## **Creating Hypergraphics**

Using convetional graphics, you can define only one hot spot per graphic. Although that is useful, it limits the way in which you can link other kinds of information to pictures. Fortunately, Windows Help provides a tool that lets you define many hot spots using a single picture. This chapter describes how to add multiple hot spots to graphics so that they can link to other information in the Help file.

## What Are Hypergraphics?

A *hypergraphic* is a picture containing one or more hot spots. Like bitmap hot spots, hypergraphics let you use graphics instead of text to create links to other topics, display

information in pop-up windows, and execute Help macros. The difference between bitmap hot spots and hypergraphics is that, using hypergraphics, you can define multiple hot spots within the same picture to perform all these operations. In this way, creating hypergraphics extends the usefulness of graphics in your Help file.

Conceptually, a hypergraphic consists of two layers:

- A Windows bitmap or metafile
- One or more rectangular hot spots superimposed on the bitmap

The bitmap or metafile creates the picture that the user sees in the Help window, and the hot spots define regions within the picture that the user can interact with.

Here are just a few examples of how you might use hypergraphics in a Help file:

- Take a screen shot of a dialog box in your application and define hot spots for each field so that a user can click the hot spots and learn how to use the dialog box options.
- Create an illustration and add hot spots over different parts of the illustration that the user can click to see a description of the corresponding part.
- <sup>n</sup> Create a Contents screen or Help menu using a picture so that you can control the placement of text and graphics more precisely than

with paragraph formatting. Define hot spots over the appropriate Microsoft Windows Help Authoring Guide icons or jumps to give users access to the Help topics.

- Create a visual map and add hot spots that jump to topics on the different regions shown in the map.
- <sup>n</sup> Create buttons for each letter of the alphabet and arrange them in groups (as a typewriter keyboard does, for example). Use the button picture as a hypergraphic in an online index or glossary so that the user can click a letter and see the entries for that letter of the alphabet.
- <sup>n</sup> Create a series of pictures that depict different states of an action or simulation. Make each picture in the series a hypergraphic so that when the user clicks a hot spot the picture changes to show the new state (like a door opening and closing, for example).

The rest of this chapter explains how to create and add hypergraphics to your Help file.

> To create hypergraphics you use Hotspot Editor, an application that lets you open any standard Windows bitmap or metafile and add hot spots to it. You can then save the bitmap in hypergraphic format, with the picture and hot spots combined. Using Hotspot Editor, you can define hot spots that link to other Help topics and graphics, that execute a Help macro, or that access multimedia events (if provided for by

external DLLs). After you create a hypergraphic and save it with Hotspot Editor. you can add it to Help topics exactly like any other bitmap. The only restriction is that hypergraphic files produced by Hotspot Editor must be included by reference using the **bmc**, **bmr**, or **bml** format. (For an explanation of these formats, see Chapter 10, "Adding Graphics.")

Although you can create similar effects in the Help file by carefully creating and positioning several individual bitmaps next to each other and formatting each of them as hot spots, Hotspot Editor is more efficient and much easier to use. Using several bitmaps to simulate a single-image hypergraphic also has the drawback of requiring Help to perform multiple locating operations when displaying the topic. Usually this means Help must read the disk several times, slowing overall performance, especially on CD-ROM.

If you are creating a 3.0 Help file, you cannot use Hotspot Editor. In that case, see "Creating Hypergraphics Without Hotspot Editor," later in this chapter.

#### Starting Hotspot Editor

Hotspot Editor is an independent application that runs in the Windows operating system, so you can start it the same way you start other applications in Windows. If you selected the option to install the graphics tools when you installed Help Author, the setup program automatically creates a program item icon for Hotspot Editor in the Help Author group window of Program Manager.

#### To start Hotspot Editor

<sup>n</sup> Open the Help Author group in Program Manager and double-click the Hotspot Editor icon.

If you did not use the setup program to install Hotspot Editor, you can add a program item icon for it in a Program Manager group.

