This document explains how to set up dial up connection for a UMTS/HSPA Data card on Windows XP.
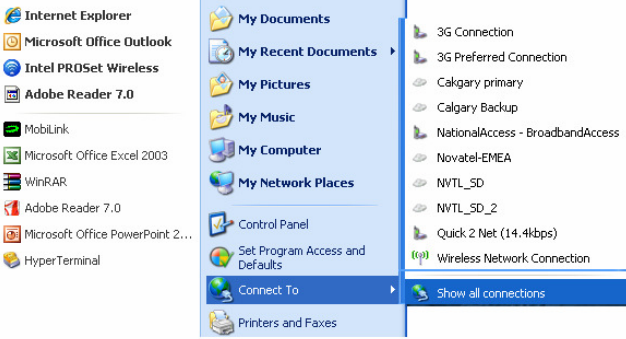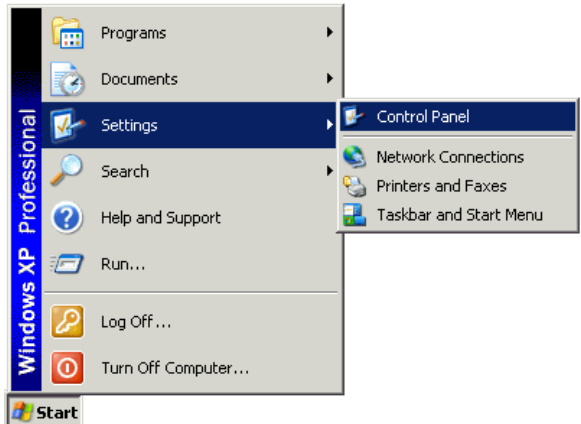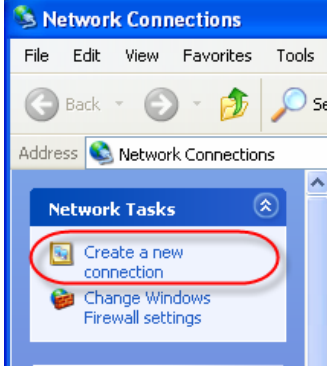
Preparation

Requirements
- ✓ Windows 2000/ XP pre-installed on your computer
- ✓ Administrator privileges on the Windows XP machine.
- ✓ Data Card "Modem"
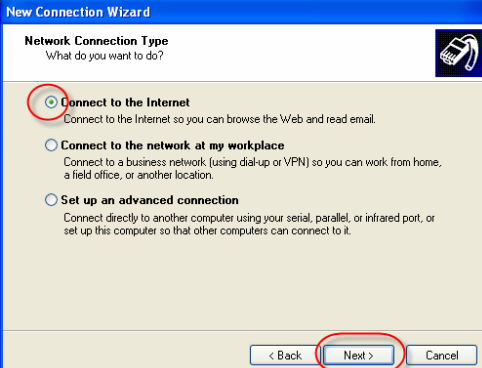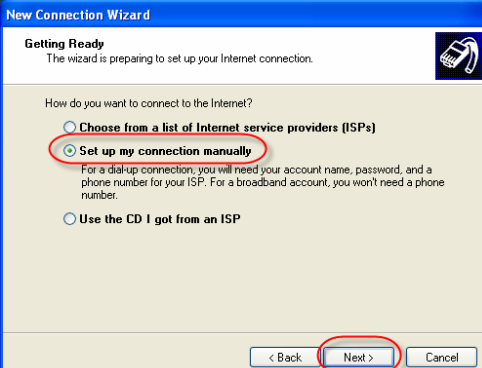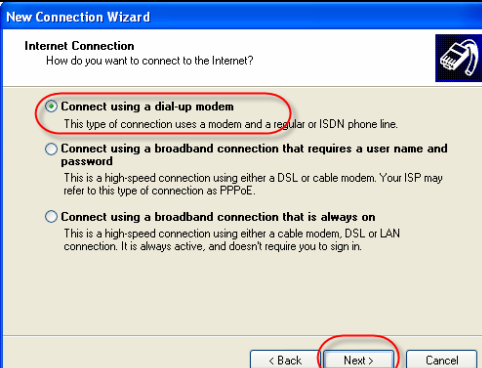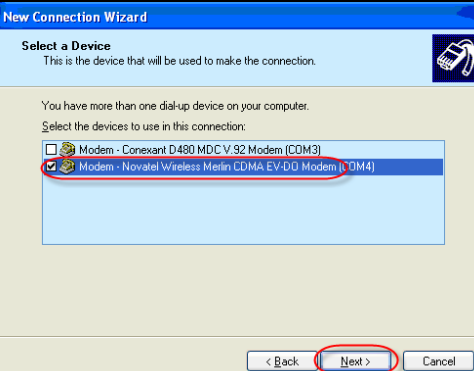- ✓ Activated SIM Card
- ✓ Network Coverage

