
ADU-520

(User Manual)

SW-ADU-520-UG-V1.2E(Skylink)

March 27, 2008



AnyDATA CDMA Module Series Reference Design Specification
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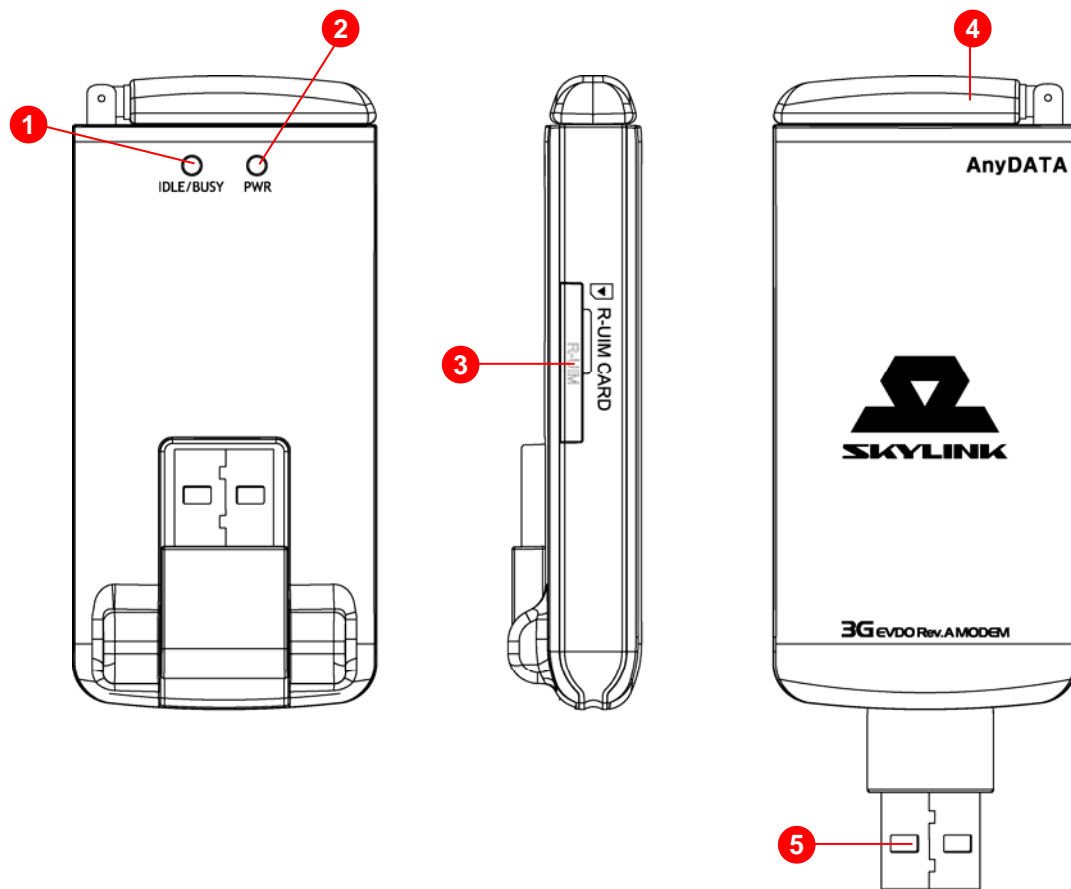
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1. ADU-520 Features



1. IDLE/BUSY Lamp

Indicates the R-UIM terminal status

2. PWR Lamp

Indicates the Power supply conditions

3. R-UIM Card Cap

Inserts/Removes the R-UIM Card

4. Antenna

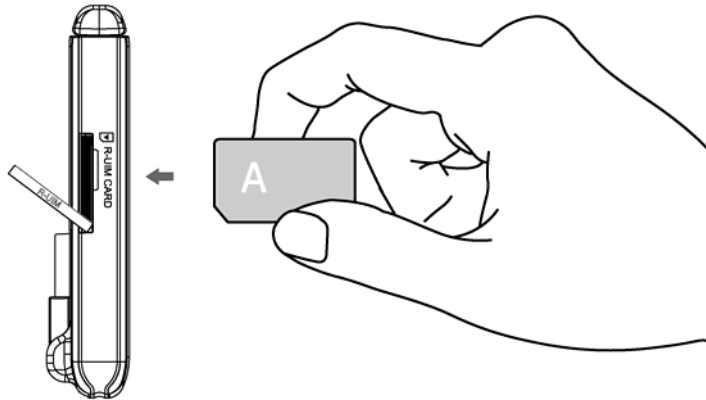
Do not place metal objects near the antenna for better communication.

5. USB Connector

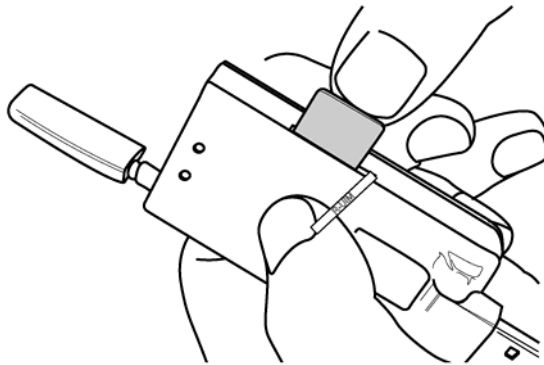
Connects to a PC

Inserting the R-UIM card

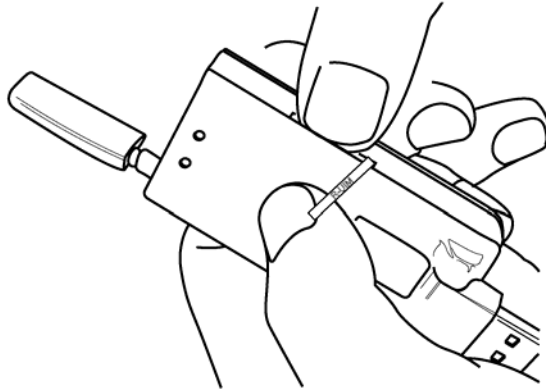
1. Open the R-UIM Card Cap
2. Let the R-UIM Card face up as below



3. Hold R-UIM terminal with your left hand, and insert R-UIM card with your right hand.



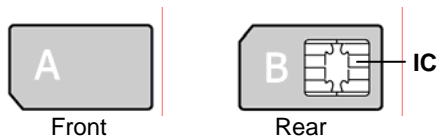
4. Insert R-UIM card securely all the way to the end until R-UIM card clicked.



5. Close the R-UIM Card Cap

<Note>

- Make sure to check front and rear side of R-UIM card.



- Do not touch or damage the IC portion for the R-UIM card.
- Inserting R-UIM card reversly may result in malfunction.

2. LED Indicators

2.1 POWER

Mode	Descriptions
RED	Modem power on state
OFF	Modem power off state

2.2 IDLE / BUSY

Mode	Descriptions
GREEN	Success to network acquisition (Idle state)
BLUE	Data call is connected
BLUE BLINK	Not connected yet
OFF	No service or Searching the network

3. Program Installation

3.1 Introduction

This section describes step-by-step method to install ANYDATA.NET USB MODEM and Easy Wireless Net Software.

Note : Must install the software before connecting ANYDATA.NET USB MODEM to PC/Notebook.

3.2 Minimum System Requirement

3.2.1 PC Hardware

Recommend to use PC/Notebook at speed of 300 MHz or higher.

Minimum 233 MHz speed required, * Intel Pentium/Celeron products,

AMD K6/Athlon/Duron products or compatible processors

Recommend to use 128MB RAM or higher

Minimum 64MB of memory must be used,

but in this case the performance will be degraded and certain features will be limited.

At least 100 MB of free hard disk space is required.

Motherboard or PCI card that supports USB.

Video adaptor with Super VGA (800 x 600) or higher resolution and Monitor

CD-ROM or DVD Optical Drive

Keyboard and Mouse

3.2.2 Operating System

Windows XP Home or Professional (with Service Pack 2)

Windows 2000 (with Service Pack 4 for optimal performances)

Windows Vista

< Recommended parameters >

Windows Update : Keep your computer up to date

3.3 Easy Wireless Net Installation and Uninstall (Windows 2000)

<Note> USB Driver installation does not support Windows 2000.

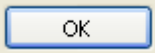
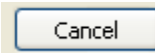
Follow the steps to use modem for Windows 2000

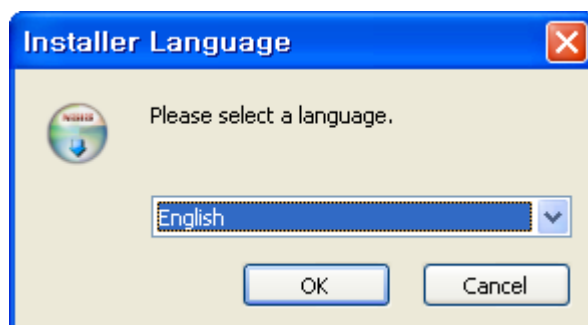
- 1) Connect USB modem into a PC that has Windows XP or Windows Vista installed
- 2) Run the included CD-ROM when you purchased
- 3) Following message will appear if you run <med.exe> contained in **CD-ROM Drive:\Utils** folder
- 4) If you connect the USB modem to PC, you will see the portable disk created and run the StartCD.exe from the disk. The next step is same as Easy Wireless Net Installation and Uninstall(Windows XP)

3.4 Easy Wireless Net Installation and Uninstall (Windows XP)

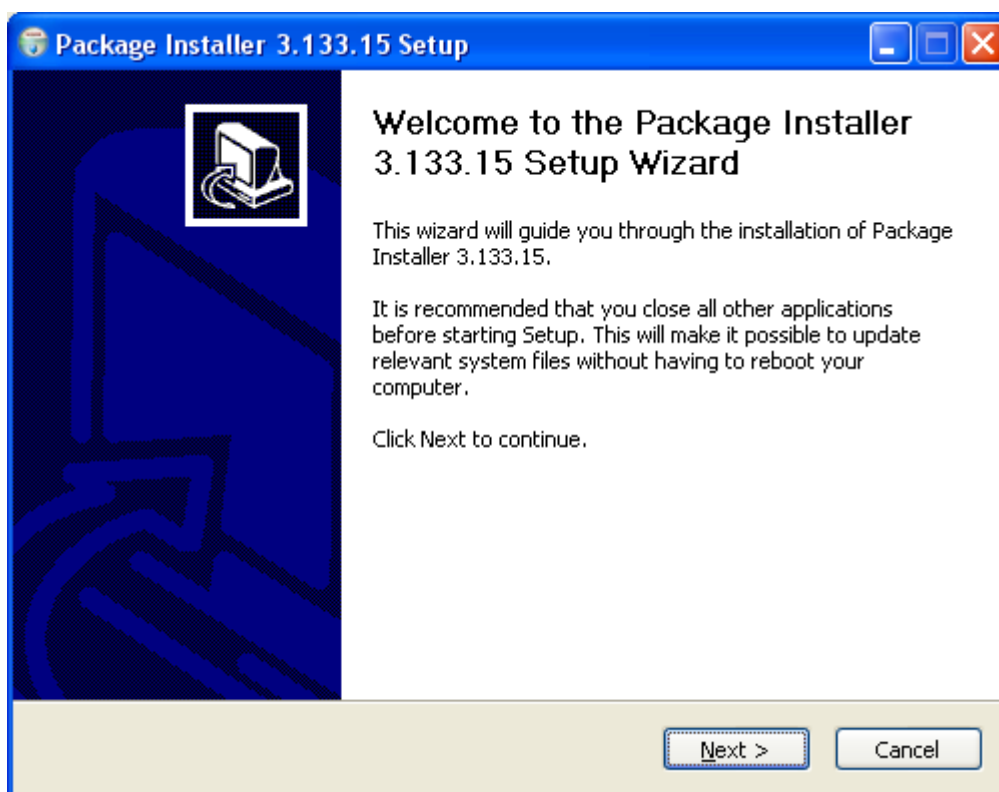
3.4.1 Easy Wireless Net Installation (Automatic)

1. Connect the modem to USB port. If USB DRIVER isn't installed, MODEM PACKAGE INSTALLER will run automatically
2. Select the desire language as shown below.

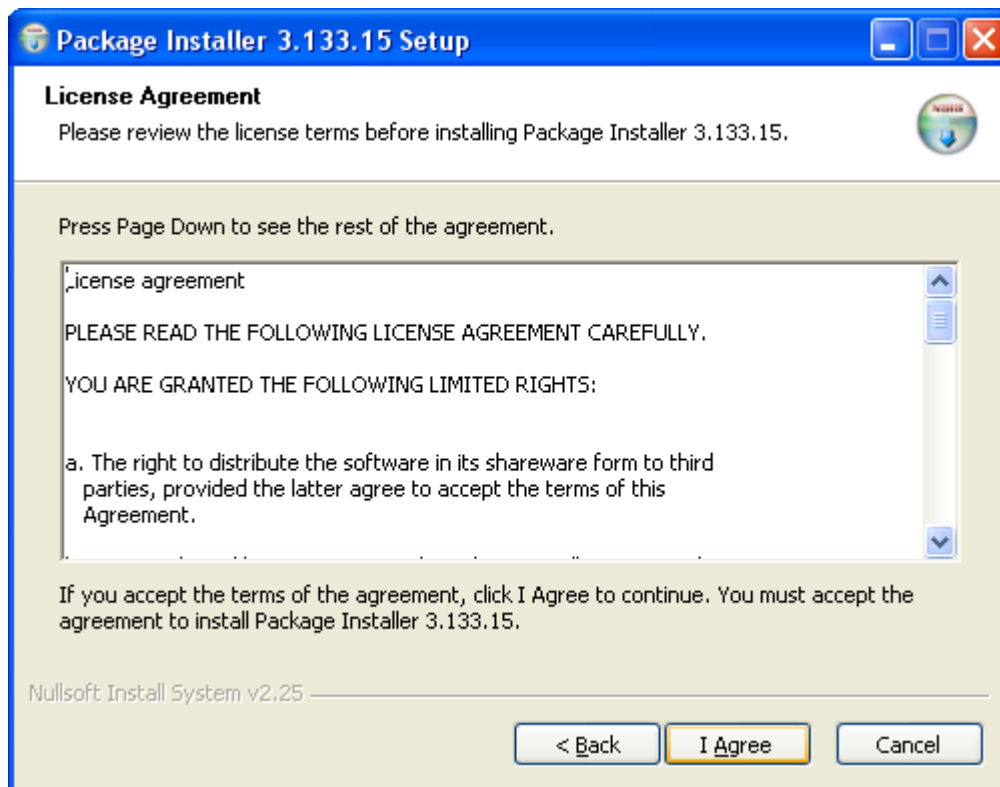
3. Press  button to proceed. By pressing  button, the installation of Easy Wireless Net Program will stop.



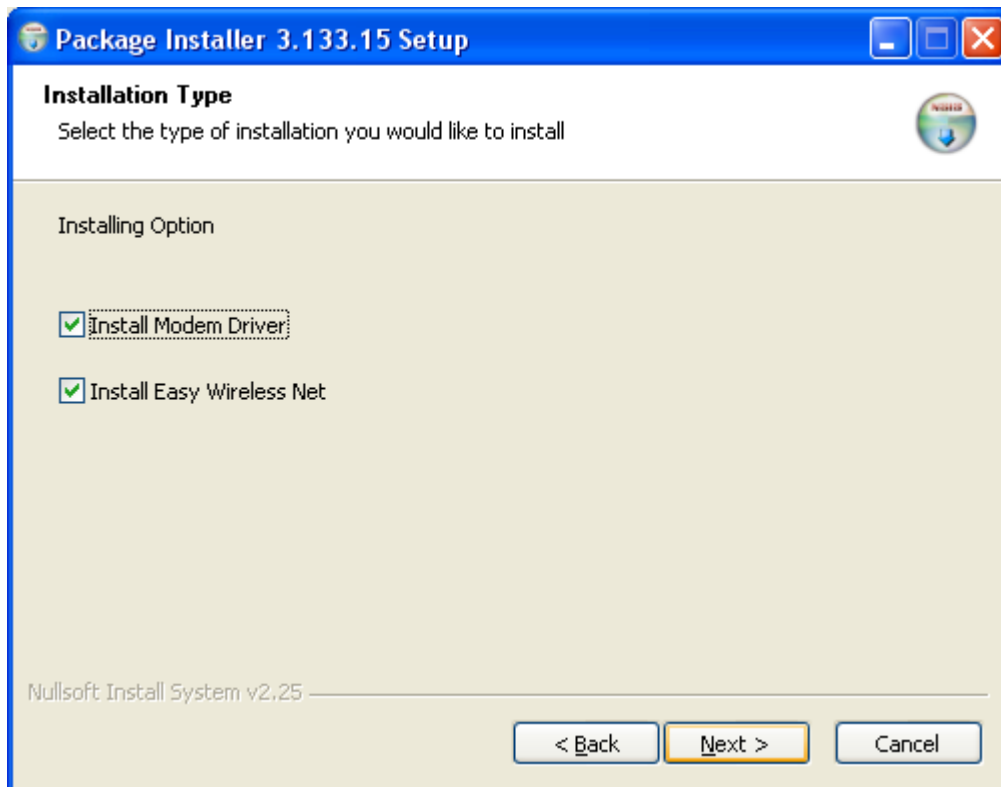
4. Welcoming message for using Easy Wireless Net Program window will appear.



