

## N Series for USB RS-232C 4ch Serial I/O Unit COM-4CN-USB



\* Specifications, color and design of the products are subject to change without notice.

### Features

Max. 921,600bps RS-232C Serial Communication  
The COM ports of this product support up to 921,600 bps.  
The product has four RS-232C-standard COM ports channel.

Equipped with an easy-to-use 9-pin D-SUB connector; just like a PC  
This product has a 9-pin D-SUB connector, the most commonly used RS-232C connector, allowing for the use of commercially available RS-232C-standard cables.

Possibly used as Windows, Linux-standard COM ports  
Combining the product with our device driver COM-DRV makes it possible to use the product in the same manner as the COM ports of a PC.

This product supports communication using DCB structures in the Win32 API and Linux-standard system calls.

In addition, supplies a diagnostic program to confirm hardware operation and to perform a communication test with equipment.

Each channel is equipped with separate 128-byte / 384-byte FIFO buffers for transmit and receive

Equipped with a buffer memory for transmitting 128 bytes and receiving 384 bytes for each channel. These are FIFO format, useful for high speed communications and to reduce the load to the CPU when transmitting/receiving.

Compatible to USB2.0/USB1.1 and not necessary to power this product externally as the bus power is used

Compatible to USB2.0/USB1.1 and capable to achieve high speed transfer at Full Speed (12Mbps).

Not necessary to power this product externally as the bus power of USB is used.

The control line for RS-232C can be controlled and monitored by software

The control lines for RTS, CTS, DTR and DSR can be controlled and monitored using software.

### Compact Design

Compact design, 188.0(W) × 78.0(D) × 30.5(H), features flexibility in installation.

### Run by USB buspower

Not necessary to power this product externally as the bus power of USB is used.

Diverse installations such as screw fastening, magnet (option), DIN rail are possible

Installation on the floor / wall / ceiling is possible by screw fastening, magnet (option), rubber feet, etc.

This product is a USB 2.0 unit for expanding the USB port of a PC into four channels of RS-232C-standard serial communication functions.

These products support a baud rate of up to 921,600bps and has separate 128-byte / 384-byte buffer memory for transmit and receive.

Windows/Linux device driver is supported with this product.

- \* The contents in this document are subject to change without notice.
- \* Visit the CONTEC website to check the latest details in the document.
- \* The information in the data sheets is as of April, 2024.

In addition, DIN rail mounting mechanism is equipped as standard with the product, making it easy to install the product within the panel or the device.

### Specifications

#### Function Specifications

Item	Specifications
I/O	
Number of channels	4ch
Interface type	RS-232C
Transfer method	Asynchronous serial transfer
Baud rate	300 - 921,600bps *1*2
Data length	7, 8 bit / 1, 2 stop bit *1
Parity check	Even, Odd, Non-parity *1
Controller chip	XR21V1414 or equivalent (Mounting the FIFO memory as the common buffer of RS-232C communication and USB. Each channel has 384-byte receive and 128-byte transmit FIFO buffers.)
USB section	
Bus specification	USB Specification 2.0/1.1 standard
transfer rate	12Mbps (Full-speed) *3
Power supply	Bus Power
Common section	
Connecting distance	15m (Typ.)
Current consumption	5VDC 105mA (Max.)
Cable length	USB cable 1.8m
Physical dimension (mm)	188.0(W) × 78.0(D) × 30.5(H) (No protrusions)
Weight	230g (Not including the USB cable, attachment)

\*1 These items can be set by software.

\*2 Data transmission at high speed may not be performed normally depending on the environment including the type of status of connected material of cable and environment.

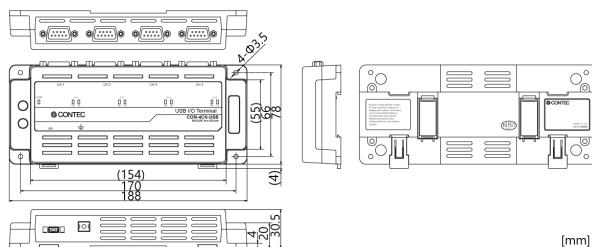
\*3 This depends on the PC environment used (OS and USB host controller).

\*4 To suppress the heating, ensure that there are spaces for ventilation (about 5cm) around this product.