Setup
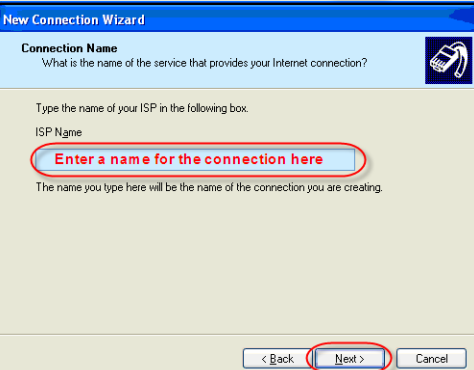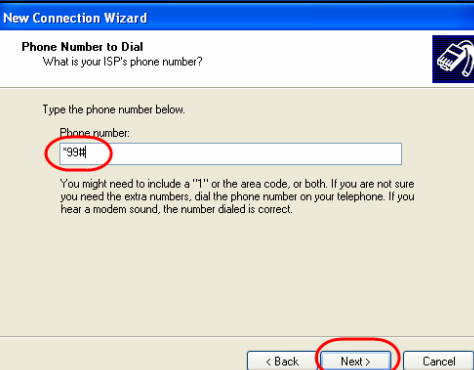
When you have met all these requirements, follow these steps to perform the installation and configuration.
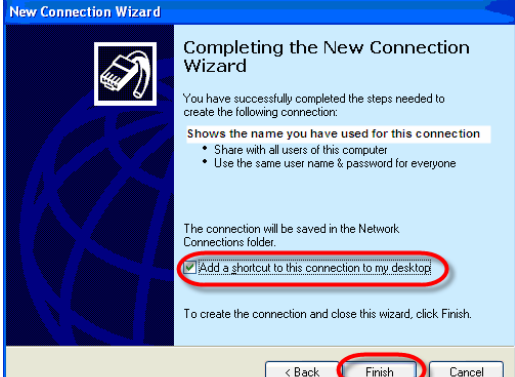
To start the setup there are two options,

a. Select "Start" -> "connect To" -> "Show all Connections".
b. Or select "Start" -> "Control Panel" -> "Network Connections"
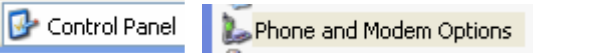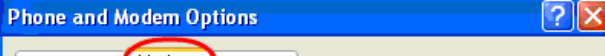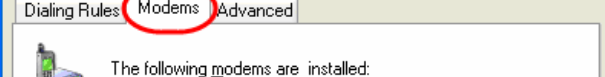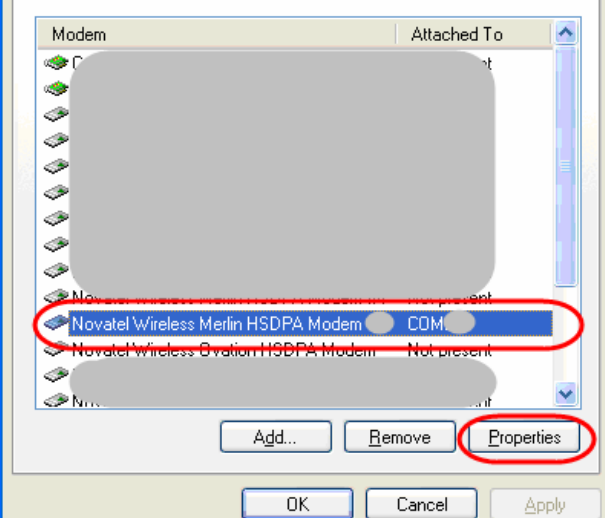
a. Click **Start-> Connect to-> Show all Connection**	b. Click **Start**->**Settings**->**Control Panel -> Network Connections**
Network connections **Select** "Create a new connection"	

