# PCIe I/O Host Adapter

## 1. Introduction

Add Multiple Ports RS232 with DB9M 5V DC bus power output and 128 byte deep FIFO at Low Profile PCIe or Mini PCIe x1 card to your System

#### 1.1. Features

#### 1.1.1. PCIe Interface

- o Compliant with PCI Express Specification, revision 1.0a
- o 1-lane 2.5Gbps PCI Express host interface
- Fully RoHS compliant

### 1.1.2. RS232 (UART) Serial Port

- o Multiple 16C950 High performance UART DB9M channels
- o 128-byte deep FIFO per transmitter and receiver
- Superset and backward compatible to 16C550, 16C650, 16C750 and 16C850
- o 5VDC Bus Power on each DB9M Port for POS device use
- Jumper to select 12VDC Power output on DB9M Port (Option for Mini PCIe card only)
- o Individual Jumper to select RI/DC-Power in each DB9M Port
- o 128 Rx interrupt thresholds
- o 128 Tx interrupt thresholds
- o Supports 64bit / 32bit Windows
- o Chipset: Oxford

## 1.2. Package Contents

- RS232 Host Adapter
- o Driver CD
- o RJ45-DB9M cable (for PCIe 2Ports card option) or DB9M 4Ports Fan-Out Cable (for 4Ports card option) or 10Pin PinHeader-DB9M cables (for Mini PCIe card option)

### 2. Hardware Installation

# 2.1. 5V or 12V DC Power Selection (J3 on Mini PCIe card only)

Select DC5V or DC12V connected to Pin9 of DB9M Connector.

#### 2.2. DC Bus Power or RI Selection

Select DB9M Pin9 as DC Bus power (Vcc Shorted) or RI function (RI Shorted).

# 2.3. 10Pin RJ45 to DB9M Pin Out (PCIe 2Ports card)

|     | 10Pin RJ45 | 8Pin RJ45 | RS232 DB9M |
|-----|------------|-----------|------------|
| 5V  | 1          | x         | x          |
| DCD | 2          | 1         | 1          |
| DSR | 3          | 2         | 6          |
| RXD | 4          | 3         | 2          |
| RTS | 5          | 4         | 7          |
| TXD | 6          | 5         | 3          |
| CTS | 7          | 6         | 8          |
| DTR | 8          | 7         | 4          |
| GND | 9          | 8         | 5          |
| RI  | 10         | x         | 9          |

FC (E

- 1 - 2-HPCIE-01C

## 2.4 Dual 10Pin Pin Header to DB9M Pin Out (Mini PCIe card)

| 15  | $\circ$    |   |    |
|-----|------------|---|----|
|     | 0          |   |    |
| 13  | 0          | 0 | 18 |
| 12  | 0          | 0 | 17 |
| 11  | 0          | 0 | 16 |
| ] ! | 5 <b>O</b> |   |    |
| ; . | 40         | 0 | 9  |
| 1   | 3 <b>O</b> | 0 | 8  |
| :   | 20         | 0 | 7  |
|     | 10         | 0 | 6  |

Top View

| Signals of Dual 10Pin Pin Header |         |  |  |  |
|----------------------------------|---------|--|--|--|
| Pin#                             | Signals |  |  |  |
| Pin 1, 11                        | DCD     |  |  |  |
| Pin 2, 12                        | RXD     |  |  |  |
| Pin 3, 13                        | TXD     |  |  |  |
| Pin 4, 14                        | DTR     |  |  |  |
| Pin 5, 15                        | GND     |  |  |  |
| Pin 6, 16                        | DSR     |  |  |  |
| Pin 7, 17                        | RTS     |  |  |  |
| Pin 8, 18                        | CTS     |  |  |  |
| Pin 9, 19                        | RI      |  |  |  |
| Pin 10, 20                       | Key     |  |  |  |
|                                  |         |  |  |  |
|                                  |         |  |  |  |
| !                                |         |  |  |  |

# 3. Software Installation

## 3.1. Windows Driver Installation

- 1. Power off the system. Insert PCIe or Mini PCIe Card into an available slot.
- 2. Power up the system, and insert the Driver CD into your CD-ROM/DVD.
- 3. Windows will display the Found New Hardware Wizard, Click "Next".
- 4. Select "Search for a suitable driver for my device (Recommended)" and Click "Next", and make sure the Driver CD in your CD-ROM/DVD.
- 5. Under "Specify a locations" insure that is only checked, and click "Next".
- 6. Type in E:\ (If your CD-ROM/DVD is **E**:\) and click "**Browse**".
- 7. Points specify a location, example **E**:\ **PCIe IO\OXPCIe\x86** (or \amd64 for 64bit Windows), and click "OK".
- 8. When the wizard indicates that it found a driver for the device click "**Next**". Then click "**Finish**".
- 9. Repeat Step 3 Step 8.

# 3.2. Driver Installation Verifying under Windows

- 1. Right click on "My Computer" icon, select "Properties", left click on "Hardware" tab, and then on "Device Manager" button.
- 2. Double click " **Multifunction adapters**", If there is no yellow "!" or "?" in front of **PCI Express Multiport Serial Adapter.** The driver has started correctly.
- 3. Double click another "**Ports**", If there is no yellow "!" or "?" in front of **PCI Express UART Port (COM3~6).** The driver has started correctly.

FC (E