WS_FTP Professional File Transfer Client for Windows

What is WS_FTP Pro?

Installation

The WS_FTP Pro Window

Connecting to Remote Hosts

Transferring Files

Execute Buttons

<u>Hints</u>

Options

Directory Display Problems

Using WS_FTP Pro from the Command Line

Copyright © 1992-1996 Ipswitch, Inc.

WS_FTP Pro Main Window

When you have established a connection between the local PC and a remote system, the WS_FTP Pro main window displays the directories and files for the PC in the Local System list box (on the left) and the directories and files for the remote system in the Remote System list box (on the right).

NOTE: In the 4-window versions of WS_FTP Pro, each column contains two list boxes: the top list box shows the available directories; the bottom list box shows the files in the currently selected directory.

The current directory is shown at the top of each column. The list box below the current directory shows all of the directories and files within the current directory. Icons are used to identify directories and files. Any disk drives that you can access also appear in the list.

The buttons to the right of each column provide file and directory operations for that column. These are (from top to bottom):

Buttons

ChgDir

MkDir

RmDir (not on 2 window versions, use **Delete**)

File Mask

View

Exec

Rename

Delete

NOTE: The above commands, as well as some additional commands are available from the right mouse button pop-up menus in each of the windows. Select a file or directory and click the right mouse button to view this pop-up menu.

Additional Items Available from Pop-up Menu

Sort (only in 2 window version)

Edit File (only in remote 2 window version)

Move Files (Directory)

chmod (UNIX)

Message Log

Below the list boxes, there is a message area that logs all queries from the WS_FTP Pro client and all responses from the FTP server on the remote system. You can double-click in this area to expand the listing. You can also click the **LogWnd** button to display the messages in a window.

chmod (remote popup menu)

This option only appears when one or more files or directories are selected. You are presented with a dialog box allowing you to specify the most common UNIX file attributes.

Note: You must have write permission on the remote system and the system must support the "SITE chmod" command. This is normally only valid on UNIX-based systems. The checked items do not reflect the current permissions of the file.

Move (popup menu)

This option only appears when one or more files or directories are selected. You are prompted for a directory name to move the files to (the directory must be on the same system).

Note: To move files on the remote system, you must have write permission on the remote system and the system must support the movement of files. Most systems will allow you to move a file over the top of an existing file without warning you!

Edit (remote popup menu)

This option only appears in the two window version of WS_FTP Pro when one file is selected and allows you to edit a remote file locally. This is accomplished by transferring the file to the local system and opening the appropriate application. After that application *exits*, WS_FTP Pro will transfer the file back to the remote system.

Note that your remote session *may* timeout if you take an excessive amount of time to edit the file. This is normally around 4 minutes. In the event of a timeout, the file will not be updated on the remote system and your edits may be lost. You can go back to the WS_FTP Pro window and refresh the directory listing every couple of minutes to keep the session alive.

Local side files can be directly edited via the View or Execute buttons.

Sort (popup menu)

The option only appears in the two window version of WS_FTP Pro and allows you to change the sort order of the files that are displayed in the selected listbox. Filenames can be sorted by name, extension, date, or size. Sort order can also be reversed. Sort order is automatically retained for future sessions. The **Show Full Directory Information** option in the Program options must be enabled for sort to work properly.

Note that information necessary to build a standard list is not available for all host types. If your host type does not sort properly send us a description and the **Dirlnfo** window contents.

ChgDir - Change Directory (button or popup menu)

Used to change directories. If a name is highlighted in the directory listbox, the system will change directories to that name. If no name is highlighted, you will be prompted for the directory to change to. Not all systems have the concept of directories so a failure here does not necessarily indicate a failure in this program.

When prompted for a directory, you can also enter a drive letter followed by a colon (for example, d:) to change to a different disk drive.

MkDir - Create Directory (button or popup menu)

Used to create a directory if possible. You are prompted for a directory name and must supply a name that is valid for the current system. Not all systems allow you to make and delete directories remotely so a failure here does not indicate a failure in this program.

RmDir - Delete Directory (button or popup menu)

Used to remove a directory if possible. You are prompted for a directory name. Not all systems allow you to make and delete directories remotely so a failure here does not indicate a failure in this program.

File Mask

This is the blank text box located above the **View** button.

You can enter a file mask that is valid for the system that you are on, and press Return.

For example, to display only files with the extension .txt, enter *.txt as the File Mask and press Return.

If you are connected to a UNIX host, you can use "-altr" in the remote system FIIe Mask to receive names in date sequence (4 window versions only). You can use any argument string that is valid on the remote system at the end of an "Is" command in a command line FTP client.

View (button or popup menu)

Used to view a file in ASCII format by whatever $\underline{\text{viewer}}$ you have defined in the $\underline{\text{Program Options}}$ dialog box.

Execute (button or popup menu)

When you click on a filename in the local side and then click on execute, the file is executed using the same rules as if it were executed in the File Manager.

If you click on a remote filename and then click on execute, it will be transferred in binary mode to the Windows temporary directory and will be executed from the current directory using the same rules as if executed in the File Manager.

If the filename has an extension other than .EXE, .COM, .BAT or .PIF, then the file associations from the File Manager are used. If the extension has no association, you will be allowed to specify the association at run time. This association is saved in the WIN.INI file in the Extensions section and will also be valid for the File Manager.