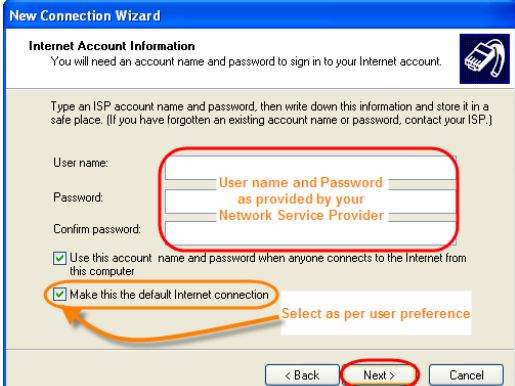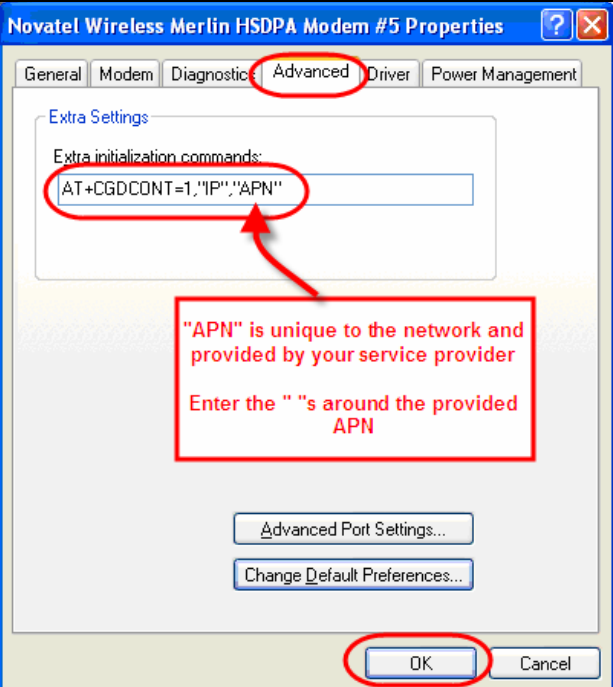|	
New Connection Wizard - click **Next** to continue	
Network Connection Type **Select** 'Connect to the Internet' and click **'Next'**.	
Getting Ready **Select** 'Set up my connection manually' and click **'Next'** to continue.	
Internet Connection **Select** 'Connect using a dial-up modem' and click **'Next'** to continue.	

Select a Device **Check** Modem – Novatel Wireless and uncheck all others. (If Modem – Novatel Wireless does not appear, then Novatel device may not have been properly installed – Goto Troubleshooting section of this document) And click **'Next'** to continue.	
Connection Name Enter "Network Name" for the ISP Name and click 'Next' to continue. The Network Name that you enter is any name you want to use to identify the connection.	
Phone Number to Dial Enter ***99#** And click **'Next'** to continue.	
Connection Availability - you may select Anyone's use And click **'Next'** to continue.	
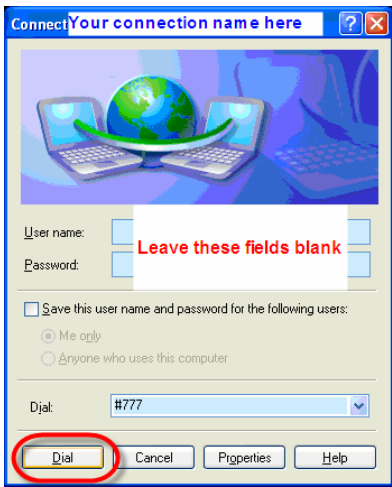
Internet Account Information Enter your user name and password - User name and password provided by your network service provider - Depending on your preference, you may choose to check/uncheck the box for Make this the default Internet connection And click **'Next'** to continue.	
Completing the New Connection Wizard **Click** on Add a shortcut to this connection to my desktop And click '**Finish**'	

Add APN to modem initialization string.

