7

Fingerprints and Zones

This chapter examines the layout and contents of Datacap Studio's **Zone Page**, and describes the steps you take to:
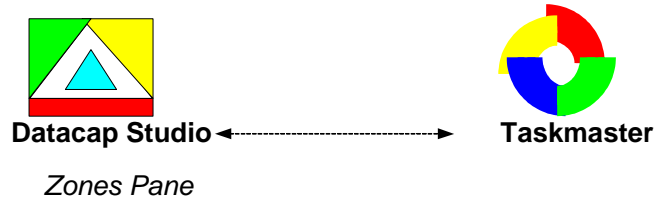
- Establish a new Fingerprint Class.

- Add one or more fingerprints to the class.

- Enhance the fingerprint's image.

- Zone specific fields in the fingerprint.

- Assign recognition properties to individual zoned fields

The chapter covers these topics:

7.1 Introduction

Datacap Studio's **Zones Page** has this structure:

Datacap Studio ◄-----------------------------► **Taskmaster**

Zones Pane

Fingerprints tab

Fingerprint Class (Global)
   Global Invoices Fingerprint

Fingerprint Class (Custom) *Samuels*
   Fingerprint A *(Line Item Table)*
   Fingerprint B (No Line Items)

Document Hierarchy tab

Application *Lakeland*
   Batch *Batch:Lakeland*
      Document *Invoice*
         Page *Invoice_Page*
            Field *Amount*

Properties tab

Object - General Information

Object - Special Recognition Properties

ICRC tab   BCode tab   OCRA tab

ICRK tab   OCRS tab

Image View tab

Samuels Supply Corporation

327 Miravery Lane   Invoice: 2422-001
Callcallunt, PA 11567   Date: 11/06/2006

To: Lakeland Industries
230 Range Road
Wilton CT 068907

PO: 13567

Amount Due: $25,000

Please remit upon receipt of this invoice.

This basic illustration highlights the page's principal tabs:

- On the left, the *Fingerprints* tab modifies existing fingerprints and sets up new Fingerprint Classes and their fingerprints (Page 17).

- The *Document Hierarchy* tab gives access to the **Fields used by the application.** From here you can zone the fields on a fingerprint image (Page 10) – and assign recognition properties to individual **Field**s (Page 14).

- The *Image View* tab displays the image of a fingerprint that you have selected from the *Fingerprints* tab. The image in this tab serves as the foundation for zoning procedures. The *Image View* tab also gives you a chance to enhance a new fingerprint's image before you assign it to the fingerprint (Page 17).

✓ The chart on the previous page is important from another perspective: it shows an invoice without a **Line Item Table**. As a result, the fingerprint is easier to set up, and recognition procedures are less complicated than those involving a fingerprint such as the actual fingerprint depicted below.

This chapter describes how Datacap Studio's **Zones Page** sets up and works with fingerprints of both kinds.

Fingerprint Class

Fingerprint

Line Item Table
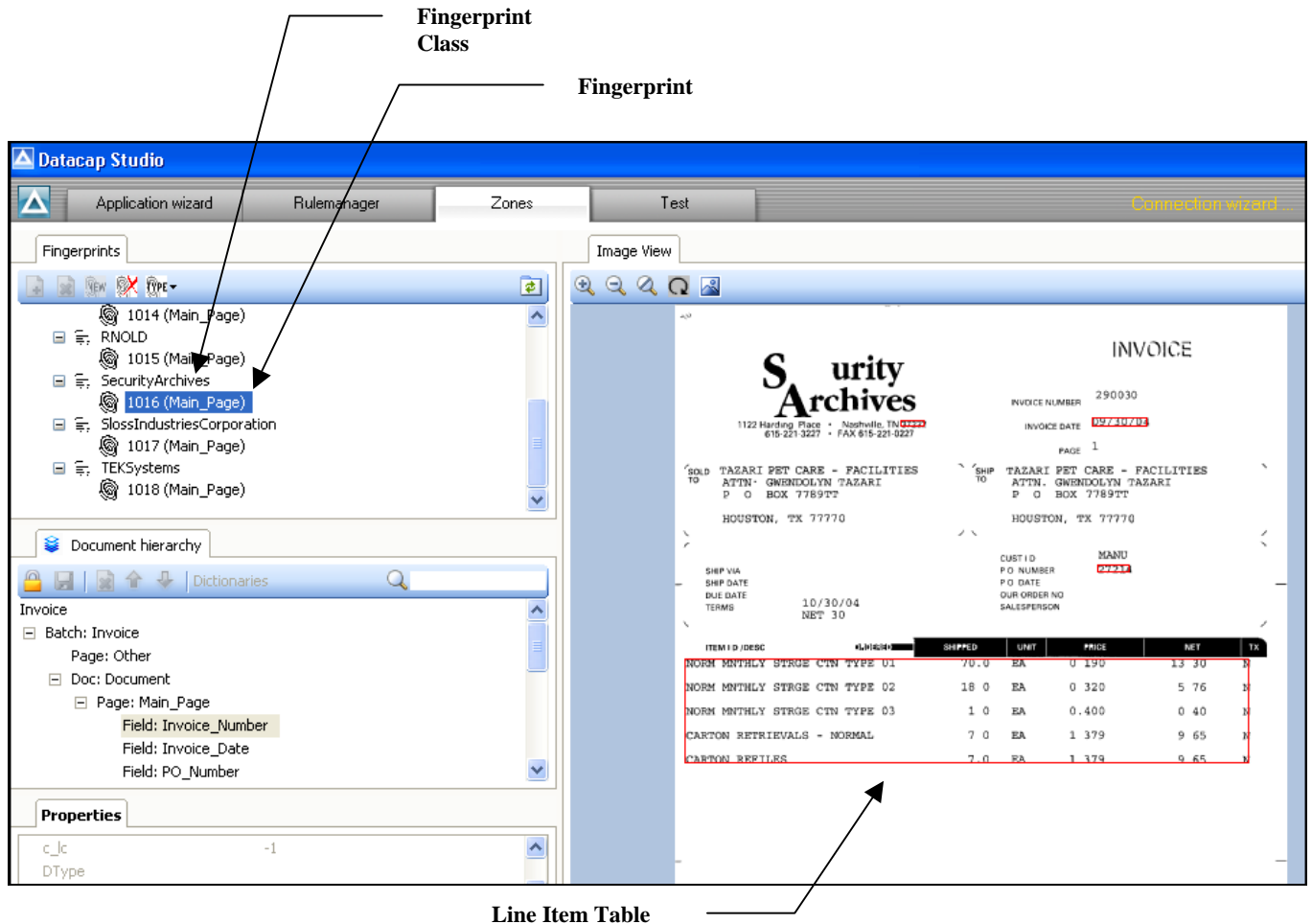
✓ *Very important!* Datacap Studio establishes the recognition parameters and procedures that *Rulerunner* tasks use to:

♦ Identify the pages in a batch.

♦ Locate fields and blocks of fields on each page.

♦ Match the page to a pre-defined fingerprint.

♦ Recognize each field's data.

7.1.1 Starting out with the Zones Page

When you first access the **Zones Page** after you install Datacap Taskmaster, or set up a new application, the *Fingerprint Database* dialog may appear on your screen:
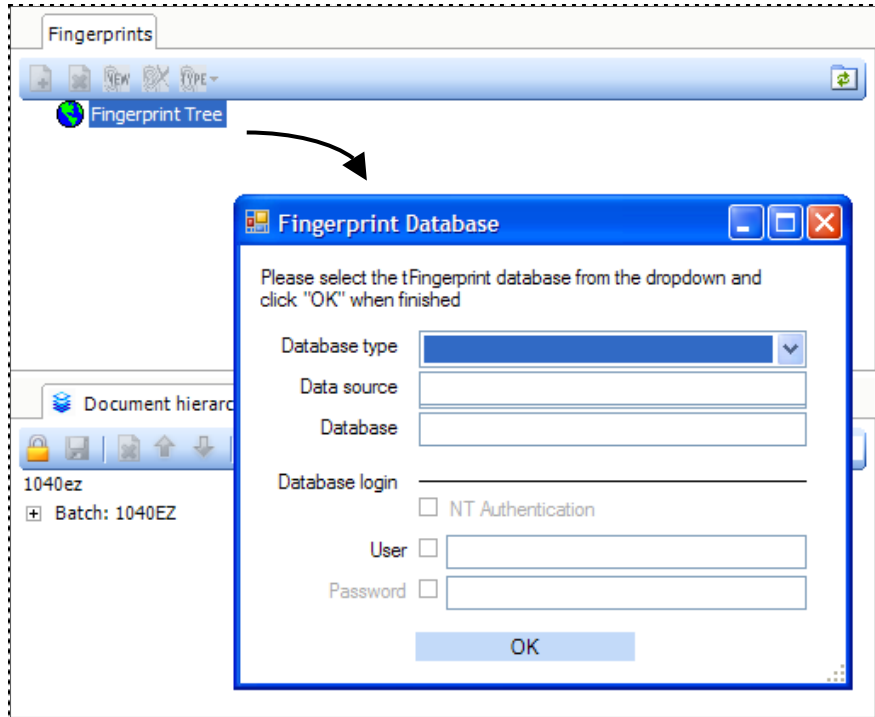
Fingerprint Database dialog

This dialog needs specifics about the database that stores information about your application's fingerprints. In Taskmaster 6 and prior, this information was stored together with the application's rules in the Rules database.

Typical values you might enter in this dialog include:

> **Database type:** *Access*

> **Data source:** *1040ezRule.mdb*

✓ When you select *Access* as the Database Type, this is all the information you need to supply. For SQL Server or Oracle databases, fill in the rest of the information as needed. Consult with your Datacap Installation Specialist or Datacap Support if you are unsure of the appropriate values.

7.1.2 Introduction to the Tabs of the Zones Page

The **Zones Page** has nine tabs! Four are "dominant."

The *Fingerprints* tab lists an application's Fingerprint Classes; the fingerprints that belong to a class; and the Page Type of each fingerprint.

The *Document Hierarchy* tab displays objects of the application's Document Hierarchy at four levels: **Batch**, **Document**, **Page** and **Field**. Additional dialogs reached from this tab access the object's variables, dictionaries, and special rules(Chapter 5).

The *Image View* tab displays a fingerprint's image before and after "enhancement" – and before and after fields have been zoned. This tab can also highlight zoned fields and lines and words that are recognized.