You can set associations by selecting the **Options** button and then selecting <u>File Associations</u>.

Rename (button or popup menu)

Used to rename a file if possible. Enter the new name for the item and press **Rename** or press **Cancel** to leave the item intact. Not all systems allow you to rename files and directories remotely, so a failure here does not indicate a failure in this program. **Some systems will allow you to rename a file over the top of an existing file.** You can also be able to move a file from one directory to another directory by specifying a full or relative path (and the filename).

Delete (button or popup menu)

Used to delete a file if possible. Press **Yes** to delete the item or **No** to cancel. Not all systems allow you to delete files remotely, so a failure here does not indicate a failure in this program.

In the two window version, **Delete** is also used to delete directories.

What is WS_FTP Pro?

WS_FTP Pro is a Windows-based application for transferring files between your PC (the <u>local system</u>) and a <u>remote system</u>. Using WS_FTP Pro, you can connect to another system from your PC, browse directories and files on both systems, and transfer files between the systems.

WS_FTP Pro provides ease of use for the beginner plus a full set of functions for the power user. See WS_FTP features for a list of some of the available features.

WS_FTP Pro is a File Transfer Protocol (<u>FTP</u>) client application that complies with the Windows sockets (<u>Winsock</u>) standard. WS_FTP Pro can connect to any system that has a valid Internet Address and contains an <u>FTP server</u> program, allowing you to transfer files between a wide variety of systems, including Windows, OS\2, and UNIX systems.

There are multiple versions of WS_FTP. Most noteable is the existence of the **Professional** version of WS_FTP and the **Limited Edition** version of WS_FTP. The Pro version of WS_FTP offers additional functionality and additional applications for a low cost.

See <u>WS_FTP Configurations</u> for more information. Some of the functions described in this help file are available only in WS_FTP Pro and are identified as such.

For more information on FTP and FTP sites, please refer to the network newsgroups or one of the recent books on the Internet.

WS_FTP Configurations

WS_FTP is available in the following configurations:

Note: For each configuration, there is a **Professional** version and a **Limited Edition** version. The executable name of the **Limited Edition** version is shown in parenthesis. <u>WS_FTP Features</u> describes some of the capabilities of the two versions.

FTPPRO.exe (WS_FTP.exe) is designed for 16-bit environments but will work in any environment.

FTP32PRO.exe (**WS_FTP32**.exe) is designed for the 32-bit operating environments presented by Win32s on Windows 3.x, Windows 95, Windows NT and OS/2. (FTP32PRO is also available for Power PC and Alpha processors.)

FTP95PRO.exe (WS_FTP95.exe) is designed for the 32-bit operating systems of Windows 95 and Windows NT and requires the multi-threading capabilities. (FTP95PRO is also available for Power PC and Alpha processors.) Operation of WS_FTP95 (and FTP95PRO) is not blocked under Win32s but some features like remote edit will not work under Win32s. WS_FTP95 is not tested or supported in the Win32s environment.

The internal workings of the 2 window version are considerably different than earlier 4 window versions of WS_FTP. This allows a considerable number of enhancements to be possible including the retention of file dates and times on transfers from remote systems to local systems and automatic UNIX link processing. So far we have not found a reliable way of setting the file date and time on remote systems.

WS FTP Features

You can use WS FTP to:

- Create a connection between a local system and a remote system
- Create and retain session profiles to automate the logon and connection to frequently used remote systems
- · Display and browse directories and files on both the local and remote systems
- Transfer one or more files between the local and remote systems (in either direction) using Window's point-and-click capabilities
- Access the vast store of information on anonymous FTP sites

In addition to the above features, **WS FTP Pro** also includes the following:

- Resume interrupted file transfers -- If a file transfer is interrupted, WS_FTP Pro asks if you want to continue the transfer when you re-connect to the remote host.
- Drag-and-drop file transfer between a local and remote system.
- Drag-and-drop file transfer from Window's File Manager or Windows 95 Explorer to the local or remote system.
- Multiple file transfer using WS_FTP Pro commands from a DOS prompt.
- Preserve file date/time on transfer (Windows 95 and NT)
- Prevent overwrite of newer files (Windows 95 and NT)
- Free Bonus Pack includes Network tools -- Ping, Trace, Finger, Whois, and Lookup.

FTP Server

FTP is a client/server based protocol, whereby a client program on one system (the <u>local system</u>) sends requests to a server program on another system (the <u>remote system</u>) and receives replies from the server.

Internet address

An Internet address or IP address is a unique identifier that defines a system's location on the Internet network. IP addresses are 32-bit addresses that are commonly specified in Internet dot notation, which consists of four numbers from 1 to 255 that are separated by dots (.), for example: 156.21.50.1

Each IP address is mapped to a unique hostname as it is easier for people to remember names than it is to remember strings of numbers. For example, the IP address 156.21.50.1 maps to the system named superserv.ipswitch.com.

Local system vs. Remote system

In networking terms, your PC is known as the "local system." A "remote system" is any other computer that you connect to via a modem and telephone lines or a local-area network.

Connecting to Remote Hosts

WS_FTP Pro contains a remote host profile capability. Once the profile information is entered, you can connect to a remote host by simply clicking the **Connect** button, choosing the host from the Profile Name drop-down list and then clicking the **OK** button.

