Turnpike & Windows 95

Contents:

1 Introduction

If you have Windows 95 installed on your PC, you can use either the NTS Winsock supplied with Turnpike to access the Internet or the one provided as part of the Windows 95 Dial-Up Networking (DUN) software.

Either of these Winsocks can be used not just with Turnpike but also with any Internet applications that you wish to run alongside Turnpike - whether 16bit or 32bit.

In general, it is easiest and most convenient to use the NTS Winsock provided with Turnpike, because this allows you to run the Turnpike Connect program and go on-line in one smooth action. Setting up the Windows 95 DUN and using it to dial up your Access provider is not a simple task.

But in case you particularly want to use the DUN's auto-dial feature or you need it to support some exotic hardware you are using, this document describes the special features of running Turnpike alongside the DUN. It also explains how to install and configure the DUN software because this isn't always clear to Windows 95 users.

If you are happy to use the NTS Winsock supplied with Turnpike, you can ignore this document.

Note: If you need to use the Windows 95 Winsock but you have already installed Turnpike's own Winsock, don't worry: just use the **Winsock used** *option offered in the Turnpike Connect program to select the DUN Winsock instead. (To be tidy, you could then remove the WINSOCK.NTS and WSOCK32.NTS files from your Windows directories - but it's not essential to do this.).*

You should also note that Windows 95 Set-Up disks are needed for some of the steps described in this document.

*If your modem isn't listed, either take the '**Have disk**' option if a disk was supplied with the modem or select the 'Standard' modem of the appropriate baud rate (from the top of the Manufacturers list).*

2 Installing and Configuring your modem

Call up the Control Panel (for example, from the **Settings** option of the Start menu) and double-click on the **Modems** icon.

With no modem yet installed on your PC, you should see an '**Install New Modem**' dialog.

*If a modem is installed, you will see instead a list of modems. If your modem is listed, go on to set its properties: see below. If not, click the **Add** button to display this '**Install New Modem**' dialog.*

Opt for Windows to detect the modem (by ensuring that the tick box by the 'Don't detect' option is cleared), then click **Next**.

Windows then tries to identify your modem.

If your modem is correctly identified, simply click the **Next** button.

If it isn't correctly identified, click the **Change** button and select the modem's manufacturer and model from the list displayed.

When you are ready to continue, click the **Next** button and, if necessary, set the port to which the modem is attached.

If you are installing a modem for the first time, you will then be asked for details of your location and your phone system.

In the final dialog, you are offered a **Finish** button. When you click this, you will be put into the Modem Properties dialog from where you can set the properties of your modem as described below.

Setting its properties

Check your modem is selected in the Modem Properties dialog, then click the **Properties** button and set its properties as follows.

General properties (Displayed first)

The speaker volume is up to you but the speed to set depends on the modem and the type of UART in the COM port - and also on how fast your PC is able to respond. Ideally, the speed set here should be 4 times the modem speed eg. 57600 for a 14.4k modem or 115200 for a 28.8k modem. But data can only be transmitted at these speeds if the COM port uses a 16550 UART (and then only if the PC itself can cope at these speeds). If it uses a 16450 UART, the highest speed to set is 38400, while if it uses an 8250 UART, the limit becomes 19200.

Note: If you don't know what type of UART is used, you can find out by returning to the Modem Properties dialog, switching to the Diagnostics display, selecting the appropriate port and clicking the **More info** button.

Connection properties (Displayed by clicking on the Connection tab).

Connection preferences: *The default settings of '8, None, 1' are the ones you are likely to need here.*

*This dialog can be opened from the Control Panel (called up via the Control Panel Settings option under the Start menu), just click **OK** back to the Control Panel, then go on to Part 4.*

Call preferences: *The 'Wait for dial tone' option should be selected unless your modem isn't able to detect the appropriate dial tone.*

Now click the **Advanced** button to show the 'Advanced Connection Settings' dialog.

Error control: *is automatically selected where it is supported by your modem.*

Flow control: *Here you need to select the form of Flow control used by your Access provider.*

Modulation type: *The 'Standard' setting should be fine.*

Extra settings: *Slot for additional modem initialisation commands. These may be needed if Windows 95 didn't recognise your modem.*

3 Installing the Dial-Up Networking (DUN) software

Double-click on the **Add/Remove programs** icon in the Control Panel.

Click the **Windows Setup** tab of the **Add/Remove Programs Preferences** dialog that is displayed, select the **Communications** option and click the **Details** button in the **Communications** dialog.

Tick **Dial-Up Networking**, and click **OK** - then click **OK** again to leave the Add/Remove programs dialog.