The *Properties* tab lists properties and variables of individual objects at the four levels of the Document Hierarchy.
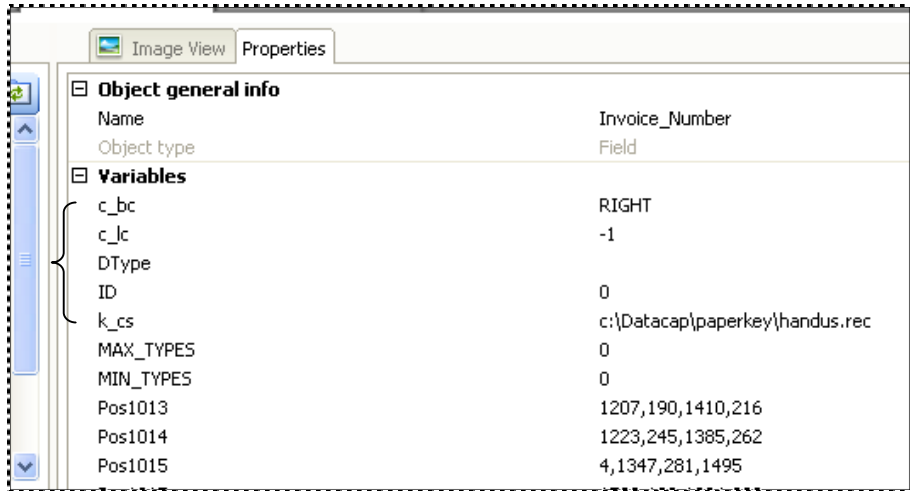
The *Properties* tab has five secondary tabs, with recognition properties you can assign to **Field** objects.

✓ The **Zones Page** provides tools you use to manage placement of the nine tabs (Page 7). Complete explanations of the four dominant tabs begin on Page 24.
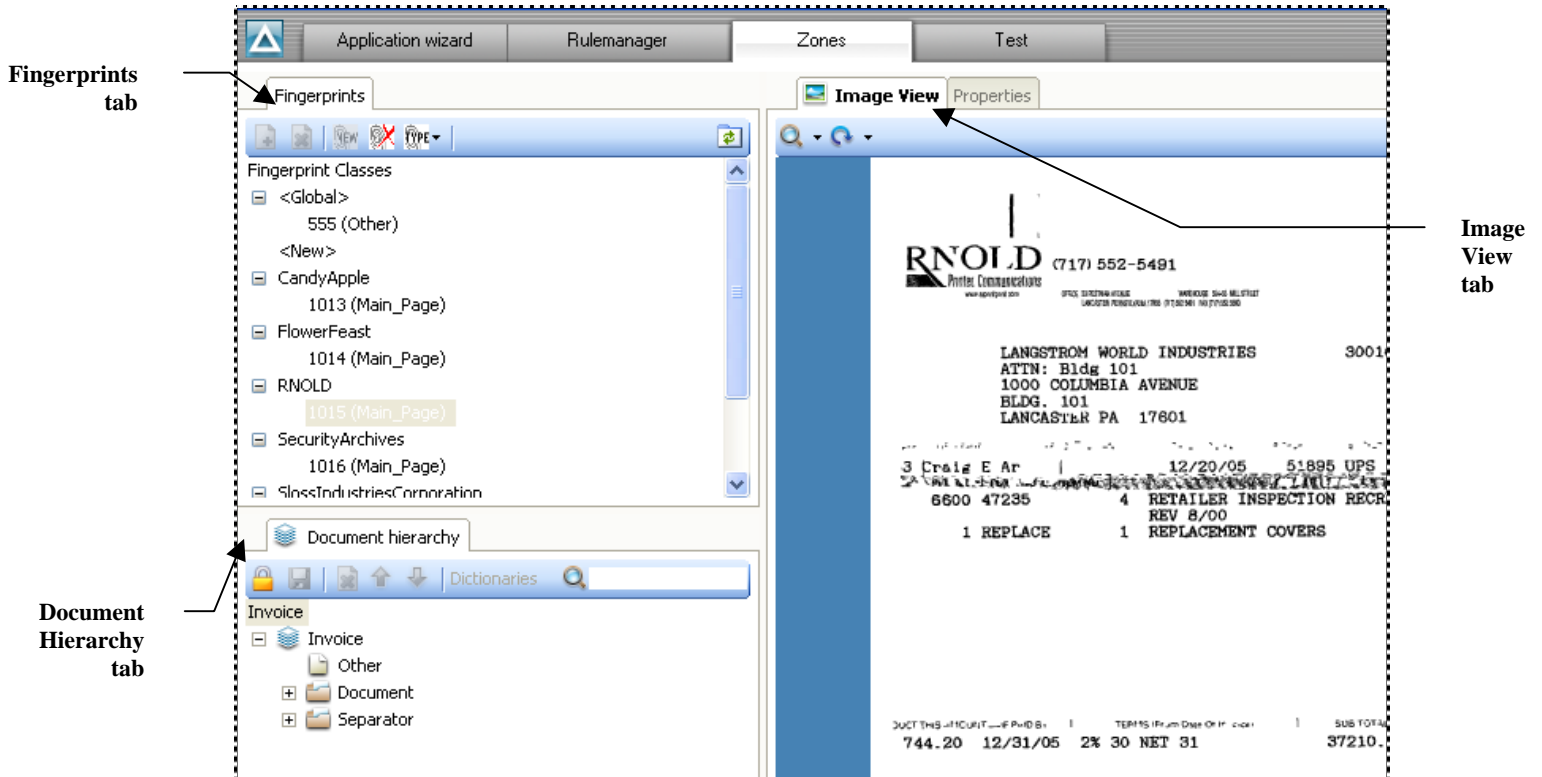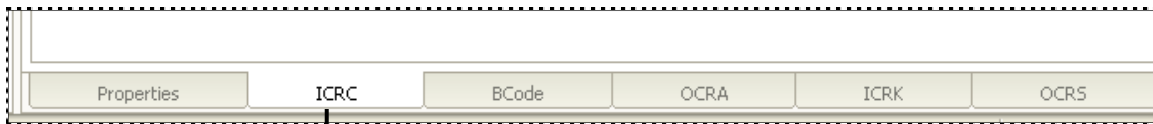

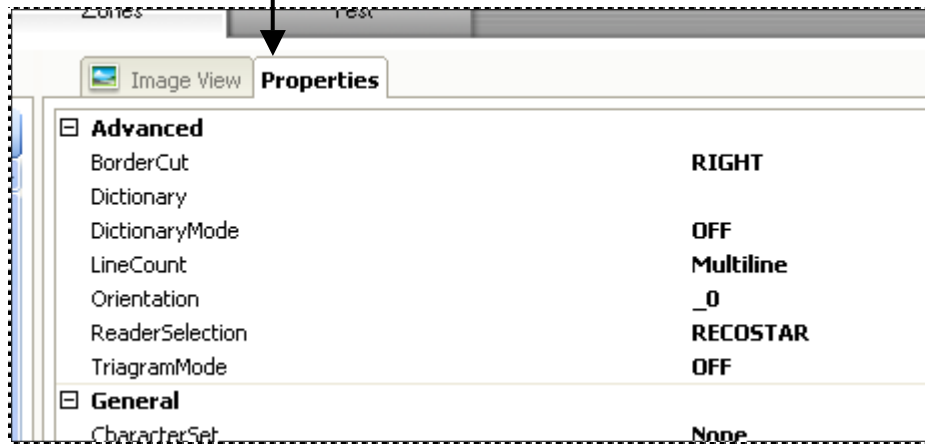**Invoices Application – DC Studio Zones Page**

Properties tab – *Invoice_Number Field Object*

In the example above, the first five variables of the *Invoice_Number* **Field** object are unique recognition properties found in various *secondary* tabs of the *Properties* tab:
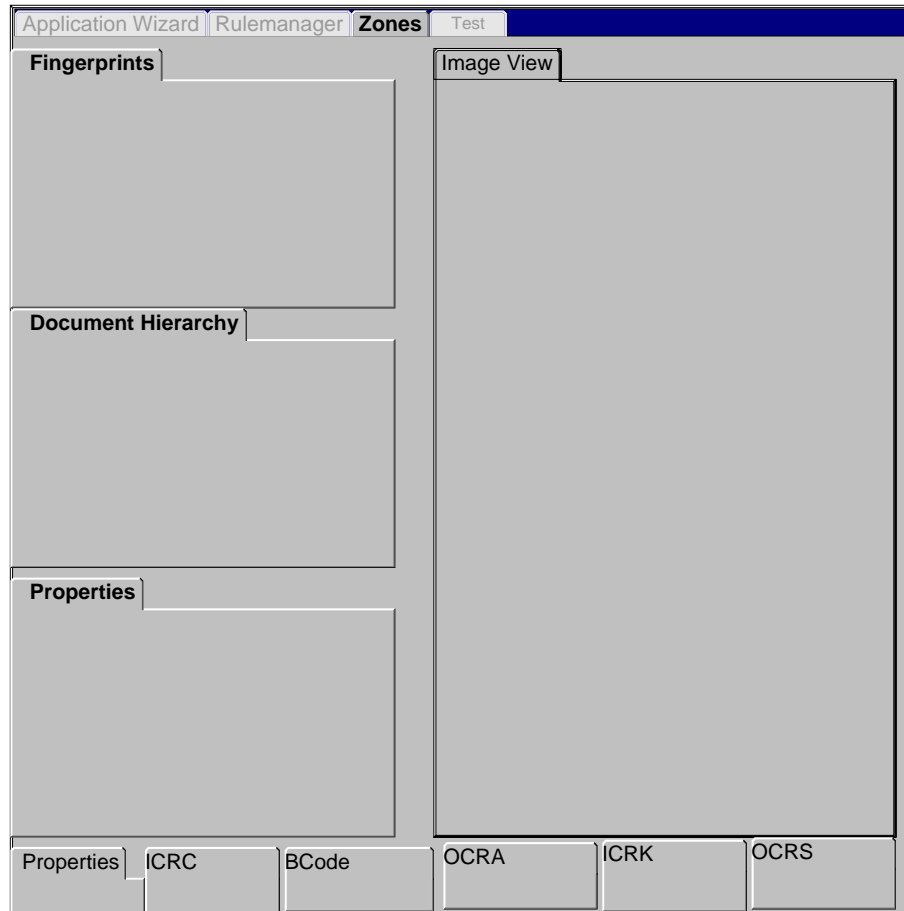

Secondary Properties tabs – *Recognition Variables*

Properties - ICRC tab
Invoice_Number Field

✓   Don't hesitate to re-configure your **Zones Page**, with its nine tabs, to provide easy accessibility. Instructions are on the next page.

Tabs of the **Zones Page's** default setup resemble this diagram.

Datacap Studio

Application Wizard	Rulemanager	**Zones**	Test	

Fingerprints

Document Hierarchy

Properties

Image View

| Properties | ICRC | BCode | OCRA | ICRK | OCRS |

Tabs of the Zones Page

You can use the following DStudio procedures to re-arrange the default layout of the **Zones Page**:

Establish a prominent position. If you right-click on a tab's title and select **Prominent** (or use the Ctrl +Shift + T keyboard combination), the tab will completely occupy the **Zones Page**. To return the tab to its default position, right-click on the title and select **Rebalance** (Ctrl + Shift + W).