Session Profile Information

Profile Name

Host Name

Host Type

User ID

Password

Account

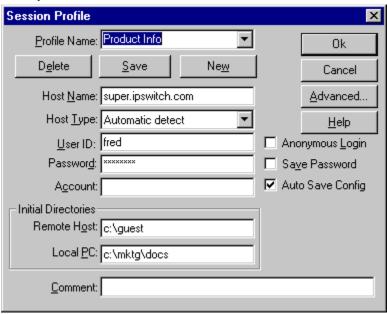
Anonymous Login

Save Password

Save/Delete Buttons

Advanced...

Sample Session Profile



Advanced Profile Parameters

Timeout Port

Passive transfers

Use Firewall

FTP Sites

Many companies and organizations maintain "FTP sites" where you can download evaluation versions of software and obtain product information. You can access these sites using an <u>anonymous</u> login. WS_FTP Pro provides a number of predefined profiles for some of the popular FTP sites.

Note: When you log on to an anonymous FTP site, look for a file called *readme*, *readme.txt*, *index*, or *00index*. Many sites use this file to provide a description of the files available on the site and other information, such as restricted hours for using the site.

Profile Name

This is a profile or configuration name and can be anything you desire to identify the connection you are creating. The length of this name is restricted as it is used as a section name in the WS_FTP.INI file.

You can select from a number of preconfigured profiles for some of the popular $\underline{\mathsf{FTP}\ \mathsf{sites}}$. Click on the Profile Name list box to show the choices.

Remote Host Name

This is either a fully qualified <u>Internet host name</u> or an <u>IP address</u>.

Remote Host Type

If you know the host type, select it from the drop down list. If you don't know, try "auto detect".

If you can connect to a remote host but don't get a directory listing, try changing the host type in the OPTIONS dialog box. I am still working on the "auto detect". It does take care of about 90% of all hosts.

NOTE: Check the messages log (click the **LogWnd** button) to see if the Host Type is identified there. Then, select the corresponding host type from the drop-down list.

User ID (userid)

Enter the userid that you wish to use for this configuration. (or you can click on the **Anonymous Login** check box to automatically enter $\underline{anonymous}$ as the userid.)

Password

Enter the password that you wish to use for the userid that you entered.

If this is an <u>anonymous</u> login, you should enter your full electronic mail address. It is recommended that you place a minus (-) sign in front of your e-mail address for anonymous logins.

Instead of entering your password for anonymous logins, it is recommended that you simply click on the **Anonymous Login** checkbox.

Firewall Password

Enter the password for the firewall host for the userid that you entered.

Account

Enter the account that you wish to use for the userid that you entered if the remote host requires an account. Note that the account is used for VM/CMS hosts for the initial password to the user's default directory. When you change directories (**ChgDir**) on a VM/CMS host you are prompted each time for the password to connect to that directory.

Timeout

This is the number of seconds before WS_FTP Pro times out waiting for a host response to a command.

Note that the initial connection Timeout is determined by your WinSock DLL. Setting this value higher does not have any effect on the initial connection to the host. Setting to less than the amount of time that your WinSock DLL uses will cause the connection to fail in that amount of seconds.

Port

This is the port to connect to on the remote host. This is normally 21, however, it may be something different if you are going through a firewall.

Anonymous Login

Checking this box will automatically enter $\underline{anonymous}$ as your userid and enter your e-mail address as the password.

Firewall

If you are behind a <u>firewall</u> host, click this box. You must insure that the firewall information has been correctly filled out. You can specify a <u>PORT</u> to be used for the firewall.

WS FTP supports five types of firewalls:

SITE hostname

Firewall host, userid and password is required. User is logged on the firewall and the remote connection is established using **SITE remote host**.

USER after logon

Firewall host, userid and password are required. User is logged on the firewall and the remote connection is established using **USER remote_userid@remote_host**

USER with no logon

Firewall host required, userid and password are ignored. **USER remote_userid@remote_host** is sent to firewall upon initial connection.

Proxy OPEN

Firewall host required, userid and password are ignored. **OPEN remote_host** is sent to firewall upon initial connection.

PASV Mode

There is another kind of firewall, which is not specifically configured. A router-based firewall is one which allows connections to be established in one direction only. The router itself is invisible to the user. However, the default mode within FTP is that "data" connections are established by the server rather than the client. To work with a router-based firewall requires using the PASV Mode of FTP. The PASV mode of operation can be turned on from the Options screen.

(Code for type 0 was initially provided by Jeff Welty)

(Code for type 1 and PASV was initially provided by Robert E. Stockwell.)

Save Password

Check this box *only if you are the only user of your computer* and no one else has access to your Windows directory. Passwords are stored in the WS_FTP.INI file and even though they are encrypted, it is an easy encryption to break (especially since the source to this algorithm has been published).

Save/Delete buttons

The **Save** and **Delete** buttons are provided to help you manage the session profiles.

Use the **Save** button to save an entry without trying to actually connect to the host. Use the **Delete** button to remove unwanted entries. The **Cancel** button exits the dialog box without saving any changes to the current configuration.

If the **Auto Save Config** option is checked, a configuration is automatically saved when you select the OK button and there is no imposed limit on the number of configurations that you can have.

Transferring files

To transfer files:

- 1. Select the file or files on the source system.
- 2. Open the directory to which you want to transfer files on the destination system.
- 3. Select the file transfer mode.
- 4. Transfer the files using the left and right arrow buttons located between the listboxes. Click on the **left arrow** button to transfer files from the remote to the local system. Click on the **right arrow** button to transfer files from the local to the remote system.

