

OBM1000CTSD01 is a wireless control module which operates at 2.4GHz ISM band and support RX/TX half duplex mode. Typical application of the module is dimming and color temperature LED driver or other smart appliance control.

FCC ID: PUU-LINKABLE-OB01

IC:10798A-LINKABLE001

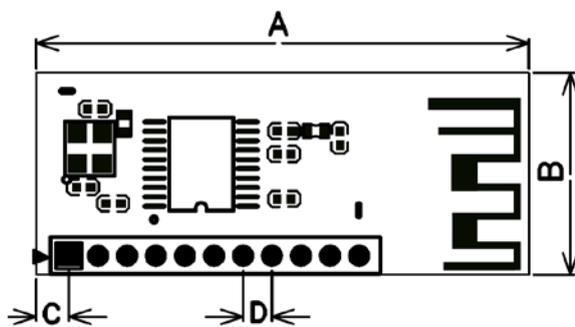
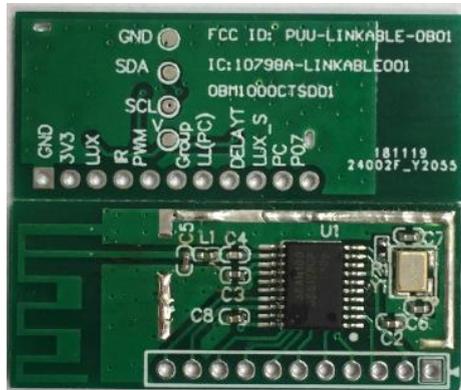
Module Features

- SOC integrated MCU and RF transceiver
- 9 GPIOs, including
 - 10bit/16bit PWM
 - 10bit ADC
 - GPIO
- Working voltage 2.2-3.6V
- Maximum Transmit power +7dbm
- Receive sensitivity -93dbm@250Kbps
- Sleep mode current 8uA @3.3V
- Receive mode current 20mA @3.3V
- Transmit mode current 34mA@8dbm, 3.3V
- Support custom function development

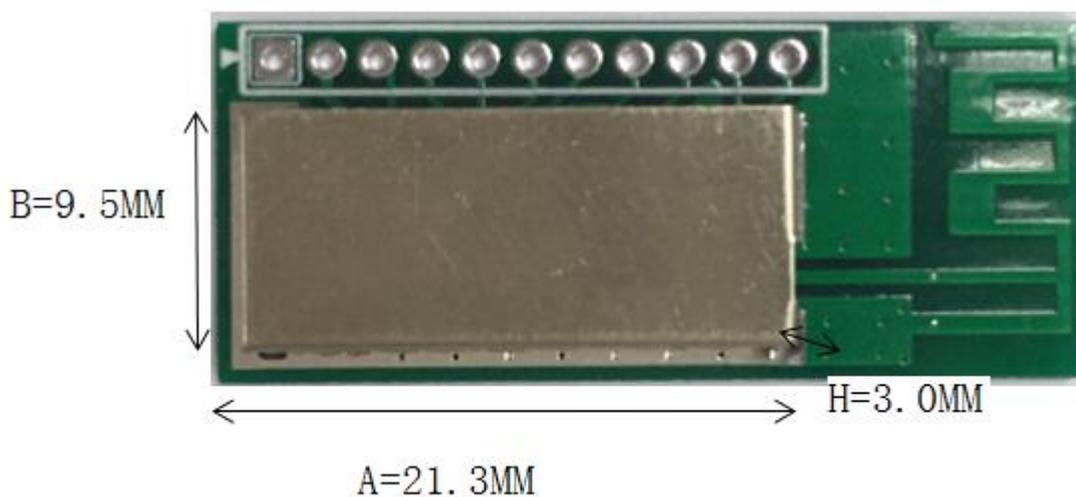
DC Electrical Characteristics

Parameter	Min	Typ.	Max	Unit	Test condition
Working Voltage	2.0	3.3	3.6	V	
Output Low-voltage			0.45	V	
Output High-voltage using strong pull-up	90%Vcc			V	IOH=-8mA IOH=-15mA
Port output PWM frequency		5	43.2	kHz	16 MHz IRC, Output accuracy 1% in 1%~100% dimming
Output PWM Duty	0		100	%	
Sleep mode current			8	uA	LVR function off, 3.3V
Working current		20	34	mA	3.3V
Working temperature	-20		85	°C	