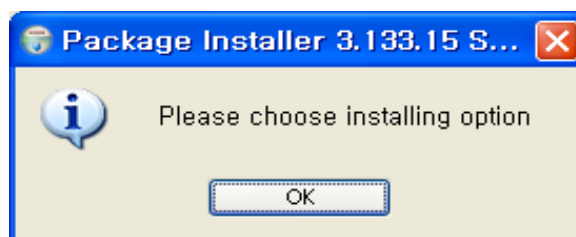
5. Next window is related to License Agreement. Please read carefully.
6. Press <I Agree> button to advance to the next step.



7. You can install Easy Wireless NET Program and modem driver by choosing the installing option.

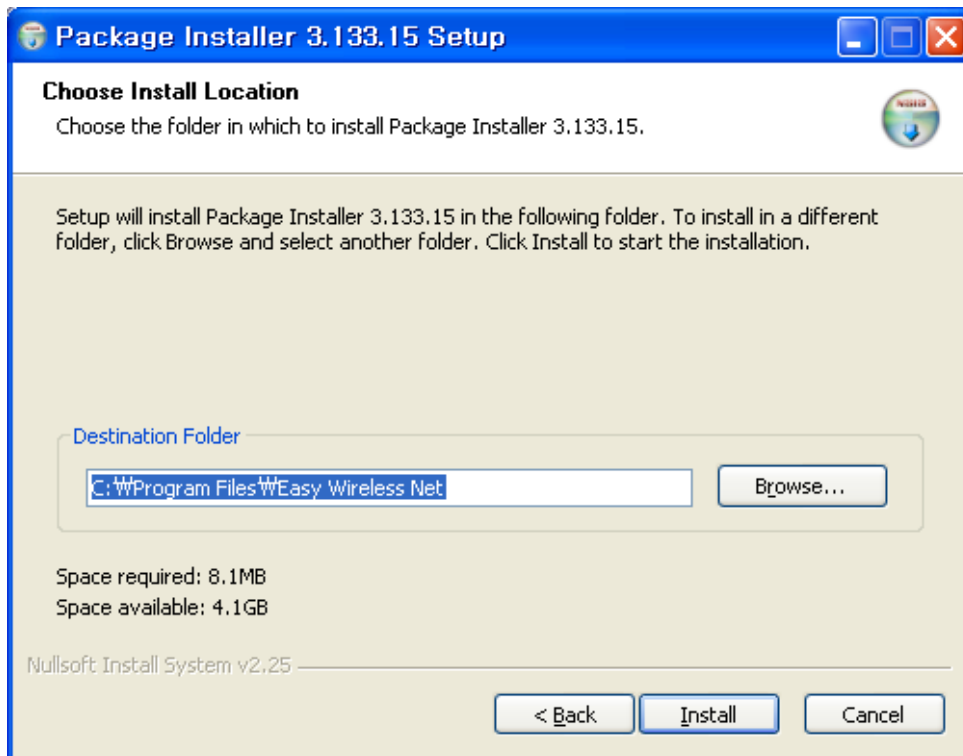



8. If you don't choose any option, the message will appear. The choice of one option is required.

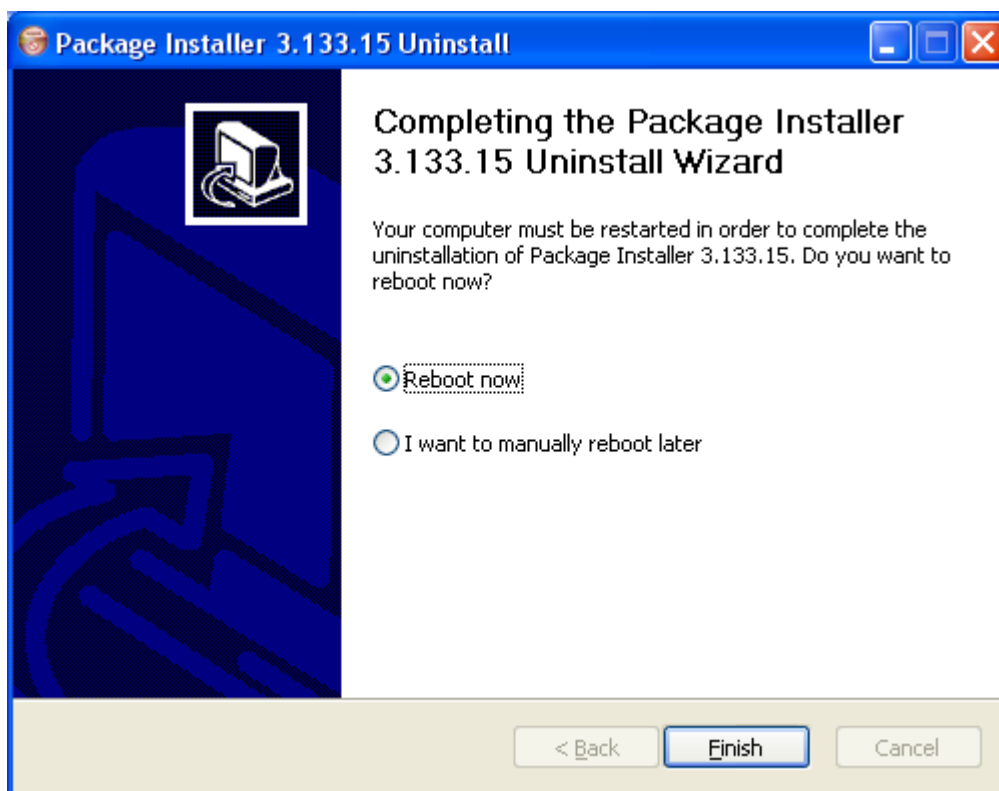


9. Next window displays asking proper path for installing the program.

Default path is <C:\Program Files\EasyWirelessNet>



10. Press  button for ending the program installation.

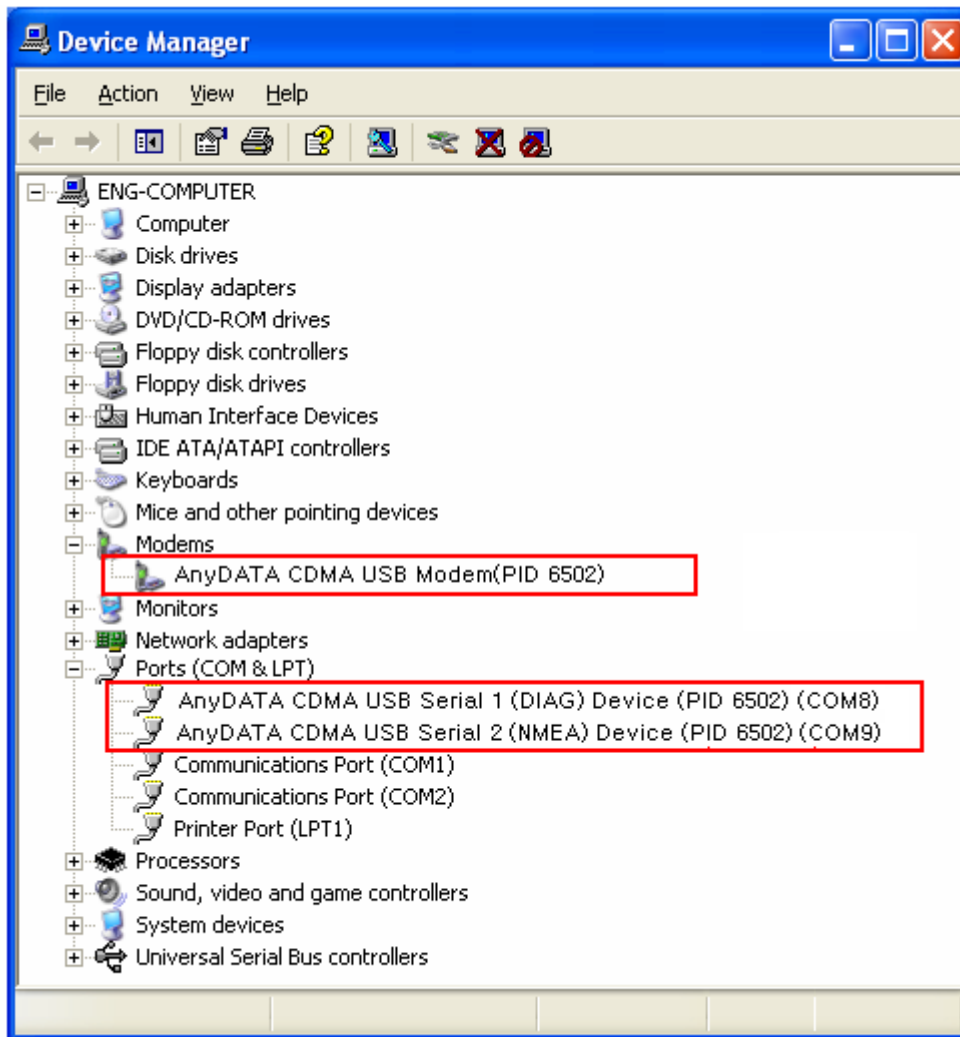


11. The computer needs to restart after the driver installation completed.
To restart the computer later, select <I want to manually reboot later>.

12. Connect the modem and PC's USB port, and check if the driver is installed properly in <Device Manager>. See the followings to the location of <Device Manager>

[Start Control Panel System Hardware Tab Device Manager]

As shown in below with red boxed that shows <AnyDATA CDMA USB Modem> and <AnyDATA CDMA USB Serial 1/2 Device>, the driver has been successfully installed.



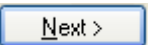
3.4.2 USB Driver Installation (Manual)

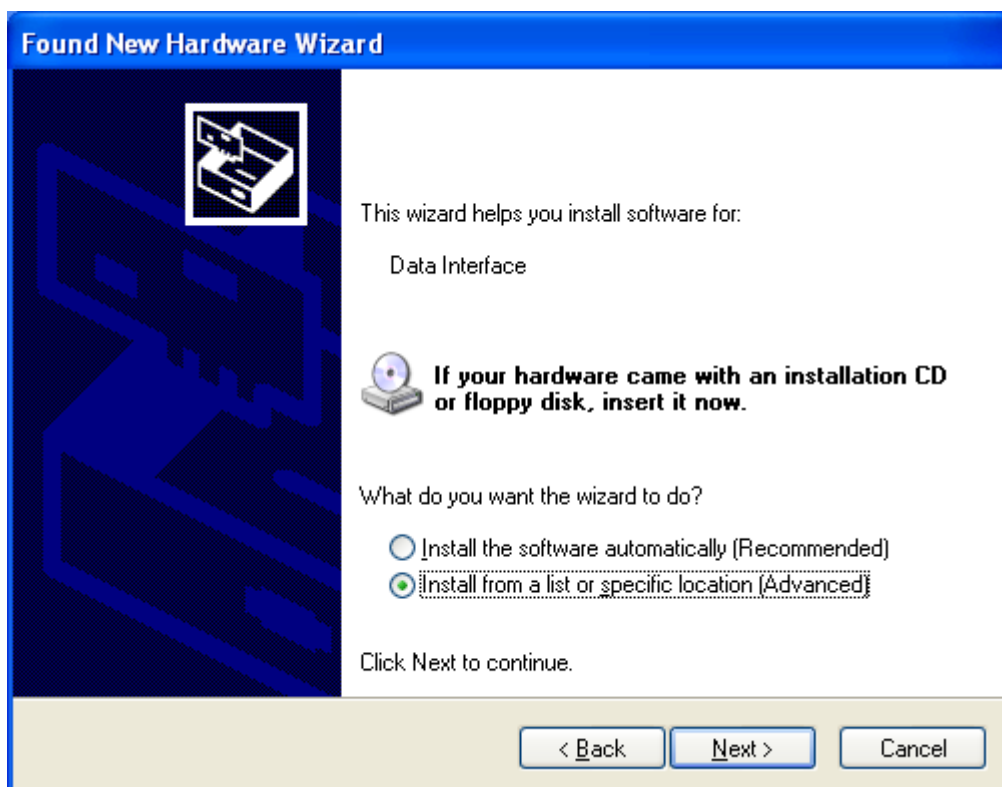
1. Connect the modem and PC's USB port with supplied USB cable.

The manual driver installation shall be required twice.

2. Installing <AnyDATA USB Modem Driver> window will appear.

Select <Install from a list or specific location (Advanced)>.

3. Press  button to proceed.

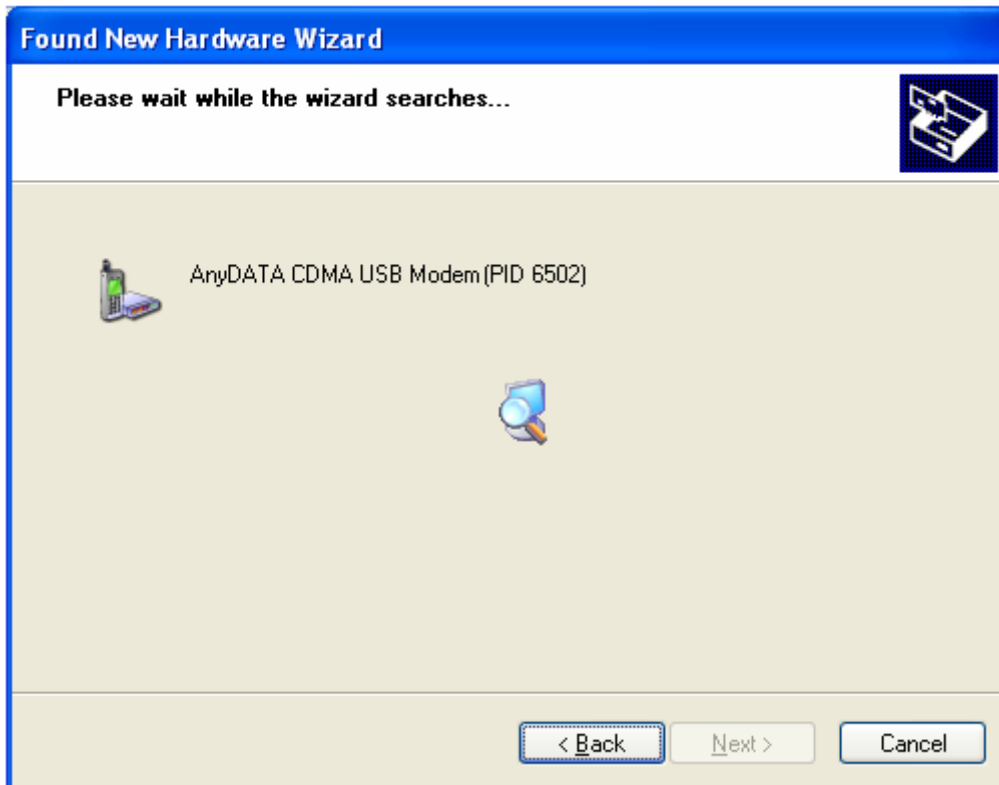


4. A window that displays a proper path of Driver will appear.

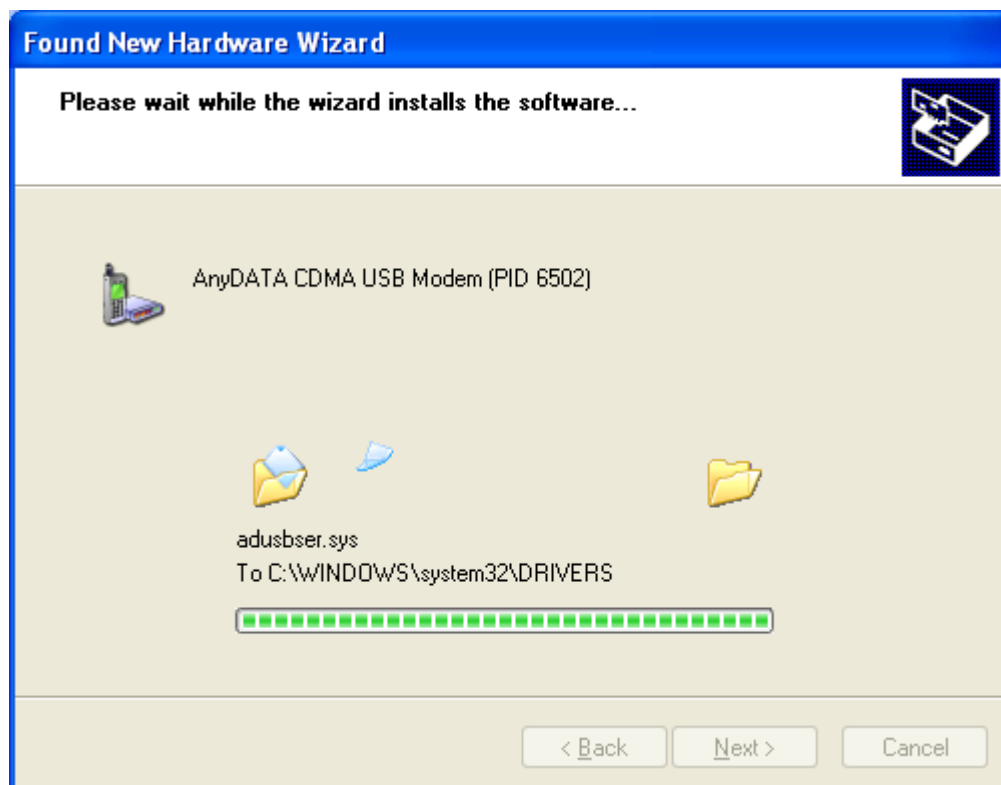
5. Select from the CD's path <CD ROM Drive: \Driver\> folder for appropriate OS.