#### To create a program item for Hotspot Editor

- 1. Open the group in the Program Manager window where you want to add the program item.
- 2. From the File menu, choose New.
- 3. Select the Program Item option, and then choose OK.

The Program Item Properties dialog box appears.

- **Tip** To open this dialog box quickly, hold down the ALT key and double-click in an empty part of the group window.
- 4. Type **Hotspot Editor** in the Description box.
- 5. In the Command Line box, type **SHED.EXE** and include a path if the application is not in your Windows directory.

For example, you might type c:\hlptools\shed.exe

You can also use the Browse button and select the application filename from the directory where it is stored .

6. Fill in the remaining options in the Program Item Properties dialog box if you want to, and then choose the OK button.

For help with the Program Item Properties dialog box, choose the Help button or press F1 while using the dialog box.

#### Importing Image Files

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To create a hypergraphic, you must first import the graphic that you want to use to define hot spots. Because Hotspot Editor is not a draw or paint program (it's an editor only), you must create the actual graphic image outside Hotspot Editor. Hotspot Editor creates a hypergraphic (.SHG) file when the imported graphic image is saved.

Hotspot Editor can open and save any standard Windows bitmap (.BMP) or device-independent bitmap (.DIB) created by a Windows draw or paint program, such as Windows Paintbrush. If you are using Windows Paintbrush, you should save the image file as a monochrome bitmap or 16-color bitmap. Hotspot Editor is also compatible with standard Windows metafile (.WMF) files.

#### Note

If Hotspot Editor cannot open the file because it is in an unsupported format, you can take a screen shot of it, paste it into Windows Paintbrush, and then save it as a Windows bitmap. If you can't display the picture in Windows, you must use a conversion utility to convert the file to a supported format.

#### Note

If you change an image file after you have edited the graphic in Hotspot Editor, you can re-import the modified image file in Hotspot Editor without losing any hot spot information. For more information, see "Editing and Replacing Images," later in this chapter.

## Hotspot Editor Window

Hotspot Editor has a standard multiple document interface (MDI) window that lets you edit multiple graphic images at the same time. Each image that you open in Hotspot Editor is displayed in a separate document window. Switching from one document window to another does not affect previously selected windows. Likewise, actions performed on a document window affect only that window. Document windows can be minimized; Hotspot Editor displays, as accurately as possible, a reduced version of the image in the minimized window icon. The

status bar at the bottom of the Hotspot Editor window displays a brief description of the currently selected menu or command and attribute information for the currently selected hot spot.

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## **Hotspot Editor Menus**

Hotspot Editor has four menus: File, Edit, Window, and Help. The commands for these menus are described in the following lists.

#### The File Menu

Commands on the File menu let you open or save graphics files.

Command	 Description
Open	Opens existing 16-color bitmaps (.DIB or .BMP), metafiles (.WMF), or hypergraphics (.SHG). More than one graphic file can be open at one time.
Close	Closes the currently selected document window.
Save	Saves changes to a hypergraphic. Hotspot Editor displays a warning if you are overwriting the original bitmap.
Save As	Saves a hypergraphic under a different name. The default extension .SHG is used if one is not specified.
Exit	Exits Hotspot Editor.
File Names	Opens a previously edited image file or hypergraphic. Hotspot Editor lists the last four graphics you edited on the File menu.

## The Edit Menu

Commands on the Edit menu let you edit hot spots and define their attributes.