Control Panel -> Phone and Modem Options	
Select the Modems tab Choose the Novatel Wireless Device you are using Click Properties	

| Choose **Advanced** tab

Enter the Extra initialization command string in order to select the APN provided by your wireless network service provider.

The format is AT+CGDCONT=1,"IP","APNstring"

- "quotes" are required.
- APNstring as per instruction from your service provider

Select **OK**. | |
| Select **OK** to close Phone and Modems window | |

Connect

| If you created a shortcut icon on the desktop. | Select (Double click) the shortcut icon for your connection (the name entered in the wizard) on the desktop.
Click 'Dial'
 |
| If you did not create and shortcut icon or it has been deleted. | Go to '**Start**' -> '**Connect To**' -> '**Show all connections**' -> Dial-up section – find your connection name – **Right Click** – '**Connect**' |

Disconnect

Network Connection in System Tray | Right Click | Disconnect
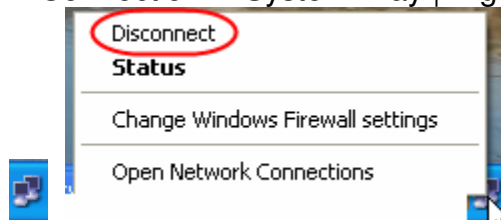
Or

To disconnect, **double click** on the desktop shortcut icon for your dialup connection to open connection status and click on **Disconnect.**

Or

Go to **Start** | **Connect To** | **Show all connections** | Find Dial-up section, **your connection** – **Right Click** | **Disconnect.**

Troubleshooting

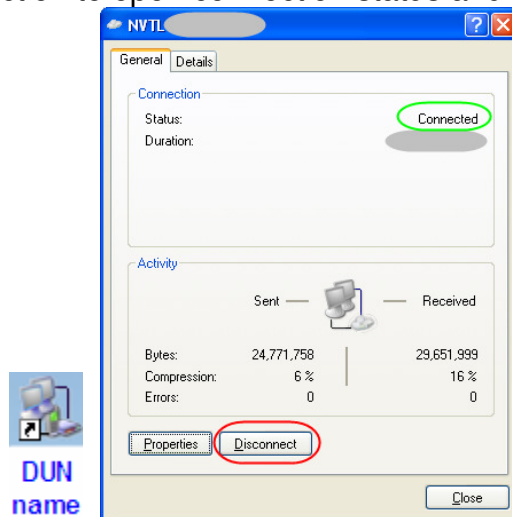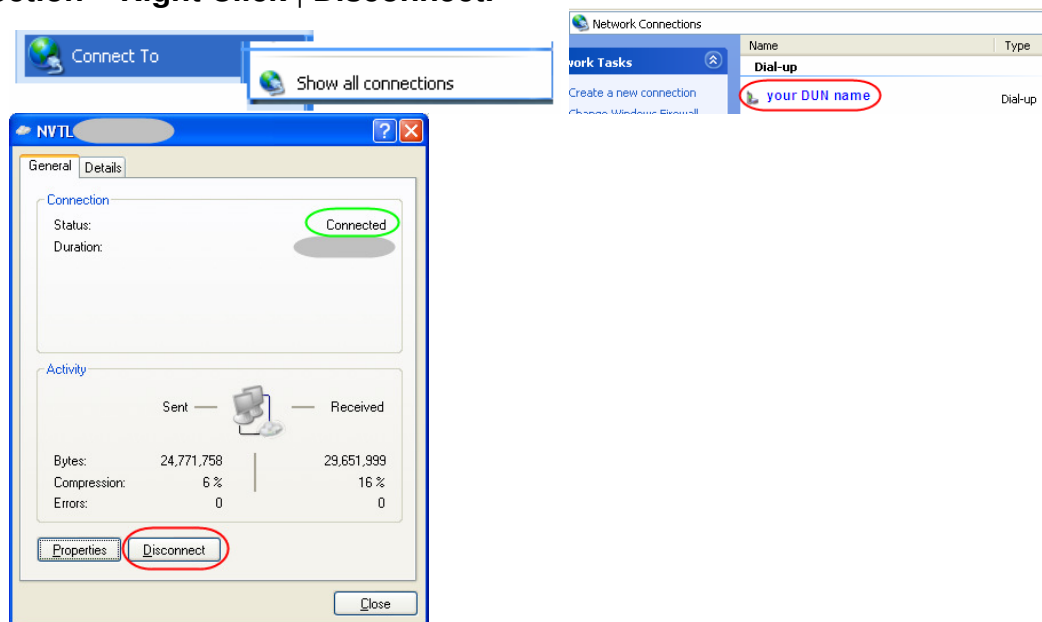| LED Color		LED State	Description
RED	⬛	SIM Error No Service	Flashing: SIM card may be missing or inserted incorrectly. Solid: GPRS/EDGE/UMTS/HSDPA cellular service is currently not available.
GREEN	⬛	GPRS	Flashing: GPRS service is available. Solid: Connected to a network using GPRS.
VIOLET	⬛	EDGE	Flashing: EDGE service is available. Solid: Connected to a network using EDGE.
BLUE	⬛	UMTS	Flashing: UMTS service is available. Solid:* Connected to a network using UMTS.
YELLOW	⬛	HSDPA	Solid:* HSDPA service is available and is being used during the download.