Move a tab to the next group. To move a tab and its content to a position in front of and next to the next tab – thus forming a Tab Group – right-click on its title and select **Move to Next** tab (see the illustration on the next page.) Alternatively, use the Ctrl + Shift + N keyboard combination. To return the tabs to their original positions,

highlight the tab you moved, and select **Move to Previous Tab Group** or press your keypad's Ctrl + Shift +B combination.
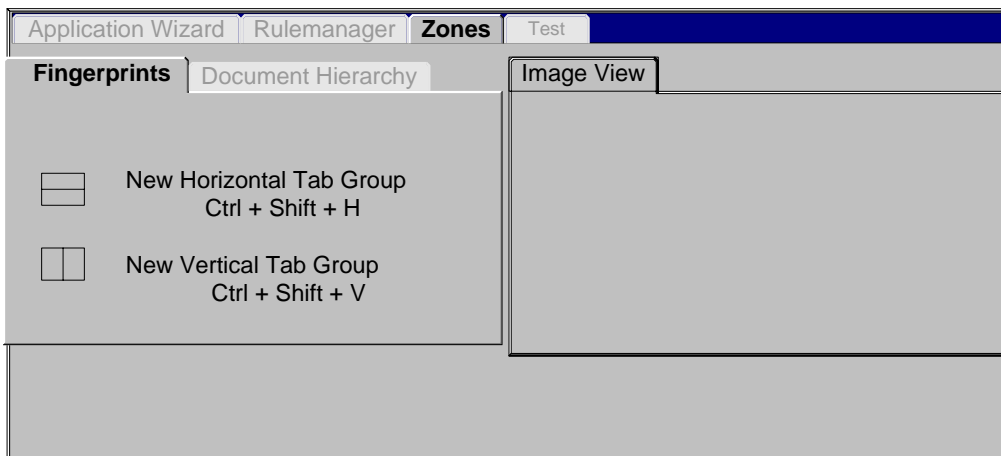
Datacap Studio

Application Wizard	Rulemanager	**Zones**	Test

Fingerprints	Document Hierarchy	Image View
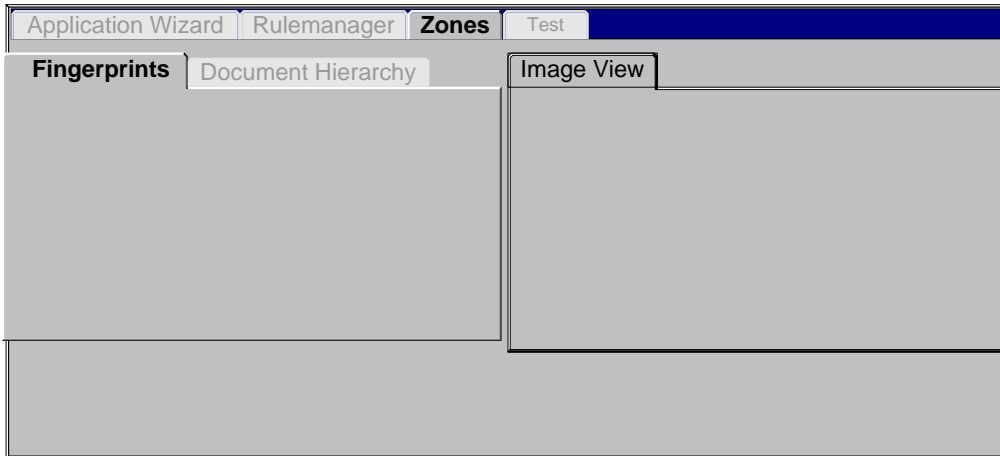
Fingerprints tab – after *Move to Next Tab*

Important! The five tabs with special Recognition properties belong to the dominant *Properties* tab – and move with it from location to location within the **Zones Page**.

Horizontal and Vertical Layouts. You can right-click on the title of either tab in a group to view the options illustrated below. Selecting a **New Horizontal Tab Group** places the tab you select below the other tab. A **New Vertical Tab Group**, on the other hand, sets up the tab as two columns.

Application Wizard	Rulemanager	**Zones**	Test

Fingerprints	Document Hierarchy	Image View

New Horizontal Tab Group
Ctrl + Shift + H

New Vertical Tab Group
Ctrl + Shift + V

Horizontal and Vertical Tab Group Options.

Drag and Drop. Finally, you can drag and drop tabs with the help of the icons illustrated below. These appear as soon as you begin to drag a tab. Dropping the tab being dragged onto the central icon puts it into a tab group with the tab under the icon. Dropping onto one of the four arrows surrounding the central icon moves the dragged tab above, below, to the left or right of the tab under the icon. Dropping onto one of the disconnected icons moves the dragged tab to the appropriate edge of the page.
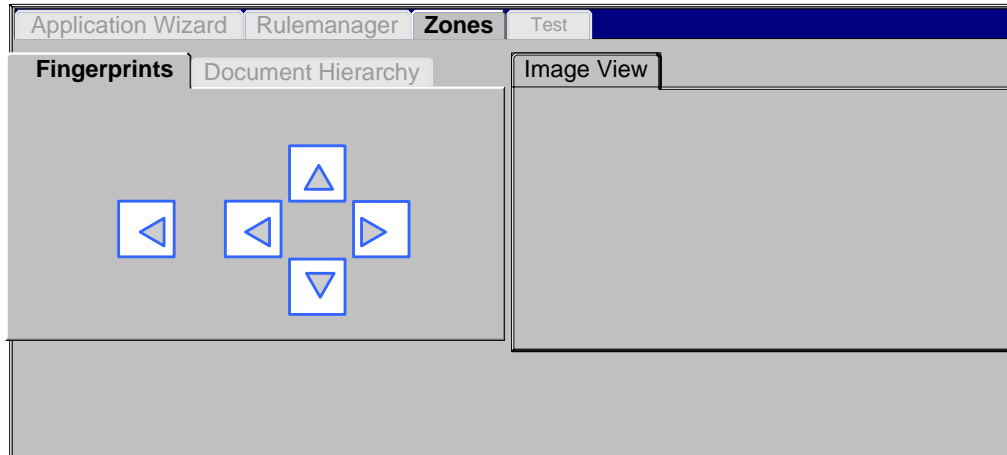
Drag and Drop Tools

7.2 Modifying a Zone and its Properties

A zone locates a field on a fingerprint:

- A zoned field is represented by a **Field** object of the Document Hierarchy.

- At a minimum, zoning provides the **Field** object's **POS** variable with a new locating value (Page 14) – just for this fingerprint!

You are not limited to working with one field at a time. Instead, you can zone a set of *child* fields individually, and as a **block**.

7.2.1   Creating a Zone for a Field

To zone a field on a fingerprint, take the following steps:

Step	Action
1.	Highlight the applicable Fingerprint ID in the *Fingerprints* tab: be sure that the fingerprint's image appears in the *Image View* tab.
2.	Lock *(!)* the Document Hierarchy by toggling the **Lock** icon of the *Document Hierarchy* tab's toolbar.
3.	In the Document Hierarchy, select a **Field** object that represents a field to be zoned on the fingerprint. (This example shows eight target fields. However, two – *TaxpayerElectionFund* and *SpouseEelctionFund* have already been zoned as Optical Mark Recognition fields – Page 14).
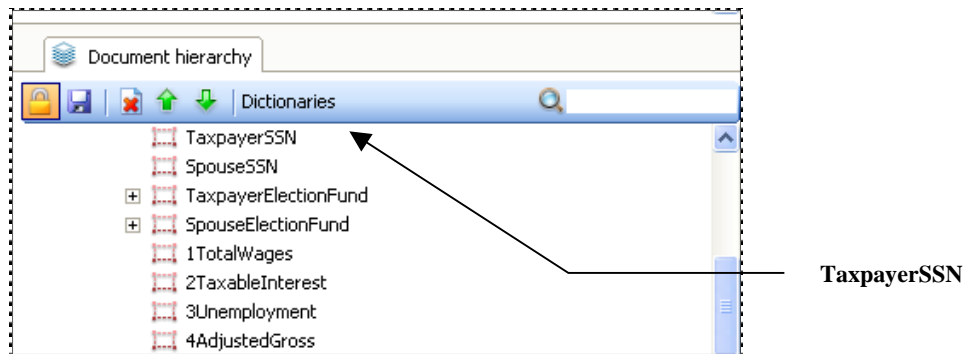
1040EZ Document Hierarchy

Fingerprint 1034: Image

How to Zone a Field (continued)

Step	Action
4.	Use your cursor to "draw" a rectangle around the space where the field's *value* will appear when a *source* page is processed – not around the field's title. (Here is the zoned *TaxpayerSSN* field.)
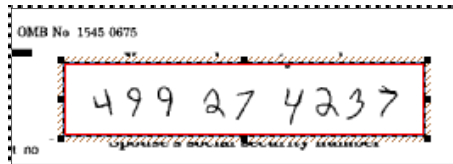
5.	Repeat Step#3 and Step#4 for other zoned fields.
6.	When you have finished, click on the Document Hierarchy tab's **Save** icon to update the Document Hierarchy on disk (1040ez.xml).
7.	Un-lock the Document Hierarchy by toggling the tab's **Lock** icon.

Now, if you:

♦ Select the new fingerprint in the *Fingerprints* tab;

♦ Toggle the **Lock** icon in the toolbar of the *Document Hierarchy* tab;

♦ Select a **Field** object in the Document Hierarchy that represents a newly-zoned field…

…the fingerprint will display red rectangles around each zoned field – and a rectangle with thicker lines around the field you have chosen.

When you select a zoned field in the *Document Hierarchy* tab, the *Image View* tab highlights this field's boundary by shading it as illustrated above. *Alert!* This highlighting only occurs if the Document Hierarchy is locked.
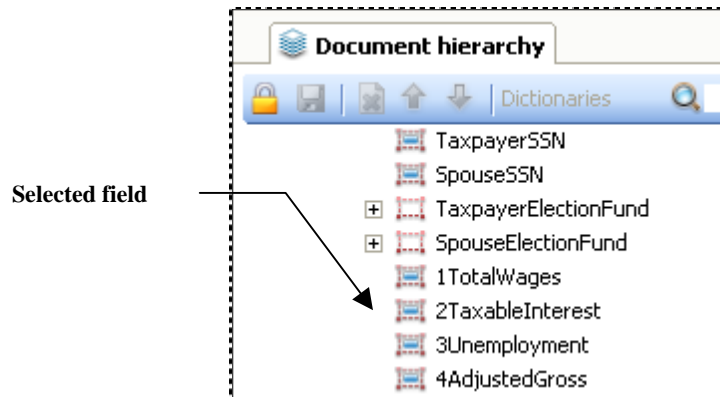
In addition, the Document Hierarchy adds a new item to its list of variables for the zoned field. The new variable will be named "POS" followed by the four digit FingerprintID. Instead of one **POS** property for the *TaxpayerSSN* **Field** object, creating a new fingerprint and zoning the field will have a result similar to this is in the *Manage Variables* dialog (Chapter 5):
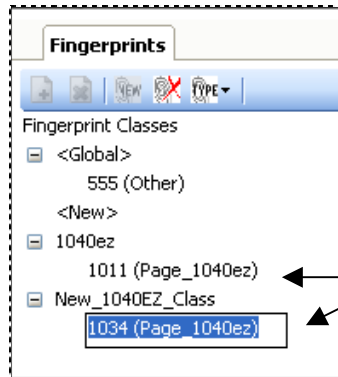
Fingerprints 1011 and 1034
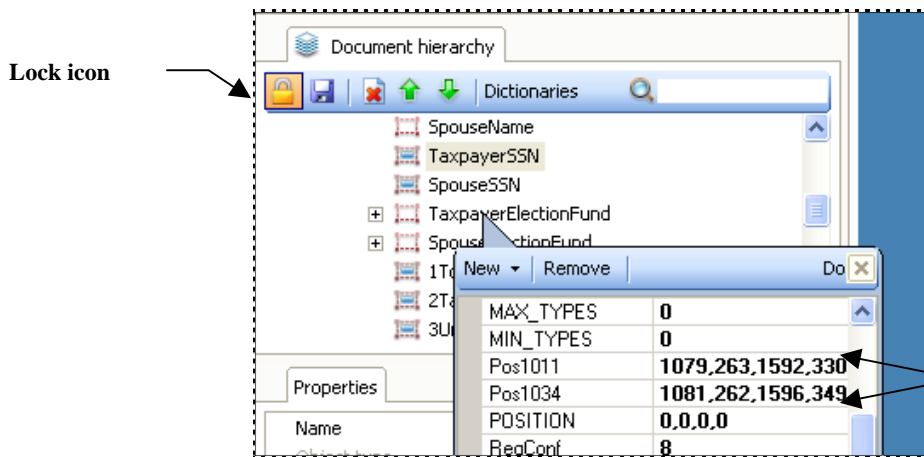
Lock icon

Pos values

Don't forget! You cannot access information about the fields of a fingerprint unless you lock the Document Hierarchy by clicking on the toolbar's **Lock** icon.