6. Press  button to proceed.

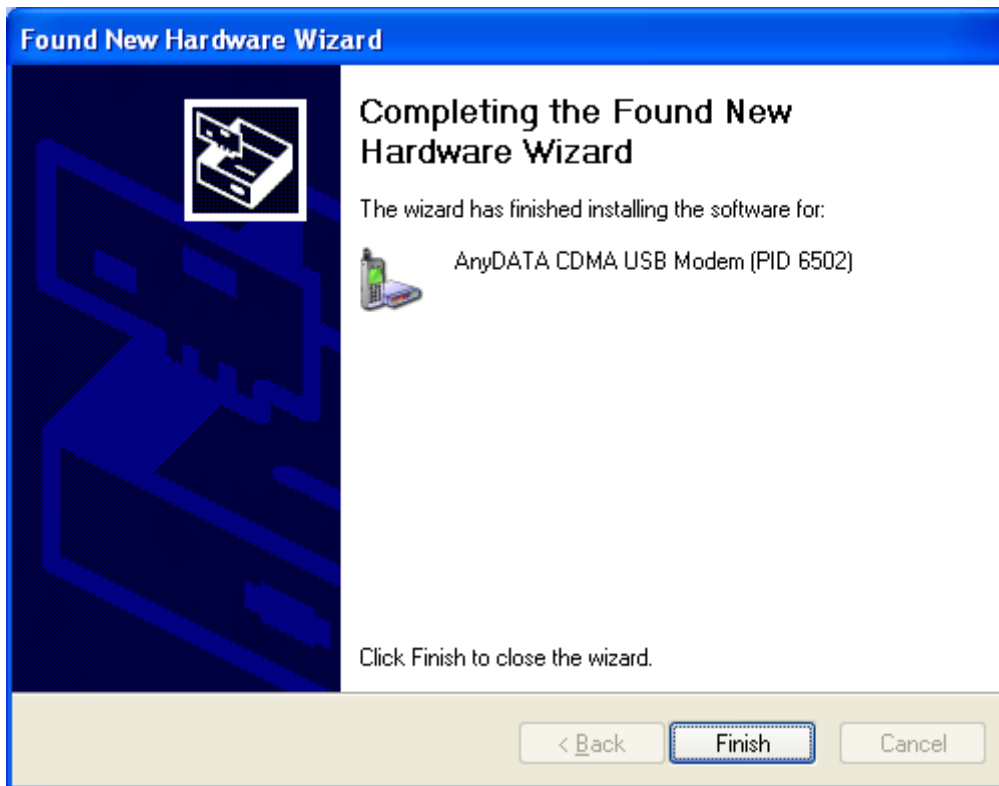
7. A window that searches <AnyDATA CDMA USB Modem> will appear.



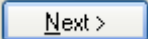
8. Process of installing <AnyDATA CDMA USB Modem>.



9. If the installation of <AnyDATA CDMA USB Modem> has been completed, following window will appear.



10. Next, it will install <AnyDATA CDMA USB Serial Device>.
11. Select <Install from a list or specific location (Advanced)>.

12. Press  button to proceed.

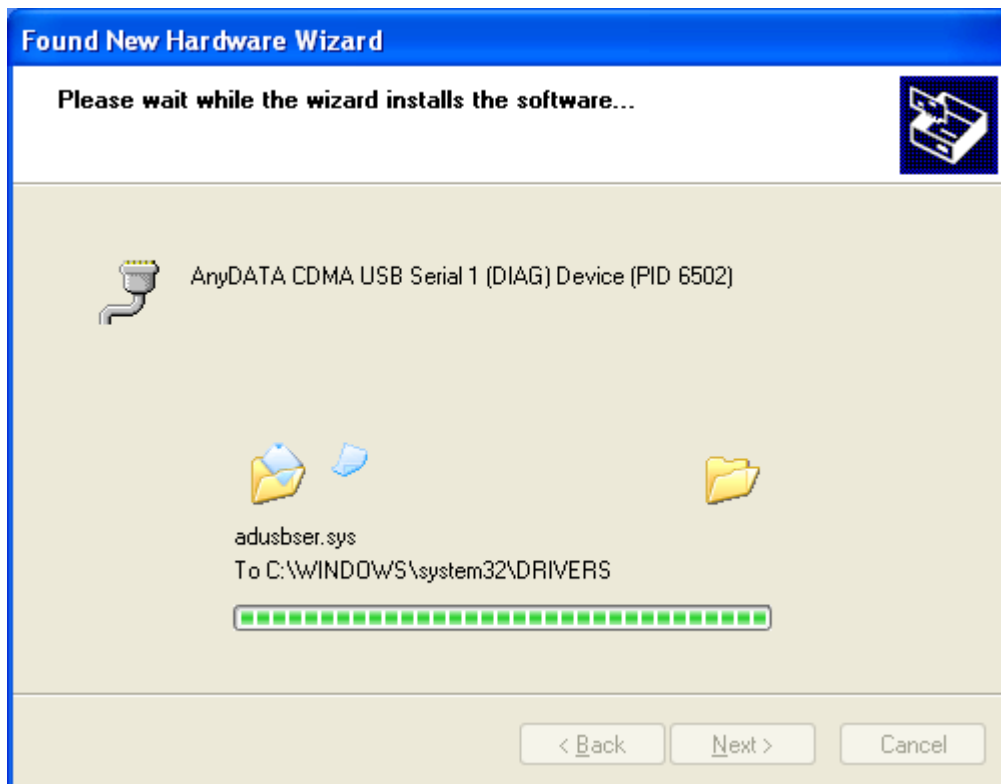


13. Select the proper path from the CD window will appear.

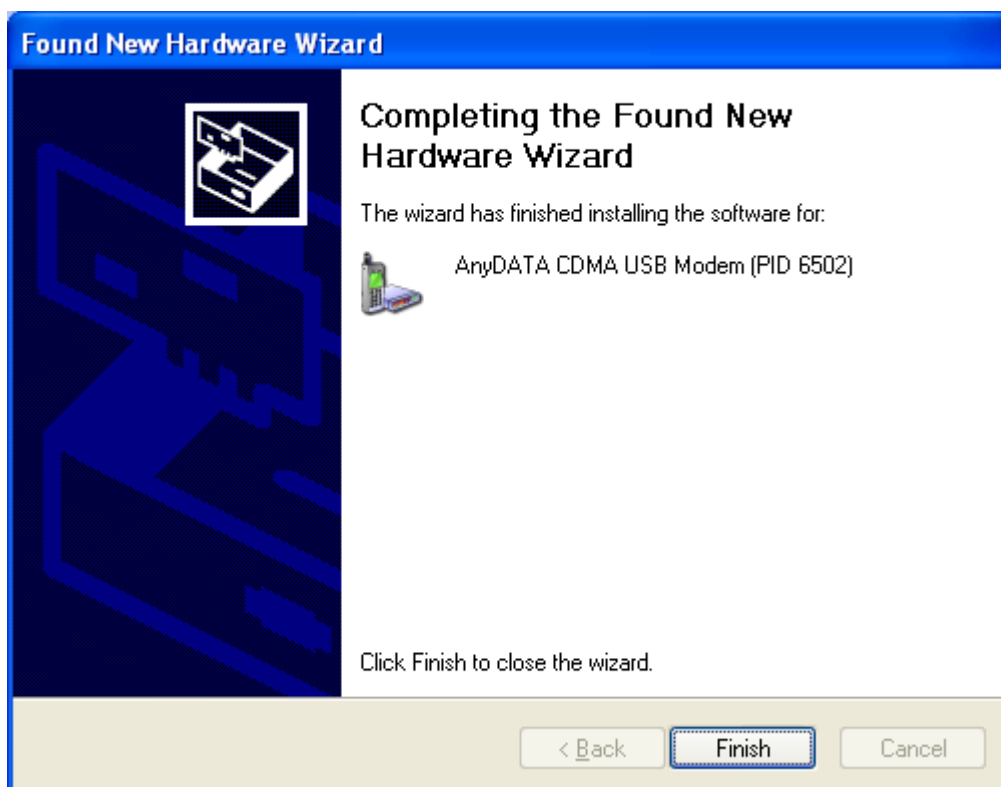
14. Select from the CD's path <CD ROM Drive: \Driver\> folder for appropriate OS.

15. Press  button to move to next step.

16. Window that searches <AnyDATA CDMA USB Serial Device> will appear.



17. If the installation has done properly, this window will appear.

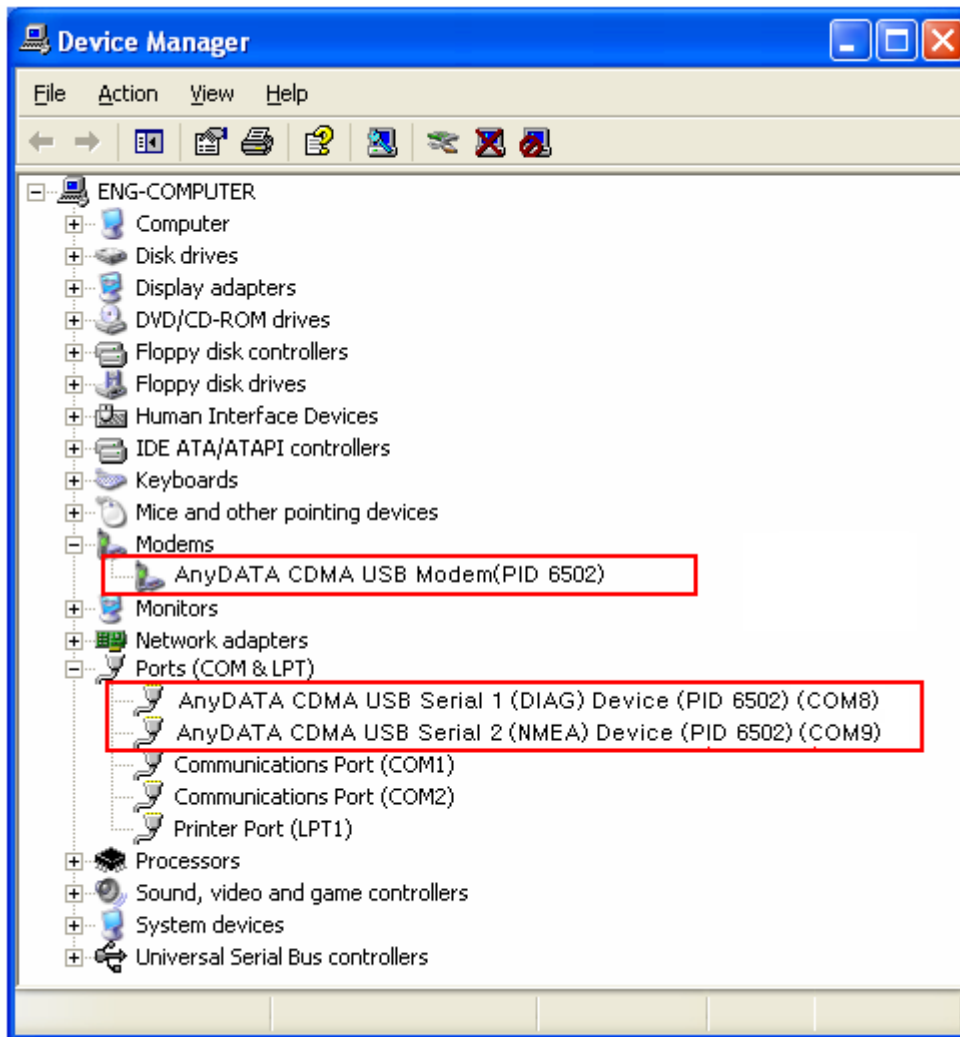


This will complete the driver installation.

18. Connect the modem and PC's USB port, and check if the driver is installed properly in <Device Manager>. See the followings to the location of <Device Manager>


[Start Control Panel System Hardware Tab Device Manager]

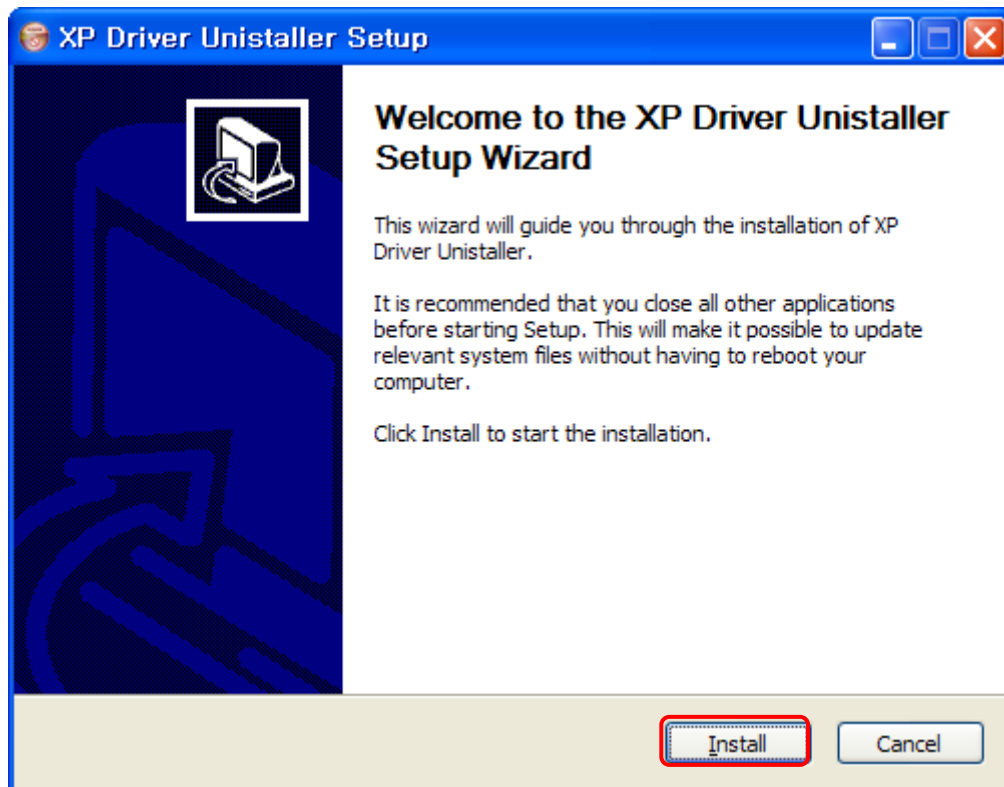
As shown in below with red boxed that shows <AnyDATA CDMA USB Modem> and <AnyDATA CDMA USB Serial 1/2 Device>, the driver has been successfully installed.