Command		
Undo	Undoes the last action you performed.	
Attributes	Displays the attributes for each hot spot. Attributes include the binding string, binding type, binding attribute, hot-spot identifier, and the bounding box coordinates. (For more information about hot-spot attributes, see "Adding Hot Spots to Bitmaps," later in this chapter.)	
Select	Displays a dialog box listing all the defined hot-spot IDs for the bitmap. You choose an item from the list to select a particular hot spot.	
Delete	Removes the currently selected hot spot.	
Cut	Removes the currently selected hot spot from the hypergraphic and places it in the Clipboard.	
Сору	Copies the currently selected hot spot and places it in the Clipboard.	
Paste	Pastes a graphic or hot spot from the Clipboard. If the Clipboard contains a graphic, it is pasted into Hotspot Editor. If the Clipboard contains a hot spot, it is pasted in the upper-left corner of the graphic. You can then move the hot spot to the desired	

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	11-7
Replace	Replaces the underlying bitmap in a hypergraphic without losing any hot spot information that has already been defined for the hypergraphic.
Preferences	Displays a dialog box that lets you set default values for the binding string, binding type, binding attribute, and hot-spot identifier options of the Attributes command.

## The Window Menu

Commands on the Window menu let you arrange and select Hotspot Editor windows and icons.

Command	Description	
Cascade	Arranges and resizes the open graphic windows so that each title bar shows.	
Tile	Arranges and resizes the open graphic windows so that they all fit in the workspace without overlapping.	
Arrange Icons	Aligns the graphic window icons evenly along the bottom of the main Hotspot Editor window.	
Window Names	Lists all the currently opened hypergraphic windows. To select a window and display its graphic, choose the window name from the list.	

#### The Help Menu

Microsoft Windows Help Authoring Gui©ommands on the Help menu display Help and copyright information for Hotspot Editor.

Command	Description
Contents	Displays the Contents topic for the Hotspot Editor Help file.
About	Displays information about the Hotspot Editor application, including copyright notice and version number.

If you are opening menus, the gray status bar at the bottom of the Hotspot Editor window displays information about the currently selected command. It also displays information about commands and hot spots.

Once you select a hot spot, the status bar displays the following information for that hot spot:

- n Context string
- Binding type
- Binding attribute
- <sup>n</sup> Hot-spot identifier
- Bounding box coordinates

## Opening Image Files

Before you can add hot spots to a bitmap with Hotspot Editor, you must first create an image file and then open it in Hotspot Editor to edit. To edit more than one image file at a time, open multiple files. Each file appears in its own document window in Hotspot Editor.

#### To open a new image file

1. From the File menu, choose Open.

The Open dialog box appears.

2. If the file is in the current directory, select the name of the file in the Files box.

If the file is not in the current directory, double-click the directory you want in the Directories box, and then select the name of the file in the Files box.

Hotspot Editor displays in the Files box only those files whose extensions match the supported file formats.

The current directory is shown below the File Name box. Double-clicking the two periods [..] at the top of the Directories box shows the files and directories located one level closer to the root directory.

3. Choose OK.

Instead of using the Files and Directories boxes to open a file, you can type the complete path in the File Name box, and then click OK.

#### Opening Previously Edited Files

Hotspot Editor records the last four files you opened. Their paths and filenames are displayed at the bottom of the File menu in Hotspot Editor.

You can open a previously edited file in two ways: either choose the file you want to open from the File menu or type the number that appears to the left of the file you want to open.

## Adding Hot Spots to Images

After opening an image file in Hotspot Editor, you can create hot spots that link to text, graphics, or multimedia events. You insert hot spots to the areas of the picture that you want to be hot, just as you determine what text you want to be hot in the topic files. For example, you might want to make a button in a screen shot a hot spot that creates a pop-up window when the user chooses the hot spot.

For each hot-spot you add to an image, you follow the same two steps.

#### To add a hot spot

## Microsoft Windows Help Authoring Guide Draw the hot spot rectangle on top of the image.

This defines the region that the user will click to activate the hot spot.

2. Define the properties for the hot spot.

This determines what action Help will take when the user choose the hot spot.

#### **Drawing Hot Spots**

A hot spot can be any rectangular area of the graphic image. Defining a hot spot is similar to drawing a rectangle in a draw or paint program.

#### To draw a hot spot on an image

1. Position the mouse pointer on the bitmap where you want to define a hot spot and press the left mouse button.

This creates the anchor for one corner of the hot-spot rectangle.