Follow the instructions that appear on the screen to install the DUN software.

When the 'Network' dialog is displayed, fill in your 'host' or 'node' name as your 'Computer name' and an appropriate 'Workgroup name'. *(If you are a Demon customer, your nodename is the unique account name you chose when you set up your account.)*

You can also fill in a Computer description if you wish.

Then restart your computer when you are prompted to do this.

You next need to install the TCP/IP software.

4 Installing the TCP/IP software

Double-click on the **Network** icon in the Control Panel to display a list of the installed Network components.
If TCP/IP isn't listed, click **Add** and select **Protocols** from the list of Network Component Types that is displayed.

If TCP/IP is listed, simply select it - then set its properties as described below.

Click **Add** again and select **Microsoft TCP/IP** from the following list of Network Protocols.

Click **OK**, then set the TCP/IP properties as described below.

*When you have finished making these settings, click **OK** back to the Network dialog and install the Dial-Up Adapter as described below.*

TCP/IP Properties

To set these, select **TCP/IP** in the list of Network components (as described above) and click the **Properties** button.

IP Address page of dialog
Take the 'Obtain automatically' option - unless specifically told otherwise by your Access provider.

WINS configuration page of dialog
Take the 'Disable' option - unless you are on a local network where WINS is used.

Gateway page of dialog
Set this if your Access provider or Network manager tells you the number to use, but otherwise leave it blank. This gateway doesn't have any real meaning on a dial-up connection.

Bindings page of dialog
The default is for TCP/IP to be bound to Client for Microsoft Networks. Leave it like this.

Advanced page of dialog
You don't need to alter this.

DNS configuration page of dialog
You can find out the addresses you need by running the Turnpike Connect program and taking the **Service access** option from the Configure menu.

5 Installing the Dial-Up Adapter

If the list of Network components is not already displayed, double-click **Network** in the Control Panel to call it up.

If **Dial-Up Adapter** isn't listed, click the **Add** button and select **Adapter** from the list of Network Component Types.

Click **Add** again and select **Microsoft Dial-Up Adapter** from the following list of Network adapters.

When you return to the main list, ensure '**Windows Logon**' is selected as the **Primary Network Logon** - then set the properties of the Dial-Up Adapter as described below.

Dial-Up Adapter properties
Driver Type page of dialog
Leave this alone.

Bindings page of dialog
Ensure that TCP/IP is ticked - and that the other protocols are cleared.

Advanced page of dialog
Leave these settings alone too.

6 Setting up the Connection icon

Select 'My computer' and open the Dial-Up Networking folder.

Assuming this is the first time you have gone into this folder, you will see a Welcome screen followed by a 'Make New Connection' dialog.

Enter a name for the connection (such as Demon Internet), and select the modem you intend to use (if you have a choice).

Click **Next**.

In the next dialog, enter the details needed to phone your Access provider.

Be sure to set the Country code to the correct country.

Click **Next**, then click **Finish** in the next display.

You are then returned to the Dial-Up Networking folder.

Back in the Dial-Up Networking folder, select the new connection icon, then take **Properties** from the File menu. *(This will display the basic details of the connection you've set up.)*

Click the **Server Type** button and set the required details in the dialog that's displayed.

Advanced options: *Clear these options unless specifically needed.*

*When you have finished setting these Server details, click **OK** back to the DUN folder.*
Allowed network protocols: *Ensure that TCP/IP is ticked and that the other protocols are cleared.*

Then click the **TCP/IP Settings** button, and set your Access Provider's DNS addresses in the following TCP/IP Settings dialog.

IP address: *Select Server assigned IP address unless specifically told otherwise by your Access provider.*

Name server details: *The numbers needed here are the ones you entered when setting the TCP/IP properties (see Part 4).*

7 Dialling up

Note: Dialling up is easiest with the different pieces of information you need to give recorded as a 'script'. However, this requires extra software as Windows 95 itself doesn't support dialling scripts. If you have suitable scripting software (or you would like to know how to acquire this), see Part 8 below on 'Using a Dial-up script'. Otherwise, dial up as described here.

Dialling up without a script

Preparation

If you will be dialling up without a script, you first need to arrange that a terminal window will be displayed after dialling for you to enter the different pieces of information that your Access provider requires.

To do this, select the appropriate Connection icon in your Dial-Up Networking folder, take the **Properties** option from the File menu, then click the **Configure** button under the modem in the Connection details that are displayed. (This displays the basic details of the connection.)

When the dialog appears, click the **Options** tab to display the Options page of the dialog and tick the option to **Bring up terminal window after dialing**.