3.4.3 USB Driver Uninstall

1. Disconnect the modem from USB port before uninstalling the driver.

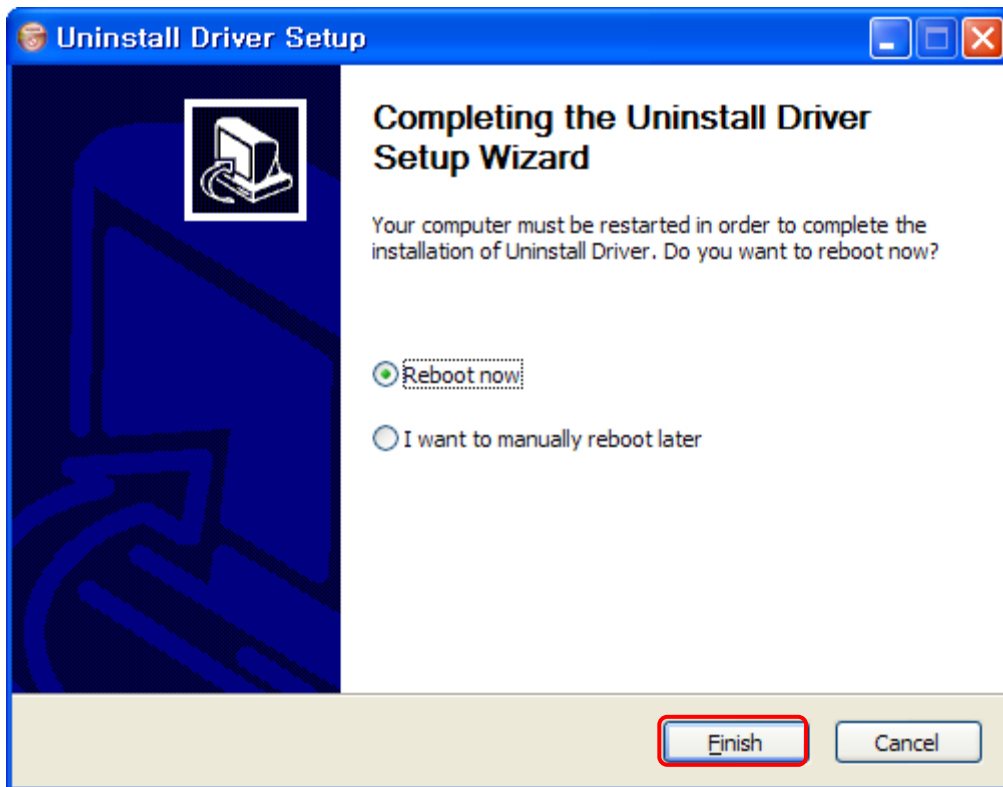
2. By clicking on  Uninstall Driver under the driver folder in CD, this will start as shown below.



3. Select <Install> to uninstall the driver.

To stop removing the driver, select <Cancel>.

4. As shown below, click <Finish> then the driver will be uninstalled.

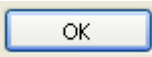
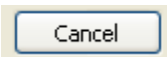


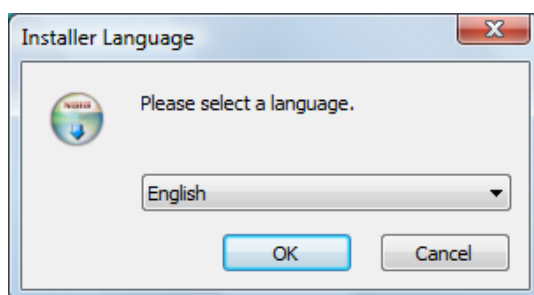
5. The computer must restart after the driver is uninstalled.

3.5 Easy Wireless Net Installation and Uninstall (Windows Vista)

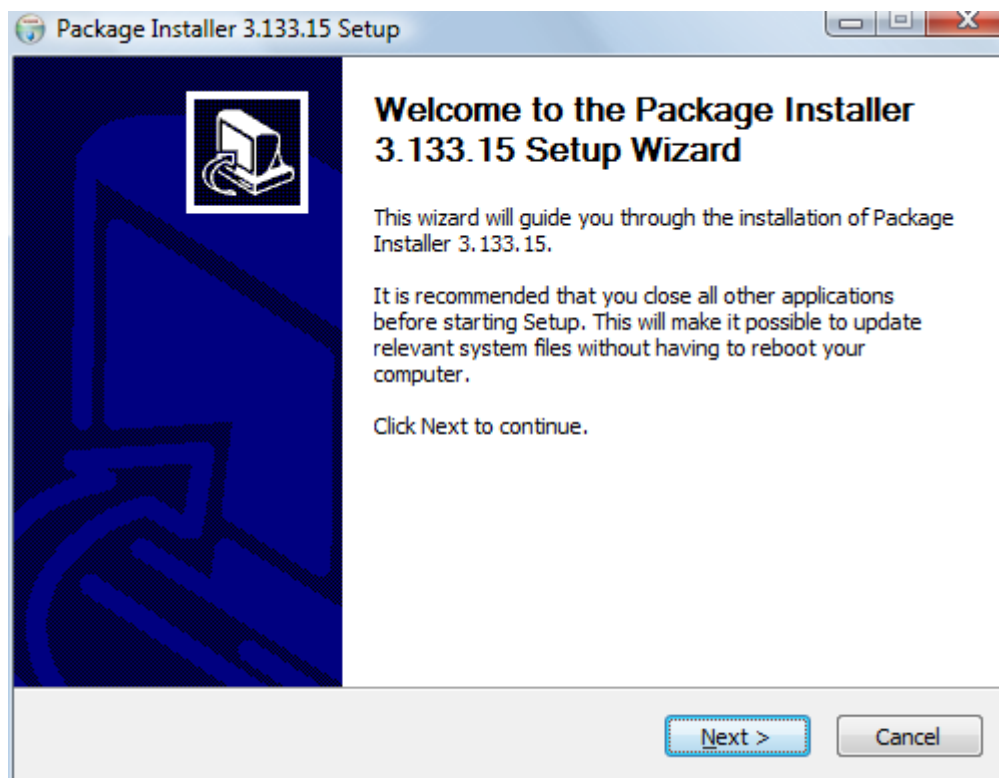
Note: The same will apply to Windows Vista 64bit.

3.5.1 Easy Wireless Net Installation (Automatic)

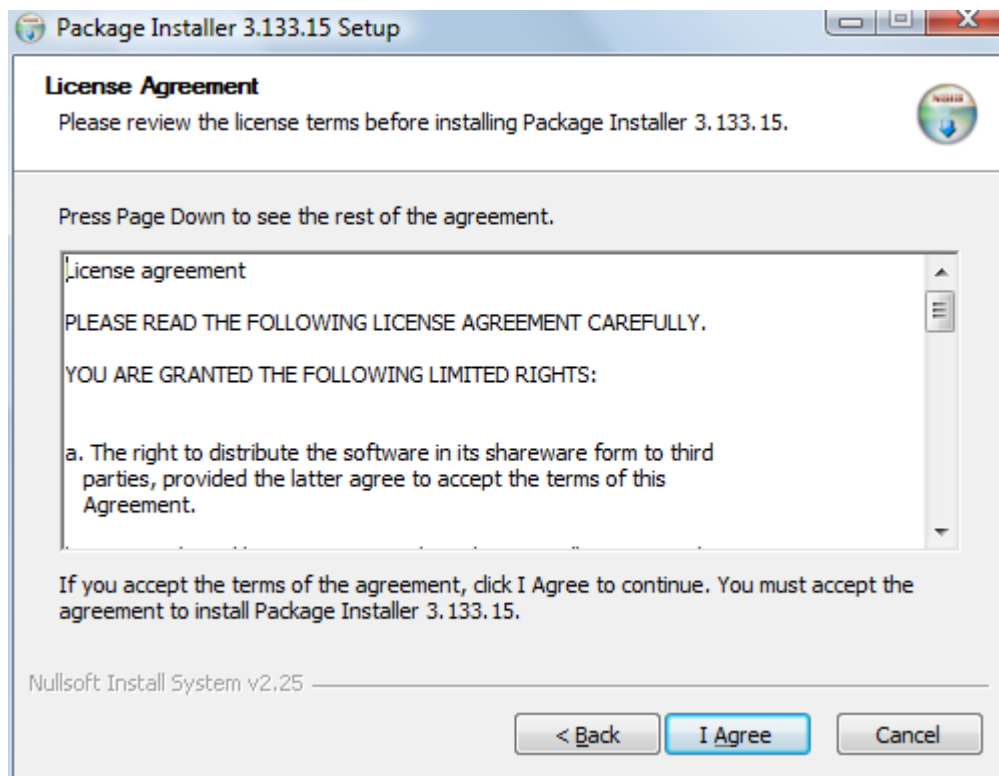
1. Connect the modem to USB PORT. If USB DRIVER isn't installed, MODEM PACKAGE INSTALLER will run automatically.
2. Select the desire language as shown below.
3. Press  button to proceed. By pressing  button, the installation of Easy Wireless Net Program will stop.



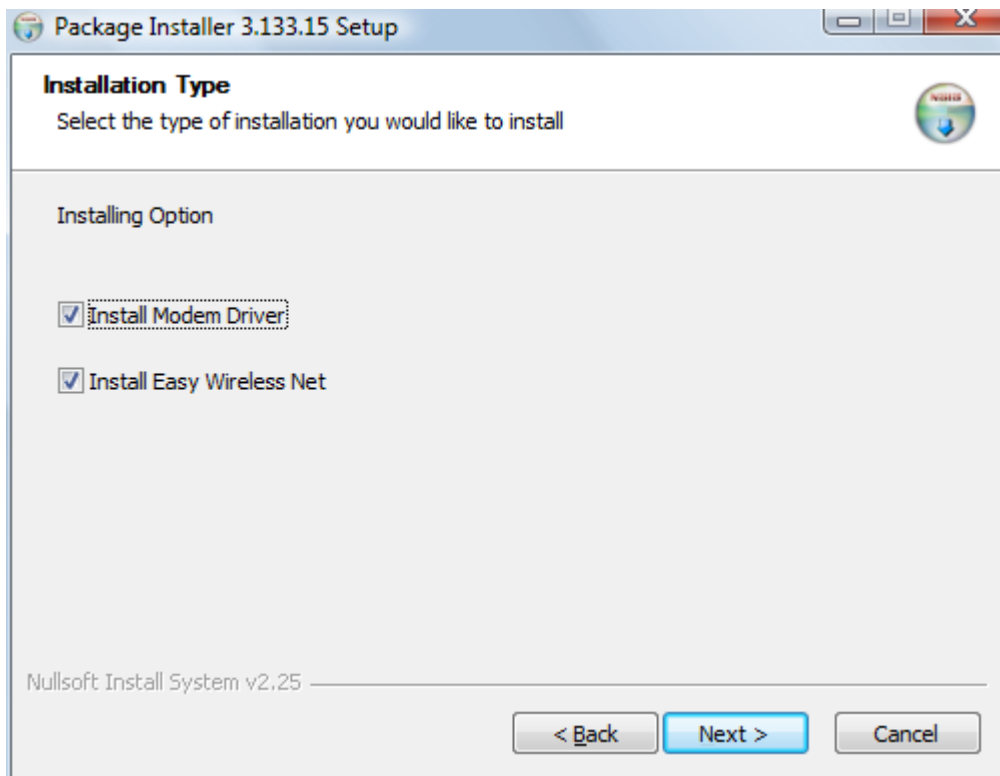
4. Welcoming message for using Easy Wireless Net Program window will appear.



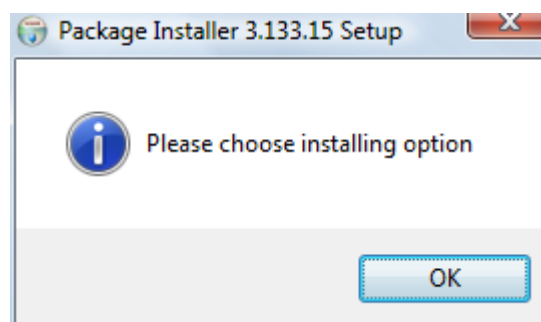
5. Next window is related to License Agreement. Please read carefully.
6. Press <I Agree> button to advance to the next step.