2. While holding down the left mouse button, drag the mouse until the rectangle encloses the area you want to define as the hot spot.

A flexible box stretches from the anchor point to the position of the mouse pointer, expanding and contracting as you move the mouse.

3. When you are satisfied with the size of the hot-spot rectangle, release the mouse button.

After you release the mouse button, the hot-spot rectangle displays eight sizing handles, indicating that it is the currently selected hot spot. You can use the sizing handles to resize the rectangle.

Your hot spot should look like the one in Figure 11.1.

## Graphic

You can draw hot spots so that they overlap each other; however, in the built Help file, only the top most hot spot is active in a stack of overlapped hot spots.

## Creating a Tabbing Order

In the built Help file, users can select the hot spots either with the mouse or with the keyboard. When using a keyboard, users press the TAB key to move from one hot spot to the next. This is called the *tabbing order*.

Hotspot Editor creates the tabbing order in the same order that you create the hot

#### To create a specific tabbing order

Define each hot spot in the same order you want users to follow in the built Help file.

#### Viewing the Tabbing Order

After you have created one or more hot spots, you can view the tabbing order by using the Select command on the Edit menu.

#### To view the tabbing order in a hypergraphic

<sup>n</sup> From the Edit menu, choose Select.

The Select dialog box appears, listing all the defined hot-spots in the hypergraphic. The hot spots are displayed in the order in which they were created, with the first hot spot at the top of the list box.

#### Changing the Tabbing Order

If you have already created hot spots in a hypergraphic, and later you want to change the tabbing order, you can use commands on the Edit menu to do so.

#### To change the tabbing order

1. From the Edit menu, choose Select.

The Select dialog box appears with the hot spots listed in the current tabbing order, as shown in Figure 11.x.

## **Graphic**

- 2. Select the hot spot that you want to move to the top of the tabbing order.
- 3. Choose the Select button.

The hot-spot rectangle displays eight sizing handles, indicating that it is the currently selected hot spot.

4. From the Edit menu, choose Delete.

Or press the DEL key.

The hot spot is deleted.

5. From the Edit menu, choose Undo.

The hot spot is restored to the hypergraphic, and it is moved to the top

of the tabbing order. To view the new tabbing order, use the Select Microsoft Windows Help Authoring Guide

6. From the Edit menu, choose Select to view the new tabbing order. The selected hot spot is at the top of the tabbing order, as shown in Figure 11.1.

## **Graphic**

**Note** If you did not assign unique identifiers to each hot spot, it may be impossible to tell that the tabbing order has changed.

7. Repeat steps 1—5 to move another hot spot.

## **Defining Hot-Spot Attributes**

After creating a hot spot, you must define its attributes in the Attributes dialog box. Hot-spot attributes include binding information for the hot spot, the hot-spot name, and the bounding box coordinates.

The following table describes the hypergraphic attributes.

Field	Description	
Context String	Specifies binding information for the hot spot, in the form of a context string or a macro.	
Туре	Indicates the type of action to be taken when the user chooses the hot spot. The four binding types are pop-up, jump, macro, and searchable.	
Attribute	Specifies whether the hot spot is to be visible or invisible when displayed to the user in the Help window. Hot spots are always visible in Hotspot Editor.	
Hotspot ID	Specifies a unique identifier for the hot spot. The hot-spot name is used internally by Hotspot Editor to make it easier to identify hot spots in the Select dialog box. Hotspot Editor assigns an incremental number to the hot-spot name; however, you can type	

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**Bounding Box Coordinates** 

Displays the coordinates for the hot-spot rectangle: left, right, top, and bottom. The coordinates are measured in pixels and are restricted to the size of the graphic image.

#### To define attributes for a hot spot

1. Select the hot spot and choose Attributes from the Edit menu.

Or click the hot spot with the right mouse button.

Or double-click the hot spot with the left mouse button.

Or select the hot spot and press ENTER.

The Attributes dialog box appears (Figure 11.2).