☞ Take time to explore zoning in the *Survey* application:

- The *Survey* application's fingerprints are variations on a standard questionnaire with multiple OMR (Optical Mark Recognition) fields. Zoning a new fingerprint locates all fields and assigns required values to the OMR properties of certain fields.

7.2.2   Properties of Zoned Fields

The *Manage Variables* dialog lists the properties of any field, and the values assigned to these properties. To access this dialog when you are working in the **Zones Page**:

- Select a fingerprint in the *Fingerprints* tab.

- Lock *(!)* the Document Hierarchy to activate all tools in the *Document Hierarchy* tab's toolbar.

- Right-click on the **Field** object that represents the zoned field.

- Select the **Manage Variables** option.

Here, the dialog lists the standard properties for a **Field** object (Chapter 5) with Position (**Pos**) values for the field as it appears in each fingerprint. Note, too, the six nonstandard properties at the beginning: **c_cs**, **c_hn** etc. These properties are set by the *ICR/C* subtab and should not be altered directly.
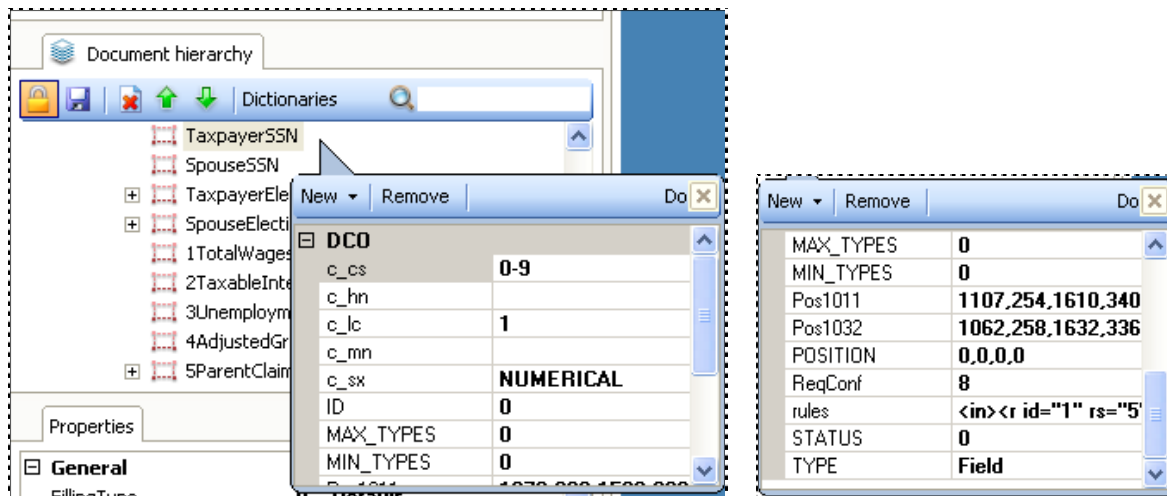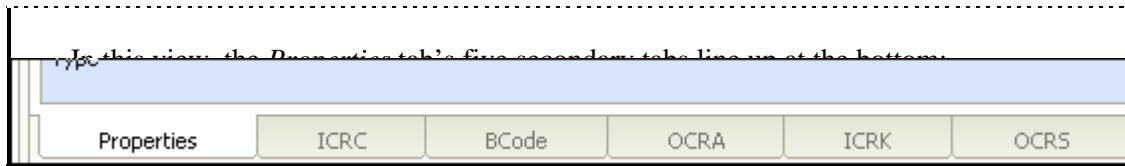
1040EZ Application: Properties of the TaxpayerSSN Field

☛   For an entirely different look at the field's properties:

- Right-click on the *Properties* tab.

- Select *Move to Next Tab Group* or drag it to a new position where you can view its entire contents. (Page 5 shows you how to manipulate the tabs of the **Zones Page**.)

Special Recognition Settings

Properties of the Taxpayer SSN Field

Secondary Tabs of the Properties Tab

The *TaxpayerSSN* field's **additional recognition properties** come from these tabs. Or, more precisely in this case, from the *ICRC* tab. To review the tab's options (illustrated on the next page), click on its title:

In the example above (and expanded on the next page), the codes under **Variables** refer to:

The "c_" prefix identifies settings in the *ICR/C* tab. ("b_" = *BAR/X*; "o_" = *OCR/A*; "i_" = *ICR/K*; "s_" = *OCRS*.)
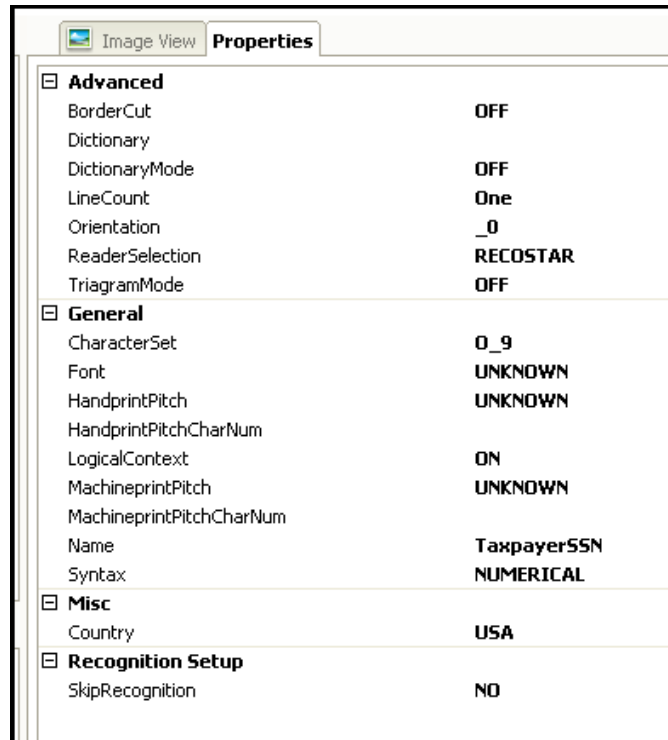
ICRC Properties Tab

Alternative Trigram Mode Settings

✓ *Very important!* Because of the range of the special Recognition parameters, the **Zone Page** provides instant access to explanations of the tabs; their settings; and the options of each setting.

- For complete descriptions of a secondary tab, right-click on the tab's title and select **Information.**
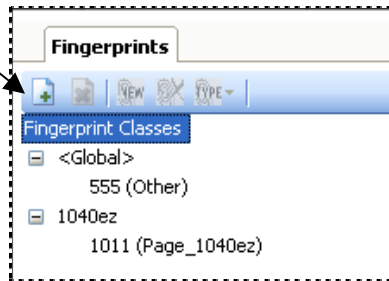
7.3 Creating a Fingerprint: Step-by-Step

To create a new fingerprint and zone its fields, take the following steps:

Step	Action

1. Open the Datacap Studio and connect to the *1040EZ* application.

2. Go right to the **Zones Page**.

3. Highlight the **Fingerprint Classes** option in the *Fingerprints* tab.
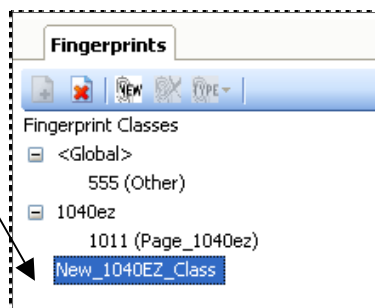
Click here →

4. Click on the **+** tool in the toolbar of the *Fingerprints* tab and select *Add Fingerprint Class*.

5. When the *New Fingerprint Class* dialog appears, enter a **New Class Name** (choose any name you like) and press the OK button.
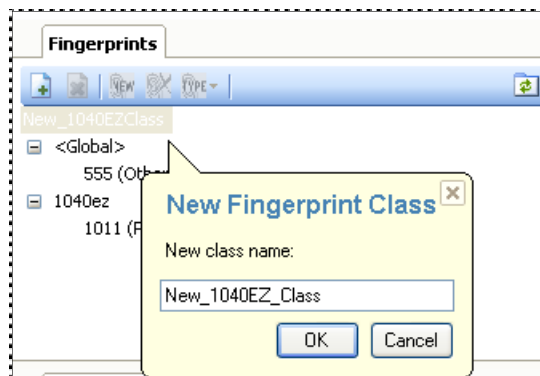
6. Confirm that the *Fingerprints* tab lists the new class.

New Fingerprint Class →

To Create a New Fingerprint (continued)

Step	Action

7. In the *Fingerprints* tab, right-click on the Fingerprint Class ID and select **Add Fingerprint.**
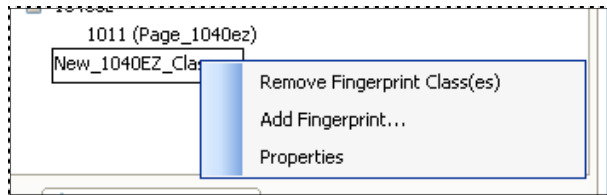
8. Select the fingerprint's image from the application's **images** folder. Click on the *Open* dialog's OK button.
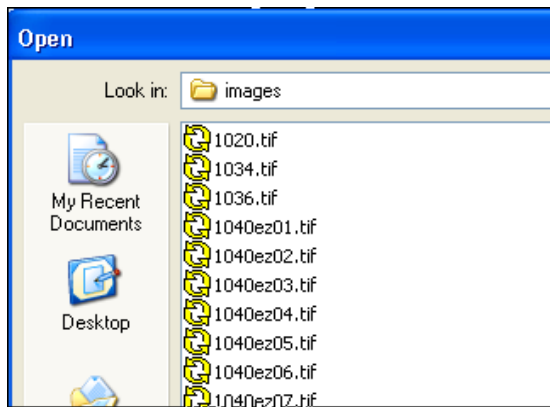
9. To enhance the fingerprint's image before you include it as part of the fingerprint, press the Yes button when the *Image Enhancement* dialog appears. Otherwise, click on the No button. (Page 20 explains Image Enhancement procedures.)