7. You can install Easy Wireless NET Program and modem driver by choosing the installing option.

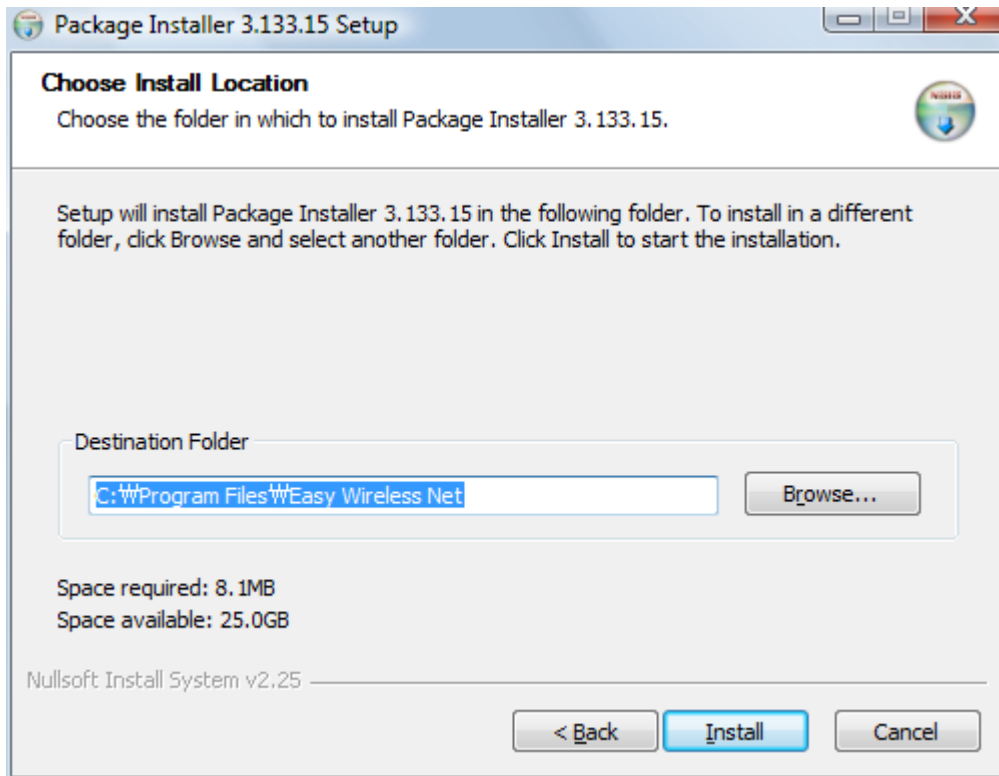



8. If you don't choose any option, the message will appear. The choice of one option is required.

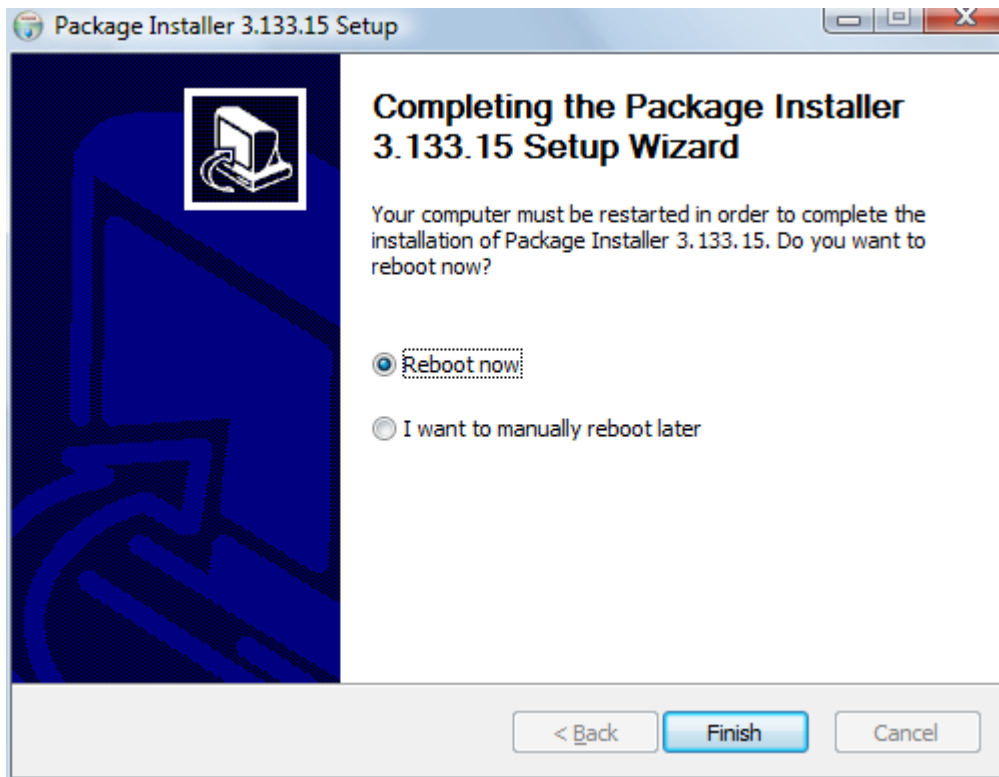


9. Next window displays asking proper path for installing the program.

Default path is <C:\Program Files\EasyWirelessNet>



10. Press  button for ending the program installation.

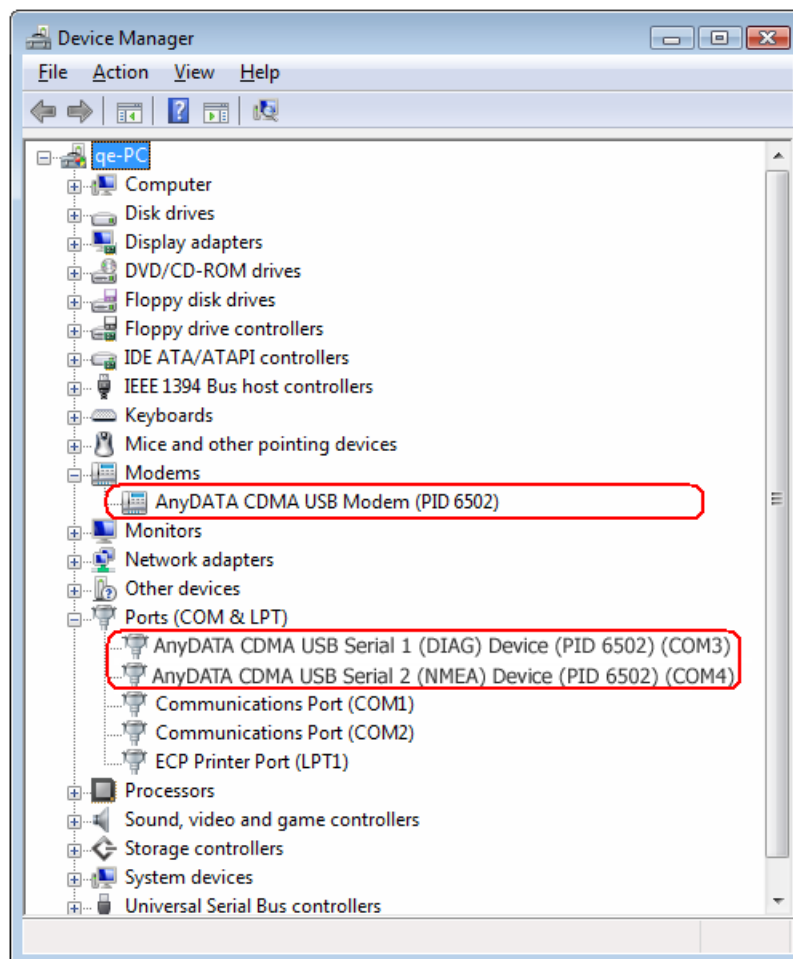


11. The computer needs to restart after the driver installation completed.
To restart the computer later, select <I want to manually reboot later>.

12. Connect the modem and PC's USB port, and check if the driver is installed properly in <Device Manager>. See the followings to the location of <Device Manager>

[Start Control Panel System and Maintenance Device Manager]

As shown in below with red boxed that shows <AnyDATA CDMA USB Modem> and <AnyDATA CDMA USB Serial Device>, the driver has been successfully installed.

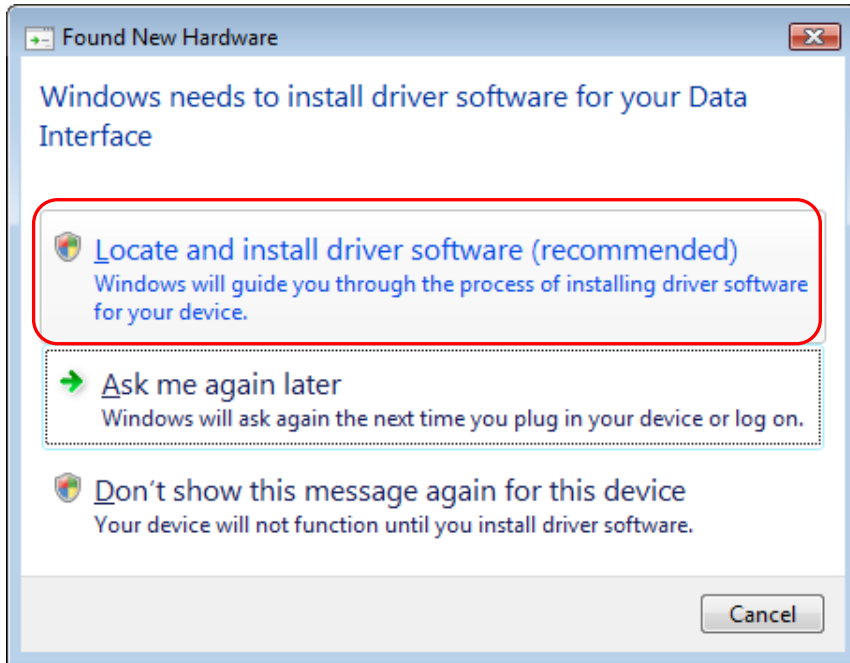


3.5.2 USB Driver Installation (Manual)

1. Connect the USB Modem to the computer.

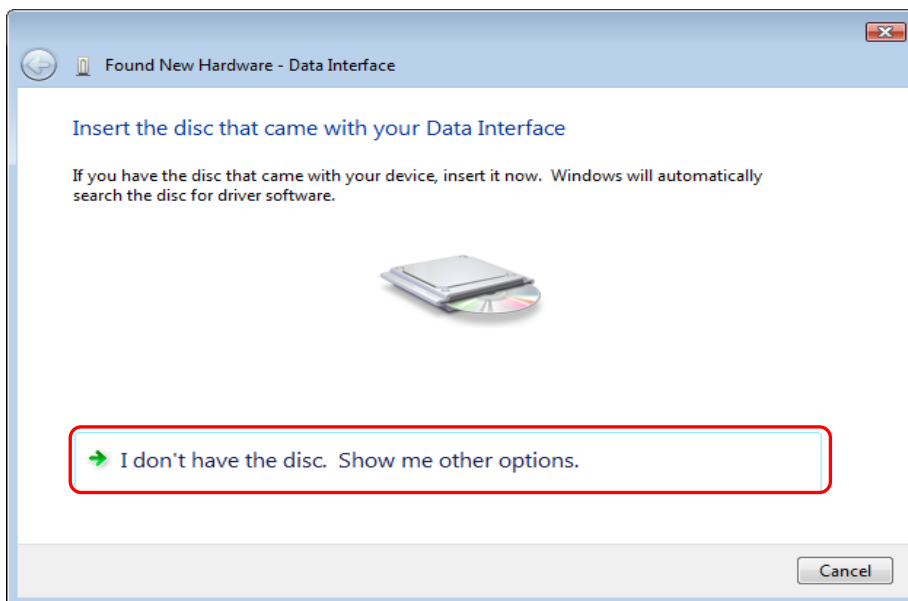
The manual driver installation shall be required twice.

2. Click <Locate and install driver software (recommended)> when shown in below.

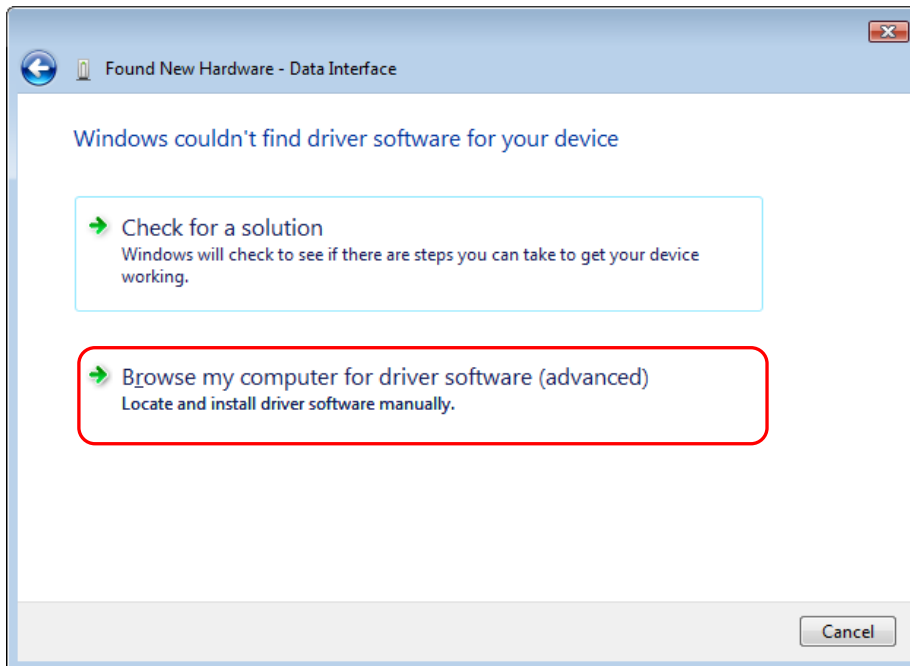


3. Click <Continue> when <User Account Control> is shown.

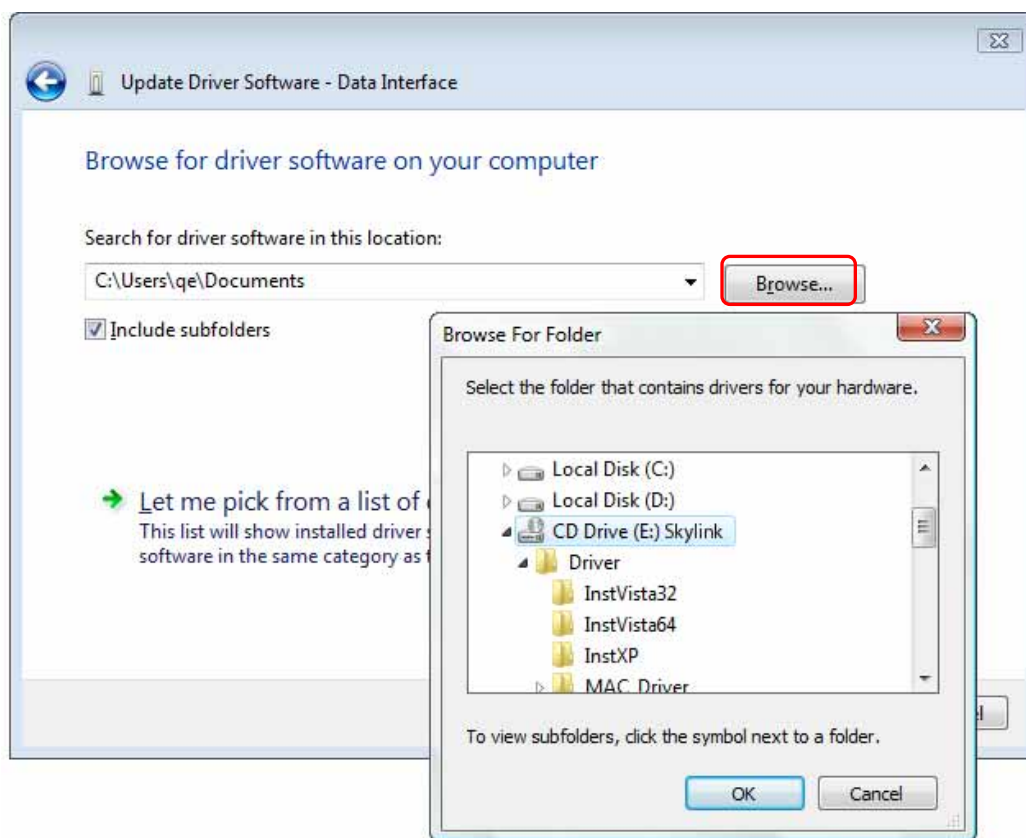
4. Click <I don't have the disc. Show me other options.> as shown below.



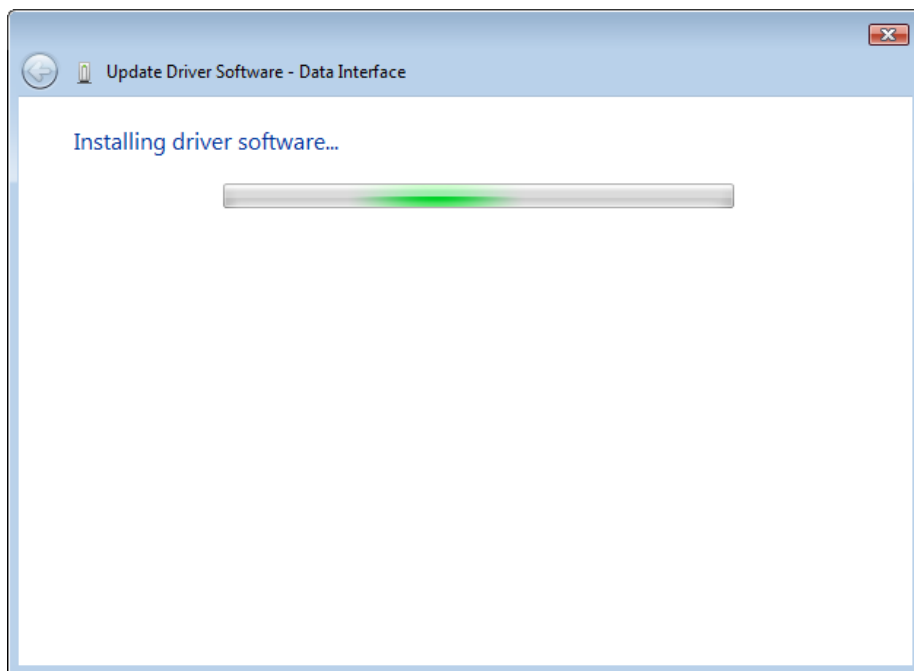
5 Click <Browse my computer for driver software (advanced)>.



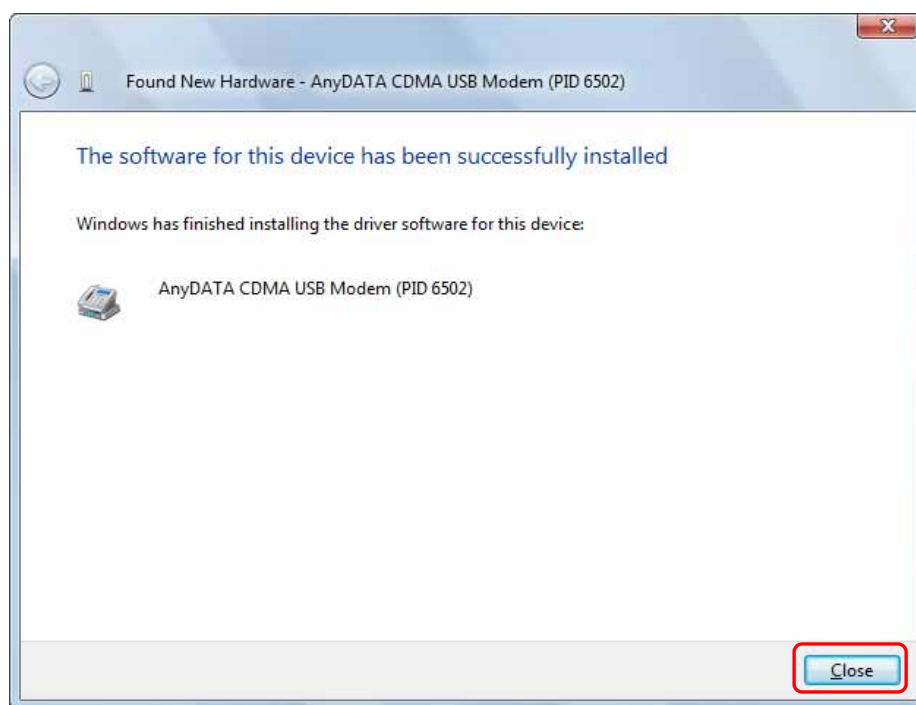
6. Click <Browse> and click <Next> as shown below.