## Graphic

Note

If you use the right mouse button to define a hot-spot rectangle, Hotspot Editor displays the Attributes dialog box when you release the mouse button.

2. Complete the Attributes dialog box and choose OK.

The attributes defined for the hot spot appear in the Hotspot Editor status bar.

For more information about each attribute, see the preceding attributes table.

3. Repeat this process for each hot-spot region that you want to define.

#### To define a jump hot spot

- 1. From the Type list, choose Jump.
- 2. In the Context String box, type the context string of the topic Help jumps to when the user chooses the hot spot.
- 3. Choose OK.

#### To define a pop-up hot spot

1. From the Type list, choose Pop-up.

2. In the Context String box, type the context string of the topic that Help displays in the pop-up window when the user chooses the hot spot.

3. Choose OK.

#### To define a macro hot spot

- 1. From the Type list, choose Macro.
- 2. In the Context String box, type the macro (or macros) that Help executes when the user chooses the hot spot.

For a Help macro, type the macro. (For more information, see Chapter 15, "Help Macros.")

3. Choose OK.

#### To define a searchable hot spot

- 1. From the Type list, choose Searchable.
- 2. In the Context String box, type the keyword (or keywords) that you want to associate with this hypergraphic.

Separate each keyword with a semicolon. (For more information, see Chapter 6, "Creating Topics.")

3. Choose OK.

#### To define the appearance of the hot spot

Choose Visible or Invisible for the binding attribute.
 Visible hot spots are outlined in black or are displayed in inverse video.

2. Choose OK.

#### To change the default name assigned to the hot spot

1. In the Hotspot ID box, type the name you want to assign to the hot spot.

This name helps you identify the hot spots in the graphic if you use the Select command (described in the next section). If you don't enter a hot-spot name, Hotspot Editor appends a number at the end of the name Hotspot.

2. Choose OK.

#### To change the size or location of the hot spot

1. Edit the bounding box values.

2. Choose OK.

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#### **Setting Preferences**

When you define a hot spot, Hotspot Editor uses the binding information and hotspot identifier stored in the Preferences dialog box. To change the default values, edit them. Setting your own preferences for hot-spot attributes saves time and effort when creating hypergraphics that require settings different from Hotspot Editor's internal defaults. Hotspot Editor assigns the attributes you enter to subsequent hot spots created with these preferences.

The following table shows the default setting for each attribute.

Field	Default entry	
Context String	(Empty)	
Туре	Jump	
Attribute	Invisible	
Hotspot ID	Hotspot	

#### To change Hotspot Editor preferences

- 1. From the Edit menu, choose Preferences.
- 2. In the Context String box, type a context string or macro.
- 3. Select the binding type.
- 4. Select the binding attribute.

5. Type a hot-spot name.

Microsoft Windows Help Authoring Guide. This entry affects only the hot-spot name. Hotspot Editor continues to

assign numbers incrementally to each new hot spot.

6. Choose OK.

## **Editing Hot Spots**

After you create a hot spot, you can select it for editing and then cut, copy, paste, delete, resize, or move it. When editing hot spots, all attributes defined for the hot spot remain with the hot spot.

#### Selecting Hot Spots

A selected hot spot contains eight sizing handles that you can use to resize the hot-spot rectangle.

#### To select a hot spot

<sup>n</sup> Click the hot spot with the left mouse button.

Or press TAB or SHIFT+TAB until you select the hot spot you want.

#### To select a hot spot using the Select command

1. From the Edit menu, choose Select.

The Select dialog box appears. All hot spots defined for the hypergraphic appear in the Hotspots box. By default, Hotspot Editor does not select a hot spot in the list unless one was selected before choosing the Select command. In that case, Hotspot Editor highlights the currently selected hot spot.

2. In the Hotspots box, select a hot-spot name.

Hotspot Editor displays the binding information for the selected hotspot name.

3. Choose the Select button.

The hot spot shows eight sizing handles to indicate that the hot spot is selected.