File <u>uploads</u> and <u>downloads</u> do timeout. You can **Cancel** the operation in the event that you lose the connection to the remote host.

During the transfer of files, the **Help** button changes to **Cancel** if the <u>Show transfer dialog</u> option is off or a Transfer Status dialog box is displayed if the **Show transfer dialog** option is on. The current transfer may be cancelled by clicking the **Cancel** button. File uploads will cancel immediately while file downloads may take up to 30 seconds to cancel. In both cases, the partial file is not deleted automatically. You may have to click the **Cancel** button a second time!

NOTE: You can hold the CTRL key down when you click on the transfer arrow and you will be prompted for a destination filename. You can also click on the transfer arrows when no file is selected and you will be prompted for the source file name. This can then be a full pathname or a simple name.

Transferring multiple files

Transfer mode

Resuming a File Transfer After Failure

Double clicking in list boxes

Changing Directories

HINTS

Auto Transfer of Files

Command Line Options

WS_FTP Pro Command

The command for using WS_FTP Pro from the command line differs depending on which version you installed. Replace **ftpro** with the executable name of the version you are currently using, for example **ftp32pro**, **ftp95pro**. See <u>WS_FTP Configurations</u> for a list of the executable names for each version.

Syntax

Use the following syntax to transfer a file from the command line.

Use the -m argument for transferring multiple files. (Available in the Pro version only) (Items enclosed in [brackets] are optional. Italics indicate a variable. The | character means OR, for example you enter a *hostname* or the word local.)

ftp95pro [args] hostname|local:/pathname/filename [hostname|local:/pathname/filename]

To transfer a file from the remote system to the local system, use the following construction:

ftp95pro [args] hostname:/pathname/filename [local:/pathname/filename]

where you enter the *hostame* for the remote system, the directory *pathname* and *filename* on the remote system, and the directory *pathname* and *filename* on the local system. You can use any of the <u>command</u> arguments.

hostname is assumed to be the name of a configuration. If it is not, then it is assumed to be the full domain name of a remote host or the IP address of a remote host and the userid will be annymous.

If this is not an anonymous FTP session and a password is required by the host and not specified in the configuration, you will be prompted for the password (and account if applicable).

During the transfer of files a Transfer Status dialog box is displayed. The current transfer can be cancelled by clicking the **Cancel** button. File downloads can take up to 30 seconds to cancel after clicking **Cancel**. The partial file is not deleted automatically.

Processing rules for this operation are to use the host, userid, password, account and gateway/firewall information specified in the configuration **hostname** if one exists. If one doesn't exist, it is assumed that the **hostname** is an actual host and the userid will be <u>anonymous</u> and the password will be the specified e-mail address.

To transfer a file from the local system to the remote system, use the following construction:

ftp95pro [args] local:/pathname/filename [hostname:/pathname/filename]

where you enter the directory *pathname* and *filename* on the local system, and the *hostname*, directory *pathname* and *filename* on the local system. You can use any of the <u>command arguments</u>.

See also:

<u>Examples of Command Line File Transfer</u> <u>Automating file transfers</u>

Command Line Arguments

[args]

-i *Inifile* where Inifile is the name of a *.ini* file

(must come before all other args)

-p *Profile* where *profile* is the name of a session profile

(must come before all other args except -i)

-u Userid Specifies the userid for your logon account on the remote system.

-w passWord Specifies the password for your logon account on the remote system.

-c aCcount Specifies an account for those systems that require a second account to log

on or access partitions.

-ascii Sets file transfer mode to ASCII.

-binary Sets file transfer mode to Binary.

-quiet Overrides normal behavior of displaying a message box if an error occurs.

Useful for automated transfers when you do not want to prompt for user input.

-s hostname|local/pathname/filename (Source)

Specifies the hostname, directory pathname and filename to be transferred.

-d hostname|local/pathname/filename (Destination)

Specifies the hostname, directory pathname and filename to which the source file is copied.

-m filename_of_file_containing_args (Pro version only)

Transfers multiple files, where the *filename* is a file that contains the filetransfer commands specified using the command line syntax. Note that you do not enter the command itself (**ftp95pro**) when entering commands in a file. For example, you can specify the command as:

ftp95pro -m transfer.m

where transfer.m contains the following lines:

ftp.wicket.com/etc/hosts local:/vmunix ftp.wicket.com/etc/hosts local:/vmunix2

See also:

Examples of Command Line File Transfers

Examples of Command Line File Transfers

The following command uploads a file to a remote file:

ftp95pro local:/upload/file.zip ftp.ipswitch.com:/upload/file.zip

The following command invokes the Session Profile dialog box with the profile named download. You can use this command to create an icon that launches a profile.

ftp95pro -p download

The following command displays a dialog box that prompts for the command line:

ftp95pro -ask

The following commands download a URL file to a local file. Use the **file** or **ftp** parameters depending on the type of URL:

ftp95pro file://www.ipswitch.com/download/file.zip local:/download/file.zip **ftp95pro** ftp://www.ipswitch.com/download/file.zip local:/download/file.zip

Command Line Options Info

To set up an Icon on your desktop to automatically invoke a file transfer operation:

1. Set the "Command Line" for the icon to one of the following:

To receive a file:

"ws_ftp [args] hostname:full_path_to_file [local:full_path_to_destination]"
To send a file:

"ws_ftp [args] local:full_path_to_file hostname:full_path_to_file"

- 2. Set the "Working Directory" to where you want the file to be placed if it is not specified in the command line.
- 3. Set the "Description" to something descriptive.