To Create a New Fingerprint (continued)

Step	Action

10. Either way, the fingerprint's image will end up in the *Image View* tab, with its title in the *Fingerprint* tab as a membe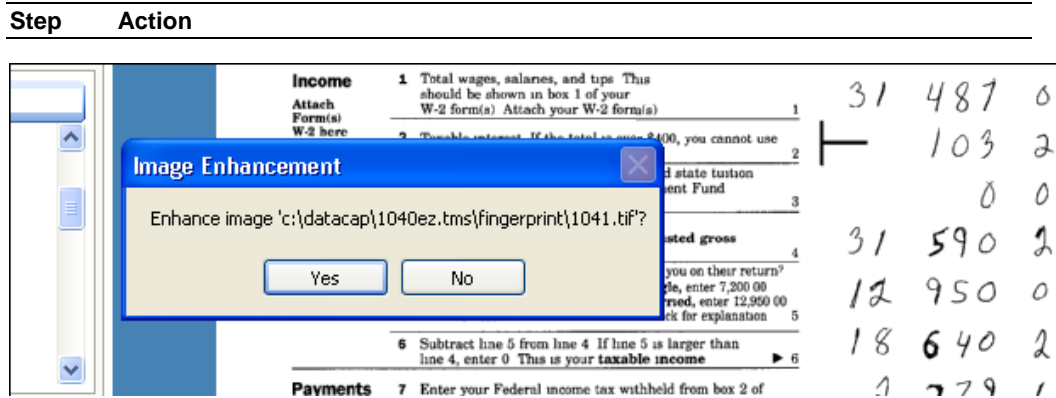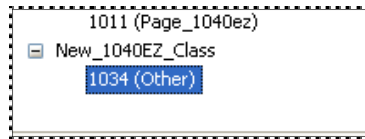r of a Fingerprint Class. *Important!* The new fingerprint is *1034* in the example below, and *Other* is its Page Type. This is because all pages are *Other* pages unless they are *source* pages that match a fingerprint, with a Page Type specified by the Document Hierarchy.

11. To update the Page Type value, highlight the Fingerprint ID and click on the **Page Type** dropdown list in the tab's toolbar.

12. Select the applicable Page Type: this is the name assigned to a **Page** object of the Document Hierarchy (Chapter 5.) Usually, it is the name of the *source* page.
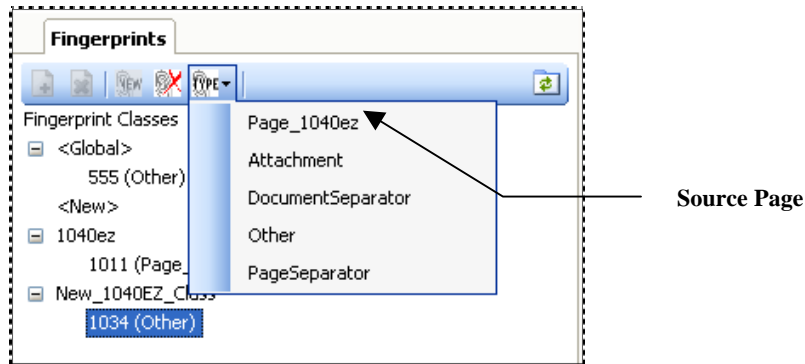
7.3.1   New Fingerprints - Image Enhancement

A fingerprint consists of an **Image file** (<fingerprint>.tif) and a **Recognition file** (<fingerprint>.cco).

When you set up a new fingerprint (Page 17), DStudio asks you to choose a source Image file (.tif) from your application's **images** directory. This file becomes the fingerprint's Image file and is given a new name – the fingerprint's name. At the same time, the Recognition file is set up to store details about the image and its contents – details that are used to help recognize a *source* page and its data during processing.

Source Image file
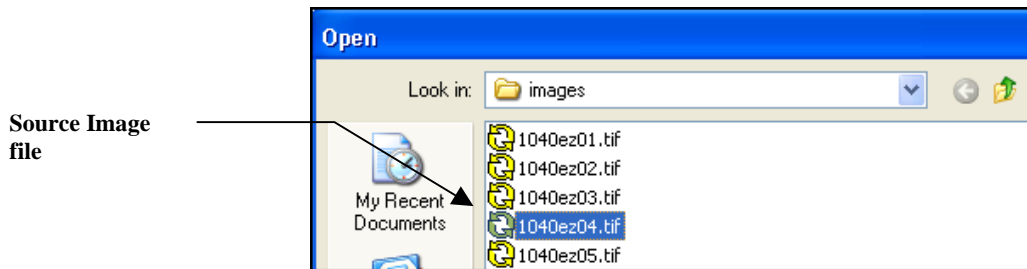
Select Image: 1040ez04

Fingerprint Image file
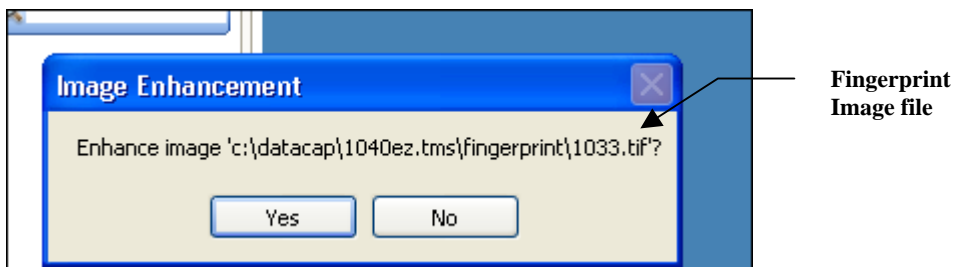
Enhance Fingerprint Image: 1033.tif

✓   Enhancing the fingerprint image modifies settings in the fingerprint's Recognition file. As a result, specifications of *source* pages that match the fingerprint are similarly modified to make recognition more accurate.

If you press the *Image Enhancement* dialog's Yes button (on the previous page), Datacap Studio's *Image Enhancement Window* will occupy the *Image* tab (below).

7.3.1.1   The Image Enhancement Window

Simple and satisfactory investigations of Image Enhancement usually involve repetitive production of fingerprint images and access to the *Image Enhancement Window*. The *1040EZ* training application provides these opportunities .
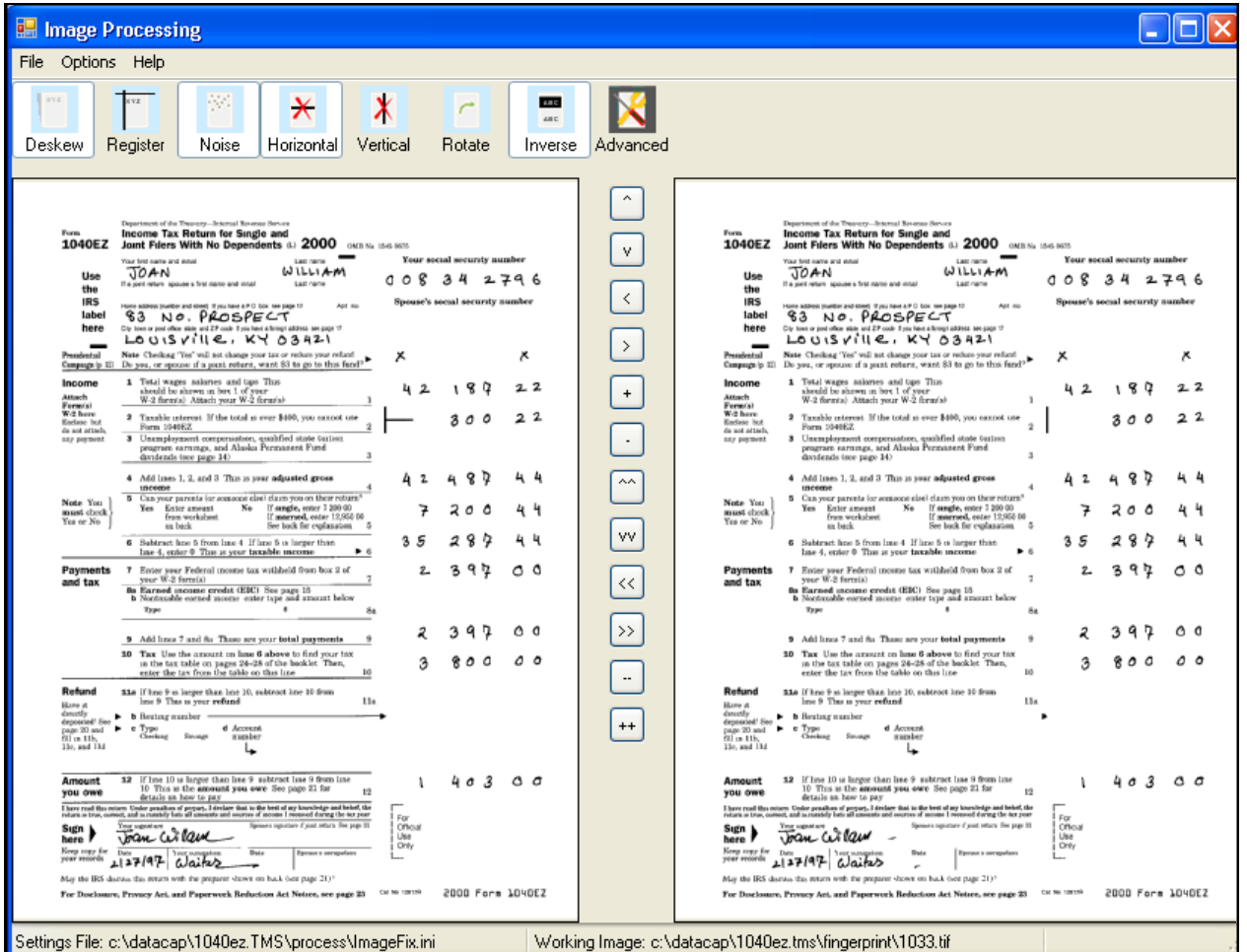
Enhance Image Window

Image
Enhancement
settings

Fingerprint
Image file

The *Image Enhancement Window* assembles details about the fingerprint's image – details that will be provided to the Fingerprint Recognition file (.cco). They include:

Before and After. The dual display shows the image before enhancement (on the left) and after enhancement (on the right.)

Settings file specifications. The window's title bar identifies the name and path of the application's **ImageFix.ini** file. This file contains the specifications that determine the initial *before* and *after* configuration. As a standard procedure, enhancements to a fingerprint's image update this file. As a result, enhancing the images of any additional fingerprints responds to these settings, unless you take steps to set up additional, unique files.

Image Placement buttons. The images are displayed in screens on either side. The buttons in the middle move the images around within the screens – individually and together– to give you various views of the images and their content.