#### Installation Environment Requirements

Item	Specifications
Operating ambient temperature	-20 - +60°C
Operating ambient humidity	10 - 90%RH (No condensation)
Floating dust particles	Not to be excessive
Corrosive gases	None
Standard	VCCI Class A, FCC Class A, CE Marking (EMC Directive Class A, RoHS Directive), UKCA

## Physical Dimensions



## Included Items

- Product [COM-4CN-USB] ...1
- External toothed lock screw  
(M4 x 5, Use for earth terminal)...1
- Rubber feet...4
- USB cable (1.8m) ...1
- USB cable attachment on the main product's side  
(For Mini B connector side) ...1
- Please read the following ... 1

## Support Software

Name	Contents	How to get
Windows Version Serial communication driver COM-DRV(WDM)	Software that makes it possible to use the product in the same manner as the COM ports of a PC running Windows. This software supports communication using DCB structures in the standard OS Win32 API, and the SerialPort class in the .NET Framework and the pySerial module in Python. Various sample programs such as C# and Visual Basic .NET, Visual C++, Python etc. and diagnostic program useful for checking operation is provided.	Download from the CONTEC website *1
Linux Version Serial communication driver COM-DRV(LNX)	Software that makes it possible to use the product in the same manner as the COM ports of a PC running Linux. This software conforms to Linux-standard tty drivers, and the pySerial module in Python. The software includes various sample programs such as gcc (C, C++) and Python programs.	Download from the CONTEC website *1

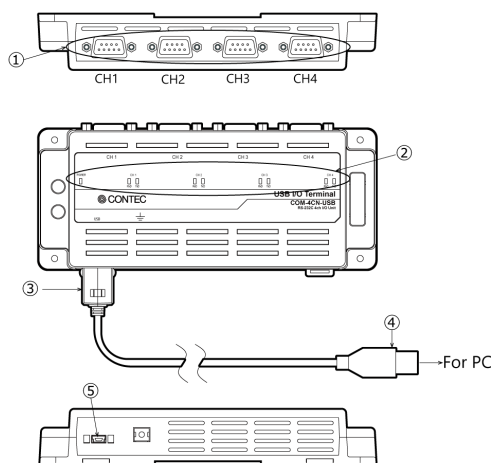
\*1 Download the files from the following URL.  
<https://www.contec.com/download/>

## Optional Products

Product Name	Model type	Description
CONPROSYS Series Magnet	CPS-MAG01-4	Four Piece Set

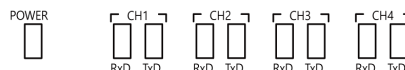
\* Visit the CONTEC website for the latest optional products.

## Name of each parts



No.	Name	No.	Name
1	Interface connector (9pin D-SUB(Male))	4	Interface connector (USB Type-A)
2	LED Indicator	5	Interface connector (USB mini-B Type)
3	USB cable attachment		

## LED indicator

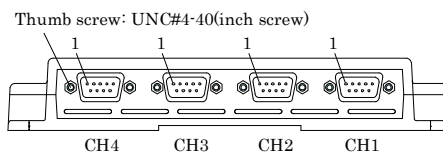


LED	Meaning	Status
POWER (Green)	Power status	OFF: Power has not been supplied. ON: Power has been supplied.
RxD (Yellow)	Reception status	OFF: It indicates receiving data by the RS-232C in standby. ON: It indicates receiving data by the RS-232C.
TxD (Green)	Transmission status	OFF: It indicates sending by the RS-232C in standby. ON: It indicates sending data by the RS-232C.

## Connection Method

### Interface Connector

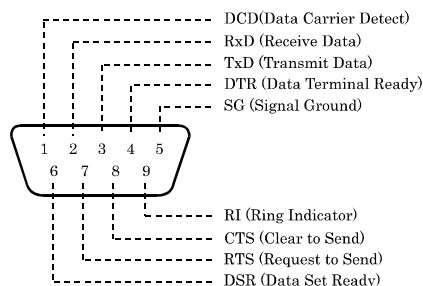
Use the interface connectors of the product to connect with external devices.



- Connector used  
DELIC-J9PAF-20L9E equivalent [mfd. by JAE, Male]
- Applicable connectors  
17JE-13090-02(D8C) [mfd. by DDK, Female]

### Connector Pin Assignment

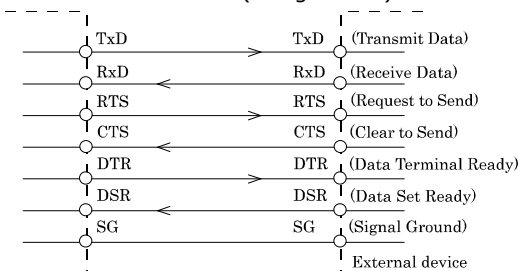
#### Pin Assignments of COM-4CN-USB Interface Connector



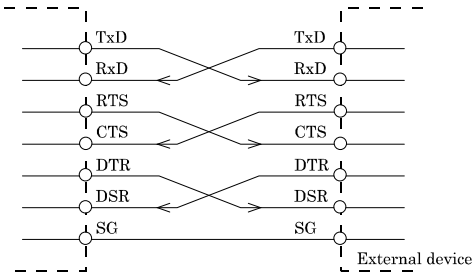
## Types of Cable and Example Connections

When using an RS-232C interface, different cables are required depending on the type of device to which you are connecting (computer or modem, etc.). Check the requirements of the external device and select either a straight-through or crossed (null modem) cable as appropriate. If special treatment of the signal lines in the connector is required, ensure that this is done in accordance with the specifications.

### Example Connection to a Modem (Straight cable)



Example Connection to a PC (Cross cable)



Example Connection to a Device

