

Copyright Information

Copyright 2001, Investment Intelligence Systems Corporation. All Rights Reserved.

The information contained in this manual and accompanying software program is copyrighted and all its rights are reserved by Investment Intelligence Systems Corporation (IISC). IISC reserves the right to make periodic modifications of this product without obligation to notify any person or entity of such revision. Copying, duplicating, selling, or otherwise distributing any part of this product without the prior consent of an authorized representative of IISC is prohibited.

JSheet and HyperSheet are registered trademarks of Investment Intelligence Systems Corporation.

Disclaimer of Warranties

The software and users manuals are provided “as is” and without express or limited warranty of any kind by either IISC or anyone who has been involved in the creation, production, or distribution of the software, including, but not limited to the implied warranties of the merchantability and fitness for a particular purpose. The entire risk as to quality and performance of the software and users manuals is with you. Should the software and users manuals prove defective, you (and IISC or anyone else who has been involved in the creation, production, or distribution of the software) assume the entire cost of all necessary servicing, repairs, or correction.

Some states do not allow the exclusion of implied warranties, so the above exclusion may not apply to you.

Limitation of Liability

In no event will IISC or any other person involved in the creation, production, or distribution of the software be liable to you on account of any claim for any damages, including any lost profits, lost savings, or other special, incidental, consequential, or exemplary damages, including but not limited to any damages assessed against or paid by you to any third party, arising out of the use, inability to use, quality, or performance of such software and users manuals, even if IISC or any other such person or entity has been advised of the possibility for such damages, or for any claim by any party. In addition, IISC or any other person involved in the creation, production, or distribution of the

software shall not be libel for any claim by you or any other party for damages arising out of the use, inability to use, quality, or performance of such software and users manuals, based upon principals of contract warranty, negligence, strict liability for the negligence of IISC or other tort, breach of any statutory duty, principals of indemnity or contribution, the failure of any remedy to achieve its essentials purpose, or otherwise.

Some states do not allow the limitation or exclusion of liability for incidental or consequential damages, so the above limitation may not apply to you.

TABLE OF CONTENTS

CHAPTER 1: INTRODUCTION.....	1-1
About this Manual	1-1
Documentation Conventions.....	1-2
 CHAPTER 2 : THE JSHEET ENVIRONMENT	2-1
The Workbook Window	2-2
The Worksheet Grid.....	2-2
Navigating Within the Worksheet Grid	2-4
The Formula Bar	2-5
Using the Cell Entry Controls.....	2-5
The Format Bar	2-5
The JSheet Menu	2-6
Setting JSheet Preferences	2-7
Format Preferences	2-8
Workbook Preferences.....	2-10
Client Preferences	2-11
 CHAPTER 3: JSHEET FILE ACTIONS.....	3-1
Creating New Workbooks.....	3-1
Opening Existing Files.....	3-2
Opening Files Created in Other Programs	3-4

Saving Workbooks.....	3-4
Saving Workbooks in Foreign Formats	3-5
Closing Workbooks	3-6
 CHAPTER 4: ENTERING DATA.....	 4-1
Entering Data into a Cell.....	4-1
Entering Data into a Range.....	4-2
Stepping Through a Range	4-2
Positioning the Current Cell	4-2
Entering Range Data.....	4-2
Defining Data Types	4-3
Entering Text	4-3
Entering Numbers	4-3
Entering Dates	4-4
Entering Times.....	4-4
Editing Workbook Data	4-5
Linking Worksheets.....	4-6
 CHAPTER 5: CREATING FORMULAS	 5-1
Introducing Formulas.....	5-2
Entering Formulas	5-2
Combining Components in Formulas	5-3
Evaluation Order in Formulas.....	5-4
Using Functions in a Formula.....	5-5
Using Numbers in Formula Arguments.....	5-7
Using Strings in Formula Arguments	5-8
Using Ranges in Formula Arguments.....	5-8

Using Operators in a Formula.....	5-9
Understanding Error Messages.....	5-11
CHAPTER 6: CUT, COPY, AND MOVE DATA.....	6-1
Cutting Data.....	6-1
Copying Data.....	6-2
Copying Data Across Ranges	6-2
Pasting Data	6-4
Pasting Data Between Worksheets	6-6
Pasting Selected Data Elements.....	6-7
Moving Data.....	6-7
Deleting Data.....	6-8

CHAPTER 1: INTRODUCTION

Welcome to JSheet! With a spreadsheet matrix, menus, palettes, and an optional charting module, JSheet is a primary visual interface to the JSServer engine. Existing files or templates can be loaded, viewed, and manipulated. JSheet, achieves the look and feel of a standard desktop spreadsheet, without the need for a spreadsheet program to reside on your local hardware.

About this Manual

This manual provides basic instructions on how to use JSheet. In most instances, easy-to-follow instructions are presented that step you through the procedures discussed. For information on how to use the functions that are available in JSheet, refer to the *JSheet Functions* manual.

Chapter 1, Introduction contains information about the contents of each chapter in this book, as well as the documentation conventions used throughout the manual.

Chapter 1: Introduction

Chapter 2, The JSheet Environment identifies the various worksheet components and worksheet navigation methods. The system preferences available JSheet are also discussed.

Chapter 3, JSheet File Actions provides information on how to create, open, close, and save workbooks and worksheets. All of the actions discussed in this chapter are performed using commands in the JSheet **File** menu.

Chapter 4, Entering Data, explains how to enter data into cells and ranges and how to edit data that you have entered.

Chapter 5, Creating Formulas, discusses formulas and formula components. Information on how to identify the various components of a formula; how to use numbers, strings, and worksheet ranges as formula arguments; how to use the JSheet operators; and how to determine the evaluation order of formulas is addressed.

Chapter 6, Cut, Copy, and Move Data, explains how to use cut-and-paste, copy-and-paste, and drag-and-drop techniques to manipulate the data in your worksheets. Inserting and deleting rows and columns of data are also discussed.

Documentation Conventions

Recognizing the following JSheet documentation conventions will help you understand and use your documentation:

1. Book, chapter, and section titles are shown in italics (e.g., *JSheet Environment* or *Chapter 3: Entering Data*).

2. Entities that can be located on the screen are shown in boldface type (e.g., the **File** menu, the **Accept Entry** button, or the **OK** button).
3. File names are shown in proper case, boldface type (e.g., **Chap4.jss**).
4. Menu commands are shown in boldface type with the menu, submenu, and command names separated by a slash (e.g., **File/New** or **Edit/Copy Right**). Menu names are listed first, followed by submenu names and then command names.
5. Keys are denoted in all uppercase, condensed type (e.g., ENTER, BACKSPACE, CTRL, or SHIFT).
6. Steps required to perform a task are numbered.
7. Function keywords appear in uppercase, condensed type (DAYNAME or SUM). This convention is used to help you recognize functions and their syntax. Functions are not case-sensitive.
8. Function arguments are shown in lowercase type (expressions, string1, or price).
9. Tip paragraphs offer additional details about the functionality being described.
10. Important paragraphs contain vital instructions, cautions, or other significant information about the feature or operation being described.

CHAPTER 2 : THE JSHEET ENVIRONMENT

When JSheet is launched, a workbook window is displayed. The workbook window includes a format bar, formula bar, worksheet grid, worksheet tabs, and status bar. Right-click to display the JSheet Menu.