Toggle Switches at the top indicate which of the major Advanced Settings categories are active when the window is ready to enhance a new image. You can also use these switches to de-activate a category.
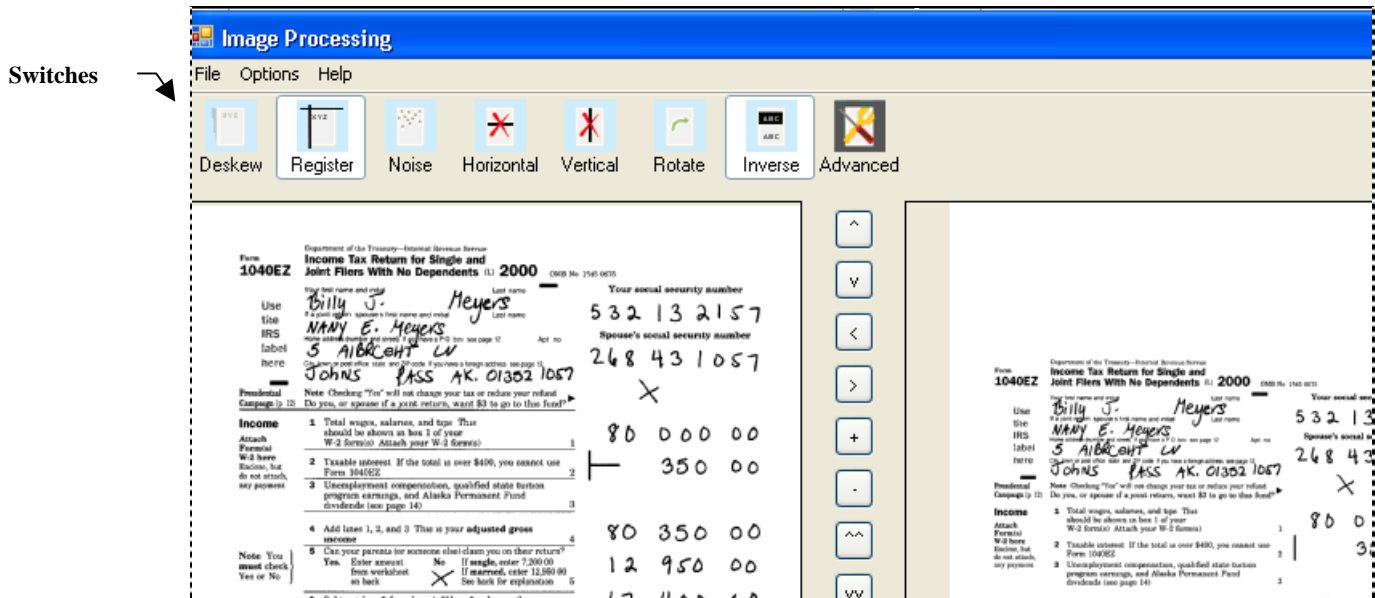

Fingerprint Image 1048: Before and After

This table describes the items in the window's **File** and **Options** menus:

Menu	Item	Description
File	Open Settings	Opens an alternative Settings file (.ini).
		Enhancement will use the settings in this file to enhance the current image, and will provide the file's values to the Fingerprint Recognition file (.cco).
		Important! After enhancement is complete, the settings in this file will be assigned to the default **ImageFix.ini** file.
	Open Image File	Opens a different Image file (.tif), and enhances the image in response to criteria in the **ImageFix.ini** file.
	Save Settings	Saves the default and enhanced settings for the current fingerprint to the **ImageFix.ini** file.
		Important! This means that any additional fingerprints you define will contain these enhancement settings.

Menu	Item	Description
	Save Settings As…	Saves the enhancement details for the current image to a different Settings file. This file is then available for the existing fingerprint and for other fingerprints.
	Save Image	Saves the current image.
	Save Image As…	Saves the current image as another Fingerprint Image File in the same or different location.
	Exit	Saves the current settings to the **ImageFix.ini** file and closes the *Image Enhancement Window.*
Options	Advanced Settings	Opens the *Enhancement Settings* dialog (illustrated on the next page).
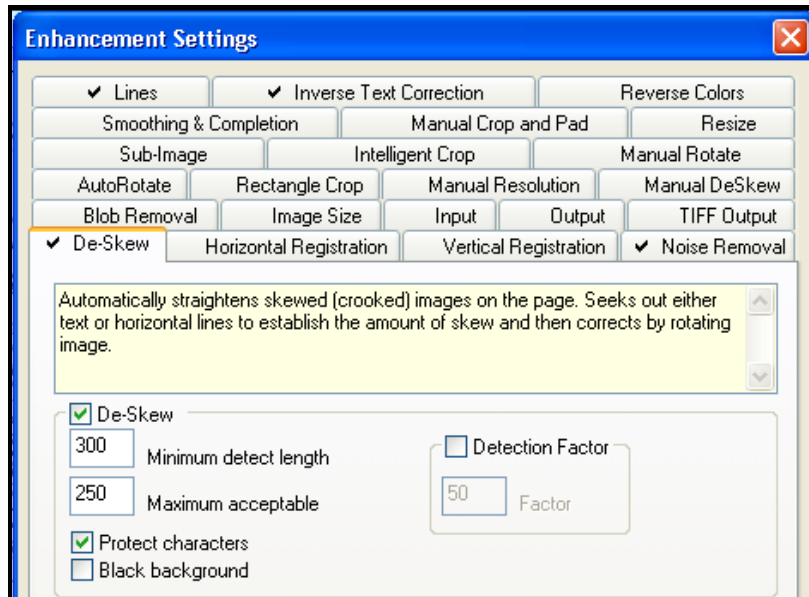
Enhancement Settings dialog
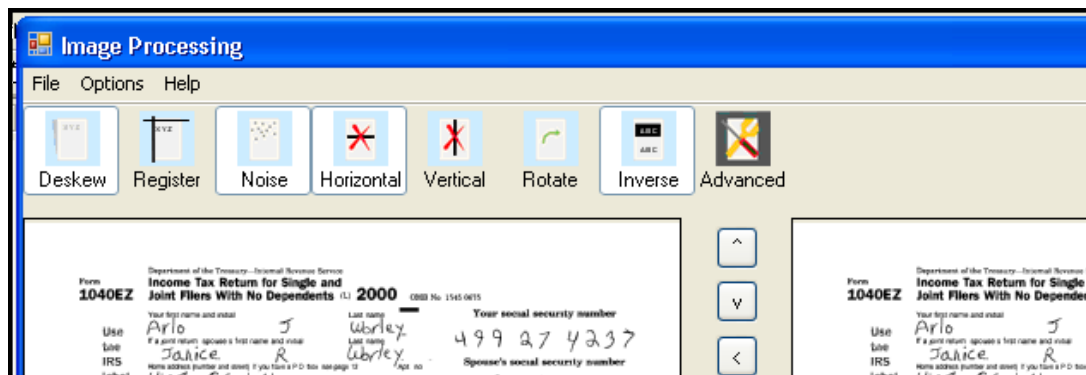
The *Enhancement Settings* dialog is the interactive presentation of enhancement specifications.

◆ The toggles at the top of the *Image Processing Window* indicate which tab of the *Enhancement Settings* dialog has active settings.

◆ Details in the *Enhancement Settings* dialog are settings in the **ImageFix.ini** file. This brief excerpt starts the file with DeSkew values you see above.

```
[ScanFix]
textdeskew=1
mindetectlength=300
maxacceptableskew=250
deskewprotect=1
```

✓ Don't hesitate to experiment with Image Enhancement procedures –especially in the *1040EZ* training application. This application is indestructible, and the enhancement settings quickly become increasingly familiar.
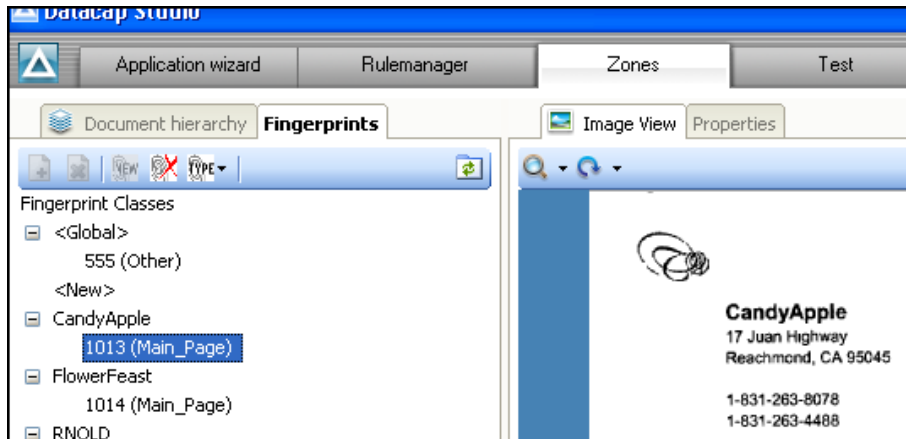
7.4 Zones Page Reference

This section is a reference to the tabs and dialogs of the tabs and dialogs of the **Zones Page.**

7.4.1   Image View Tab

The *Image View* tab has four roles:

1. The tab displays a fingerprint's raw image:

2. It carries out image enhancement procedures when you are defining a new fingerprint (Page 20).

3. It provides a template for a fingerprint's zoning procedures (Page 10).

4. After zoning is complete, the fingerprint's image in this tab highlights all zoned fields, and emphasizes any field represented by a **Field** object you select in the *Document Hierarchy* tab – *if* the Document Hierarchy is locked. (see the illustrations below and on the next page.)
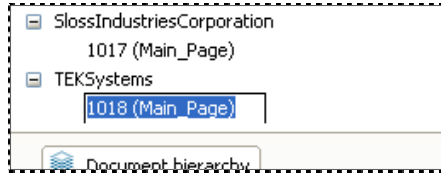
TEK Systems Fingerprint (1018)
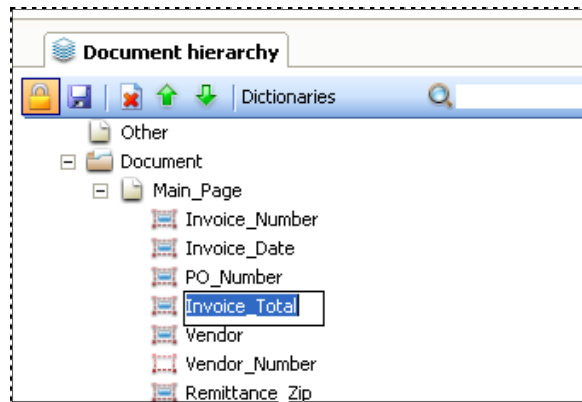
Invoices Document Hierarchy – *Invoice_Total Field*
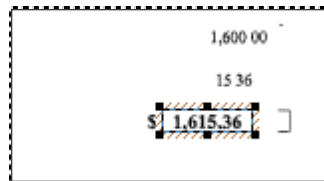
Fingerprint 1018: Invoice_Total Field

7.4.2   Fingerprints Tab

A **fingerprint** belongs to a **Fingerprint Class**: this is a very important distinction.

The *Fingerprints* tab displays both Fingerprint Classes and their fingerprints.

