What is Laserfiche PhotoDocs?

White Paper

November 2009

Laserfiche®

Table of Contents

What is Laserfiche PhotoDocs?	3
Capture Documents into PhotoDocs	4
Connect to PhotoDocs	4
Retrieve Images from a Camera or File	4
Select Which Photos to Modify	5
Process Photos to Improve the Quality of Generated Text	6
Automatically Straighten and Crop	6
Adjust for the Curvature of Book Pages	8
Rotate Images for Readability	8
Generate Text with OCR1	0
Convert Images to Reduce File Size1	0
Custom Correct Individual Photos1	2
Manually Straighten and Crop12	2
Adjust Brightness and Contrast13	3
Store the Documents in Laserfiche14	4
Document Name14	4
Folder and Metadata14	4
Page Grouping1	5
Manual Processing and Storage1	5
Automatic Processing and Storage1	5

What is Laserfiche PhotoDocs?

Laserfiche PhotoDocs is a tool that enables you to use a digital camera to capture printed text documents and transform them into a digital, searchable format in Laserfiche. In other words, it lets you use a digital camera instead of a scanner. You can use PhotoDocs in situations where a scanner might be unavailable or difficult to use, such as:

- Capturing documents when you are away from your office and do not have access to a scanner.
- Capturing documents that might not fit into a standard scanner or cannot be removed from their location for scanning, such as book pages or posters.

PhotoDocs helps you modify documents captured with a camera in order to optimize the accuracy of the text read from them with Optical Character Recognition (OCR). For example, it can turn and crop documents to compensate for documents being captured at an angle or with different backgrounds. It can also improve the appearance of images and convert color photographs to black and white or grayscale.

PhotoDocs can also be used to bring non-document photographs into Laserfiche. You can use PhotoDocs to add Laserfiche templates, fields, and tags, and specify a folder path. PhotoDocs will store the original JPEG images, including the camera metadata, such as date taken and camera model, so this information will be available if the image is exported from Laserfiche as a JPEG.

This paper provides an overview of the capture, modification, and storage capabilities in PhotoDocs. For more information on how to use each feature, please click the Help button, or see the Laserfiche PhotoDocs 8 Guided Help videos: <u>Introduction</u> or <u>Manual Correction</u>.

Capture Documents into PhotoDocs

To begin working with PhotoDocs, connect to a source of images and specify which to process.

Connect to PhotoDocs

There are three ways to connect to PhotoDocs.

- From within the Laserfiche Client: Select the PhotoDocs button from the toolbar.
- From the Windows Start menu: Select Start, All Programs, Laserfiche, and Laserfiche PhotoDocs.
- **By connecting a camera:** When you turn on your camera and connect it to your computer, a dialog box will appear asking you to choose a program to use. Select Laserfiche PhotoDocs.

Retrieve Images from a Camera or File



PhotoDocs can retrieve images directly from your

camera or from a file where you previously saved them. When you connect to a camera, PhotoDocs will automatically load the images from the camera. If your images are stored on a network drive, you can navigate to the directory.

Source: Canon PowerShot SD1000

Source: C:\Documents and Settings\Example\Photos from Remote Office 9.12.2009

By default, PhotoDocs makes temporary copies of your images and does not alter or delete the originals. You have options for how these temporary copies

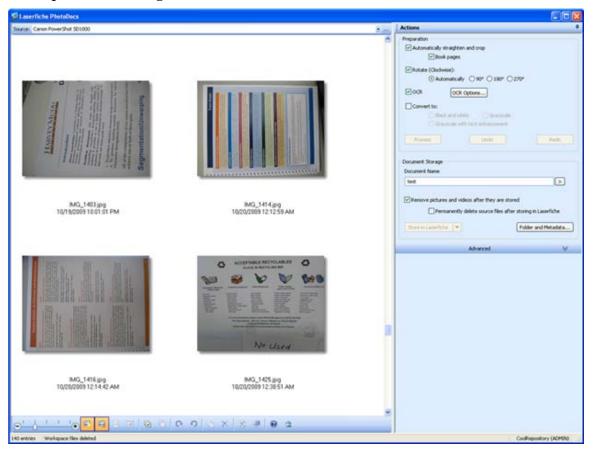
will be handled once you have finished modifying the documents and storing them in Laserfiche. Rather than manually clearing documents each time you are finished working with them, you can set the default to automatically remove pictures and videos from

Document Storage	
Document Name	
Survey forms %(DateTaken)	>
Demons with more and olderer after these are shown	
Remove pictures and videos after they are sto	
Permanently delete source files aft in Laserfiche	er storing

PhotoDocs after they have been stored. This setting only removes the copies from PhotoDocs; this option by itself does not affect the original files. Another setting allows you to set the default for source files to be deleted from your camera or Windows folder once the modified documents have been stored in Laserfiche.