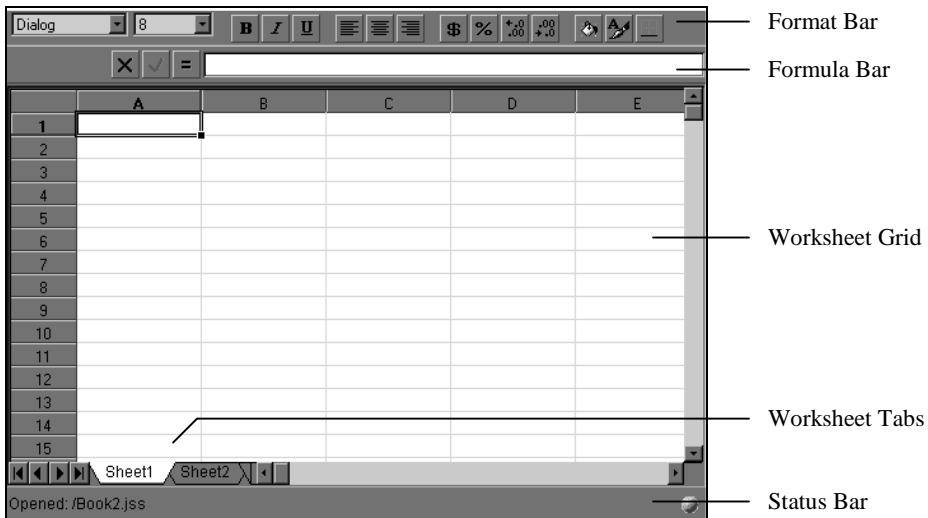
This chapter introduces you to the JSheet environment. Read this chapter to learn how to:

11. identify the components of the workbook window.
12. navigate within the worksheet grid.
13. use the components of the formula bar.
14. use the features available from the format bar.
15. access the commands available in the JSheet Menu.

The Workbook Window

The workbook window contains the format bar, the formula bar, the worksheet grid, the worksheet tabs, and the status bar. The worksheet grid contains rows and columns that intersect to form cells. All of the worksheet data is stored in the cells. The formula bar, located above the worksheet grid, is used to enter and edit all of the data stored in the cells. By default, each workbook has three worksheets. The following illustration shows a workbook window.

Figure 2-1



The Worksheet Grid

Each row and column in the worksheet grid is labeled with a heading. Rows are labeled with numbers; columns are labeled with letters.

Each cell in the worksheet is given an address based on the headings of the column and row that intersect to form the cell. The following illustration shows cell B5 (the intersection of column B and row 5) as the current cell.

Figure 2-2

	A	B	C	D
1				
2				
3				
4				
5				
6				
7				
8				
9				

Current Cell

When a cell is selected, it is current. The current cell is outlined with a border. If more than one contiguous cell is selected at a time, the selected cells are referred to as a range. A range is referenced using the addresses of the first and last cells in the range (the “anchor” cells). The following illustration shows a worksheet grid with a range selected. The address for the selected range is B3..C5. The current cell in the range is B3. The first anchor cell of the selected range is B3 and the last anchor cell is C5.

Figure 2-3

Chapter 2: The JSheet Environment

	A	B	C	D
1				
2				
3				
4				
5				
6				

Current cell and first anchor cell of the range.

Last anchor cell of the range.

Navigating Within the Worksheet Grid

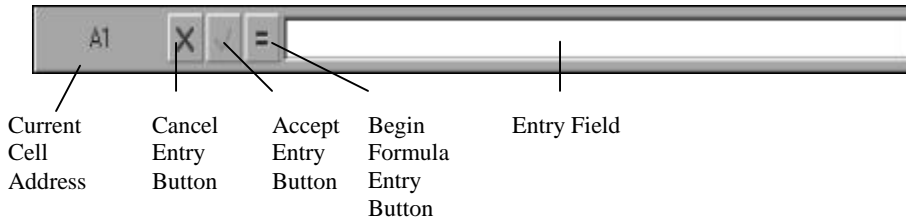
You can use keystrokes or the scroll bars to move around in the worksheet grid. Keystrokes provide shortcuts for moving around the worksheet grid; scroll bars scroll the worksheet grid left, right, up, or down. The following table lists keyboard shortcuts that you can use to navigate within the worksheet grid.

Keystroke	Scrolling Action
PAGE UP	Scrolls the worksheet grid up one screen.
PAGE DOWN	Scrolls the worksheet grid down one screen.
UP ARROW (↑)	Moves the current cell up one row.
DOWN ARROW (↓)	Moves the current cell down one row.
LEFT ARROW (←)	Moves the current cell left one column.
RIGHT ARROW (→)	Moves the current cell right one column.
CONTROL UP ARROW (↑)	Moves to the first row.
CONTROL DOWN ARROW (↓)	Moves to the last row.
CONTROL LEFT ARROW (←)	Moves to the first column.
CONTROL RIGHT ARROW (→)	Moves to the last column.
HOME	Moves to the first column in the current row.
END	Moves to the last column in the current row.

The Formula Bar

Every workbook window contains a formula bar. The following illustration identifies the elements of the formula bar.

Figure 2-4



Using the Cell Entry Controls

You use the entry field, together with the **Accept Entry**, **Cancel Entry**, and **Begin Formula Entry** buttons to enter and edit data in a cell. To enter data in a cell, select a cell and begin typing. To enter a formula in a cell, click the **Begin Formula Entry** button and then type the formula. As you type, the characters are displayed in the entry field and in the selected cell. To enter the information into the selected cell, click the **Accept Entry** button or press ENTER. Or, before you enter the information into the selected cell, you can click the **Cancel Entry** button to discard the data you typed in the entry field.

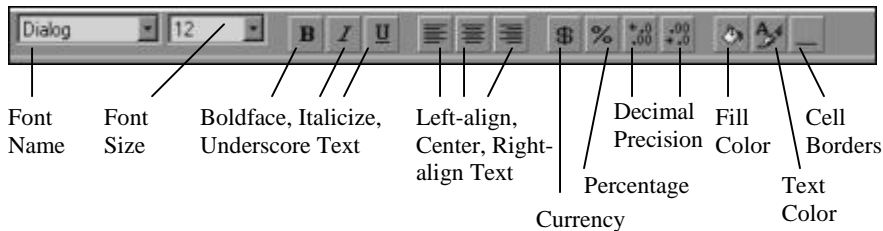
The Format Bar

The buttons on the format bar, shown in the following illustration, can be used to control the appearance and display of the data you

Chapter 2: The JSheet Environment

enter into your JSheet workbooks, as well as the appearance of your worksheet grid.

Figure 2-5



The default values for many of the options available on the format bar are set via the **Format** tab in the **Preferences** dialog box.

The JSheet Menu

Right-click while over the workbook window to access the JSheet Menu. The menu contains nine menu items:

16. Use the **Cut** command to remove selected data from the worksheet and place the data on the clipboard.
17. Use the **Copy** command to copy selected data to the clipboard.
18. Use the **Paste** command to insert the data contained on the clipboard into the specified location on your worksheet.
19. Use the commands in the **File** menu to create and manage your workbook files (e.g., **New Book** and **Open Book**). The

commands you need to save, close, and print your worksheets are also contained in the **File** menu.

20. Use the commands in the **Edit** menu to undo actions; copy and clear data; perform specialized paste operations; and specify the appearance of the numbers displayed in your worksheet grid.
21. Use the **Sheet** menu to recalculate your workbooks; to add worksheets to or delete worksheets from your workbook; to rearrange the order of the worksheets in your workbook; and to rename your worksheets.
22. Use the **View** menu to display or hide the formula bar, the status bar, the format bar, the grid headers and the cell grid; to send messages to users who are sharing a workbook; to display the charts generated for the current worksheet; and to freeze and unfreeze panes.
23. Use the **Preferences** menu to specify text and numeric formatting characteristics; workbook permissions and autosave options; and client default settings for the formula bar, format bar, and status bar.
24. Use the **About** menu to display the **About JSheet** dialog box, which contains product information.

