# 6 Troubleshooting

What baud rates can be used? Baud rates up to 921.6 Kbps.

### Which USB cables can I use?

A 0.9 meters (3 ft) cable is included. Other lengths can be purchased separately. The maximum range for USB is 4.6 meters (15 ft). If you need to go farther than 4.6 meters (15 ft), B+B SmartWorx also sells USB extenders.

Can I get another terminal block for Model BB-USOPTL4DR? Yes. The part number is BB-TBKT2.

# Recommended Accessories USB Isolator Model# BB-UH401 4-Port USB Hub Model# BB-UHR204



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# BB-USOPTL4DR, BB-USOPTL4DR-2 BB-USOPTL4DR-LS

USB to RS-422/485 Isolated Converter

Before you begin, be sure you have the following:

- + BB-USOPTL4DR-xx Converter
- + USB Cable
- + CD ROM with Drivers



Fast and easy on the web: www.advantech-bb.com



# 2 Set DIP Switches

OFF = Left

ON = Right

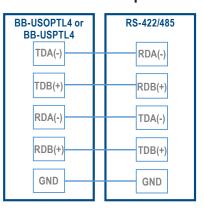
### **DIP Switch Position**

Switch	OFF	ON
1	TD always Enabled (RS-422)	TD only enabled during data transmission (RS-485)
2	RD Always enabled (ECHO On)	RD disabled during data transmission (ECHO Off)
3	4-Wire Mode	2-Wire Mode
4	4-Wire Mode	2-Wire Mode

### 4-Wire RS-485

- + RS-422 = All DIP Switches OFF
- + RS-485 = DIP 1 ON, DIP 2,3 and 4 OFF

### 4 Wire Set Up



# Install Drivers

Use the included CD to install the converter's drivers.

WARNING: To prevent installation errors, do not plug in the hardware until you have already installed the drivers.

After connecting the device, you can check Device Manager to learn which COM port number was assigned (Control Panel/System/Hardware/Device Manager/Ports LPT & COM).

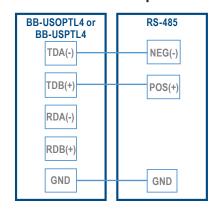
You can re-assign COM numbers by clicking the Advanced Settings button on the Port Settings screen.

# Wire the Converter

### 2-Wire RS-485

+ All DIP Switches = On

## 2 Wire Set Up



# 4 Loopback Test - Optional

- Set DIP switches 1, 3, 4 to ON.
- · Set DIP switch 2 to OFF.
- Use HyperTerminal or another terminal program to confirm passage of data through converter.

# 5 Check LEDs

When everything is installed and connected, the LEDs will blink to let you know that data traffic is passing through the converter