

CAN Series Products

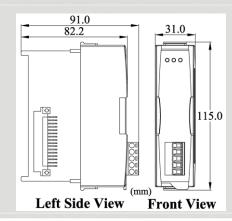


Programmable CAN Interface Module





I-87120



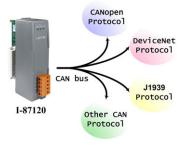
Dimensions

The I-87120 is a kind of CAN communication module, and need to be plugged into a host unit, such as I-8000 series MCU, WinCon-8000, LinCon-8000, and WinPAC-8000. I-87120 gives a way to connect these ICPDAS host unit with CAN network. We provide the libraries and several demos of these host devices with EVC++. And we also provide the library and demos of the firmware for designed the user-defined I-87120. Owing to the features of I-8000 series MCU, WinCon-8000, WinPAC-8000, and LinCon-8000, these hose units can be arranged to be a CAN converter, CAN slave device and CAN master device in a CAN network. Please refer to the product web site of I-87120: http://www.icpdas.com/products/Remote IO/can bus/i-87120.htm

Features

- Microprocessor inside with 80186, 80MHz
- 82C250 CAN transceiver
- SJA1000 CAN controller
- Support both CAN 2.0A and CAN 2.0B
- Built-in jumper to select 120 ohm terminal resister
- Max transmission speed up to 1M bps for CAN
- Max transmission distance over 1000m
- Support I-8000/WinCon-8000/WinPAC-8000/ LinCon-8000

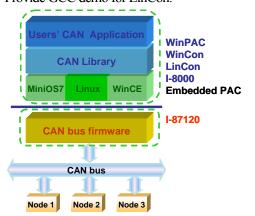
Firmware Features



- Initialize function of user-defined
- Interrupt function of user-defined
- Loop function of user-defined
- ASCII command function of user-defined
- Binary code command function of user-defined
- Standard firmware inside

Host Library

- Support I-8000/WinCon/WinPAC/LinCon.
- Provide C/C++ function libraries to send and receive CAN message
- Provide C++ demo for I-8000 series MCU.
- Provide EVC++ demo for WinCon and WinPAC.
- Provide GCC demo for LinCon.



Wire Assignments

	-	
N/A	$ \bullet\rangle$	Pin 1
CAN_H	$ \bullet\rangle$	Pin 2
CAN_SHLD	lacktriangleleft	Pin 3
CAN_L	$ \overline{ullet} $	Pin 4
N/A	$ \bullet\rangle$	Pin 5

Description
No use
CAN high bus line
CAN Shield
CAN low bus line
No use

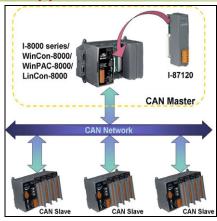




Hardware Specifications

Item	I-87120
CPU	Microprocessor inside with 80186 80MHz
CAN Port Channels	1
CAN Transceiver	Philips 82C250
CAN Controller	Philips SJA1000 with 16MHz
CAN Connector	ISO/IS 11898-2, 5-pin screw terminal connector
OS	Mini-OS 7
Max. Baud Rate	1Mbps
Isolation	2500 Vrms on the CAN bus
Terminator Resistor	Selectable 120Ω terminator resistor by jumper
Support Protocol	CAN 2.0A/2.0B
RTC	Support real time clock
Flash/SRAM/EEPROM	512K/512K/2K bytes
Software	
Firmware	Support five programmable functions for user-defined firmware
Library	Provide I-8000/WinCon-8000/WinPAC-8000/LinCon-8000 libraries
Baud Rate Configure	5K, 10K, 20K, 25K, 50K, 100K, 125K, 200K, 250K, 500K, 800K and 1Mbps
User-defined Baud	Support user-defined baud rate
Receive Buffer	4096 data frames for firmware and 4096 data frames for host library
General	
Power Requirement	Unregulated +10VDC to +30VDC
Power Consumption	2W
LEDs	Rx/Tx LED: Receive/Transmit data, Err LED: CAN status error occur
Environment	
Operating Temp.	-25°C to 75°C
Storage Temp.	-30°C to 85°C
Humidity	5~95% non-condensing
Dimensions	31mm x 91mm x 115mm (W x D x H)

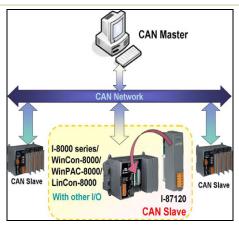
Applications



RS-232 / RS-485 / Ethernet / ...

I-8000 series/
WinCon-8000/
WinPAC-8000/
LinCon-8000

CAN Converter/



I-87120 is as CAN master

I-87120 is as CAN converter

I-87120 is as CAN slave

Ordering Information

I-87120 Module with one programmable CAN port, I-8000/WinCon/WinPAC/LinCon CAN library, 80186 80MHz CPU, 512K flash, 512K SRAM, 120Ω terminal resister selected by jumper.