7. <Installing driver software> will be shown as below.

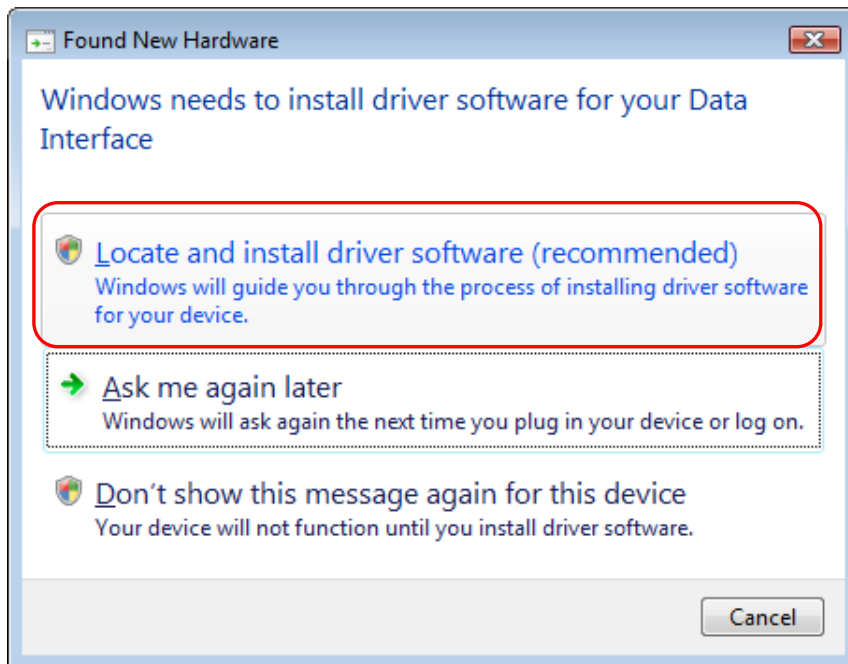


8. Click <close> if driver will be installed successfully as shown below.



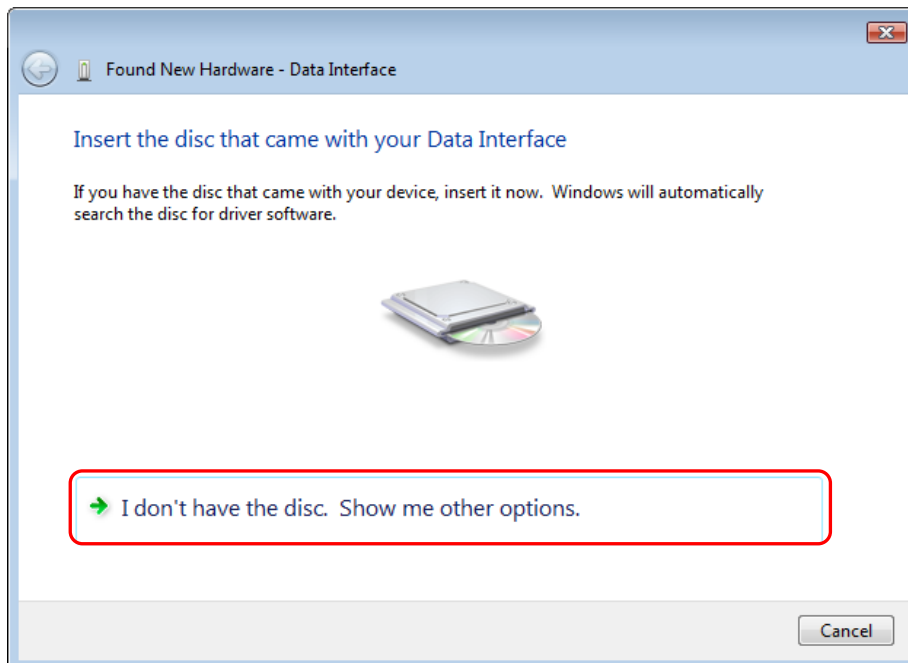
After the Windows shown above, the driver installation is required one more time.

9. Click <Locate and install driver software (recommended)> when shown below.

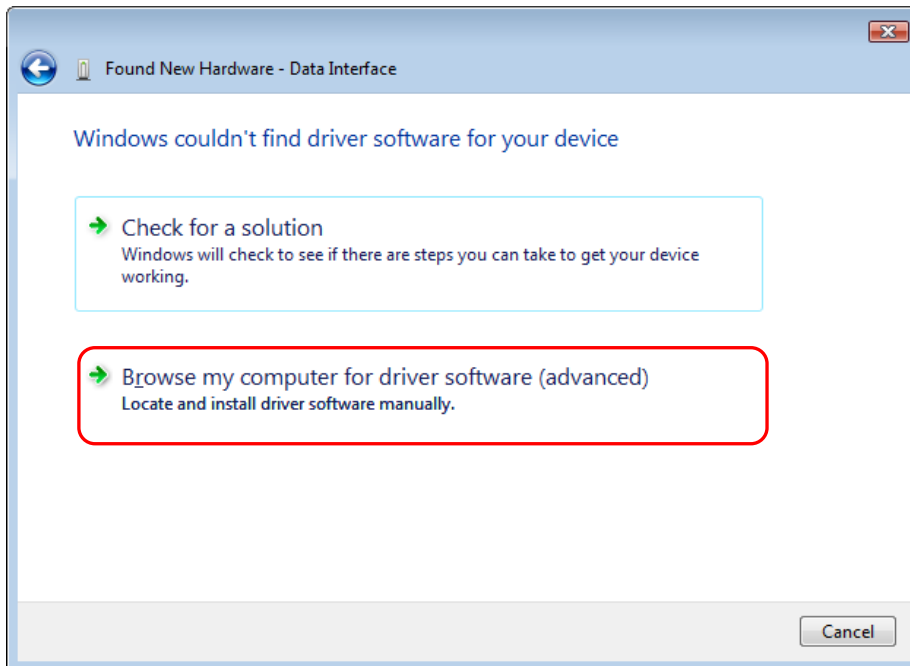


10. Click <Continue> when <User Account Control> is shown.

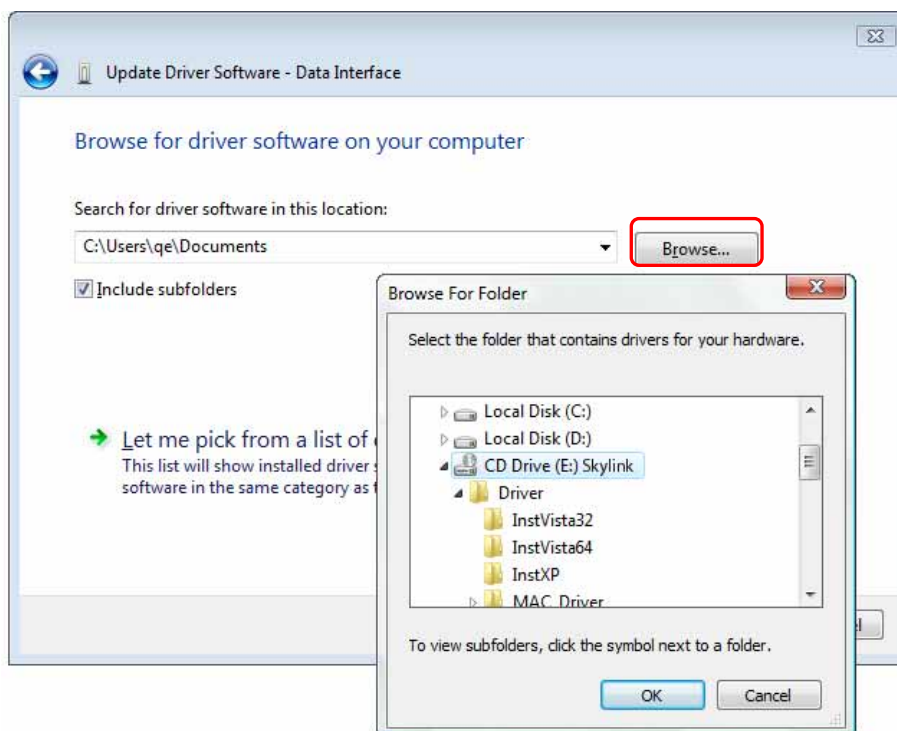
11. Click <I don't have the disc. Show me other options.>



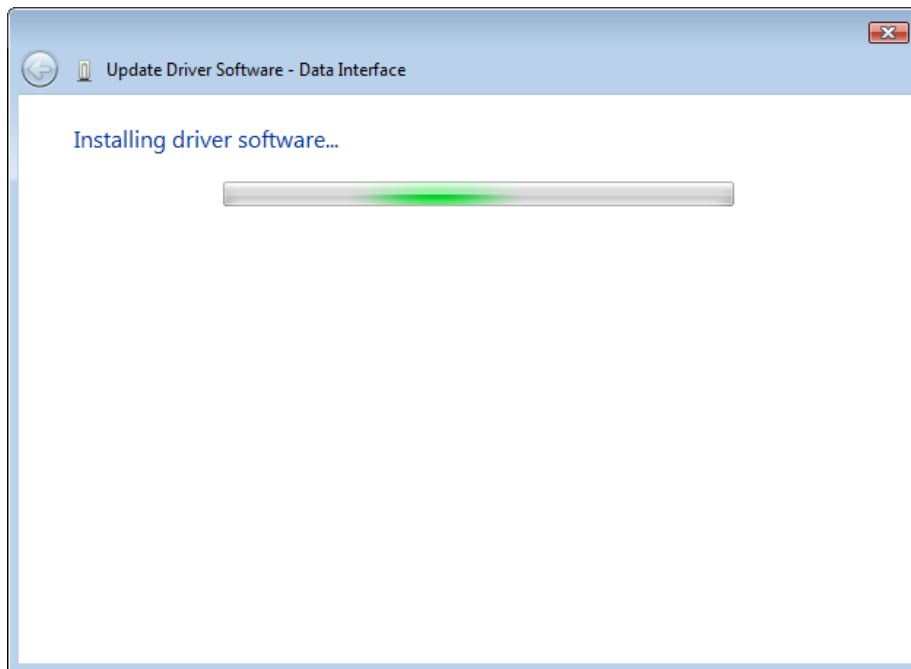
12 Click <Browse my computer for driver software (advanced)>.



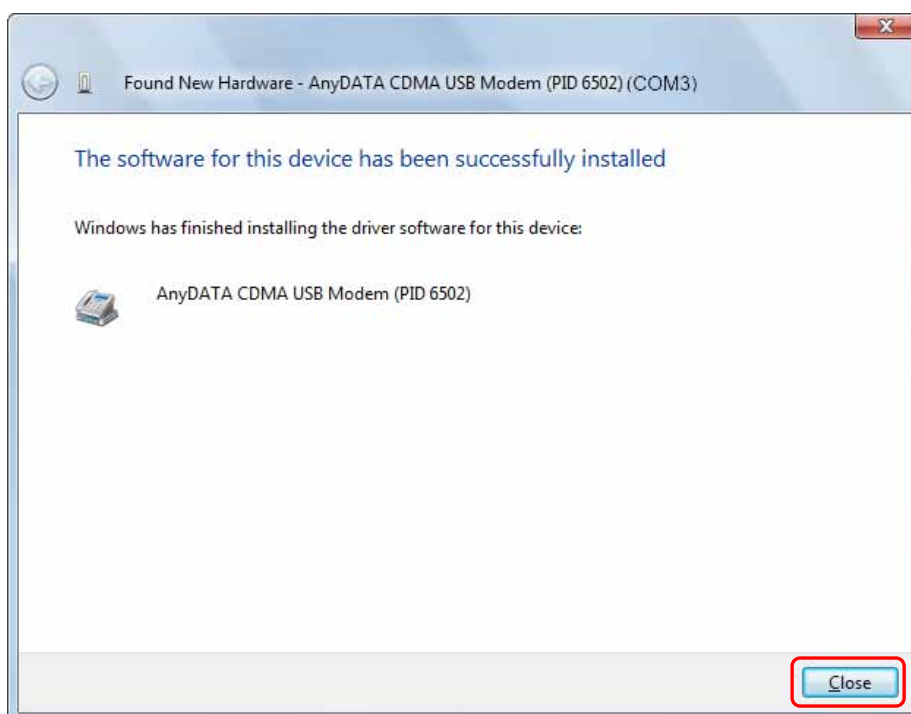
13. Click <Browse> and click <Next> as shown below.



14. <Installing driver software> will be shown as below.



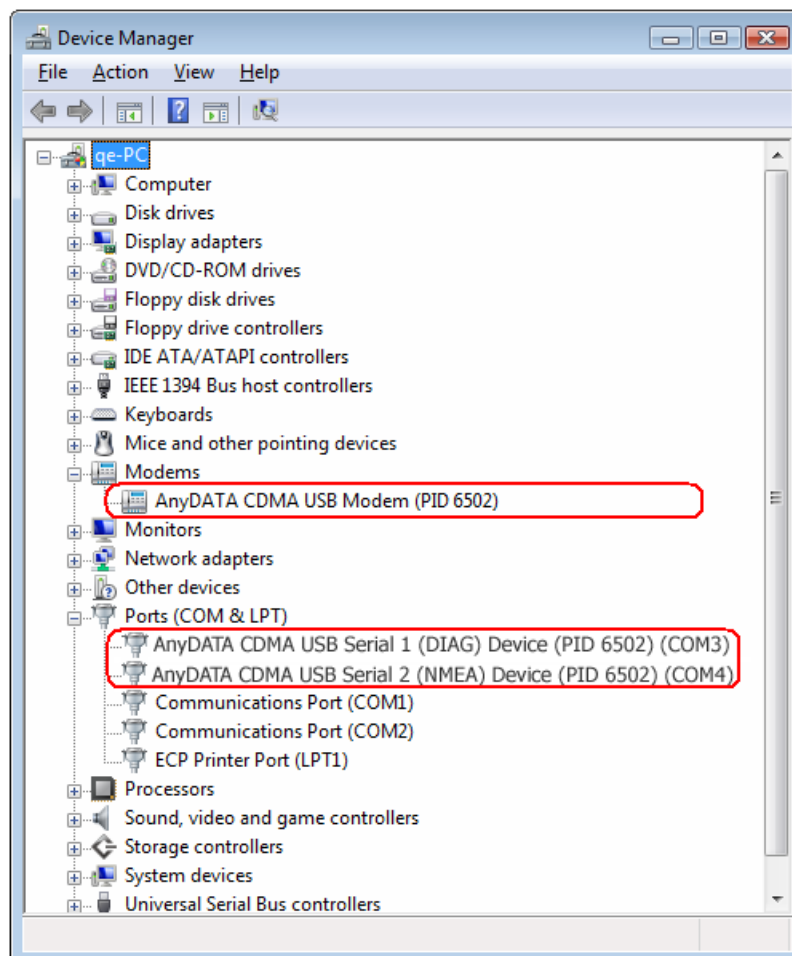
15. Click <close> when the driver will be installed successfully as shown below.



16. Connect the modem and PC's USB port, and check if the driver is installed properly in <Device Manager>. See the followings to the location of <Device Manager>


[Start Control Panel System and Maintenance Device Manager]

As shown in below with red boxed that shows <AnyDATA CDMA USB Modem> and <AnyDATA CDMA USB Serial Device>, the driver has been successfully installed.



