MCS7
Geo-location Capability	Not Support
Adaptivity	Adaptive
Maximum RF output power(EIRP) ..	17.0 dBm
Antenna type	PCB Antenna
Antenna gain	0.5 dBi
Number of channel	IEEE 802.11b: 11 IEEE 802.11g: 11 IEEE 802.11n-HT20: 11
Operating Temperature Range	-20 °C – 40 °C

Intended use of the Equipment Under Test (EUT)

The apparatus as supplied for the test is Cync Direct Connect Strip intended for residential use.

Based on customer description: All model are identical except ranging power.

Hence, models CSTR16CBDM was chosen for full test, and the corresponding test data are also representative of the other models as well.

1.2 Test data

Test Location	DEKRA Testing and Certification (Shanghai) Ltd. Guangzhou Branch Block 5, No.3, Qiyun Road, Huangpu District, Guangzhou, Guangdong, China FCC Designation Number: CN1324; ISED CAB identifier: CN0130
Date of receipt of test item	2026-04-13
Date (s) of performance of tests	2026-04-13 to 2026-05-11

1.3 The environment(s) in which the EUT is intended to be used

The equipment under test (EUT) is intended to be used in the following environment(s):

☒	Residential (domestic) environment.
☒	Commercial and light-industrial environment.
☐	Industrial environment.

2 DESCRIPTION OF TEST SETUP

2.1 Operating mode(s) used for tests

During the tests the following operating mode(s) has(have) been used.

Operating mode	Operating mode description	Used for methods	
		Conducted	Radiated
1	Transmitting at 802.11b mode	☒	☒
2	Transmitting at 802.11g mode	☒	☒
3	Transmitting at 802.11n20 mode	☒	☒
4	Transmitting at BLE	☒	☒
Supplemental information: ---			

2.2 Port(s) of the EUT

Port name and description	Connected to / Termination	Cable		
		Length used during test [m]	Attached during test	Shielded
AC input	AC mains	0	☒	☐
			☐	☐
			☐	☐
Supplemental information: ---				

2.3 Support / Auxiliary equipment / unit / software for the EUT

The EUT has been tested with the following auxiliary equipment / unit / software:

Auxiliary equipment / unit / software	Type / Version	Manufacturer	Supplied by
Laptop	Latitude 5488	DELL	DEKRA
Supplemental information: ---			

2.4 Test Configuration / Block diagram used for tests

Refer to Annex 3.

3 RF EXPOSURE EVALUATION

3.1 Limits

According to FCC 1.1310: The criteria listed in the following table shall be used to evaluate the environment impact of human exposure to radio frequency (RF) radiation as specified in 1.1307(b)

LIMITS FOR MAXIMUM PERMISSIBLE EXPOSURE (MPE)

Frequency Range (MHz)	Electric Field Strength (V/m)	Magnetic Field Strength (A/m)	Power Density (mW/cm ²)	Average Time (Minutes)
(A) Limits for Occupational/ Control Exposures				
300-1500	--	--	F/300	6
1500-100,000	--	--	5	6
(B) Limits for General Population/ Uncontrolled Exposures				
300-1500	--	--	F/1500	6
1500-100,000	--	--	1	30

F= Frequency in MHz

According to RSS 102 Issue 6: The criteria listed in the following table shall be used to evaluate the environment impact of human exposure to radio frequency (RF) radiation as specified in RSS 102 Clause 6

LIMITS FOR MAXIMUM PERMISSIBLE EXPOSURE (MPE)

Frequency range (MHz)	Electric field (V _{RMS} /m)	Magnetic field (A _{RMS} /m)	Power density (W/m ²)	Reference period (minutes)
10-20	27.46	0.0728	2	6
20-48	$58.07 / f^{0.25}$	$0.1540 / f^{0.25}$	$8.944 / f^{0.5}$	6
48-300	22.06	0.05852	1.291	6
300-6000	$3.142 f^{0.3417}$	$0.008335 f^{0.3417}$	$0.02619 f^{0.6834}$	6
6000-15000	61.4	0.163	10	6
15000-150000	61.4	0.163	10	$616000 / f^{1.2}$
150000-300000	$0.158 f^{0.5}$	$4.21 \times 10^{-4} f^{0.5}$	$6.67 \times 10^{-5} f$	$616000 / f^{1.2}$

Note: f is frequency in MHz.

Friis Formula

Friis transmission formula: $P_d = (P_{out} \cdot G) / (4 \cdot \pi \cdot r^2)$

Where

P_d = power density in mW/cm²

P_{out} = output power to antenna in mW

G = gain of antenna in linear scale

π = 3.1416

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

P_d is the limit of MPE, 1 mW/cm² of FCC and 5.35 W/cm² of RSS. If we know the maximum gain of the antenna and the total power input to the antenna, through the calculation, we will know the distance r where the MPE limit is reached.

3.2 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: 20 °C and 50% RH.

3.3 Test Result

Test Mode	Frequency Band (MHz)	Maximum EIRP (dBm)	Tune up tolerance (dBm)	Power Density at $R = 20$ cm (mW/cm ²)	Limit of Power Density S(mW/cm ²)	Limit of Power Density S(W/cm ²)	Verdict
BLE	2402 ~ 2480	7.7	± 1	0.0014	1 (FCC)	5.35 (RSS)	PASS

Test Mode	Frequency Band (MHz)	Maximum EIRP (dBm)	Tune up tolerance (dBm)	Power Density at $R = 20$ cm (mW/cm ²)	Limit of Power Density S(mW/cm ²)	Limit of Power Density S(W/cm ²)	Verdict
WIFI: Mode 3 (The highest power)	2400 ~ 2483.5	17.0	± 1	0.0125	1 (FCC)	5.35 (RSS)	PASS

Note: This wireless module does not support simultaneous transmission of WI-FI and Bluetooth.

--- END ---