

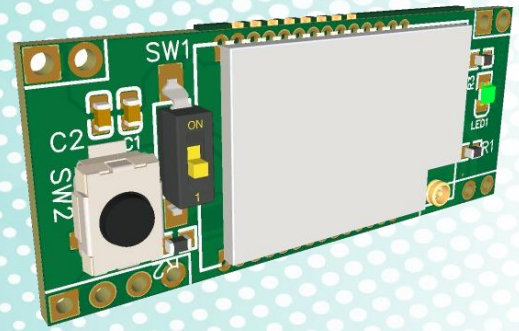


Power Meter Monitor

Model: PMM0910

Document version: 1.2

Date: October 2020



UART/TTL to CANBUS Converter Module

KEY FEATURES AND SPECIFICATIONS

- Bidirectional conversion between UART and CAN is available
- Three types of conversion modes:
 1. Transparent conversion
 2. Transparent tape identification
 3. Protocol mode conversion
- Two CAN frame data types transmission methods:
 1. Fixed configuration
 2. Serial frame data designation
- Parameter configuration via UART interface is available
- UART baud rate: 300~921600
- Parameter setting mode entered via software and hardware
- Factory settings are restored via software or hardware
- Multiple indications:
 1. Power indicator
 2. Status indicator
 3. Mode indicator
- Module size: 43mm X 18mm X 3mm.
- Vertical and horizontal mounting options, compatible with standard DIP/SIP pinout
- RoHS Compliant
- Proven PCB Layout
- Fully Assembled and Tested

DESCRIPTION

PMM0910 is a CANBUS to UART/TTL converter. It integrates one channel CAN-BUS interface and one channel UART TTL interface, which can recognize mutual transparent transmission or Modbus protocol conversion between UART TTL signal and CAN-BUS.

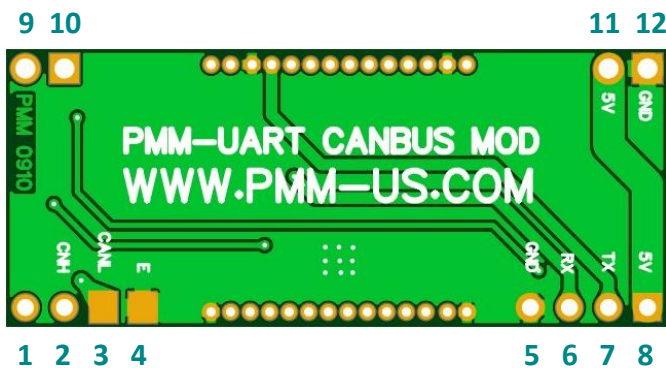
PMM0910 is compact in size and can be powered through any 3.3V or 5V power supply for easy integration into a variety of boards.

WIRING CANBUS MODULE

The Two data lines (labeled as CANH&CANL) on the output side of the module are connected to the communication network, the wiring should be straight through, where CANH on one end is connected to CANH on the other end and CANL connects to CANL.

The wires should ideally be twisted and shielded within one cable, this method is important as it runs for longer where there is a lot of electrical noise. The shield or the common ground is labeled as E in output side of the module.