Note: 5 LED colors not supported on U630, U530 or U520

If the LED is not lit, then check that the device is connected properly. If physical connection seems good, then check for the device in the device manager.

Device Manager

Verify that your device is found in Device Manager without Red 'X's or Yellow Triangles with '!". If these conditions show, then there is a driver problem or device conflict

When you insert your Novatel Wireless device into your computer, Windows will double ding and popup messages indicating new hardware found. Please note any error or warning messages that may popup.

To get Hardware Device Manager Information
- Start | Control Panel | System
- Hardware tab
- Select Device Manager

- Click '+' to expand a device type
- Highlight device (left click)
- Right Click – Select Properties (left click)

Please check one of the following sections appropriate for your device

PCMCIA Devices U730, U740 U630 U520, U530	3 Devices **MUST** show - Modem Section – Novatel Wireless Merlin UMTS or HSDPA Modem - Ports Section – Novatel Wireless Merlin UMTS or HSDPA Status Port (COM# will vary by system) - Universal Serial Bus Controller – NEC PCI to USB Open Host Controller Safely Remove Device Icon will show in System Tray
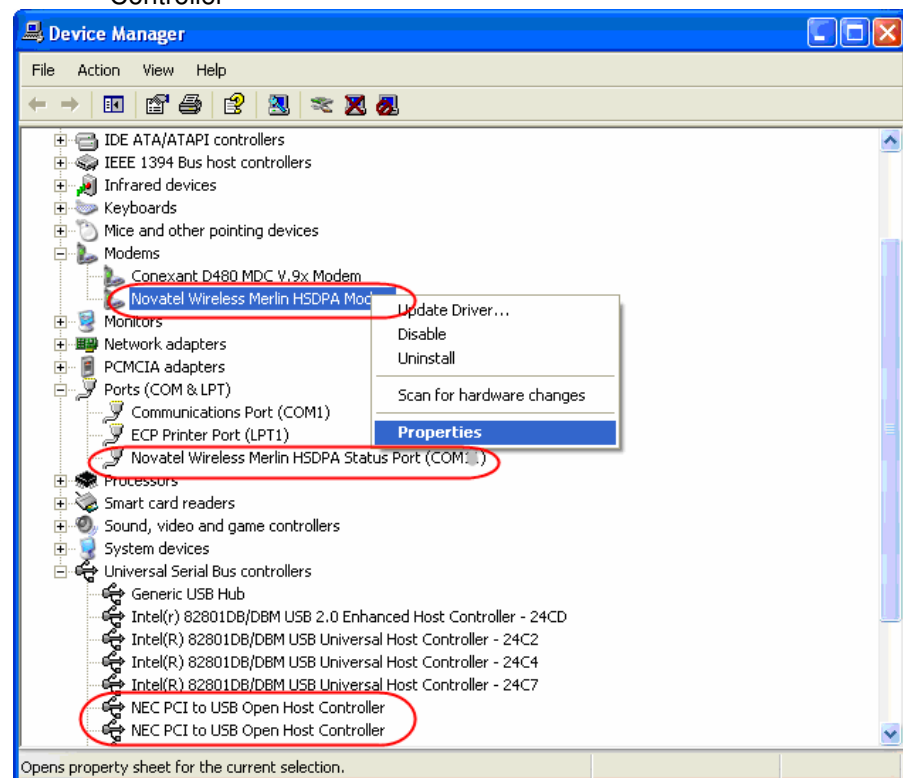
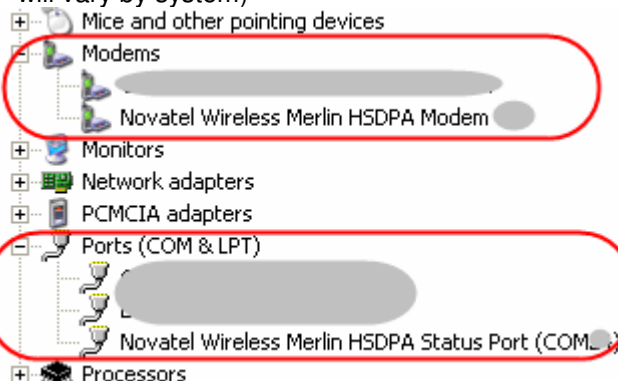| ExpressCard Devices