Resuming a File Transfer After Failure

When a file transfer is interrupted while in progress because of a lost connection or because it was cancelled, WS_FTP Pro can resume the transfer when you reconnect to the remote system. When you reconnect, WS_FTP Pro asks if you want to resume the transfer.

Click **Yes** to resume the transfer. Click **No** to cancel the transfer.

Note: If you choose not to resume the transfer, you will be left with a partial file (from the interrupted transfer) in the destination directory. You should delete this file.

The resume transfer feature is enabled by default. You can disable this feature by toggling off the check box for the <u>Enable auto reget of failed transfers</u> option in the Pro options.

Note: Not all FTP servers will allow the auto reget option, although most servers will.

Hints

- 1. If you have problems transferring files, try changing the MTU of your stack to 576.
- 2. Make sure you have binary mode set to transfer ZIP or EXE files.
- 3. Make sure your modem is set to hardware flow control if you are using a slip or PPP connection.
- 4. If you get a "Can't open file for write" message, exit to DOS, enter SET and make the directories specified by your TMP and TEMP environment variables.
- 5. Hold the CTRL key down when you click on a transfer arrow to be prompted for a destination file name.
- 6. Click the right mouse button anywhere in the main windows for additional functions.

Change default local directory

Overcoming name conversion problems

Changing Directories

Double clicking

Transfer Mode

Saving a "viewed" file

Drag-and-Drop

No directory listing

Access to debug commands

Changing the default directory

To set the default local startup directory to be something other than where WS_FTP Pro is located:

- 1. Highlight the WS_FTP Pro icon and press ALT-ENTER (or select <u>File Properties</u>) in the Program Manager.
- 2. Change the Working Directory to your desired directory.

Overcoming name conversion problems

If you have problems with remote to local file name conversions, check the <u>Prompt</u> option in the **Options** dialog box. You will then be shown the proposed file name and allowed to change it.

Changing Directories

To change directories, click on the desired directory and press the **ChgDir** button.

If you want to change to a directory without traversing the full tree, make sure there is no name selected in the list box and click on **ChgDir** (works with **RmDir** also). When changing drives on a remote system, you usually have to enter a directory name in addition to the drive letter.

You can also double-click on a directory name to change to that directory.

Double-clicking

You can double-click on a directory name to change to that directory or double-click on a file name to transfer that file (or to execute the file), depending on the how you set up the double-click options in the Program options.

You can choose to have the double-click action activate one of the following:

Transfer

Execute

Nothing

File Transfer Modes

Use Binary mode to transfer all files unless you know the file only contains text, then use ASCII.

If you know that the host that you are transferring to or from is the same as your local host, you can always use BINARY mode and never use ASCII.

Transfer Modes:

ASCII

BINARY

<u>L8</u>

Auto Detect

Saving a "viewed" file

If you use **View** to display a remote file and then want to save that file and have the <u>viewer</u> set to **Notepad**, you can select the **SaveAs** menu option and save the file to whatever name you want.

Transferring Multiple Files

To transfer multiple files, use the SHIFT or CTRL keys when selecting filenames (this is the standard windows method of selecting files).

To select two or more items in sequence:

- 1. Click the first file that you want to select and drag the mouse pointer down, releasing the mouse button on the last file in the group.
- OR -
- 1. Click the first file that you want to select.
- 2. Press and hold down SHIFT while you click the last file in the group.

To select two or more items out of sequence:

Press and hold down CTRL while you click each file.

To cancel a selection:

Press and hold down CTRL while you click the selected file.

After selecting the desired files, press the desired transfer direction button (**left arrow** or **right arrow** button).

Drag-and-Drop Feature

You can drag one or more files from the Windows File Manager and drop them anywhere on the main window (or when iconized) and they will be transferred to the current directory of the remote host using the current transfer mode (ASCII/binary).

NOTE: You cannot drag and drop directories in the 4 window versions of WS_FTP, nor can you drag and drop from the remote host to another application.

PRO Drag-and-Drop

In the PRO versions, you can drag-and-drop between windows and drag to other applications. In the 2 window version, you can *move* files by dragging a file or group of files to a directory on the same system (move the mouse over the directory name so that the directory name becomes highlighted). Files can also be copied to a directory other than the displayed directory (on the other system) in the same way. The ability to use the enhanced dragging and dropping in the PRO version is controlled by an option in the Pro Options dialog box.

Directory Display Problems

If you can connect to a remote host but don't get a directory listing, try changing the host type in the Session Profile or Session options dialog boxes. We are always working on the "auto detect" and host types. It does take care of about 90% of all hosts.

Some hosts MAY not be properly auto-detected and must be set at connect time!

If you have a host that just won't display correctly, please follow this procedure.

If the host is available via anonymous FTP or if you can create a test account for us, send access information to <junodj@csra.net>

If not,

- 1. Go to **Program Options** and turn on the **Debug Messages** option.
- 2. Exit WS FTP and restart.
- 3. Connect to the remote host.
- 4. Press the **LogWnd** button and **Save** the log window to a file.
- 5. Press the **DirInfo** button and **Save** the file listing to a file.
- 6. Mail both files to <junodj@csra.net> along with as much of a description of the host as possible.