Appearance

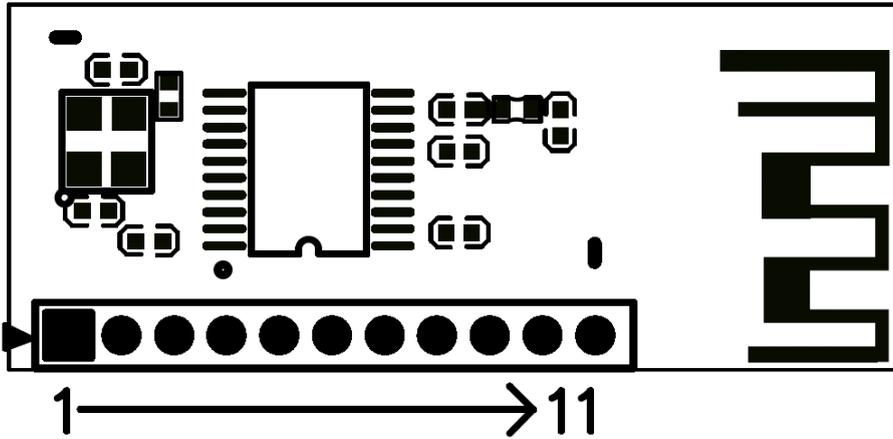


Parameter	Typ.	Unit
A	34.00	MM
B	14.00	MM
C	2.30	MM
D	2.00	MM



Shielding case size : 21.3MM x 9.5MM x 3.0MM

Port Definition



Number	Symbol	Description
1	GND	Ground
2	VCC	Working voltage 2.0V~3.6V
3	IO	ADC
4	IO	GPIO
5	IO	PWM
6	IO	ADC
7	IO	ADC/GPIO
8	IO	GPIO
9	IO	ADC
10	IO	GPIO
11	IO	GPIO

FCC Notice

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

The manufacturer is not responsible for any radio or TV interference caused by unauthorized modifications to this equipment. Such modifications could void the user's authority to operate the equipment.

FCC RF Safety Caution statement

To satisfy FCC RF exposure requirements for mobile and base station transmission devices, a separation distance of 20 cm or more should be maintained between the antenna of this device and persons during operation. To ensure compliance, operation at closer than this distance is not recommended. The antenna(s) used for this transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

The device has been evaluated to meet general RF exposure requirement.

When integrating OBM1000CTSD01 into a product it must be ensured that the FCC and IC labelling requirements are met. This includes a clearly visible label on the outside of the finished product specifying the FCC identifier (FCC ID: PUU-LINKABLE-OB01) and IC identifier (IC ID: 10798A-LINKABLE001). This exterior label can use wording such as "Contains Transmitter Module FCC ID:PUU-LINKABLE-OB01", "Contains Transmitter Module IC ID: 10798A-LINKABLE001" although any similar wording that expresses the same meaning may be used.

This device contains licence-exempt transmitter(s)/receiver(s) that comply with Innovation, Science and Economic Development Canada's licence-exempt RSS(s). Operation is subject to the following two conditions:

1. This device may not cause interference.
2. This device must accept any interference, including interference that may cause undesired operation of the device.

L'émetteur/récepteur exempt de licence contenu dans le présent appareil est conforme aux CNR d'Innovation, Sciences et Développement économique Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes :

1. L'appareil ne doit pas produire de brouillage;
2. L'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

IMPORTANT NOTICE

RIGHT TO MAKE CHANGES

On-Bright Electronics Corp. reserves the right to make corrections, modifications, enhancements, improvements and other changes to its products and services at any time and to discontinue any product or service without notice. Customers should obtain the latest relevant information before placing orders and should verify that such information is current and complete.

WARRANTY INFORMATION

On-Bright Electronics Corp. warrants performance of its hardware products to the specifications applicable at the time of sale in accordance with its standard warranty. Testing and other quality control techniques are used to the extent it deems necessary to support this warranty. Except where mandated by government requirements, testing of all parameters of each product is not necessarily performed.

On-Bright Electronics Corp. assumes no liability for application assistance or customer product design. Customers are responsible for their products and applications using On-Bright's components, data sheet and application notes. To minimize the risks associated with customer products and applications, customers should provide adequate design and operating safeguards.

LIFE SUPPORT

On-Bright Electronics Corp.'s products are not designed to be used as components in devices intended to support or sustain human life. On-bright Electronics Corp. will not be held liable for any damages or claims resulting from the use of its products in medical applications.

MILITARY

On-Bright Electronics Corp.'s products are not designed for use in military applications. On-Bright Electronics Corp. will not be held liable for any damages or claims resulting from the use of its products in military applications.