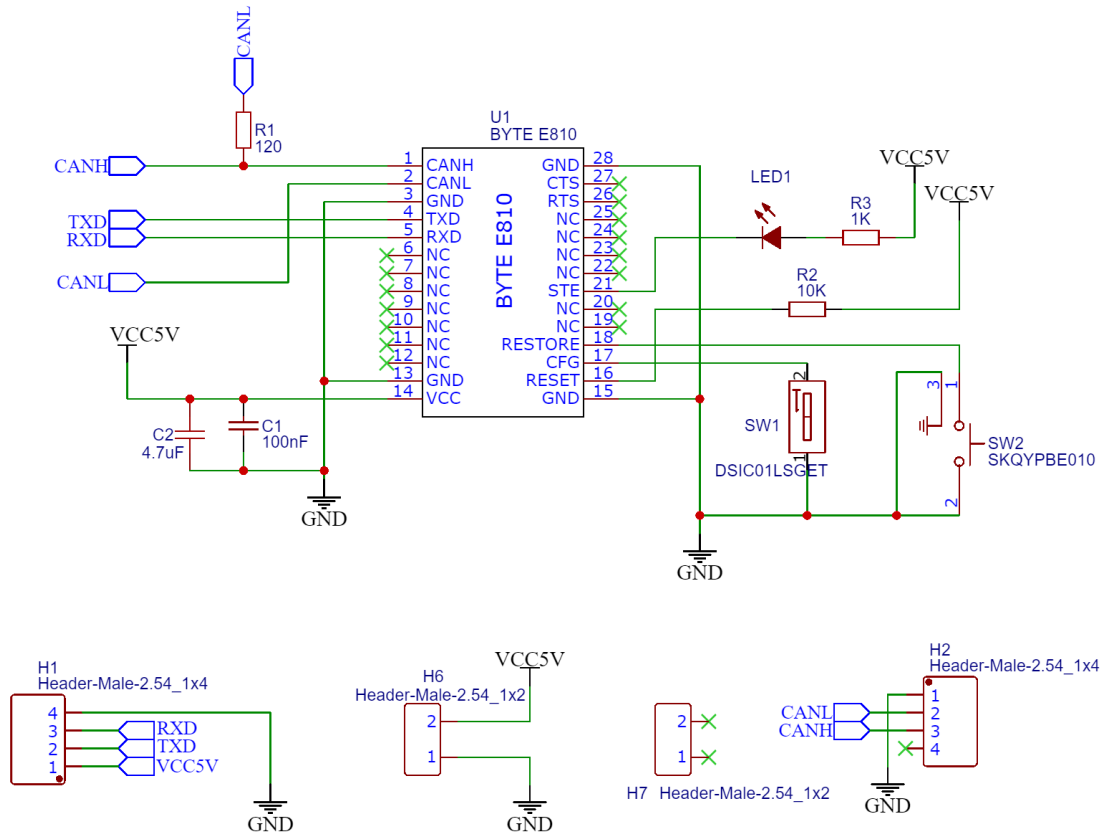
BOARD PINOUT



BOARD PINOUT DESCRIPTION

| PINs | DESCRIPTION |
|--------|--|
| 1,9,10 | NOT CONNECTED |
| 2 | CANH OUTPUT |
| 3 | CANL OUTPUT |
| 4 | SHIELD/COMMON GROUND |
| 5,12 | TTL/UART GND |
| 6 | TTL/UART RX |
| 7 | TTL/UART TX |
| 8,11 | (VCC) POWER SUPPLY: 5VDC OR 3.3VDC |
| NOTE | TTL level should match the connected VCC |

SCHEMATIC DIAGRAM



ENTERING COMMAND CONFIGURATION INSTRUCTIONS

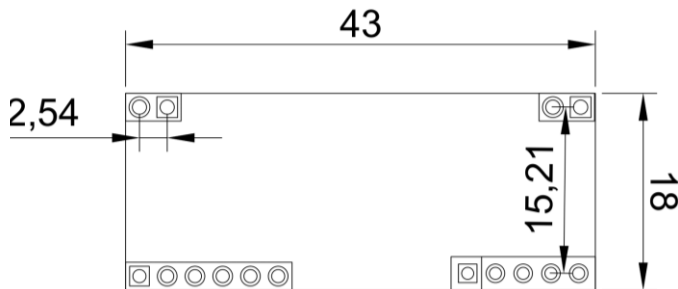
Use the **SW1** to Short-circuit the **CFG** pin to **GND** to enter the configuration mode directly. After entering, the module's indicator flashing frequency becomes 5Hz (it flashes at 1Hz frequency in normal mode).

During the configuration process, the **CFG** pin must be kept low at all times. Send the **AT** command directly for configuration. After shorting, reset pin by pressing the **SW2** for 5 seconds and the parameters will take effect.

COMMAND LIST

| | |
|----------|--|
| AT | TEST COMMAND |
| CANFLT | Inquire/set CAN filter info. |
| CAN | Inquire/set CAN transmit parameter info. |
| EXAT | Exit AT command |
| E | Inquire/set AT command echo |
| MODBUSID | Inquire/set MODBUS ID |
| MODE | Inquire/set operating mode |
| MID | Inquire device info. |
| RESTORE | Restore factory default |
| REBT | Reset command |
| UARTPKT | Inquire/set UART sub-packing parameter |
| UART | Inquire/set UART parameter |
| VER | Inquire/set version |

DIMENSIONS (mm)



ORDERING INFORMATION

| Part Number | Description |
|-------------|-------------------------------------|
| PMM0910 | UART/TTL to CANBUS Converter Module |

CUSTOMIZED REQUIREMENT

For any customized inquiries and orders, contact us on info@Pmm-usa.us