Select Which Photos to Modify

When you connect to a camera or folder, PhotoDocs will display all the images stored there. You can select one or more of these images to modify with specified settings.



Process Photos to Improve the Quality of Generated Text

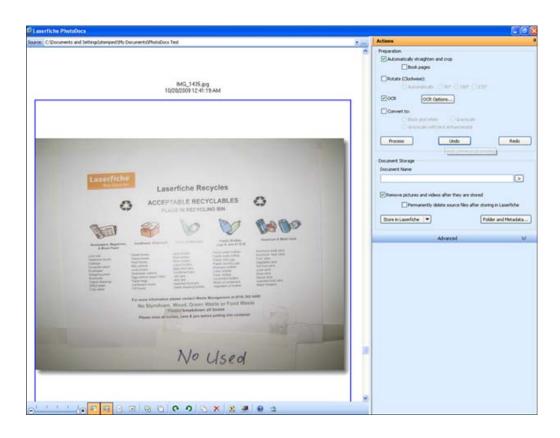
You can specify which processes will be applied to the selected photos, with the goal of improving the quality of OCR (Optical Character Recognition) and reducing file size before storing the documents in Laserfiche.

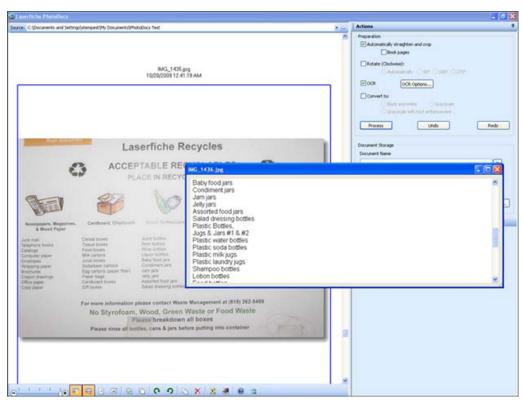
This section discusses the various options for modifying your pictures, shows example pictures before and after the processes have been applied, and displays the extracted text.

Preparation
Automatically straighten and crop
Book pages
Rotate (Clockwise):
Automatically ○ 90° ○ 180° ○ 270°
V OCR OCR Options
Convert to:
 Black and white Grayscale
Grayscale with text enhancement
Process Undo Redo

Automatically Straighten and Crop

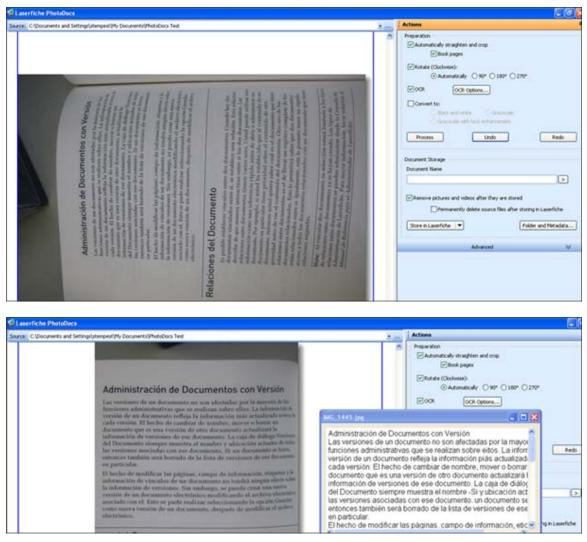
OCR gives better results when performed on horizontal text. When you are capturing images with a camera, it is difficult to align the camera perfectly. This option helps you compensate for that fact. When you select **Automatically straighten and crop**, the images will be automatically adjusted so that they are upright and have neat borders.