Debug Menu

You can bring up a pop-up menu by clicking the right mouse button when the cursor is pointing at the gray area of the main window. This gives you access to some additional FTP commands. **(NOT RECOMMENDED FOR THE BEGINNER!)**

Options

WS_FTP Pro provides many options through which you can tailor its operation to meet your particular file transfer needs. To access these options, click the **Options** button on the main window. A dialog box appears from which you can select the following options:

Program Options

Program options affect the layout and operation of WS FTP Pro.

Session Options

Session options affect the current session (and session defaults)

Pro Options

Pro options affect all sessions and the overall operation of WS_FTP Pro

ASCII Extensions

Extensions are used for Auto Mode (auto detect binary/ascii)

Extension Conversions

Change extensions on transfer

File Associations

Associations affect execution by **Exec** button.

Save Directory Names

Saves the local and remote directory names in the current session profile.

Save Window Locations

Saves the current main window size and location.

Program Options

Options available in this dialog affect the display and operation of WS_FTP for all configurations.

Alternate Screen Layout

Buttons on Top

Show Directory Information

Auto Save Host Profile

Verify Deletions

Auto Connect

Debug Messages

Text Viewer

E-Mail Address

Listbox Font

Scale Font

Double Click

Transfer

Execute

Nothing

Recv Size

Send Size

Alternate Screen Layout (Program option)

Controls the main window display layout. The alternate layout has the local directory and file list on top and the remote directory and file list on the bottom. Directories are on the left and file lists are on the right.

Buttons on Top (Program option)

Controls the placement of the buttons that are normally across the bottom of the window.

Show Directory Information (Program option)

When turned on, additional file information is displayed when possible. Not all host types are supported for this option! The client does not attempt to decipher or interpret this information; it is only displayed for human consumption.

Auto Save Config (Program option)

If checked, WS_FTP Pro will automatically save the Session Profile when you click **OK** in the Session Profile dialog box. Even though this option also appears in the Session Profile dialog box, its state is only saved in the Program Options dialog box.

Verify Deletions (Program option)

If checked, WS_FTP Pro will prompt you for confirmation when you delete files.

Auto Connect (Program option)

Controls whether or not WS_FTP Pro displays the connect (Session Profile) dialog box when WS_FTP Pro first starts.

Debug Messages (Program option)

This enables extra debug messages in the message window at the bottom of the main window. (These messages generally are of no value to the user as all error messages are displayed even when this option is off.)

Text Viewer

(Program option)

This is the program that is invoked when you click the **DirInfo** or **View** button. The default value is the Windows Notepad.

E-Mail Address

(Program option)

This is used as the default password for anonymous logins as required by most anonymous <u>FTP sites</u>.

It is recommend that you place a minus (-) sign as the first character of your e-mail address in order to turn off descriptive messages on the remote host.

ListBox Font

(Program option)

This is used to change the font that is used in the listboxes. *SysVar* is the default system font and is a variable font. *SysFix* is the fixed system font and will improve the alignment of columns in the boxes. *AnsVar* is the ANSI Variable Font, which is a narrower font than the System font. *AnsFix* is the ANSI Fixed Font.

Scale Fonts

(Program option)

This is used to cause the font outside the listboxes to reduce in size when the window size reduces. The font used will always be the ANSI variable font.

Double-click Transfer

(Program option)

When you double-click on a filename, the file is transferred to the opposite side. (If you double-click on a file on the local side, it is uploaded to the remote system. If you double-click on a file on the remote side, it is downloaded to the local system.)

Double-click Execute

(Program option)

When you double-click on a filename, the file is executed using the same rules as if double-clicked on in the File Manager. If you double-click on a remote file, it will be transferred in binary mode to the Windows temporary directory and will be executed from the current directory using the same rules as if double-clicked on in the File Manager.

Execute Buttons

Double-click Nothing (Program option)

When you double-click on a filename, nothing happens.

Receive Size

(Program option)

This is used to control how many bytes are read from the network in each read (recv). This option can have a value from 80 to 4096. You should see the best results with this set to 4096. Note that the actual number of bytes read in each read is determined by the underlaying TCP/IP stack and by the amount of information available.

Send Size

(Program option)

This is used to control how many bytes are written to the network in each send. This option can have a value from 80 to 4096. The optimum value to place here will depend on your underlying TCP/IP stack. If you have a direct connection, I'd suggest setting this to 4096. If you have a slip or PPP connection, you probably want to set it to the MTU size.

Pro Options

You can use the Pro options to enable or disable certain features of WS_FTP Pro. These options only exist in the Pro versions of WS_FTP.

Enable drag-and-drop between window Enable auto reget of failed transfers

The following options only appear in the two-window version of WS FTP Pro.

Preserve file time on transfer from remote

Prompt for overwrite of same or new files

Don't transfer older or same files during directory transfers

Note: The internal workings of the 2 window version are considerably different than earlier 4 window versions of WS_FTP. This allows a considerable number of enhancements to be possible including the retention of file dates and times on transfers from remote systems to local systems. So far we have not found a reliable way of setting the file date and time on remote systems.

Enable drag-and-drop between windows (Pro option)

When enabled, you can transfer directories and files between systems by dragging them with the mouse from one listbox to another. See <u>drag-and-drop feature</u> for more information.