XU870
X950D | 2 Devices **Must** show
 - Modem Section – Novatel Wireless Merlin HSDPA Modem
 - Ports Section – Novatel Wireless Merlin HSDPA Status Port (COM# will vary by system)

 □ Mice and other pointing devices
 ─ Modems
   Novatel Wireless Merlin HSDPA Modem
 □ Monitors
 □ Network adapters
 □ PCMCIA adapters
 ─ Ports (COM & LPT)
   Novatel Wireless Merlin HSDPA Status Port (COM..)
 □ Processors

 - Depending on the device and options available, other Novatel Wireless Merlin ports may also show.
 - The 'Safely Remove Device' icon may not show in system tray – not required for this device
Note
 - if you are using a ExpressCard-PCMCIA adapter, you will also see

 ─ Universal Serial Bus controllers

   NEC PCI to USB Open Host Controller
   NEC PCI to USB Open Host Controller

 - Safely Remove Device Icon will show in System Tray |

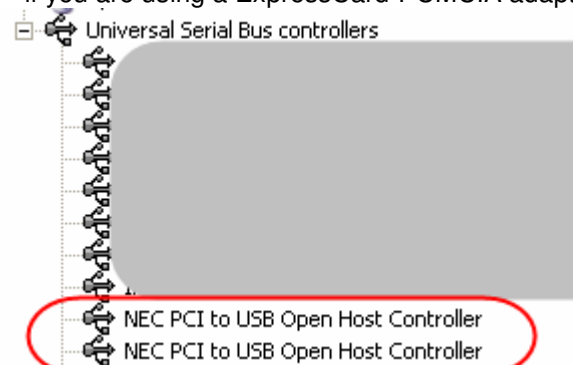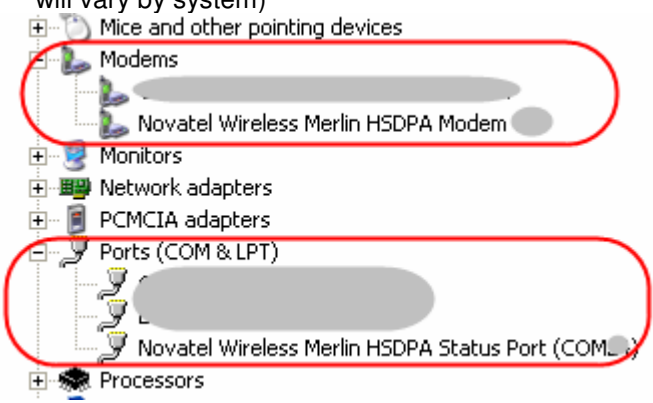| Ovation USB Devices MC950D MC930D	2 Devices **Must** show - Modem Section – Novatel Wireless Merlin HSDPA Modem - Ports Section – Novatel Wireless Merlin HSDPA Status Port (COM# will vary by system) - Depending on the device and options available, other Novatel Wireless Merlin ports may also show. - The 'Safely Remove Device' icon may not show in system tray – not required for this device

If required, drivers are available for download at
www.nvtl.com/releases/NvtlDriver_V2.01.07MSI.zip