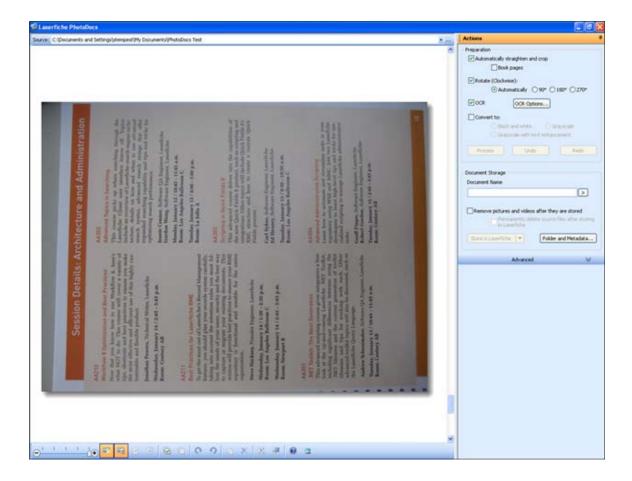
Adjust for the Curvature of Book Pages

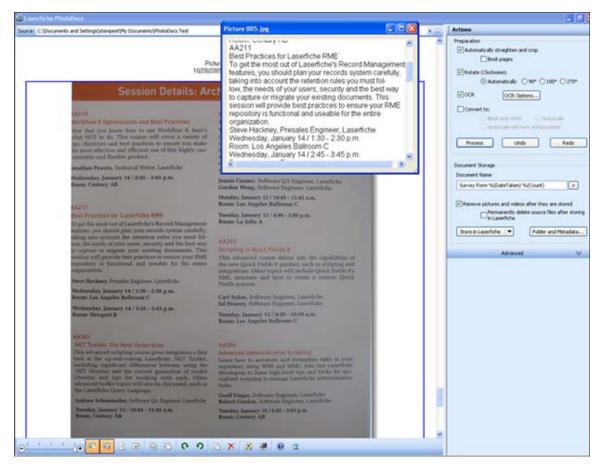
When a book is opened, the pages tend to curve away from the spine. When the book is photographed, the characters in the resulting image are bent to the shape of the pages, which affects the quality of OCR. Select **Book pages** to have PhotoDocs compensate for this curvature in order to increase the accuracy of OCR.



Rotate Images for Readability

When capturing documents with a camera, you may turn the camera in different directions to capture the best image. Then when you import the pictures to a computer, they may appear in the direction that is "up" for the camera, rather than for the text. PhotoDocs can rotate the images to an appropriate orientation for OCR, either automatically or by a preset amount.





Generate Text with OCR

Most the features in PhotoDocs are designed to help improve the quality of

text generated by OCR. You can perform the OCR itself within PhotoDocs, and can select options such as language, whether to optimize for speed or accuracy (accuracy is recommended), and whether to decolumnize text. Another option is to use PhotoDocs to prepare images for OCR, but leave the OCR option in PhotoDocs cleared and perform the OCR later with another program, such as in the Laserfiche Client or through Quick Fields.

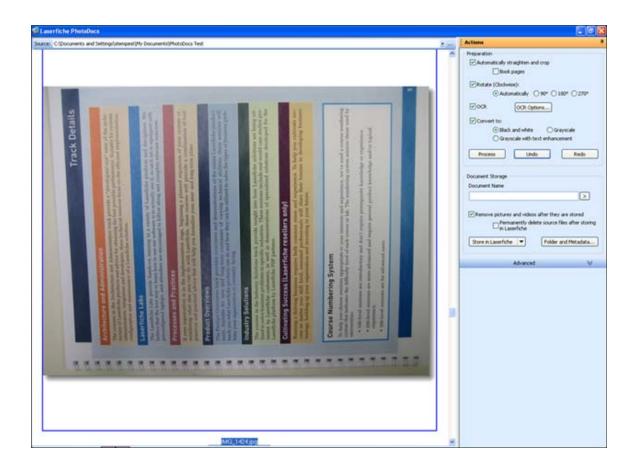
OCR engine:	OmniPage OCR		•
anguage:	Chinese Simplified		•
OCR engine optin	nization:	Accuracy	
Decolumnize t	ext		