3.5.3 USB Driver Uninstall

1. Disconnect the modem from USB port before uninstalling the driver.

2. By clicking on  Uninstall Driver under the driver folder in CD, this will start as shown below.



3. Select <Install> to uninstall the driver.

To stop removing the driver, select <Cancel>.

4. As shown below, click <Finish> then the driver will be uninstalled.

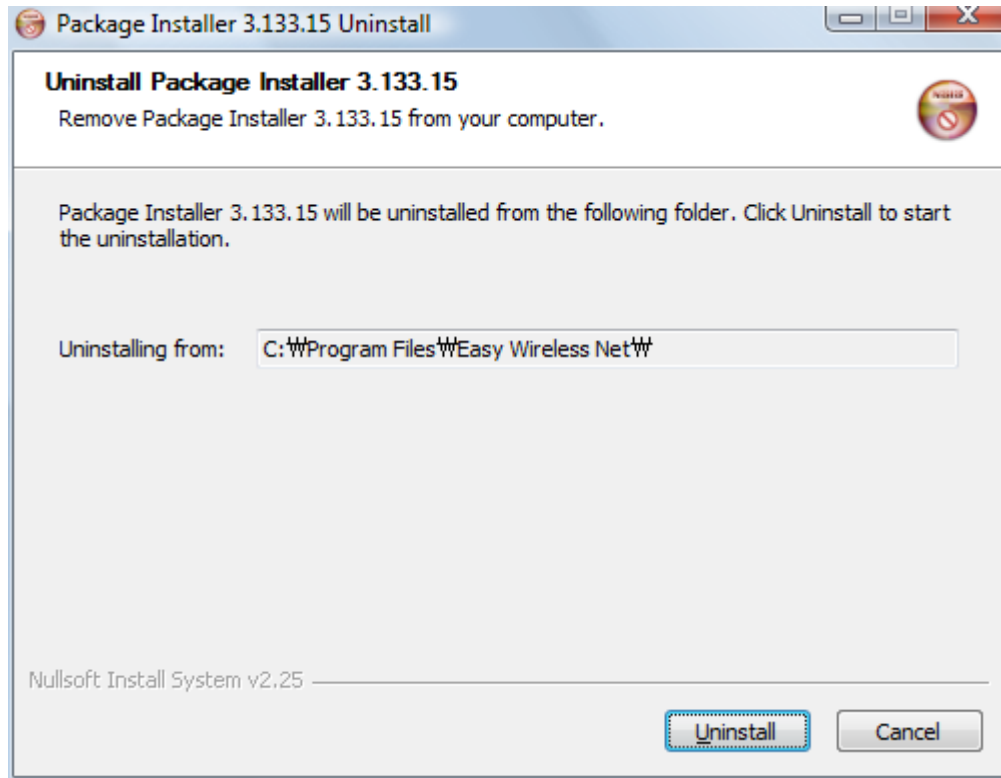


5. The computer must restart after the driver is uninstalled.

3.6 Uninstall Easy Wireless Net Software and USB driver

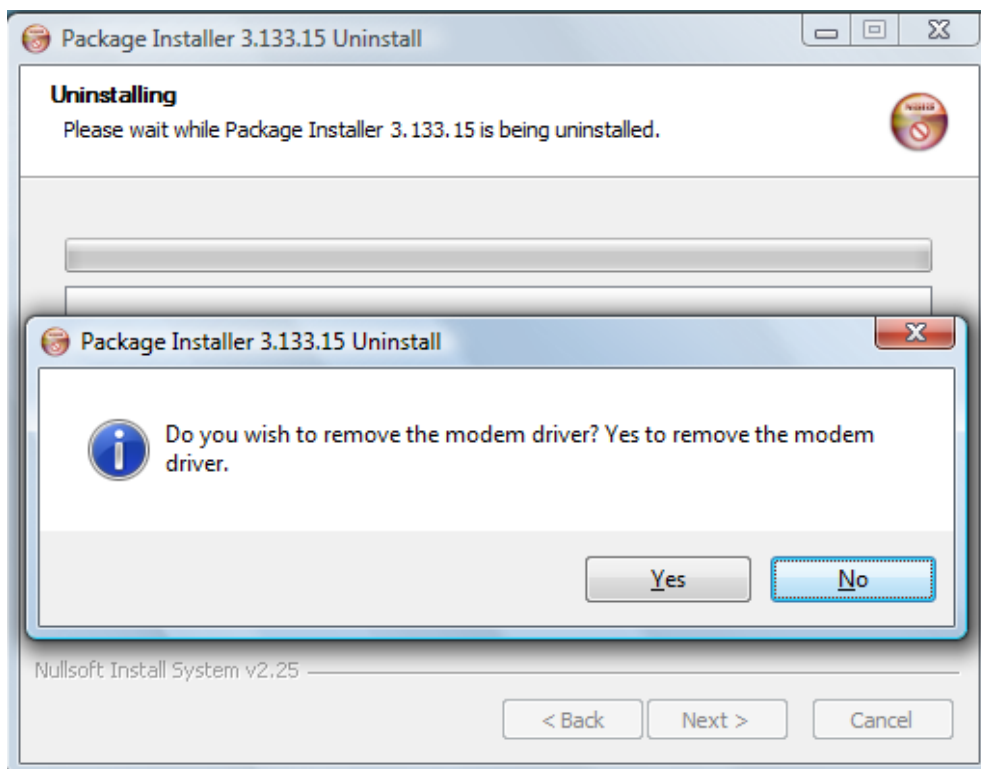
1. [Start All Programs Easy Wireless Net Uninstall]

2. EASY Wireless NET Program will be uninstalled.

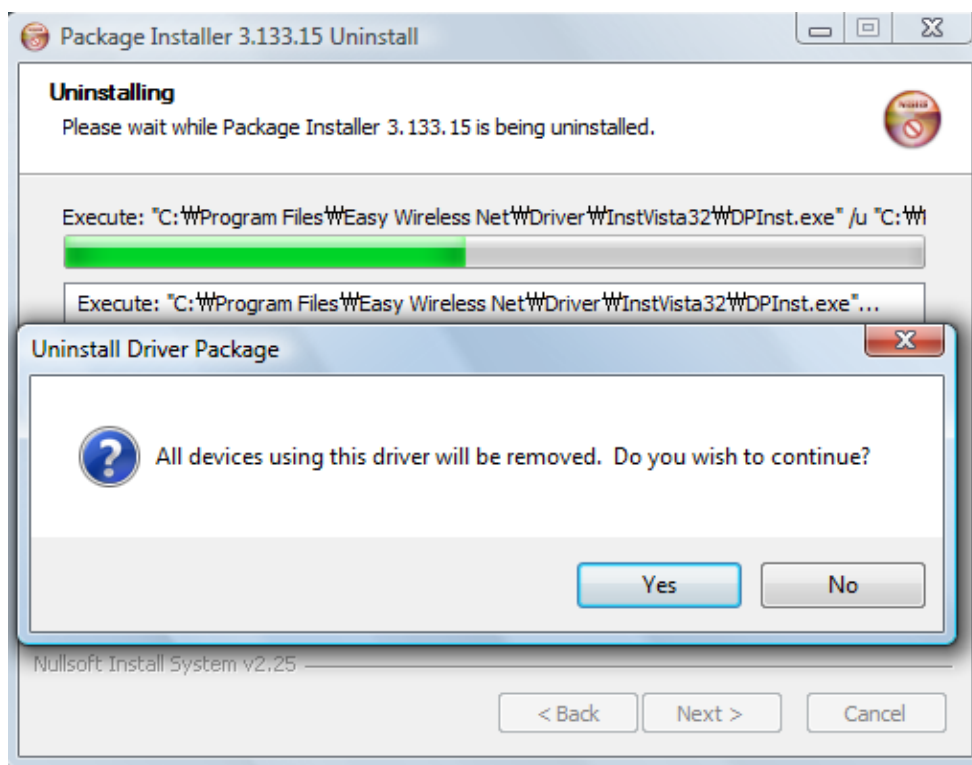


3. By pressing Uninstall button, EWN program will be uninstalled.

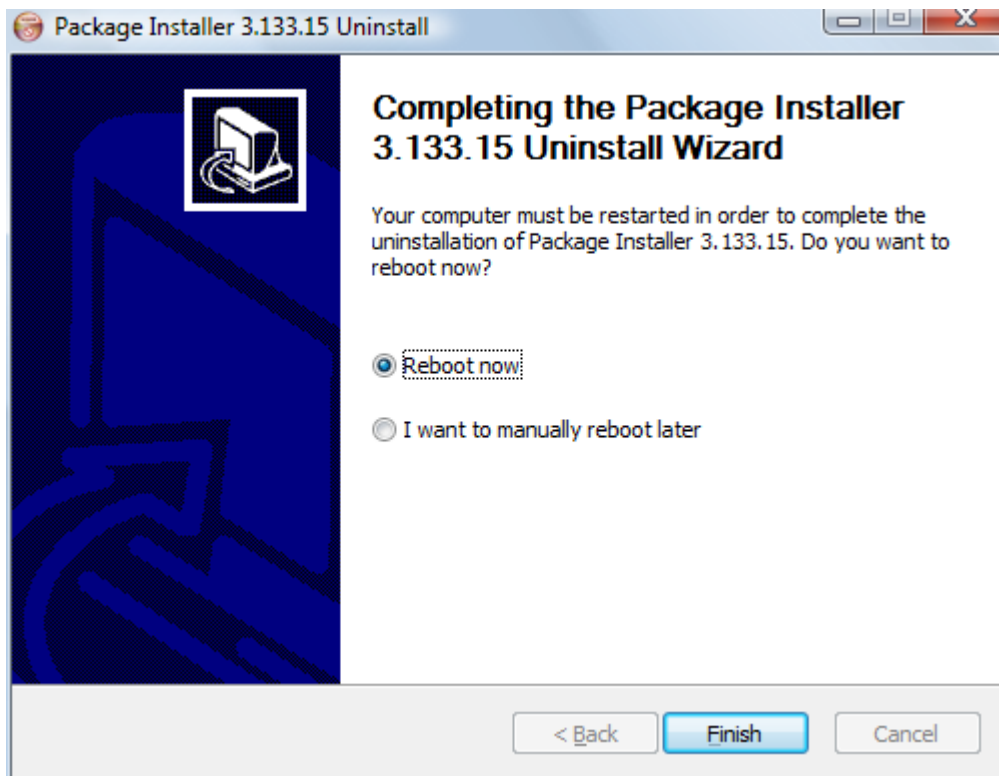
4. Click Yes to remove the modem driver



5. Click Yes. Following screen will appear twice.



6. The computer must restart after the driver is uninstalled.



4. Using Easy Wireless Net







4.1 Run and Exit

- 1) To run Easy Wireless Net, double click [Easy Wireless Net] icon on the Desktop

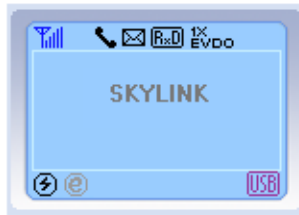




















- 2) To exit from Easy Wireless Net, Press  button on the program

4.2 Descriptions for each button

Display	Function
	Connecting to the Internet
	Disconnecting to the Internet
	Setup Menu
	SMS menu
	Phonebook Menu
	Sending message


4.3 Descriptions for each icon



Display	Function
	RSSI Signal Strength Indicator
	Calling Possible
	Calling not Possible
	New message arrived.
	Voice Mail arrived.
	Voice Mail and New Message arrived.
	Supports Hybrid mode
	Only 1X mode available
	Only EVDO mode available
	USB connected
	Roaming
	Connected to the Modem
	Either the cable is disconnected to the modem or improper port connection.
	Internet connected
	Internet disconnected
	Read Message
	Unread Message
	Sent Message

4.4 Setting Menu

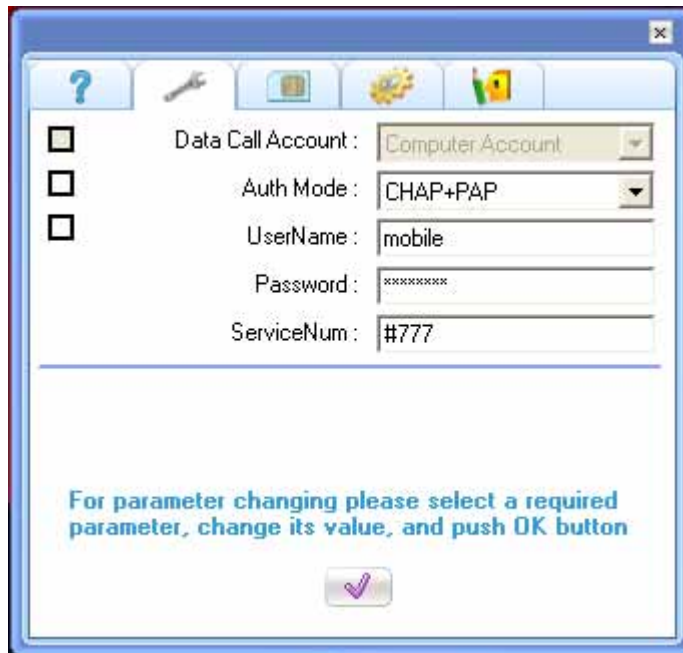
There are 4 sub-menus for setting.

To change the value check wanted item box ☒ and press  button to take effect.

- 1) [About]: Version information



2) [Basic]: Configurations for internet connection



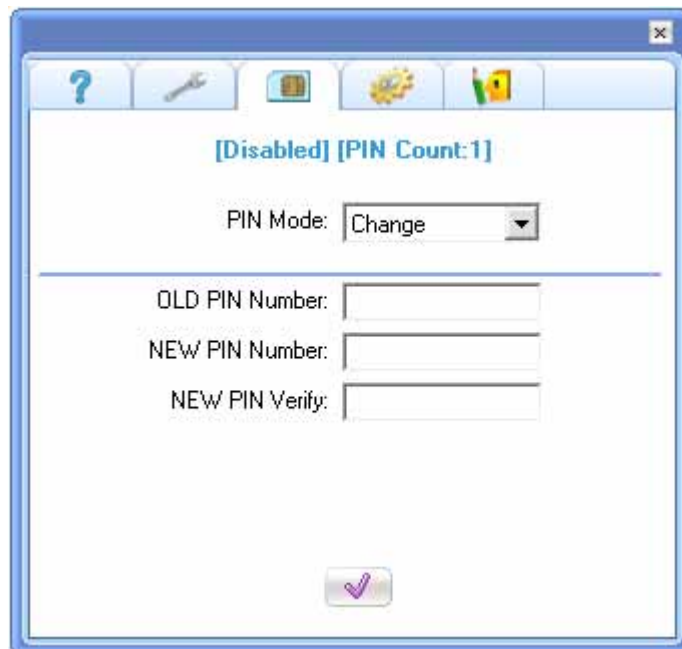
The screenshot shows a configuration window titled "AnyDATA.NET USB Modem (User Manual)". The window has a toolbar with icons for help, settings, and other functions. Below the toolbar, there are three checkboxes on the left, each corresponding to a configuration parameter on the right. The parameters are: "Data Call Account" (set to "Computer Account"), "Auth Mode" (set to "CHAP+PAP"), "UserName" (set to "mobile"), "Password" (set to "*****"), and "ServiceNum" (set to "#777"). At the bottom of the window, there is a message: "For parameter changing please select a required parameter, change its value, and push OK button" and an "OK" button.

- All values for internet connection are set automatically.
- From Data Call Account, there are two accounts, called Computer Account and RUIM Account. You may select one of them and change Auth Mode upon the selected Account type.

<Remark>

For more detail, please ask to SKYLINK Customer support center.