#### To delete a hot spot

- 1. Select the hot spot.
- 2. From the Edit menu, choose Delete.

Or press the DEL key.

#### **Cutting or Copying Hot Spots**

Hotspot Editor lets you transfer hot spots to and from the Clipboard using the Cut, Copy, and Paste commands on the Edit menu. Transferring hot spots is useful to:

- <sup>n</sup> Create multiple versions of the same hot spot with the same attributes.
- <sup>n</sup> Move a hot spot from one image file to another.
- <sup>n</sup> Save time when repeatedly defining hot spots in a hypergraphic.

#### To cut or copy a hot spot to the Clipboard

- 1. Select the hot spot.
- 2. From the Edit menu, choose Cut or Copy.

Hotspot Editor transfers the selected hot spot to the Clipboard using Hotspot Editor's proprietary clipboard format.

#### **Pasting Hot Spots**

You can paste images or hot spots from the Clipboard into Hotspot Editor. Pasting an image is the same as opening the file. If you paste a hot spot, Hotspot Editor pastes it in the upper-left corner. You can paste a hot spot into the same image file or another image file.

#### To paste a hot spot

<sup>n</sup> From the Edit menu, choose Paste.

The hot spot is pasted in the upper-left corner of the hypergraphic being edited.

#### Moving Hot Spots

Microsoft Windows Help Authoring GuAfter you create a hot spot, you can move it anywhere within the current image area.

#### To move a hot spot

- 1. Select the hot spot.
- 2. Position the mouse pointer in the center of the selected hot spot. The pointer changes to a hand, indicating that you can move the hot spot.
- 3. Drag the hot spot to the new location and release the mouse button when the hot spot is where you want it.

The hot-spot sizing handles disappear while dragging and reappear when you release the mouse button.

#### Note

If the Hotspot Editor window is larger than the graphic displayed in the image area, Hotspot Editor does not let you move the hot spot outside the image area. If the window is smaller than the image area (that is, if the window shows scroll bars), Hotspot Editor scrolls in the direction of the attempted move if a hot spot crosses the edge of the scroll bar.

#### Resizing Hot Spots

The eight sizing handles on a hot spot let you change its size the same way you change the size of a window.

#### To resize a hot spot

- 1. Select the hot spot.
- 2. Position the mouse pointer on the sizing handle on the border or corner that you want to change.

The pointer changes to a two-headed arrow.

3. Drag the sizing handle until the rectangle is the size you want. If you drag a side handle, the rectangle changes size on only one side, the side of the border you drag. If you drag a corner, the two adjoining sides that form the corner change size at the same time.

#### Saving the Hypergraphic

After you have defined all the hot spots and made all your changes to the image, you save it as a hypergraphic.

#### To save a hypergraphic

From the File menu, choose Save As to save the file with hot spots using the .SHG filename extension provided by Hotspot Editor.

Hotspot Editor saves your graphic with the appropriate hot-spot coding. You can now include this graphic in your Help file using a **bmc**, **bml**, or **bmr** reference.

#### Editing and Replacing Images

Sometimes you will create a hypergraphic and then discover that you need to change the original picture used in the hypergraphic. Since you cannot use Hotspot Editor to change the graphic, you must use the graphics application that created the original image.

However, after an image has been saved as a hypergraphic (.SHG file), it cannot be opened again in the original graphics program. Because Hotspot Editor does not alter the original bitmap or metafile when creating the hypergraphic, you can edit the original bitmap (.BMP) or metafile (.WMF) in the graphics program and then re-import it into Hotspot Editor after you have made your changes.

#### To edit or replace the bitmap in a hypergraphic

1. Open the original bitmap or metafile in the graphics application you used to create the image.

Or create a new bitmap for the hypergraphic.

- 2. Make your changes to the image.
- 3. Save the edited image in the graphics application.
- 4. Copy the image to the Clipboard.
- 5. Start Hotspot Editor and open the hypergraphic that contains the graphic you want to replace.
- 6. From the Edit menu, choose Replace.