Setting JSheet Preferences

A comprehensive set of JSheet preferences enables you to customize the display and performance of [JSheet](#) to meet your needs. The preferences you select are used each time you launch [JSheet](#).

To set the JSheet preferences:

Chapter 2: The JSheet Environment

1. Right-click to display the JSheet Menu and then choose **Preferences** to display the **Preferences** dialog box.
2. There are three types of preferences you can set: **Format**, **Workbook** and **Client**. Click the corresponding tab for the type of preference you want to set.
3. Click the format setting(s) you want to change and enter the new setting(s).
4. Click **OK** to apply all the preference settings.

Important: When you make changes to the preferences, you must disconnect from and reconnect to JSheet to implement the changes. Existing worksheets are not affected by the preference changes; only new worksheets are affected.

Format Preferences

Format preferences allow you to customize the display of the text and numbers you enter into your JSheet worksheets. The text defaults also are used for the row and column headings, the text in the formula bar, and the text displayed in the current cell address. The settings available on the **Format** tab are:

25. **Font Name.** Select the font family that you want to use for the data you enter into your JSheet worksheets. The default is **Arial**. Click the dropdown arrow to display the list of font choices.
26. **Font Size.** Set the point size that you want to use for the data you enter into your JSheet worksheets. The default is **12**.
27. **Font Color.** Select the color that you want to use for the data you enter into your JSheet worksheets. The default is black

Chapter 2: The JSheet Environment

(**RGB(0,0,0)**). Click the color box to display the array of available colors.

28. **Font Alignment.** Select the alignment you want to use for the data you enter into your JSheet worksheets. The default is **General**.
29. **Font Bold.** Check the **Font Bold** check box to display all of the information you enter into your JSheet worksheets in boldface type. The default is **false** (not boldface).
30. **Font Italic.** Check the **Font Italic** check box to display all of the information you enter into your JSheet worksheets in italic type. The default is **false** (not italic).
31. **Font Underline.** Check the **Font Underline** check box to display underscores on all of the information you enter into your JSheet worksheets. The default is **false** (not underscored).
32. **Number Format.** Select the format that you want to use for the numbers you enter into your JSheet worksheets. The default is **Fixed**. Click the dropdown arrow to display the list of number format choices.
33. **Precision.** Use the **Precision** number wheel to specify the number of decimal positions to display. A positive precision defines the number of digits displayed to the right of the decimal point. A negative precision defines the number of digits to the left of the decimal point to which the number is rounded.
34. **Hide Zero.** Check the **Hide Zero** check box to hide the display of any numbers in your worksheet cells that equal zero. The default is **false** (zero values not hidden).
35. **Show Commas.** Check the **Show Commas** check box to display a comma as the thousands separator for any number in

Chapter 2: The JSheet Environment

your worksheet cells that is greater than 999. The default is **false** (no comma displayed).

36. **Show Parenthesis.** Check the **Show Parenthesis** check box to display negative numbers in your worksheet cells within a set of open and close parentheses. The default is **false** (no parentheses displayed).
37. **Negative Color.** Negative numbers in your worksheet cells can be displayed in a color different than the color used to display other data. Click the **Negative Color** color picker to select the color you want to use to display negative numbers in your worksheet cells.
38. **Book Background Color.** Click the **Book Background Color** color picker to select the color you want to use as the background color for your worksheet cell grid. The default is white (**RGB(255,255,255)**).

Workbook Preferences

Workbook preferences govern the public read/write/save options for all of your new workbooks. The settings available on the **Workbook** tab are:

39. **Public Read.** Check the **Public Read** check box to enable others to access any new JSheet workbooks you create. The default is **true** (access enabled). Uncheck the check box to deny access to others.
40. **Public Write.** Check the **Public Write** check box to enable others to make changes to any new JSheet workbooks you create. The default is **true** (changes enabled). Uncheck the check box to prevent others from making changes to your workbooks.

- 41. **Public Save.** Check the **Public Save** check box to enable others to save changes to any new JSheet workbooks you create. The default is **true** (saving changes enabled). Uncheck the check box to prevent others from saving changes made to your workbooks.
- 42. **Number of Sheets.** Select the number of worksheets that are available in a workbook. A workbook can contain a maximum of 256 sheets; the default is **3**.

Client Preferences

Client preferences control the display of the components of the workbook window (the format bar, formula bar, and status bar). Cell update tracking and duration are also established via the **Client** tab.

- 43. **Show Format Bar.** Check the **Show Format Bar** check box to display the JSheet format bar. The default is **true** (display format bar). Uncheck the check box to hide the format bar.
- 44. **Show Formula Bar.** Check the **Show Formula Bar** check box to display the JSheet formula bar. The default is **true** (display formula bar). Uncheck the check box to hide the formula bar.
- 45. **Show Status Bar.** Check the **Show Status Bar** check box to display the JSheet status bar. The default is **true** (display status bar). Uncheck the check box to hide the status bar.
- 46. **Cell Update Tracking.** Select an option from the **Cell Update Tracking** dropdown to activate the tracking of numeric changes made to your worksheets. When this option is activated, you must specify the **Cell Tracking Up Color**, the **Cell Tracking Down Color**, and the **Cell Tracking Duration** preference

Chapter 2: The JSheet Environment

options. The default for this option is **None** (no cell update tracking).

47. **Cell Tracking Up Color.** To see any changes that are made to the values in the cells of your worksheets, activate the **Cell Update Tracking** preference option. Right-click the **Cell Tracking Up Color** color box to display the color picker. Select the color to use when the change results in an increase in the cell's value.
48. **Cell Tracking Down Color.** To see any changes that are made to the values in the cells of your worksheets, activate the **Cell Update Tracking** preference option. Right-click the **Cell Tracking Down Color** color box to display the color picker. Select the color to use when the change results in a decrease in the cell's value.
49. **Cell Tracking Duration (seconds).** Select the frequency, in seconds, at which you want cell updates to be tracked. The default is **2** seconds. This option is active only if a **Cell Update Tracking** option is selected.
50. **Broken Connection Timeout (seconds).** Select the number of seconds at which a broken connection is timed out. The default is **20** seconds.
51. **Rollover Year.** Use this option to specify the 100-year period for which 2-digit year input is allowed. The default is **1950**.

CHAPTER 3: JSHEET FILE ACTIONS

JSheet file actions allow you to create, open, close, and save workbooks that contain worksheets. You can also open documents from other applications and save workbooks in foreign formats. All of the file actions discussed in this chapter are performed using commands in the **File** menu.

Creating New Workbooks

You can create new workbooks at any time while working in JSheet. To create a new workbook, choose **File/New**; the **New Workbook** dialog box is displayed. In the dialog box, you can specify the book name, a template to use, public access, and whether the new book can be shared. Press **OK** and a blank workbook that contains three worksheets is displayed on the screen. This workbook becomes the current window. By default, the new workbook is given the name **Book.jss**.