Enable auto reget of failed transfers (Pro option)

When enabled, if a file transfer is interrupted while in progress because of a lost connection or because it was cancelled, WS_FTP Pro will ask if you want to resume the transfer when you reconnect to the remote system. See <u>resuming file transfers</u> for more information.

Preserve file time on transfer from remote

(Pro option)

When enabled, when you transfer a file from a remote system, the file will maintain its original creation date and time. If disabled, a transferred file is given the current date and time. (This does not work when transferring files to the remote system.)

Prompt for overwrite of same or newer files (Pro option)

When enabled, if you transfer a directory or file for which there is the same or newer version (by date and time) in the destination directory, WS_FTP Pro will ask if you want to overwrite the file. Note that this feature will not work with some FTP servers.

Don't transfer older or same files

(Pro option)

When enabled, if you transfer a directory, WS_FTP Pro transfers those files for which there are not the same or newer versions (by date and time) in the destination directory.

Session Options

These options reflect the options in use for the current session and are specific for the configuration. If you want to make the options be the default for all sessions, click the **Save as Default** button. Sessions can still have unique options other than default by setting the option in this dialog box and clicking **Save**. Note that only options that are different than the default options are saved for the session. If you change the defaults later, you may want to re-check the session options for a configuration.

Host Type
Auto Update Remote Directories
Show Transfer Dialog
Use PASV Transfer Mode
Send Unique
Receive Unique
Prompt for Destination
Sound When Transfer Done
Convert Extensions
Sorted Listboxes
Use Firewall
Transfer Modes:

ASCII
BINARY

<u>L8</u>

Auto Detect

Auto Update Remote Directories (Session option)

When this option is checked, the remote directory list will be refreshed after uploading a file, deleting a file or directory, or creating a directory. When this option is not checked, you can click the remote side **Refresh** button to update the directory.

Show Transfer Dialog (Session option)

When the option is on, a Transfer Status dialog box appears during file transfers and displays the status of the transfer. If the option is off, the Transfer Status dialog box does not appear.

The Transfer Status dialog box shows a percent done bar if the file size is sent from the remote host on receives. You can click the Cancel button in the dialog box at any time to cancel the transfer. If you cancel a transfer, you will have a partial file in the transfer destination. You need to delete the partial file.

Use PASV Transfer Mode

(Session option)

PASV Mode forces "data" connections to be established by the client, rather than the server (which is the default). PASV Mode may be required for users who are behind a router-based firewall.

Send Unique (Session option)

This option makes sure the transmitted file names do not conflict with existing files if the remote host supports the STOU FTP command. The new filename is determined by the remote host.

Receive Unique (Session option)

This option makes sure the received file names do not conflict with existing files. The new filename will be changed so that the sixth though eighth character of the filename will be a number from 000 to 999.

Prompt for Destination (Session option)

Enables local/remote filename prompting. For each file that is transferred, you will be shown the proposed destination file name and allowed to change it. You can enter a full pathname to a different directory if you want.

NOTE: You can also hold the CTRL key down when you click on the Transfer arrow to take the opposite action of this option.

Sound When Transfer Done

(Session option)

Causes bell to sound at end of each file transfer. If you have a sound card, this will be the Default Beep sound, if you have Enable System Sounds selected in the Control Panel Sound setup.

Sorted Listboxes

(Session option)

If this box is checked, the **remote file listbox** is automatically sorted alphabetically. Otherwise the files are presented in the order the remote host transmitts them.

Send PORT Command

(Session option)

This causes the PORT nn,nn,nn,nn,nn,nn command to be sent to the remote system each time a file is transferred.

This should always be left on. This option is NOT saved along with the other program options. This option is no longer displayed in any dialog boxes.

ASCII

(transfer mode)

Used for TEXT file transferring. The end of line character is different on different type of computers; using ASCII mode will insure that the end of line character is translated properly.

If you know that the host that you are transferring to or from is the same as your local host, you can always use BINARY mode and never use ASCII.

Binary (transfer mode)

Used for non-TEXT file transferring. Executable programs, word processing documents, spreadsheets, databases, graphics files, and sound files are some examples of files that must be transferred in BINARY mode.

If you know that the host that you are transferring to or from is the same as your local host, you can always use BINARY mode and never use ASCII.

L8

(transfer mode)

Used for VMS non-TEXT file transferring.

Setting Auto Detect Extensions

The Extensions dialog box is used to specify the transfer mode for different file extensions. When <u>Auto</u> <u>Detect</u> is selected for the transfer mode, WS_FTP Pro will transfer all files in binary mode, unless the extension is in this dialog box (which stores entries in the WS_FTP.EXT file). The specified extensions will be transferred in ASCII mode.

To add a file extension to the Auto Detect list:

- In the ASCII Mode text box, enter a file extension.
 (The extension can be up to 10 characters long and can contain periods.)
- 2. Click the Add button.

The extension appears in the listbox.

The listbox lists all file extensions that WS FTP will transfer in ASCI mode when using Auto Detect.

To delete a file extension from the listbox, select the extension and click the **Delete** button.

Click Exit to exit the dialog box.

Setting Up Extension Conversions

The Convert Extensions dialog box is used to convert file extensions of transferred files to a new extension. For example, if the remote system uses .html for HTML files and your system uses .htm, you can specify that all files with the extension .html are converted to .htm on transfer.