The *Fingerprints* tab has these features:

Global Class and Global Fingerprint. `<Global>` is a Fingerprint Class with one fingerprint: `555`. This fingerprint is not represented by an image. Instead, the Global Class and its fingerprint serve as the foundation for the Global RuleSet/Rule combinations you develop for the *rulerunner* tasks that process most pages (Chapter 6).

Toolbar. Icons of the tab's toolbar are active or inactive, according to your selection of an item in the Fingerprints Hierarchy:

The **+** icon ("Add New Item") at the far left allows you to add new Fingerprint Class or a new Fingerprint.

The **X** tool removes a Fingerprint Class and its fingerprints. *Alert!* This step does not ask for confirmation.

A fingerprint is always linked to a Page Type (see Page 17). The **Type** field is a drop-down list of the **Page** objects of the application's Document Hierarchy . Select the appropriate type for each Fingerprint you add.

The **Refresh** tool in the tab's upper right-hand corner updates the application's Fingerprint Hierarchy with new information.

Fingerprint Images. When you select a Fingerprint ID such as *1013(Main_Page)* in the example below, the **Zones Page** will display the fingerprint's image in the **Image View** area on the right.

✔ Don't hesitate to scroll through the list of *Invoices* fingerprints as you examine each image for special properties related to format and content.
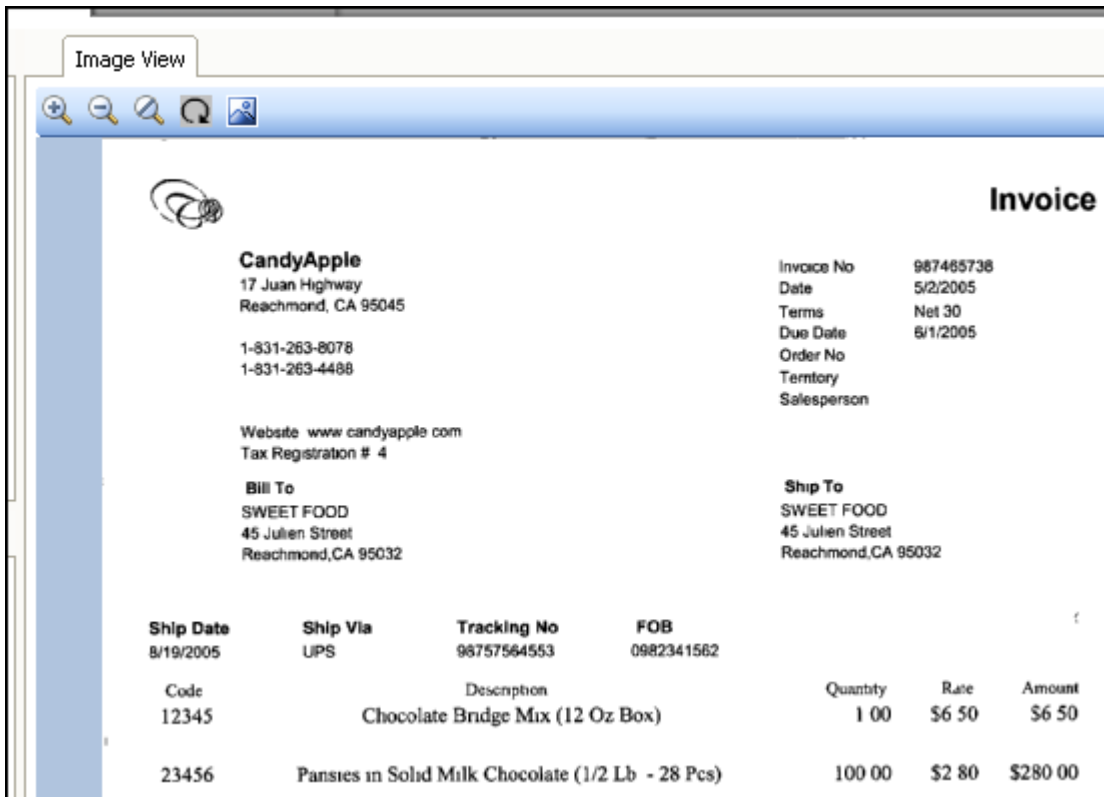
Fingerprint 1013(Main_Page)

7.4.3 Document Hierarchy Tab

The *Document Hierarchy* tab in the **Zones Page** is similar to the *Document Hierarchy* tab in the **Rulemanager Page** (Chapter 5) – but far more limited. In the **Zones Page**, the Document Hierarchy concentrates on the **Page** objects and **Field** objects of fingerprints, rather than on objects of every kind – and their rules.
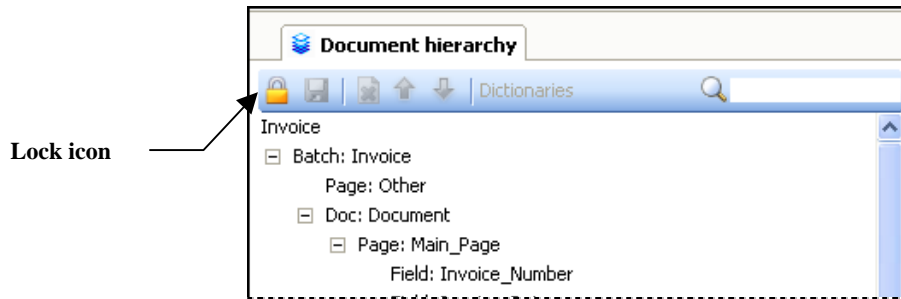

Zones Page – *Document Hierarchy tab*

✓   *Don't forget!* The Document Hierarchy cannot be modified until you lock the Document Hierarchy for editing by toggling the **Lock** icon.

7.4.3.1 Document Hierarchy Tab –Page Object

In the *1040EZ* application, locating a fingerprint and its fields is relatively easy because this training application starts off with just one fingerprint (*1011*):
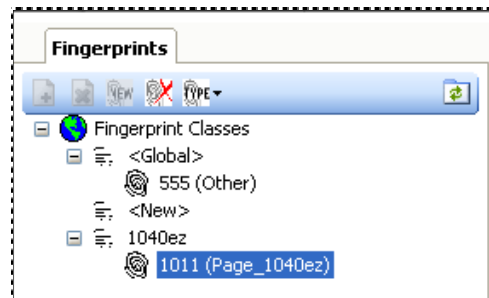
1040EZ Application – *1011 Fingerprint*

The illustration at the top of the next page portrays the relationship of the *Page_1040EZ* **Page** object to a fingerprint, as well as the link between the **Page** object's *TaxpayerSSSN* **Field** object and the fingerprint's Social Security Number field.

Chapter 5 explained the standard icons in the Document Hierarchy's toolbar. The table on the next page describes the options that appear when you right-click on a **Page** object or **Field** object, paying particular attention to those involving fingerprints and their zoned fields.

Page Options – *Document Hierarchy tab*

Document Hierarchy – Page Options

Page Optiion	Description
Add	Adds a single *child* **Field** object to the highlighted **Page** object of the application's Document Hierarchy. You can also use this option to add conditions to an object's Open and Close events (Chapter 6) or to modify conditions within an existing event.
Add Multiple	Adds multiple **Field** objects to a highlighted **Page** of the Document Hierarchy (Chapter 5).
Delete	Removes the highlighted object from the application's Document Hierarchy – without a warning from DStudio. *Alert!* This icon removes the object and any child objects it may have, along with properties, RuleSets and rules.
Manage Variables	Accesses the **Page** object's *Manage Variables* dialog (below).
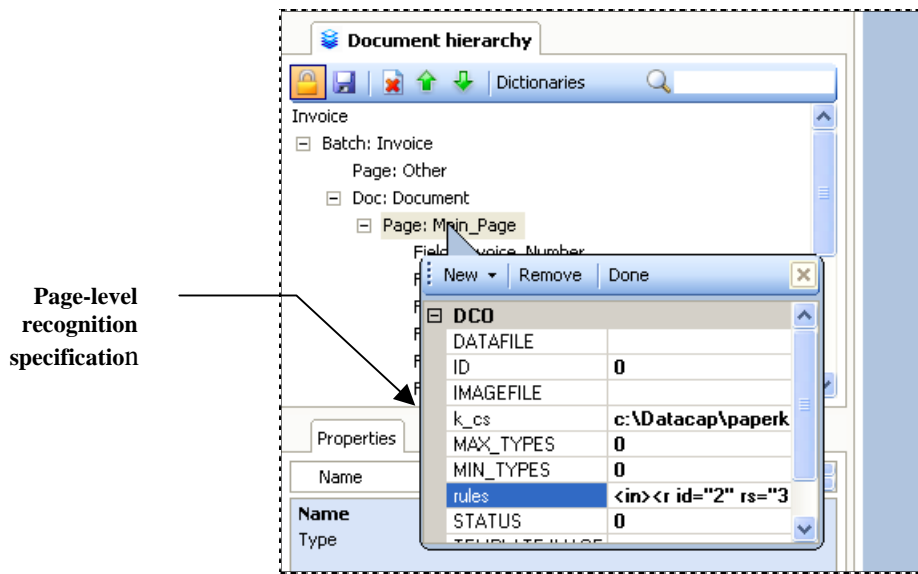
Page Object – *Manage Variables dialog*

The **Page** object's *Manage Variable's* dialog may differ from the default dialog described in Chapter 5 in two ways:

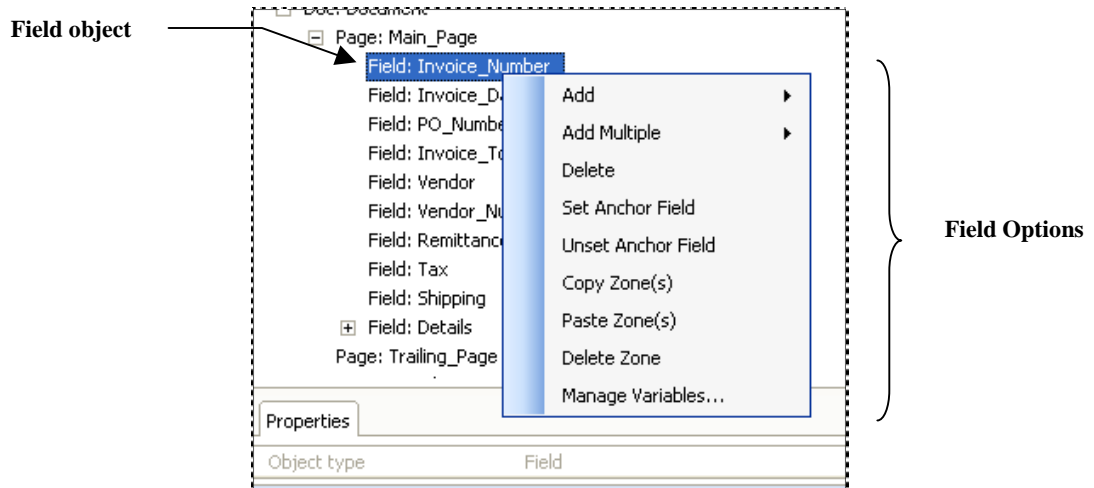- One or more new variables might designate recognition criteria that affect *source* pages (Page 14).

- The values assigned to the **rules** variable may have changed to identify all current RuleSet/Rule combinations bound to the **Page** object.