Tip: You can select the **Workbook** tab in the **Preferences** dialog box to change the default setting for the number of worksheets

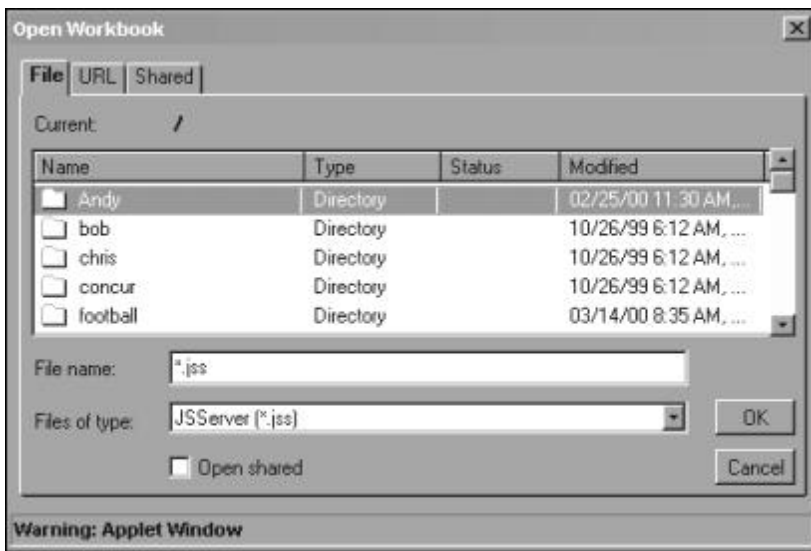
Chapter 3: JSheet File Actions

displayed in a workbook. The maximum number of worksheets you can have in one workbook is 256.

Opening Existing Files

At any time while you are working in JSheet, you can choose to open network files or additional workbooks that you have saved to a file or that reside on the server. You do not have to close a workbook to open another workbook. To open a workbook or network file, select **File/Open** from the JSheet Menu. As shown in the following illustration, the **Open Workbook** dialog box contains three tabs: **File**, **URL**, and **Shared**.

Figure 3-1



To open a workbook saved on your system:

1. In the **Open Workbook** dialog box, select the **File** tab.
2. Select and open the directory in which the file is stored.
3. Click the **Files of type** popup menu to select the type of file to be displayed in the dialog box. By default, all JSheet files are displayed; you can also open text files and Wingz, DIF, SYLK, Excel, and Lotus 123 worksheets.
4. Select the file you want to open and click **OK**.

To open a network file:

5. In the **Open Workbook** dialog box, select the **URL** tab.
6. Specify the location of the network file by entering the full URL.
7. Click **OK**.

To open a shared file:

8. In the **Open Workbook** dialog box, a list of files that are currently open and available for sharing is displayed under the **Shared** tab.
9. Select the file you want to share and click **OK**.

TIP: To open as shared a file that is not listed under the **Shared** tab, click the **File** tab, select the file you want to open, check the **Open Shared** check box, and click **OK**.

Opening Files Created in Other Programs

As previously mentioned, JSheet can open files created in other programs and saved in formats other than the JSheet workbook format. The following table describes the file formats JSheet recognizes, as well as the elements within the files that are supported by JSheet.

File Type	File Information
Wingz	Files created with Wingz are opened with all numbers, text, formatting, formulas, objects, and attached scripts intact.
DIF	Files created in this format are opened with numbers and text intact.
SYLK	Files created in this format are opened with numbers and text intact. All formulas are retained except for those not supported by JSheet. Formulas that are not supported by JSheet appear as text.
Excel	Files created with Excel are opened with all numbers and text intact; number and text formats are retained. All formulas are retained except those not supported by JSheet. Formulas that are unsupported by JSheet appear as text.
123-1a	Files created with Lotus 1-2-3, version 1a, are opened with all numbers and text intact. Number and text formats are also retained. All formulas are retained except for those not supported by JSheet Builder. Formulas that are unsupported by JSheet Builder appear as text.
123-2.0	Files created with Lotus 1-2-3, version 2.0, are opened with all numbers, text, and their formats intact. All formulas are retained except for those not supported by JSheet Builder. Unsupported formulas are read as text.
Text	Text files retain all numbers and text. Use the Text dialog box to enter the delimiter you want to use.

Saving Workbooks

Right-click to select **File/Save** or **File/Save As** to specify where the workbook is saved, the name it is given, and the file format used. When you save a workbook, all worksheets, text, numbers, formulas, formatting, page setup and report specifications, objects, charts, passwords, and attached scripts are saved with the file.

When you initially save a workbook, the **Save Workbook** dialog box appears, and you are prompted to specify where and how the file is to be saved.

Saving Workbooks in Foreign Formats

When you save a workbook, by default it is saved in JSheet format. If you want to save your workbook so it can be used in other programs, you can select a different file format. The following table describes the formats available for saving your workbook.

Tip: Chart types and chart elements (such as, titles, footnotes, or axis titles) added to a chart with the Workbook Builder interface take advantage of new charting features. Because these features were not available in Wingz 2.0, these chart elements are not saved when you save a worksheet as a Wingz 2.0 worksheet.

Format Type	Format Information
Wingz 2.0	Files saved in this format retain all Wing 2.0 supported worksheets, numbers, text, formats, and formulas. Only the current worksheet is saved.
Wingz 3.0	Files saved in this format retain all Wingz 3 supported workbooks, worksheets, numbers, text, formats, and formulas.
DIF	Files saved in this format retain only worksheet text and numbers. Only the current worksheet is saved.
SYLK	Files saved in this format retain all numbers and text, as well as supported formatting and formulas. Only the current worksheet is saved.
Excel	Files saved in this format retain all numbers, workbooks, text, and supported functions. Supported formatting and formulas are also retained. Charts and objects are not saved. All worksheets in the current workbook are saved.
123-1a	Files saved in this format retain worksheet numbers, text, and Lotus 123 supported formats. Formulas supported by this version of Lotus 123 are also retained. Only the current worksheet is saved.
123-2.0	Files saved in this format retain worksheet numbers, text, and Lotus 123 supported formats. Formulas supported by this version of Lotus 123 are also retained.

HTML	Files saved in this format retain all numbers, text, formats, and objects.
Text	Files saved in this format retain only worksheet text and numbers.

Closing Workbooks

Closing a workbook removes the workbook from your screen. To close a workbook, select **File/Close**.

If no changes have been made to a workbook since the last time it was saved, the workbook closes. If changes have been made since the last save, a dialog box appears that prompts you to save or discard the changes before the workbook is closed.

CHAPTER 4: ENTERING DATA

Once you have become familiar with the JSheet environment, you are ready to enter data. There are several types of data that can be entered in a workbook including numbers, text, and formulas.

Entering Data into a Cell

Because a selected cell is also the current cell, it is ready for data input. The data can be text, numbers, or formulas. A maximum of 255 characters can be entered into a cell.

To enter data into a cell, type the data you want to place in the cell. Press the `ENTER` key or click the **Accept Entry** button to enter the data into the cell.

When you use the **Accept Entry** button to enter data into a cell, the selected cell remains the current cell. When you use `ENTER` to enter data into a cell, the current cell moves down one cell in the column. Alternatively, you can press `TAB` to enter data into a cell and move the current cell right one cell in the row.

If you make an error while entering data, use `BACKSPACE` to move the insertion point backward and delete characters from the entry

field. Or, position the pointer on the entry field data, click to reposition the insertion point at the point where the error was made, and then make the correction.

Entering Data into a Range

Because a range is a group of cells, entering data into a range is similar to entering data into a cell. However, when entering data into a selected range, you need to move the current cell to each cell in the range so data can be entered throughout the range. Moving the current cell through a range is referred to as stepping through the range.

Stepping Through a Range

If you use **TAB** to accept data, you step through a range, by columns, from left to right. **SHIFT TAB** steps you through a range, by columns from right to left.

Positioning the Current Cell

When you enter data into a range, the current cell receives data first. If the current cell is not where you want to begin to enter data in the range, press **TAB** or **SHIFT TAB** to move the position of the current cell to the point where you want to enter data.