The new or edited graphic replaces the original bitmap.

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If the new image is smaller than the original graphic included in the hypergraphic, Hotspot Editor may move the hot spots to ensure that they are still on top of the image.

7. Save the changes to the hypergraphic.

### Preparing Hypergraphics for Different Displays

Normally, when it saves a bitmap in .SHG format, Hotspot Editor records the display resolution (EGA, VGA, or 8514) in the .SHG file based on the resoultion of the computer it's running on and ignores the resolution information stored in the original bitmap. This can cause problems if you want to display your hypergraphics on different display resolutions. For example, if you have three bitmaps, created on EGA, VGA, and 8514 devices, and you edit them with Hotspot Editor on a VGA system, Hotspot Editor marks all the resulting .SHG files as VGA.

To correct this problem, you can either can save the hypergraphic with the correct resolution information, or you can compile these files with Help's Multi-Resolution Bitmap Compiler (MRBC). For information about MRBC, see Chapter 12, "Creating Graphics for Different Displays."

#### Saving Resolution Information

When creating hypergraphics, you can save the resolution information of the target monitor (not just the monitor on which they are created). This is especially important if you want to create hypergraphics for the Macintosh, because you cannot use Hotspot Editor on a Macintosh computer. Also, if you use this feature, you do not have to compile hypergraphics with MRBC to make them appear correctly on different displays, including Macintosh displays.

To save resolution information in the hypergraphic, you must add a line to your SHED.INI file. The entry tells Hotspot Editor whether you want to save .SHG files with the resolution information of a monitor other than the one on which they were authored. The monitor type actually saved depends upon the first letter of the extension, just as when using MRBC.

To save resolution information, add the following line to your SHED.INI file:

[Hotspot Editor] ResBasedOnExt=1

If the value of **ResBasedOnExt** equals 1, Hotspot Editor sets the appropriate

resolution based on the first letter of the file extension. The following table shows how Hotspot Editor interprets the extensions.

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First character	Example	Resolution
С	bitmap.cbm	CGA
E	bitmap.ebm	EGA
V	bitmap.vbm	VGA (default)
8	bitmap.8bm	8514
М	bitmap.mbm	Macintosh
other	bitmap.bmp	VGA

For example, if you create a hypergraphic to be displayed on a Macintosh, you can specify the MAC extension M and the hypergraphic will look good on a Macintosh display, without using

MRBC.

# Creating Hypergraphics Without Hotspot Editor

If you are using Windows Help version 3.0, or if you don't have Hotspot Editor, you can create hypergraphics in the Help file by carefully positioning several individual bitmaps next to each other and formatting each of them as hot spots.

Microsoft Windows Help Authoring Guilles technique might be called the jigsaw puzzle method because it is similar to taking a whole picture and cutting it into pieces and then pasting it back together, and formatting the pieces that you want to be hot as bitmap hot spots. For example, you could take a screen shot of a menu that has been dropped down and

## Graphic

make a separate bitmap of each command, as in Figure 11.3.

In the topic file, you place the bitmap references in separate paragraphs and format them so that there is no space between the paragraphs. Otherwise, the individual bitmaps will display with white space or gaps between them. Also, you should format all the bitmap paragraphs as Keep Together so that the individual bitmaps don't wrap when the user resizes the Help window. When you have the bitmaps positioned, format each bitmap reference as a hot spot, as in Figure 11.4.

## **Graphic**

The resulting graphics will look like a single hypergraphic when built into the Help file, as in Fugure 11.5.

## Graphic

If done carefully, users will not be able to tell the difference between this imitation hypergraphic and a true hypergraphic created with Hotspot Editor. However, using several bitmaps to simulate a single-image hypergraphic has the disadvantage of requiring Help to perform multiple locating operations when displaying the topic. Usually this means Help must read the disk several times, slowing overall performance, especially on CD-ROM. The decreased performance may or may not be significant, depending on the size and number of bitmaps being used.

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