RN4871U-V/RM118

Bluetooth v5.0 (BLE) SMART SOC Class II IoT 0.01Mbps 3.3V 17-Pin Tray

Images are for reference only

Inquiry

Manufacturer:	Microchip Technology, Inc
Package/Case:	MODULE-17
Product Type:	RF Integrated Circuits
RoHS:	RoHS Compliant/Lead free
Lifecycle:	Active

General Description

The RN4871 is a small form factor, Bluetooth Low Energy module measuring just 9 x 11.5 x 2.1 mm. This fully-integrated module is designed for easy implementation into a broad range of applications. It delivers up to 2.5x throughput improvement and more secure connections vs. Bluetooth 4.1 based products. Developers can easily interface to the device via a standard UART interface, available on most Microcontrollers and Processors. The RN4871 has a completely integrated Bluetooth software stack, and offers a shielded regulatory certified version with built-in antenna. Developers are freed from the complexities of Bluetooth Software and RF development and can simply utilize the RN4871 as a wireline replacement. Perfect for IoT (Internet of Things) applications, when interfaced to a BLE enabled smartphone or Bluetooth Internet Gateway, applications can be monitored, controlled and updated from anywhere in the world.

The Microchip Bluetooth Data (MBD) mobile app is available tospeed up development for both Android and iOS.

Microchip's complimentary and confidential Wireless Check online design review service is available for customers who have selected our products for their application design-in*.*The online design review service is subject to Microchip's Program Terms and Conditions and requires a myMicrochip account.

Firmware Release Summary, see Software Release Notesfor details:

RN4871-I(V)/RM140 - (FW 1.40.0) Fixes bug with random private addressing which created IOP issue with select Andoird devices. Added feature to turn off advertising at power-on in order to easily configure module with the host MCU before advertising. Available in industrial temperature range (I) and varying (V) for easier transition from RN4871-V/RM118.

RN4871-I/RM130- (FW 1.30.0) Fixes bug with invalid Bluetooth address. Refer to Errata document for moreinformation.

RN4871-I/RM128- (FW 1.28.2) Introduces LE Secure Connections and Data Length Extension features amongother bug fixes. Also improved the operating range to 85C.

RN4871-V/RM118- (FW 1.18.3) Initial Release.

Key Features

1.9V to 3.6V (3.3V typical) operating voltage

ASCII command interface API over UART

Scripting engine for hostless operation and Beacon private service for Beacon services

UART transparent service for serial data applications, remote configuration over the air

Up to 3 PWM outputs

GAP, GATT, SM, L2CAP and integrated public profiles

Customer can create up to 5 public and 4 private services

Keyboard I/O authentication and RSSI monitor

Software configurable role as peripheral or central and client or server

External antenna connection via RF Pad

Recommended For You

RN171-I/RM

Microchip Technology, Inc

MODULE

RN42-I/RM630

Microchip Technology, Inc

MODULE-35

RN42XVP-I/RM

Microchip Technology, Inc

MODULE-20

RN4870-V/RM118

Microchip Technology, Inc

MODULE-33

RN171XVU-I/RM

Microchip Technology, Inc

MODULE-20

RN42N-I/RM

Microchip Technology, Inc

MODULE

RN42-I/RM

Microchip Technology, Inc

35-SMD

RN131C/RM

Microchip Technology, Inc

Module

RN4020-V/RM120

Microchip Technology, Inc

MODULE

RN2483A-I/RM105

Microchip Technology, Inc

MODULE

RN1723-I/RM100

Microchip Technology, Inc

Module

RN4870-I/RM130

Microchip Technology, Inc

MODULE

RN42HID-I/RM

Microchip Technology, Inc

MODULE-35

RN52-I/RM116

Microchip Technology, Inc

Module

RN42SM-I/RM

Microchip Technology, Inc

MODULE-35