Then click **OK** back to the Dial-Up Networking folder.

When you are ready to dial

First run the Turnpike Connect program.

When the following 'third party Winsock' message appears *leave this message on the screen for the moment* and switch either to some other application or to the appropriate Connection icon in your Dial-Up Networking folder and use this to connect to the Internet. You will then see a 'Connect to' dialog.

Leave the slots for your username and password blank, and simply click the **Connect** button.

After dialling, a 'Post-Dial Terminal Screen' window will be displayed - probably containing brief details of the connection that has been made, followed by one or more requests for information.

The likely sequence is login name (ie. user or 'nodename'), password, then protocol (normally PPP).

To each such request, type the appropriate details and press [RETURN]. After the last item, click **Continue** (or press [f7]).

When you are connected, you will see a 'Connected to' dialog showing your Access provider.

At this point, you need to promptly switch back to the Connect program and allow this to continue.

8 Using a Dial-up script

Typing the different pieces of information your Access provider requires every time you connect can be tedious. A better solution is to set up a 'script' that will provide this information for you.

Windows 95 doesn't itself support dialling scripts. To get this facility, you need to add either the Dial-Up Scripting Tool from the Windows 95 CD ROM, or the Internet Jumpstart Kit provided as part of Microsoft Plus - or one of the third-party scripting programs that are available.

If you don't have any scripting software at the moment, you can download a copy of the basic Microsoft scripting tool software from our FTP site **(ftp: //ftp.turnpike.com/pub/win95/dscript.exe)** or, for faster transfer, from our mirror at Demon (**ftp://ftp.demon.co.uk/pub/mirrors/turnpike/win95/dscript.exe**).

Stored alongside this software is a file called **demon.scp** which provides the basis for a suitable script for Demon customers. This script may also be adaptable for use with other Access providers as pretty much the same procedures are used by most Access providers.

We suggest you create a Windows.95 directory within your main Turnpike directory, dial up as described in Part 7, and use Turnpike's FTP program to copy these files to your Turnpike\Windows.95 directory. Then install the scripting tool and the script as described below.

To install the scripting tool

The first step is to extract the various component files that go to make up the Dial-Up Scripting Tool.

dscript.exe is a self-extracting .exe file, so to do this, you need to start a DOS session (by taking **MS-DOS Prompt** from the Start | Programs menu), change directory to your Turnpike\Windows.95 directory, and then run dscript.exe with the command **dscript**[RETURN].

When the files have been extracted, exit from the DOS session and call up the Control Panel (eg. by taking **Control Panel** from the Start | Settings menu). Double-click on the **Add/Remove Programs** icon, then when the dialog appears, click on the **Windows Setup** tab, then click the **Have disk** button.

When the 'Install from disk' dialog appears, click the **Browse** button and select the **rnaplus.inf** file from your Turnpike\Windows.95 directory - then click **OK**. You will then see a panel containing the single entry **Slip and Scripting for Dial-Up Networking**. Tick the box beside this entry, then click **Install**.

When you return to the Add/Remove Programs dialog, click **OK**.

To install the supplied script

Open the **Dial-Up Scripting Tool** now shown in the Start | Programs | Accessories menu.

When the **Dial-Up Scripting Tool** dialog appears, check that the appropriate connection is selected, then use the **Browse** button in the Dial-Up Scripting Tool dialog to pick out the **demon.scp** file from your Turnpike\Windows.95 directory.

(If you want to see what is in the script you've selected or you expect to need to change it, click the **Edit** button when you return to the Dial-Up Scripting Tool dialog.)

Back in the Dial-Up Scripting Tool dialog, check that the option to **Start terminal screen minimized** *isn't* ticked, then click the **Properties** button underneath the list of connections. When the Connection Properties dialog appears, click the **Configure** button below the modem details, click the **Options** tab of the Modem Properties dialog and ensure that neither **Bring up terminal window** option is ticked.

When you've done this, click **OK** back to the Windows Desktop - pausing only to accept the offer to save the changes you've made to the connection if this is offered.

When you are ready to dial

Run the Turnpike Connect program, then switch to your Dial-Up Networking folder and double-click on the appropriate connection icon in very much the same way as described in Part 7.

However, this time when the dialog appears, check that your username and password are entered in the slots provided before clicking the **Connect** button. (Note: These details may be filled in for you as your username is automatically saved while there's a special option to save your password.)

You should then go straight through to the 'Connected' dialog without any further intervention from you - at which point, you should then promptly switch back to the Connect program and allow this to continue.