Entering Range Data

To enter data into a range, type the data you want to place in the first cell. Press **TAB** or **SHIFT TAB** to enter the data into the range and move the current cell to the next cell in the range. When data is entered into all of the cells in the range in consecutive order, the current cell returns to the first cell into which you entered data.

Defining Data Types

Text and numbers are the basic types of worksheet data. Data that includes letters, punctuation marks, or symbols is considered text. Data that includes only numeric characters is considered a number. Data that includes numeric characters and letters, punctuation marks, or symbols is considered text.

A third type of worksheet data is a formula. Formulas combine text and numbers and perform some type of calculation or evaluation. Formulas are always preceded by an equal sign (=). Refer to *Chapter 5, Creating Formulas* for information on using formulas in JSheet.

Entering Text

Text can be entered at any location on your worksheet. Most often, text is used as a label for a column or row of numeric data. Sometimes numbers are used as text. To enter a string of numeric characters as text, precede the characters with a double quotation mark (").

Entering Numbers

JSheet recognizes both positive and negative numbers. To enter a positive number, enter only the string of numeric characters. (You can precede the number with a plus sign (+), but it is not necessary.) To enter a negative number, you must precede the string of numeric characters with a minus sign (–).

Important: When you enter a number, do not include currency symbols or thousands separators; doing so causes the data to be recognized as text. The only character other than numeric characters that can accompany a number is the decimal separator. The default decimal separator is the period (.) Currency symbols and thousands separators are added to a number when it is formatted. The number appears in the worksheet according to the default number format specified in the **Format** tab of the **Preferences** dialog box.

Entering Dates

Dates are a type of number. There are several methods for entering a date. JSheet recognizes the abbreviations of months and years, and the numeric representation of months. You can also use hyphens (-), slashes (/), and periods (.) as separators. For example, to enter the date September 11, 1999, you can enter 9/11/99, 9-11-99, 9.11.99, September 11, 1999, or 11-September-99.

The date appears in your worksheet according to the default format specified in the **Format** tab of the **Preferences** dialog box. To change the format used to display dates in your current worksheet, right-click to display the JSheet Menu. Then, select **Edit/Number Format** from the menu and make the change in the **Number Format** dialog box.

Entering Times

Time is also a type of number. You can enter time with hours, minutes, and seconds. JSheet recognizes only the colon (:) as a separator for time entries.

Time can be entered with an AM or PM designation following the time (e.g., 10:45AM or 10:45PM) or it can be entered using the 24-hour format. For example, 10:45 PM also can be entered as 22:45.

Tip: Do not use periods when you enter AM and PM (e.g., a.m. or A.M.). When you use periods with an AM or PM designation, the time is read as a text string rather than as a number.

Editing Workbook Data

After you enter data into a workbook, you can replace the data in a cell or edit parts of the data. Workbook data is edited using the entry field. To edit data entered into a cell, double-click the cell and change the data as needed.

To edit data in the formula bar:

10. Select the cell that contains the data you want to edit.
11. Position the pointer in the entry field at the point where you want to begin to edit. The pointer appears as an I-beam when positioned in the entry field.
12. Click to place an insertion point in the entry field. Or, click and drag to highlight the section of the entry field you want to edit. You can use BACKSPACE or DELETE to delete text adjacent to the insertion point. Or, you can type to insert text at the insertion point. If you select a section of data, the entire section of data is deleted if you press BACKSPACE or DELETE, or begin typing.
13. Enter your changes in the entry field.

14. Click the **Accept Entry** button or the ENTER key to enter the edited data in the worksheet. If you do not want to enter the edited data in the worksheet, click the **Cancel Entry** button.

Linking Worksheets

A cell in your worksheet can reference a cell in any worksheet in that workbook. A reference to a cell in another worksheet is called an external reference. Worksheets that contain external references are called linked worksheets.

A cell with an external reference displays the data from the external worksheet it references. When a cell with an external reference is the current cell, the entry field displays the name of the worksheet and cell to which it is linked.

To link worksheets:

15. Open the workbook that contains the worksheets you want to link.
16. Select the cell in which you want to place the external reference.
17. Enter an equal sign (=), the name of the worksheet followed by an exclamation point (!), followed by the cell to be linked.
18. Press RETURN or click the **Accept Entry** button to enter the external reference.

The examples below are of formulas that contain links to other worksheets.

Examples

=sheet3!B5

=sum(sheet5!A9, sheet6!A1)

CHAPTER 5: CREATING FORMULAS

In addition to providing the ability to create and store data and graphical information, formulas allow you to put that data and information to work quickly and efficiently.

This chapter teaches you how to use formulas, the keys that unlock the power of your JSheet workbooks. Read this section to learn how to:

- 52. identify the various components of a JSheet formula.
- 53. include functions in your formulas.
- 54. use numbers, strings, and worksheet ranges as arguments.
- 55. use the JSheet operators.
- 56. determine formula evaluation orders.

Introducing Formulas

A formula is composed of one or more functions, numbers, strings, ranges, operators, or any combination of these components. A formula performs a calculation on data and provides the result of that calculation. The data is evaluated and calculated in the order of precedence defined by JSheet. The result of the calculation is then placed in the worksheet cell where the formula is entered. The following table describes the components of a formula.

Component	Description
Function	Built-in JSheet functions are used to calculate mathematical operations and evaluate worksheet information.
Number	This component provides the numeric data on which formulas perform calculations.
String	This component provides the textual data on which formulas perform calculations.
Range	This component references ranges of worksheet cells that contain data used in formula calculations.

Entering Formulas

You can enter formulas directly into a worksheet cell or into the Formula Bar. When entering a formula, the formula is preceded by an equal sign (=), as shown in the following illustration. This formula adds the values in cells A1 through A5 and places the total in the cell containing the formula (A6).

Figure 5-1



Combining Components in Formulas

Combining components in formulas allows you to produce more complex calculations and evaluations. These formulas allow the various operators, functions, and data to interact to provide specific information for your worksheet.

When you combine components in a formula, it is important to make certain the components interact to produce the type of data needed to complete the formula calculation. For example, built-in functions return specific types of data (such as, numbers, strings, or ranges). The type of data returned must be appropriate to the formula calculation. The following examples illustrate the uses of functions in formulas.

Example

```
=ADDDYEARS(30936, 19)
```

This example shows the most basic use of a function. The ADDYEARS function is shown with numbers used for its two arguments. The first number (30936) is a serial date number representing the date September 11, 1984. The second number is the number of years (19) to be added to that date.

Example

```
=ADDDYEARS(DATEVALUE("September 11, 1984"), 19)
```

This example uses a function as an argument for another function. DATEVALUE is used for the first argument of the ADDYEARS function. DATEVALUE converts the string "September 11, 1984" to a

Chapter 5: Creating Formulas

serial date number. ADDYEARS then adds 19 years to this number, as specified by the second argument.

Example

```
=(ADDYEARS(DATEVALUE("September 11, 1984"), 19)) >= 33832
```

This example performs the same calculation as the previous example and evaluates the result against another number through the use of a relational operator ($>=$). The result of the ADDYEARS calculation is 37875. The formula evaluates this result to determine if it is greater than or equal to ($>=$) the serial date number 33832.

Evaluation Order in Formulas

When you use more than one component in a formula, JSheet evaluates and calculates the formula in an order of precedence. This order is defined in the following table.