To convert file extensions automatically, you need to enter the source and destination extensions in the Convert Extensions dialog box and enable the <u>Convert Extensions</u> option in the Session options.

To add an extension conversion:

- 1. In the Source text box, enter the file extension of the source file.
- 2. In the Destination text box, enter the file extension to convert to (destination file).
- 3. Click the Add button.

The extension conversion appears in the listbox.

The listbox shows all defined extension conversions.

To delete an extension conversion, select it in the listbox and click the **Delete** button.

Click **Exit** to exit the dialog box.

Setting Associations

The Associate dialog box is used to associate files of a particular extension with an executable file. In this way, you can map file types to an application (executable file) that can run that type of file. When you choose the <u>Exec</u> button, the file is opened in the associated application.

To set up an association:

- 1. In the File with Extension text box, enter the file extension to be associated with an executable program.
- 2. In the Associate With text box, enter the executable program to run when the **Exec** button is clicked.
 - You can use the **Browse** button to browse your directories and files to locate the executable program.
- 3. Click OK.

Convert Extensions

(session option)

When this option is selected, the extension of all files that are transferred are compared with an extension list. If the file extension is found in this list, the destination file name is changed to match the desired extension.

For example:
htm=html
html=htm

See for <u>Setting Up Extension Conversions</u> for more information.

Auto Detect

(transfer mode)

When this option is selected, all files will be transferred in binary mode unless the extension is found in the WS_FTP.EXT file and then the file will be transferred in ASCII mode. You can add extensions in the <u>ASCII Extensions</u> dialog box. Note that extensions can be up to 10 characters long and can contain periods, etc.. These are not DOS extensions! Rather they are the ending characters of a filename. If you expect it to match on a period, you *must* put the period in.

Sample:

.LST

.TXT

.ME

README

Author Information

Copyright © 1992-1996 Ipswitch, Inc.

Written by John A. Junod <junodj@csra.net>

Acknowledgments

Note that there have been a lot of people that have contributed ideas and information to support WS_FTP. It is no longer possible to keep up with this list of people. Sorry!

Some code **concepts** are based on code that is copyrighted by the **Regents of the University of California** or code published in *UNIX Network Programming* by **W. Richard Stevens** or published in *Programming Windows* by **Charles Petzold** or in the Microsoft manuals/samples or code in **WATTCP** or other public sources. The rest is based on my knowledge of Windows programming and my interpretation of RFC 969 and the Windows Sockets API version 1.1.

License Information

Copyright © 1992-1996 Ipswitch, Inc. All rights reserved.

PLEASE REFER TO THE SEPARATE LICENSE AGREEMENT!

Latest Version

The latest version of the Limited Edition versions can be found through the Web on http://www.ipswitch.com or at the "home" FTP site FTP1.IPSWITCH.COM.

The WS_FTP WEB home pages are at http://www.ipswitch.com and htp://www.csra.net/junodj/

Installation

Execute INSTALL. EXE that is provided in the WS_FTP Pro distribution.

Anonymous, definition

Most FTP sites support **anonymous** logins where you do not have to have an actual account on the system in order to access the system to transfer files. Normally, the userid is the word **anonymous** and the password is your full e-mail address. Usually, you can place a minus (-) sign as the first character of your e-mail address to reduce the number of messages that come from the host FTP process.

Firewall, definition

Some organizations have chosen to separate their networks from the rest of the world while still allowing certain users the ability to access resources outside of that organization's network. This access is provided through a "gateway" or "firewall" host system and is generally uni-directional. There is another kind of firewall, which is not specifically configured. A router-based firewall is one which allows connections to be established in one direction only. The router itself is invisible to the user. To work with a router-based firewall requires using the <u>PASV Mode</u> of FTP.

FTP, definition

FTP stands for File Transfer Protocol. This is one of the standard protocols defined for use on a TCP/IP network.

Winsock, definition

WinSock is a specification that network software providers use as a guideline for the standard application programming interface to their network software.

Upload

Transferring a file *from* your local workstation *to* a remote host or workstation.

Download

Transferring a file *to* your local workstation *from* a remote host or workstation.

Local file name

Enter a valid name for a MS_DOS file in the form of *filename.ext. Filename* is a maximum of eight characters consisting of the letters A-Z and digits 0-9. *Ext* is a maximum of three characters consisting of the letters A-Z and digits 0-9. Recommend you use standard extensions for files, such as .TXT, .ZIP, .DOC, .WKS, etc..

Remote file name

Enter a name for a file that is valid on the system you are connected to. Many systems allow names that are much longer than MS_DOS allows. Also, some systems allow characters that MS_DOS does not allow. No error checking or filtering is performed on the name that you enter.

Remote directory name

Enter the name of a remote directory. Naming conventions must match the remote system. Refer to the documentation for the remote system for additional help. On most systems, a directory must be empty in order to be able to delete it. Not all systems allow you to make and delete directories remotely so a failure here does not indicate a failure in this program.

SITE Command

(available by clicking the right mouse button)

Enter a remote site specific command. The client will prefix your entry with the word SITE and send you entry unedited to the remote system. It is up to you to determine what is valid input for this command by reading the documentation for the remote system.

QUOTE Command

(available by clicking the right mouse button)

Enter any command that you want. It will be sent unedited to the remote system. It is up to you to determine the command syntax depending on the host you are connected to. You should not send any commands that need to open a secondary channel.