3) [RUM]




[Disabled] [PIN Count:1]

PIN Mode:

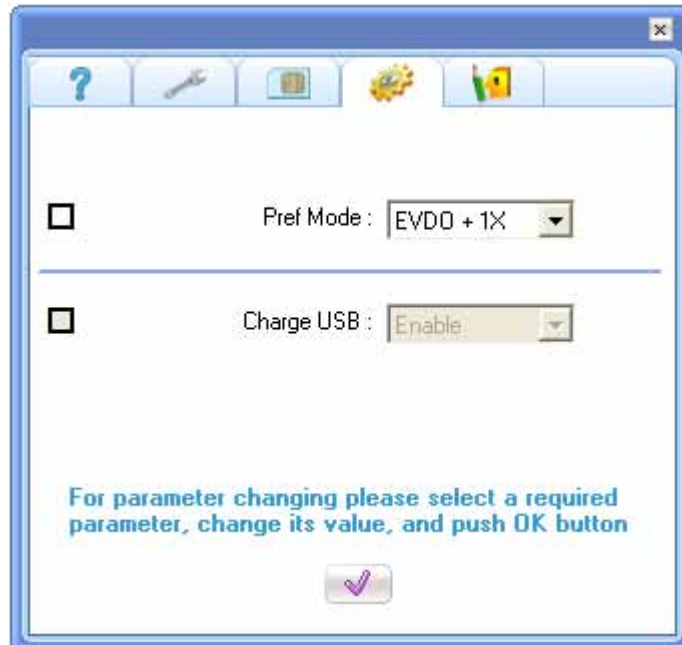
OLD PIN Number:

NEW PIN Number:

NEW PIN Verify:




4) [Advance]: Operating network (1xRTT or 1xEVDO)



☐ Pref Mode:

☐ Charge USB:

For parameter changing please select a required parameter, change its value, and push OK button



- This is very important parameter, It is strongly recommended that remain default value

5) [User]: Display options




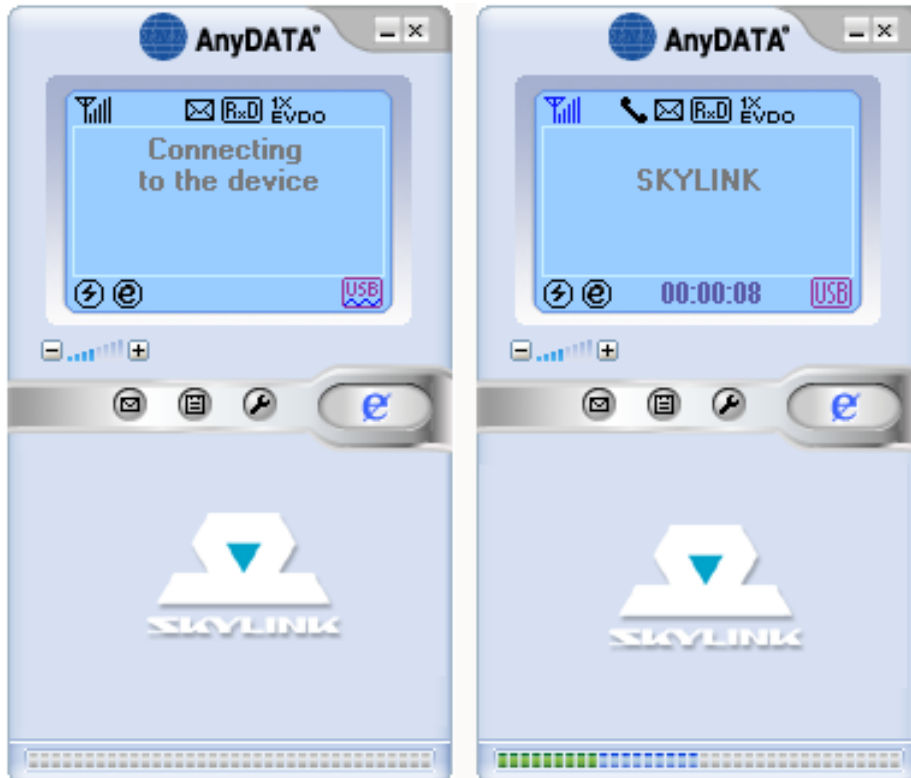
- Always On Top: The program window will be displayed on the top level
- Battery Warning Sound : Do not use battery warning feature
- From International call, there are two modes, called manual mode and AUTOMATIC mode.



Manual mode: User may select International Code.


AUTOMATIC mode: International code can be set automatically.

4.5 Connecting and Disconnecting to the Internet

- 1) Press  button for internet connection, it will display the connection status



If succeed in connection  icon will be appeared, if fail to connect  icon will be appeared.

- 2) Press  button to disconnect the internet




4.6 SMS Menu

In the SMS menu, there are 3 sub-menus (Write Message, Outbox, Inbox)




- Write Message: Edit and send new message
- Outbox: Sent message box
- Inbox: received message box

1) Write Message

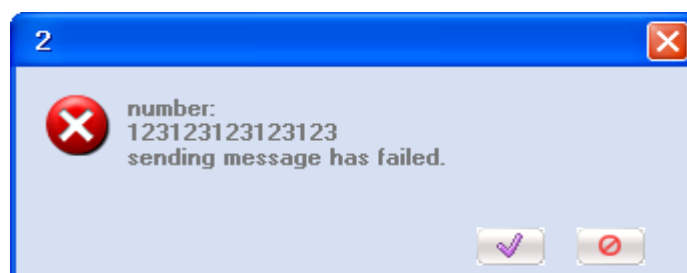
- Edit the message in the window and press  button to move to the number editing screen.
- Input number(s) for sending SMS, number(s) can be inputted from Phonebook records.
Press  button to move to send the message screen
- Press  button to send the message






- After pressing  button, it will show the sending status
- If succeed in sending SMS then it will be returned to SMS menu.
- Sent message saves RUIM card

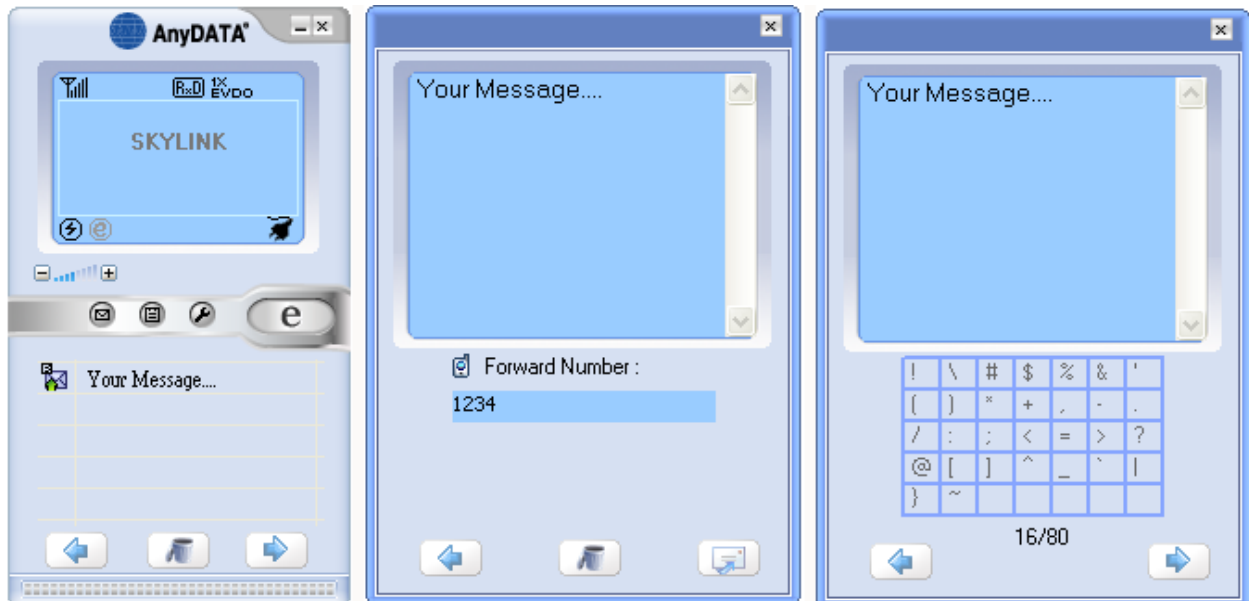


- If fail to send SMS then it will display warning message.






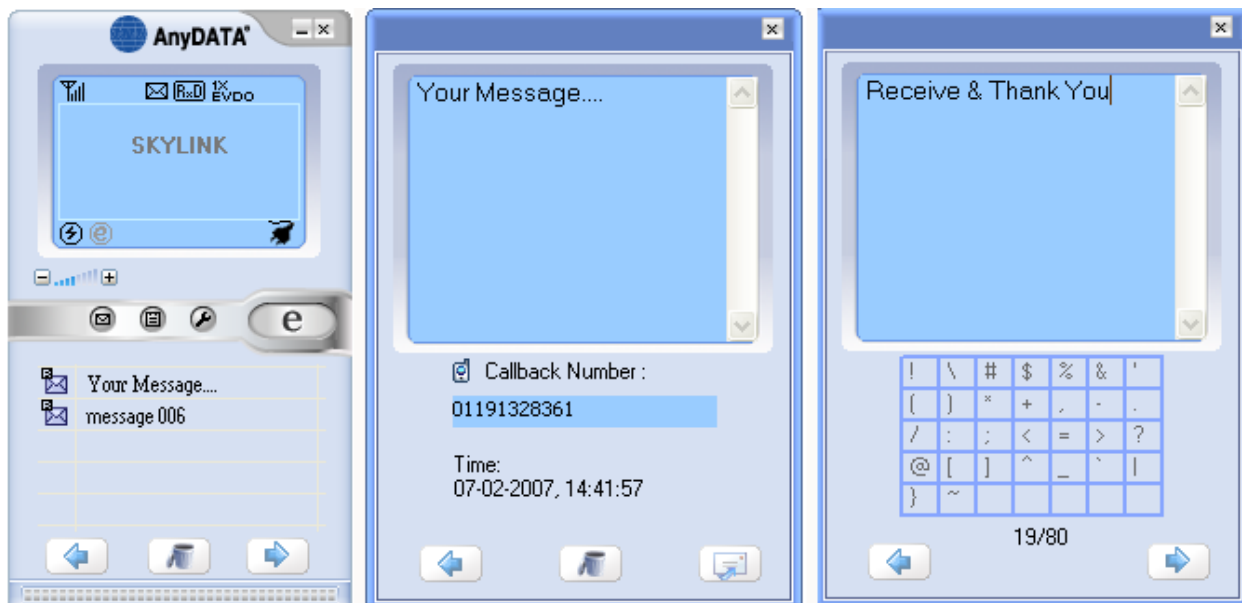
2) Outbox

- In this menu, All sent messages are shown.
- To erase the message, select the message and press  button.
- To see the message, select the message and press  button.
- To send the message to a new number, press  button.



3) Inbox

- In this menu, All received messages are shown.
- To erase the message, select the message and press  button.
- To see the message, select the message and press  button.
- To send the message to a new number, press  button.

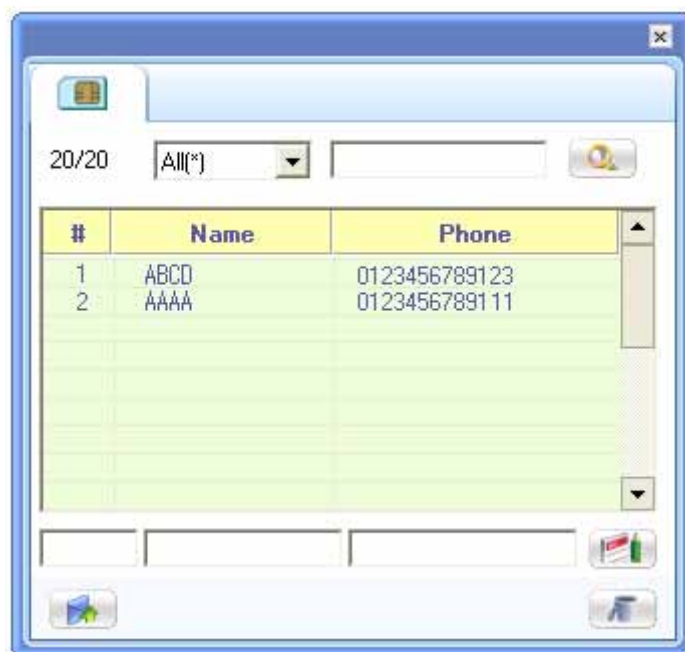


4.7 Phonebook Menu

Store phone numbers and name into RUIM.

Making calls and sending messages to stored numbers are possible.


Maximum number of Phonebook is depend on RUIM capacity.





1) Store new number

- Edit the number and name on this  screen, and press right button to save.
- If the index is already exists then warning message will be appeared.

2) Search the number

- Choose the searching type (All, Index, Name, Phone number).
- Edit the wanted name or number on this  screen, And press right to start searching.

3) Additions

- Press  button to send a SMS message.
- Press  button to delete selected number.

5. Troubleshooting

Q: The Internet connection speed is too slow.

A: Please check whether the modem is set at 1X mode. If USB modem is set at 1X mode, then the Internet is not connected as EVDO mode. EVDO icon must be appeared in the display to assure that it has been connected as an EVDO mode.

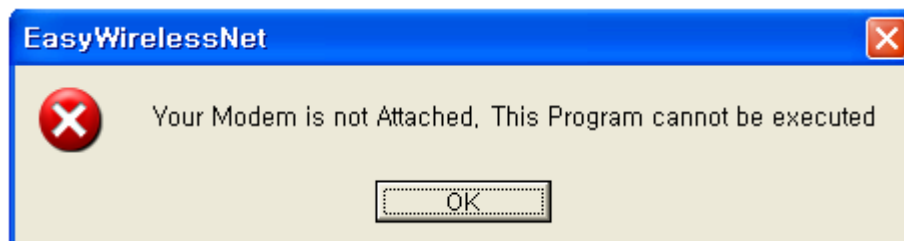
Q: The Internet connection is poor and frequently it gets disconnected.

A: The CDMA frequency is at unstable state. Try to move to a different place then use it again. Also, if you touch or block the USB modem with hand/body contact, the modem connection speed degrades. Please be careful not to touch the modem with your hand or any part of the body.

Q: All of the display on the program's screen shows as prohibited icons.

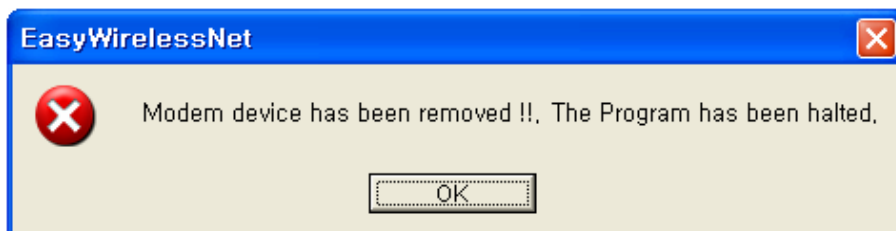
A: Please check whether the port is properly set for communicating between computer and the modem in the <environment setting> category.

Q: After the installation of the program, the program does not run and displays following message.



A: This means that USB modem and the compute are not connected properly. Please double check whether USB modem is connected properly to the computer.

Q: During the running of the program, following message appears and the program halts.



A: The actual connection of USB modem and computer has been disconnected. Please check whether the cable is dismounted, cable is disconnected or USB modem power has been turned off. Then try to reconnect the modem.

Q: Easy Wireless Net program displays <DB xxxx Error> message and terminates.

A: Easy Wireless Net program uses mdb format type of database file. This type of format is preinstalled when using Windows XP, Windows 2000 OS in a computer. However, this type of database file has been removed by some other program.

Need to update following two (2) files from Microsoft site:

1. MDAC : <<http://www.microsoft.com/downloads/details.aspx?FamilyID=6c050fe3-c795-4b7d-b037-185d0506396c&DisplayLang=en>>
2. Jet Engine 4.0:
<<http://www.microsoft.com/downloads/details.aspx?FamilyID=2deddec4-350e-4cd0-a12a-d7f70a153156&DisplayLang=en>>

Q: After installing the Easy Wireless Net Package Installer, RunProcess() - > error message appears.

A: By double-clicking on <DPInst.exe under (Installation folder\Driver\InstOS) folder, The driver is manually installed. After installation of the driver, connect the modem to USB PORT again.

EX) XP driver folder: C:\Program Files\Easy Wireless Net\Driver\InstXP

Q. Following screen will be displayed whenever the modem is connected under windows Vista. Nothing will happen although you close the screen.



A. From the screen above, check <Always do this for software and games> and then select <Run Launcher.exe> shown on <Install or run program>.

If problem persists, follow the steps below.

1. Remove the modem first.
2. Select Start->Control Panel->Classic View->AutoPlay->Software and game->Install or run program and then press the Save to apply setting.
3. Connect the modem to PC.