Order of Precedence	Description
1 Parentheses	Items surrounded by parentheses are given highest precedence. If parentheses are nested within our parentheses, the inner level receives the higher precedence.
2 Measurement operators	Numbers with measurement operators (INCH(ES), MIL(S), POINT(S), DECIPOINT(S), OR MILLIMETER(S)) are converted to twips.
3 Exponentiation	Exponential numbers are calculated.
4 Negative/Positive	The negative or positive state of numbers is considered.
5 Multiplication/ Division	Numeric operations involving multiplication (*) or division (/) are calculated.
6 Addition/ Subtraction	Numeric operations involving addition (+) or subtraction (-) are calculated.
7 Relational Evaluation	Evaluations involving relational operators (=, >, >=, <, <=, <>) are performed.
8 Unary Logical	Evaluations involving the logical operator NOT are performed.
9 String or Logical	String concatenation (&) or logical evaluation involving the logical operators AND and OR are performed.

It is important to understand the order of evaluation when combining components in formulas. The order of precedence can easily change the order of formula evaluation, and ultimately, the formula's result.

Using Functions in a Formula

JSheet provides a set of built-in workbook functions. To access these functions, right-click to display the JSheet Menu and then select **Edit/Paste Function** to display the list of available functions. The functions can be used alone or in combination with other data in a formula.

Function Arguments

Each function has a unique name and set of data on which it performs calculations. This data is referred to as an argument. Arguments can be numbers, strings, or ranges.

Arguments are enclosed in parentheses. A function that requires no arguments must be followed by a set of empty parentheses. When multiple arguments are required, commas must separate the items in the argument list. The following formulas contain functions that require no arguments.

Examples

```
=NOW() +3  
=RAND()  
=PI()
```

Chapter 5: Creating Formulas

The following formulas contain functions that require arguments.

Examples

```
=INT(24.5970)  
=ROUND(B7,2)  
=MAX(C6, sheet5!B9, (sheet7!K12+sheet4!F6))
```

Functions can be entered in either uppercase or lowercase letters. In this Guide, functions are shown in uppercase and arguments are shown in lowercase.

Pasting Functions in a Formula

Instead of typing functions in your worksheet cells, you can paste functions in cells using the **Paste Function** dialog box.

To paste a function:

19. Right-click to display the JSheet Menu and choose **Edit/Paste Function**. The **Paste Function** dialog box provides a list of the JSheet workbook functions, grouped by type.
20. Select a function type from the **Category** list box to display a list of functions in the **Name** list box.
21. Click a function name to select that function. Click the scroll bar to the right of the list box to scroll through the functions. When you select a function, the arguments required for the function are displayed below the list boxes.

22. Click **Paste** to paste the selected function into the current cell in your worksheet.
23. After you paste the function from the **Paste Function** dialog box, you must replace the arguments with valid data or cell references to properly calculate the function.

Using Numbers in Formula Arguments

A number in a formula argument can be any numeric value (such as, 5, 400,000, or -3482). The number is calculated according to the operators and functions in the formula.

Dates and times are also considered numbers. JSheet uses a special type of number, called a serial date number, to represent dates and times. The serial date number is the number of days that have passed since December 30, 1899, and can be any number from 0 (December 30, 1899) to 401768 (December 31, 2999). A negative serial date number is evaluated as a date prior to December 30, 1899.

The fractional portion of a serial date number represents time. For example, 0 represents midnight, .5 represents noon, .75 represents 6:00 p.m., and .875 represents 9:00 p.m. Therefore, the date number 34764.65 represents 3:36 p.m. on March 6, 1995. This can be demonstrated by placing 34764.65 into a cell, formatting the cell (**Edit/Number Format**), and selecting the date format picture of “**3/4/98 1:30 PM.**” When **OK** is clicked, **3/6/95 3:36 PM** appears in the cell.

Using Strings in Formula Arguments

Strings in formula arguments are surrounded by a set of double quotation marks (" "). Although strings are usually comprised of alphabetic characters, they can also be numbers or combinations of alphabetic and numeric characters.

When a number is surrounded by a set of double quotation marks, JSheet recognizes it as a string and does not recognize its numeric value. Zip codes, social security numbers, and telephone numbers are examples of numbers often entered as strings. The following formulas contain numbers entered as text.

Examples

```
= "09812"  
= "816-541-3298"
```

Using Ranges in Formula Arguments

Ranges in formula arguments refer to worksheet cells that contain data to be used in a formula. A range can contain multiple cells (e.g., D3..F11) or a single cell (e.g., A1, B5, or C9).

For example, if the value in A1 is **6**, the value in B1 is **8**, and the value in C1 is **2**, the formula **=(A1 + B1)/C1** returns the number **7**. The formula is calculated and the result is a numeric value.

Identifying Types of Range References

References to ranges can be relative (for example, **C2** or **A1..D4**), absolute (**\$C\$2** or **\$A\$1..\$D\$4**), or combined (**C\$2** or **\$A1..\$D4**). If a formula that contains a relative range is copied and pasted, the

range is modified to preserve the cell relationships. If a formula that contains an absolute range is cut or copied and pasted, the range does not change. If a formula that contains a combined reference is cut or copied and pasted, only the column or row that is absolute does not change.

You can enter a range in a formula by typing the reference or by selecting the range in the worksheet.

Using Ranges on Linked Worksheets

Ranges from other worksheets can be included in formulas. These range references are called external references. You can reference a range in any worksheet in the current workbook.

Using Operators in a Formula

The operator you use in a formula defines the type of calculation or evaluation to be performed by the formula. Additionally, the operator determines the amount of numbers, ranges, or strings required by the formula. The five types of JSheet operators are described in the following table.

Operator	Definition
Numeric	These operators perform arithmetic operations on numbers. The numeric operators are: Addition (+), Subtraction (-), Multiplication (*), Division (/), and Exponentiation (^).
Logical	These operators evaluate a formula and return 1 if the evaluation is true and 0 if the evaluation is false. The logical operators are: AND - Requires values on both sides of the operator. Returns 1 only if both values are true. OR - Requires values on both sides of the operator. Returns 1 if either value is true. NOT - Requires only one value. Returns 1 when the comparison is false.

Chapter 5: Creating Formulas

Text	This operator concatenates strings. The ampersand (&) is the concatenation operator.										
Measurement	<p>These operators convert numbers to twips (1/1440th of an inch or 1/20th of a point), the standard JSheet measurement. The measurement operators are:</p> <table><tr><td>INCH(ES)</td><td>Converts inches to twips.</td></tr><tr><td>MIL(S)</td><td>Converts 1/1000th of an inch to twips.</td></tr><tr><td>POINT(S)</td><td>Converts 1/72nd of an inch to twips.</td></tr><tr><td>DECIPOINT(S)</td><td>Converts 1/10th of a point to twips.</td></tr><tr><td>MILLIMETER(S)</td><td>Converts millimeters to twips.</td></tr></table>	INCH(ES)	Converts inches to twips.	MIL(S)	Converts 1/1000th of an inch to twips.	POINT(S)	Converts 1/72nd of an inch to twips.	DECIPOINT(S)	Converts 1/10th of a point to twips.	MILLIMETER(S)	Converts millimeters to twips.
INCH(ES)	Converts inches to twips.										
MIL(S)	Converts 1/1000th of an inch to twips.										
POINT(S)	Converts 1/72nd of an inch to twips.										
DECIPOINT(S)	Converts 1/10th of a point to twips.										
MILLIMETER(S)	Converts millimeters to twips.										
Relational	These operators evaluate two numbers, ranges, or strings to determine whether they meet the criteria of the given operator. If the criteria are met, 1 (true) is returned. If the criteria are not met, 0 (false) is returned. The relational operators are: Equal to (=), Greater than (>), Greater than or equal to (>=), Less than (<), Less than or equal to (<=), and Not equal to (<>).										