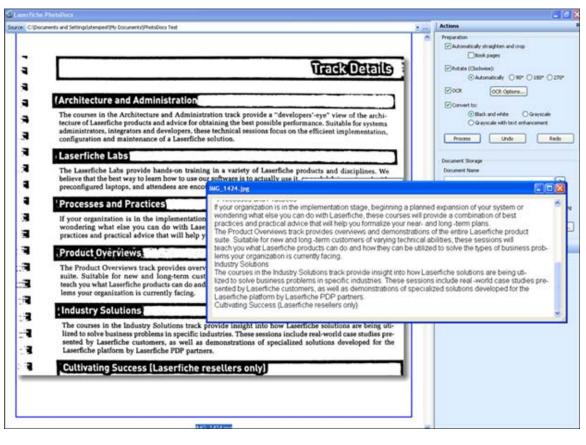
hitecture and Administration	Picture 005.jpg	
AA302 Advanced Topics in Searching This course picks up where searching through the Laserfiche Client user interface leaves off. Topics include an overview of Laserfiche search engine archi- tecture, details on how and when to use advanced search syntax, advanced search strings that offer expanded searching capability and tips and tricks for optimizing search performance.	tecture, details on how and when to use advanced	
Jeanie Conner, Software QA Engineer, Laserfiche Gordon Wong, Software Engineer, Laserfiche	optimizing search performance. Jeanie Conner, Software QA Engineer, Laserfiche	
Monday, January 12 / 10:45 - 11:45 a.m. Room: Los Angeles Ballroom C	Gordon Wong, Software Engineer, Laserfiche	
Tuesday, January 13 / 4:00 - 5:00 p.m. Room: La Jolla A	Monday, January 12 / 10:45 - 11:45 a.m. Room: Los Angeles Ballroom C Tuesday, January 13 / 4:00 - 5:00 p.m.	

Convert Images to Reduce File Size

PhotoDocs can convert your photographs to black and white or grayscale images, which will reduce the file size when the images are stored in Laserfiche.

Note: Unlike with images created with a traditional scanner, converting photographs to black and white may not improve the quality of OCR. If you have chosen both to OCR and to convert images to black and white or grayscale, the OCR will be performed first by default. You can perform the conversion first by applying the processes separately.





Custom Correct Individual Photos

For the features described above, you specify whether to perform an operation or not, but if it is selected, PhotoDocs automatically determines the settings. In some cases, you can also correct individual photos manually. This is particularly useful if the images you are working with have "false" edges or corners, such as skewed lines near the edges of the pages, that may throw off the straightening algorithms. It can also improve the results of OCR on book pages by allowing you to define the edge of the page, which helps PhotoDocs calculate the curvature of the book.

Manually Straighten and Crop

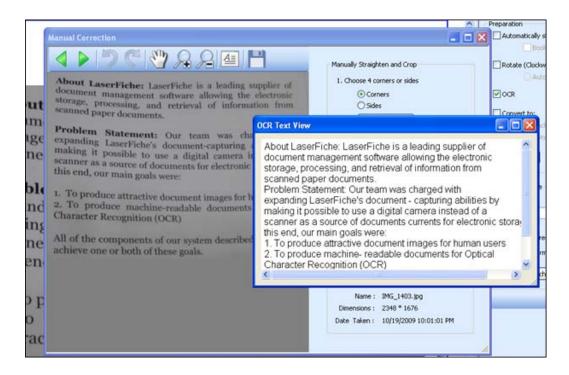
In addition to the ability to have all selected images automatically straightened and cropped as described above, you also have the option to adjust the settings for each image and straighten and crop each individually. For some images, you may be able to achieve better OCR results by performing these operations manually.

Specify how to determine the edges of the page:

- **Corners:** You place dots and PhotoDocs will automatically draw straight lines between them.
- Sides: You draw lines along each side of the image.

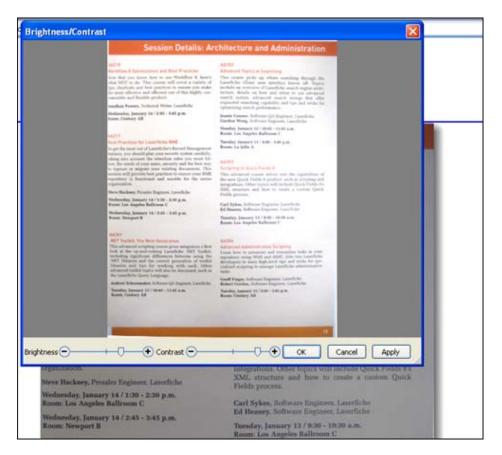
You can straighten, repeat these operations until you are satisfied with the shape of the page, and then crop.