7.4.3.2   Document Hierarchy Tab: Field Objects

Depending on its nature, a field of a page can:

- Identify the page according to its Page Type.

- Help match the page to a specific fingerprint.

- Distinguish the current page from other pages in the batch (so-called Page Identification or Page ID).

- Hold data that is recognized, verified, validated and exported according to rules bound to corresponding **Field** object.

✓ *Very important!* Information about a field can be found in four locations in DStudio:

- ♦ **Document Hierarchy tabs**. The Document Hierarchy has values for standard properties of a **Field** object, as well as values for properties such as **Pos** (position) which are fingerprint-specific.

- ♦ **The Rulemanager Page's RuleSets tab.** This tab, in combination with the page's *Document Hierarchy* tab, displays details of any rules that are associated with the field (Chapter 6).

- ♦ **Zoned Fingerprints.** A fingerprint consists of an Image file(.tif) of a page, and an Information file (.cco) containing words and the location of other objects such as lines that were detected on the fingerprint image.

- ♦ **Field Recognition Properties.** You can assign unique Recognition properties to a zoned field within a particular fingerprint.

The list of options for a **Field** object representing a zoned field looks like the example on the next page. The explanations in the accompanying table describe options for zoned fields.

Field Options – Document Hierarchy tab

Document Hierarchy – Field Options

| Field Optiion	Description
Add	Adds a *child* **Field** object to the current **Field** object. This option gives you a chance to review and perhaps modify the Document Hierarchy's field structure, with due care. You can also use the **Add** option to insert a condition or other parameter into an object's *Open* or *Close* event. This technique can be especially useful if application has multiple fingerprints and you intend to assign unique criteria to a fingerprint. Chapter 6 shows you how to take full advance of this feature.
Add Multiple	Adds multiple *child* fields to the field you have highlighted (see Chapter 5 for details.) *Plan ahead.* When working with fingerprints – especially with multiple fingerprints – you may be tempted to add **Field** objects to the Document Hierarchy. However, because you cannot use the **Zones Page** to bind rules to the new fields, consider carrying out this procedure when you are in the **Rulemanager Page.**
Delete	Deletes the highlighted **Field** object – *without a warning* – and any *child* fields. *Alert!* Concern for a target field's children is especially important if the *parent* field is a table or OMR field.

Document Hierarchy – Field Options (continued)

Field Optiion	Description
Anchor Field	Assigns a unique role to the **Field** object you have selected. Typically, an Anchor field does not contain changing values to be recognized. Instead, it has a prominent location and prominent marking. Together, these features help distinguish a *source* page from other pages in a batch – and begin a process that matches *source* pages to their fingerprints.
Copy Zone(s)	*Copies* a field's location parameters. This procedure is helpful if your application uses multiple fingerprints with identical fields in identical locations. It is the first step of a copy-paste sequence.
Paste Zone(s)	*Pastes* a field's copied location parameters from one fingerprint to another fingerprint. *Important!* After you click on the tab's **Save** icon and un-toggle the **Lock** icon, DStudio assigns the zoning coordinates to a separate **Pos** property for the fingerprint.
Delete Zone	Deletes zone parameters for the field you have selected within the current fingerprint.
Snap Zone	
Manage Variables	Accesses the *Manage Variables* dialog for the current field.

The contents of a **Field**'s *Manage Variables* dialog usually change as you work with a fingerprint, or with other components of the **Zones Page.** For example, adding a second *1040EZ* fingerprint – and zoning its **TaxpayerSSN** field - adds a value to the dialog's **Pos** variable (illustrated below and on the next page.)
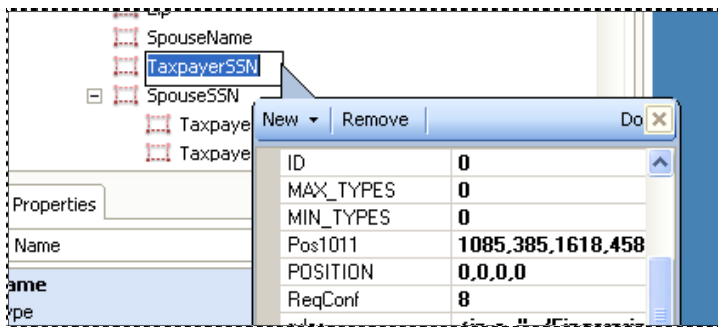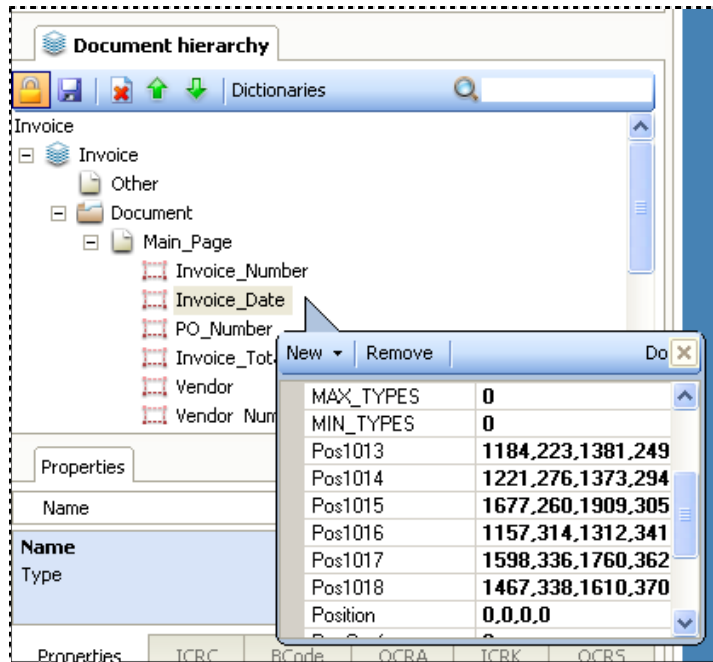

Pos: Fingerprint 1011
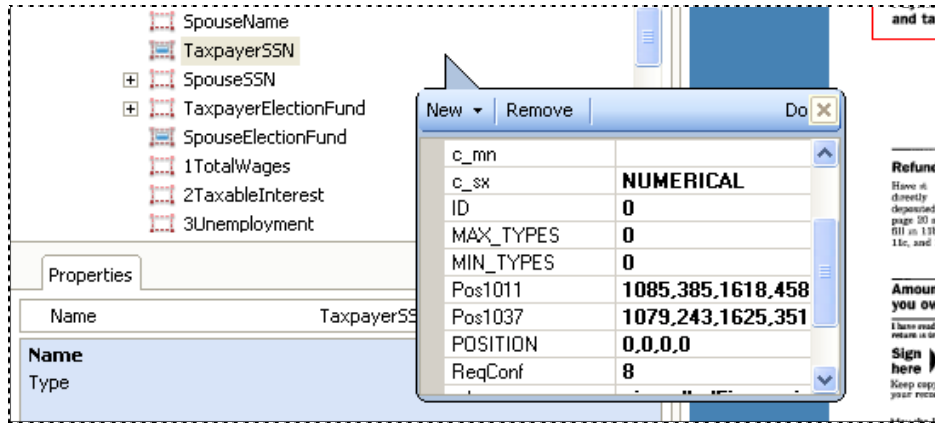
Pos: Fingerprint 1011

A more dramatic example shows listings of positions for various zoned fields in the fingerprints of the *Invoices* application:
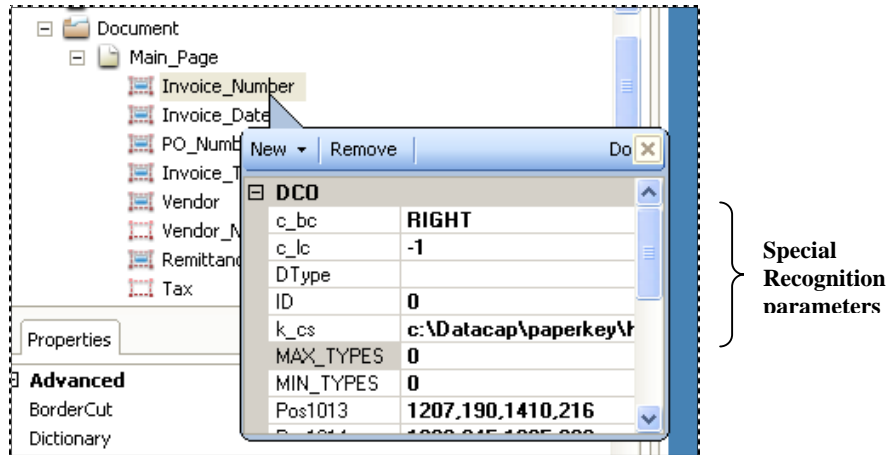

Invoice_Date Field: *Manage Variables dialog*
Field Positions, Multiple Fingerprints

The ***Manage Variables*** dialog for a field also expands as you assign Recognition criteria to the zoned field as it appears in an individual fingerprints. In the illustration on the next page, values for five criteria have been assigned to the *Invoice_Number* field. Page XX lists and describes the Recognition criteria.
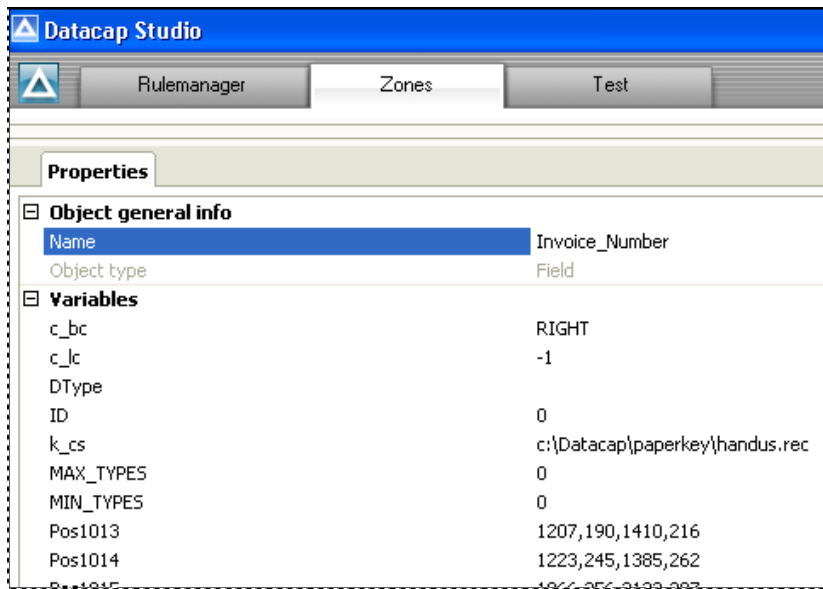
✓   *Remember!* You cannot explore these aspects of any *Taskmaster* application – including yours – until you toggle the *Document Hierarchy* tab's **Lock** icon.

Invoice_Number Field: *Manage Variables dialog*

Another aspect of the **Zones Page** is that information in the *Manage Variables* dialogs also shows up in the *Properties* tab. For example:

Invoice_Number Field: *Properties tab*

Page 14 describes the *Properties* tab of the **Zones Page**, and its five secondary tabs.