The following examples demonstrate how the JSheet operators can be used in your worksheet.

Numeric Examples	Definition
45 + 183	Adds 45 and 183 .
A4 – D7	Subtracts the contents of cell D7 from the contents of cell A4 .
23 / A4	Divides 23 by the contents of cell A4.
C5 ^ 4	Calculates the contents of cell C5 to the fourth exponential power.

Logical Examples	Definition
B2 > 4 AND C4 < 12	Returns 1 (true) if the contents of cell B2 is greater than 4 and the contents of cell C4 is less than 12; returns 0 (false) if either portion of the formula is not true.
C7 = B12 OR A2<10	Returns 1 (true) if the contents of cell C7 equals the contents of cell B12 or the contents of cell A2 is less than 10; returns 0 (false) if both portions of the formula are not true.
NOT B1>3	Returns 1 (true) if the contents of cell B1 is less than or equal to 3, returns 0 (false) if the contents of cell B1 is greater than 3.

Text Examples	Definition
----------------------	-------------------

"Lenexa, "&"Kan"	Concatenates the two strings in the example to produce the string "Lenexa, Kan" .
"Stock No. "&A2	Concatenates the string "Stock No. " and the contents of cell A2.

Measurement Examples	Definition
1 INCH + 3 POINTS	Converts 1 inch to 1440 twips and converts 3 points to 60 twips; the results are added together.
10 MILS + B2	Converts 10 milliinches to 14.40 twips. The result is added to the value in cell B2 .

Relational Examples	Definition
34 + 24 > B2	Returns 1 (true) if the sum of 34 and 24 is greater than the value in cell B2 ; returns 0 (false) if the sum of 34 and 24 is less than or equal to the value in cell B2 .
E5 <> A2 + C4	Returns 1 (true) if the value of cell E5 is not equal to the sum of the values in cells A1 and C4 ; returns 0 (false) if the value of cell E5 is equal to the sum of the values in cells A2 and C4 .

Understanding Error Messages

Formulas that cannot be calculated or evaluated return errors. Errors can be caused by using the incorrect syntax for a function, providing incorrect data for a formula, or using an incorrect operator.

When a formula returns an error, the error (**ERR number**) appears in the cell where the formula was entered. *Number* refers to a particular error message in the JSheet error message list.

CHAPTER 6: CUT, COPY, AND MOVE DATA

JSheet provides multiple methods for moving and copying data in your workbooks. You can perform simple cut, copy, and paste tasks; you can drag-and-drop blocks of data; or you can perform more complex tasks that clear and paste individual elements of your data. You can also insert or delete rows and columns of data, or move data between worksheets.

Cutting Data

To cut data, select the range containing the data that you want to cut, right-click to display the JSheet Menu, and choose **Cut** from menu. Data from the selected range is removed from the worksheet and placed on the clipboard. The range that contained the cut data is now empty. The formatting associated with the data is also removed.

Tip: You can also use the shortcut key combination CTRL X to execute the **File/Cut** command.

Copying Data

To copy data, select the range containing the data that you want to copy, right-click to display the JSheet Menu, and choose **Copy** from the menu. A copy of the data from the selected range is placed on the clipboard. The selected data remains in the worksheet, along with the formatting associated with the data.

Tip: You can also use the shortcut key combination CTRL C to execute the **File/Copy** command.

Copying Data Across Ranges

Copying data across a range allows you to duplicate data from the top row or left column of a selected range and copy it across the range.

To copy data across a range:

24. Select the range across which you want to copy data.
25. Right-click to display the JSheet Menu and choose **Edit/Copy Right** to copy the data in the left column across the selected range.
26. Right-click to display the JSheet Menu and choose **Edit/Copy Down** to copy the data in the top row down the selected range.

Tip: You can also use the shortcut key combination CTRL R to execute the **Edit/Copy Right** command and CTRL D to execute the **Edit/Copy Down** command.

Chapter 6: Cut, Copy, and Move Data

If the data you copy contains formulas with relative references, the references are updated as the formulas are copied. If the range across which data in the top row or left column is copied contains other data, the other data is overwritten by the copied data.

The following illustrations demonstrate the effect of copying data across a selected range. The first worksheet shows a selected range before **Edit/Copy Right** is executed. The second worksheet shows the result of the action.

Figure 6-1

	A	B	C	
1	1.00			
2	2.00			
3	3.00			
4	4.00			
5	5.00			
6	6.00			
7				

Figure 6-2

	A	B	C	
1	1.00	1.00	1.00	
2	2.00	2.00	2.00	
3	3.00	3.00	3.00	
4	4.00	4.00	4.00	
5	5.00	5.00	5.00	
6	6.00	6.00	6.00	
7				

The next two illustrations show the effect of using the **Edit/Copy Down** option. The first worksheet shows a selected range before the copy option is used. The second worksheet shows how the data in the top row of the selected range is copied down the range.

Figure 6-3

Chapter 6: Cut, Copy, and Move Data

	A	B	C	
1	1.00	2.00	3.00	
2				
3				
4				
5				
6				
7				

Figure 6-4

	A	B	C	
1	1.00	2.00	3.00	
2	1.00	2.00	3.00	
3	1.00	2.00	3.00	
4	1.00	2.00	3.00	
5	1.00	2.00	3.00	
6	1.00	2.00	3.00	
7				

Pasting Data

To paste data, select the range in which you want to place the data that is on the clipboard. You can select a single cell or a range of cells for pasting the data. Then, right-click to display the JSheet Menu and choose **Paste** from the menu.

Tip: You can also use the shortcut key combination CTRL V to execute the **File/Paste** command.

The data you cut or copied to the clipboard is placed in the worksheet range you selected. You can repeat this procedure as many times as you need to paste multiple copies of the data from the clipboard. The data remains on the clipboard until you cut or copy another range of data or an object.

How data from the clipboard is pasted into the worksheet depends on the size of the range into which you are pasting the data. The following illustrations demonstrate data pasted into a single cell, a range larger than the clipboard data range, and a range smaller than the clipboard data range.

In the first illustration, the range A1..C4 was selected and copied to the clipboard. In the second illustration, cell A8 was selected when the **Paste** command was chosen from the JSheet Menu. When a single cell is selected, the data is pasted into as many cells as needed, with the selected cell serving as the top left cell of the range. Any data in these cells is overwritten by the pasted data.

Figure 6-5

	A	B	C	
1	1.00	5.00	9.00	
2	2.00	6.00	10.00	
3	3.00	7.00	11.00	
4	4.00	8.00	12.00	
5				

Figure 6-6

	A	B	C	
7				
8	1.00	5.00	9.00	
9	2.00	6.00	10.00	
10	3.00	7.00	11.00	
11	4.00	8.00	12.00	
12				

In the next illustration, the range A8..C9 was selected when the **Paste** command was chosen from the JSheet Menu. When the

Figure 6-7

Chapter 6: Cut, Copy, and Move Data

selected range is smaller than the data range, the pasted data is truncated to fit the selected range.

	A	B	C
7			
8	1.00	5.00	9.00
9	2.00	6.00	10.00
10			
11			

In the following illustration, the range A8..C13 was selected when the **Paste** command was chosen from the JSheet Menu. When the selected range is larger than the clipboard data range, the pasted data is repeated until the selected range is filled.

Figure 6-8

	A	B	C
7			
8	1.00	5.00	9.00
9	2.00	6.00	10.00
10	3.00	7.00	11.00
11	4.00	8.00	12.00
12	1.00	5.00	9.00
13	2.00	6.00	10.00
14			

Pasting Data Between Worksheets

Data that has been cut or copied from one worksheet can be pasted into another worksheet in the open workbook. After cutting or copying the data from the worksheet, click the name tab for the worksheet into which you want to paste the data. Select the cell or

range into which you want to paste the data, right-click to display the JSheet Menu, and choose **Paste** from the menu.