Manual Correction	
<section-header><section-header><section-header><section-header><section-header><section-header></section-header></section-header></section-header></section-header></section-header></section-header>	Manually Straighten and Crop 1. Choose 4 corners or sides Corners Sides Sat selecting 2. For a book page, drag the top and bottom sides so they follow the curve of the page. 3. When the borders look right, press to straighten the page: Straighten 4. Repeat steps 2 and 3 f necessary to make the text of a book page look straight. 5. Press to crop: Crop File Information Name : IMS_1403.jpg Dimensions : 2703 * 2030 Date Taken : 10/19/2009 10:01:01 PM



Adjust Brightness and Contrast

You can also adjust the brightness and contrast for individual images. Using sliders, you can manually alter these settings.





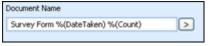
Store the Documents in Laserfiche

In addition to the settings for how PhotoDocs will process your images, you can configure additional details for how they will be stored as documents in your Laserfiche repository. The selected storage settings will apply to all images stored at the same time.

Document Name

You can specify a default document name. You can use tokens to automatically fill in the document name with information generated from the

photo files or the PhotoDocs session, such as date or time taken, date or time processed, or user name.



Folder and Metadata

In PhotoDocs, you can also specify the repository and folder where the

documents will be stored, and which template, fields, and tags will be applied to them.

- **Repository:** If you open PhotoDocs from outside a Laserfiche repository, you will be prompted to choose a repository where the documents will be saved. If you open it from within a repository, by default it will save documents to the same repository, but you can change the destination.
- **Folder:** Browse to an existing folder or type a new folder path

Folder and Metadata	X
Repository: CoolRepository General Fields Tags	Change
Folder:	
CoolRepository/Notes 2008.10.21	Browse
Volume:	
<use default="" folder's="" parent="" volume=""></use>	
ОК	Cancel

to have the folders created in Laserfiche. If you have opened PhotoDocs from within the Laserfiche Client, the default will be the folder that is currently open in the client.

- **Fields:** Select a template. If needed, add or remove fields. You can type information in the fields or use tokens to have the fields filled out with information from the files or program.
- Tags: Select a tag to apply or create a new tag from within PhotoDocs.

Page Grouping

By default, all images selected for storage will be grouped as pages within a single document. You can change this setting to group documents by different factors. This can be helpful when you have configured PhotoDocs to process and store documents immediately. The page grouping options are found in the **Advanced** section of the Actions Pane.

Page grouping options:

- Group all selected pictures into one document.
- Fixed number of pictures per document.
- Ending a document with a blank page. You can plan ahead and photograph white separator sheets when capturing your images.
- Group pictures taken at the same time into a document. You can specify the amount of time that needs to elapse before the next picture will become the start of a new document.

Manual Processing and Storage

You can either process images first and then store them, or process them and store at the same time. The advantage of processing first and then storing is that you can confirm that the processes performed correctly before you store the documents in Laserfiche. The advantage of storing and processing simultaneously is that you can complete the entire operation at once, instead of waiting for processing to complete before storage.

Automatic Processing and Storage

If you consistently use the same processes and settings in PhotoDocs and seldom need to adjust them, you may want to configure PhotoDocs to automatically begin processing documents according to the specified settings as soon as they are imported, or even to automatically store the documents.

Laserfiche

What is Laserfiche PhotoDocs? November 2009

Author: Snow Tempest Technical Editor: Evelyn Crofts and Ryan Wong

Compulink Management Center, Inc. Global Headquarters 3545 Long Beach Blvd. Long Beach, CA 90807 U.S.A

Phone: +1.562.988.1688 www.laserfiche.com

Laserfiche is a trademark of Compulink Management Center, Inc. Various product and service names references herein may be trademarks of Compulink Management Center, Inc. All other products and service names mentioned may be trademarks of their respective owners.

Laserfiche makes every effort to ensure the accuracy of these contents at the time of publication. They are for information purposes only and Laserfiche makes no warranties, express or implied, as to the information herein.

Copyright © 2009 Laserfiche All rights reserved