Pasting Selected Data Elements

When data is pasted from the clipboard into a cell in your worksheet, the clipboard data, plus any associated formatting, is pasted. To paste only the data or only the formatting from the clipboard to the selected cell(s), you can use the **Paste Special** commands.

If the clipboard data contains numbers, you can also use **Edit/Paste Special** commands to add, subtract, multiply, or divide the clipboard data values with numbers in your worksheet.

To use Paste Special:

27. Select the range that contains the data on which you want to perform a special paste.
5. Right-click to display the JSheet Menu and choose **Edit/Paste Special** to display the **Paste Special** dialog box.
6. Select the desired **Paste** or **Operation** action and click **OK**.

Moving Data

You can use a drag-and-drop technique, a combination of cut-and-paste commands, or a combination of copy-and-paste commands to move worksheet data.

Chapter 6: Cut, Copy, and Move Data

- 57. Use the cut-and-paste combination or the drag-and-drop technique if you want to remove data from its original location and place it in another location in the worksheet grid.
- 58. Use the copy-and-paste combination if you want to leave data in its original location and place a copy of the data in another location in the worksheet grid.

To use the drag-and-drop technique:

- 28. Select the range that contains the data that you want to move.
- 7. Drag the cursor to the bottom right corner of the selected range. (Notice a small box appears at the bottom right corner of the selected range.)
- 8. Drag the block of data to the location in your worksheet where you want to move the data. (Notice that a green block appears to indicate where the block of data is being moved.)
- 9. When the block is in the correct location, drop the data into the indicated location by releasing the mouse button. The range of data is displayed in the new location.

Deleting Data

If you want to remove data from your worksheet and do not want to paste the data in another location, you can use the **Clear** command. Unlike **Cut**, which removes data from your worksheet and places it on the clipboard, the **Clear** command removes the data and does not place it on the clipboard.

Chapter 6: Cut, Copy, and Move Data

To remove data from a worksheet, select the data to be removed, right-click to display the JSheet Menu, and choose **Clear** from the menu; the **Clear** dialog box is displayed. You can choose to remove all of the data, formatting, and formulas contained in the selection, or you can choose to remove only the data, only the formats, or only the formulas.

INDEX

A

Absolute cell references, 5-8
Accept Entry button, 2-5, 4-1, 4-5
Anchor cells, 2-3
Arguments in functions, 5-5

B

Begin Formula Entry button, 2-5
Buttons
 Accept Entry, 2-5
 Begin Formula Entry, 2-5
 Cancel Entry, 2-5

C

Cancel Entry button, 2-5, 4-5
Cell entry controls, 2-5
Cells
 addresses of, 2-2
 as ranges, 2-3
 current, 2-3
 entering data into, 2-5, 4-1
 entering formulas into, 2-5
 in worksheet grid, 2-2
 types of references, 5-8
Client preferences, 2-11
Closing workbooks, 3-6

Columns

 copying data across, 6-2
 labeling, 2-2
Combined range references, 5-8
Copying
 data across columns, 6-2
 data down rows, 6-2
Creating workbooks, 3-1
Currency symbols, 4-3
Current cell
 definition of, 2-3
 entering data into, 4-1
 positioning in range, 4-2
Cutting data, 6-1

D

Data

 copying, 6-1
 deleting, 6-1, 6-8
 editing, 4-4
 entering, 2-5, 4-1
 entering into a range, 4-2
 entering numbers, 4-3
 entering text, 4-3
 moving, 6-7
 pasting, 6-4
 pasting between worksheets, 6-6
 pasting selected elements, 6-6
 removing, 6-8

Data types, 4-2

Dates

- entering, 4-4

- formulas and, 5-7

Deleting data, 6-1, 6-8

DIF files

- opening worksheets from, 3-4

- saving worksheets as, 3-5

Documentation conventions, 1-2

E

Edit menu, contents of, 2-6

Editing data, 4-4

Entering formulas, 5-2

Entry field, 4-4

Error messages, 5-11

Excel files

- opening worksheets from, 3-4

- saving worksheets as, 3-5

Exporting workbooks, 3-5

External references, 4-5

- in formulas, 5-8

F

File menu, contents of, 2-6

Format preferences, 2-8

Formula bar, 2-4

- cell entry controls, 2-5

- entering data in, 2-5

Formulas

- combining components in, 5-2

- components of, 5-1

- dates in, 5-7

- defining data types, 4-3

- definition of, 5-1

- entering, 2-5, 5-2

- error messages in, 5-11

- external references in, 5-8

- functions in, 5-2, 5-4

- numbers as text in, 5-7

- numbers in, 5-2, 5-6

- operators in, 5-8

- order of precedence in, 5-4

- pasting functions in, 5-6

- ranges in, 5-2, 5-8

- text strings in, 5-2, 5-7

- times in, 5-7

Functions

- arguments in, 5-5

- built-in, 5-4

- formulas and, 5-2

- pasting, 5-6

H

HTML, saving worksheets as, 3-5

J

JSheet environment

- preferences, 2-7

- workbook window, 2-1

L

Labeling rows and columns, 2-2

Linking worksheets, 4-5

Logical operators, 5-9

Lotus 1-2-3 files

- opening worksheets from, 3-4

- saving worksheets as, 3-5

M

Measurement operators, 5-9

Moving data, 6-7

N

Navigating the worksheet grid,
2-3

Network files, opening, 3-3

New workbooks, 3-1

Numbers

as text in formulas, 5-7

currency symbols, 4-3

entering, 4-3

in formulas, 5-2, 5-6

thousands separators, 4-3

Numeric operators, 5-9

O

Opening

network files, 3-3

workbook files, 3-2

Opening foreign files, 3-4

Operators

in formulas, 5-8

types of, 5-9

P

Paste Function dialog box, 5-6

Pasting

data, 6-4

data between worksheets, 6-6

functions, 5-6

selected data elements, 6-6

Precedence, order of, 5-4

Preferences

client, 2-11

format, 2-8

setting, 2-7

workbook, 2-10

R

Ranges

addresses of, 2-3

anchor cells in, 2-3

copying data across, 6-2

definition of, 2-3

entering data into, 4-2

in formulas, 5-2, 5-8

positioning current cell in, 4-
2

stepping through, 4-2

types of references, 5-8

Relational operators, 5-9

Relative range references, 5-8

Rows

copying data down, 6-2

labeling, 2-2

S

Saving

workbooks, 3-4

workbooks in foreign

formats, 3-5

Sheet menu, contents of, 2-6

SYLK files

opening worksheets from, 3-4

saving worksheets as, 3-5

T

Text

- as numbers in formulas, 5-7
- entering, 4-3
- in formulas, 5-2, 5-7

Text files

- opening worksheets from, 3-4
- saving worksheets as, 3-5

Text operator, 5-9

Times

- entering, 4-4
- formulas and, 5-7

W

Wingz 2.0

- saving worksheets as, 3-5

Wingz 3.0

- saving worksheets as, 3-5

Workbook preferences, 2-10

Workbook window, 2-1

- formula bar, 2-4, 2-5
- worksheet grid, 2-2

Workbooks

- closing, 3-6
- creating, 3-1
- exporting, 3-5
- linking, 4-5
- opening, 3-2
- saving, 3-4

Worksheet grid, 2-2

- navigating within, 2-3

Worksheets

- opening foreign, 3-4