## Digital Collections, Repositories, and Archives

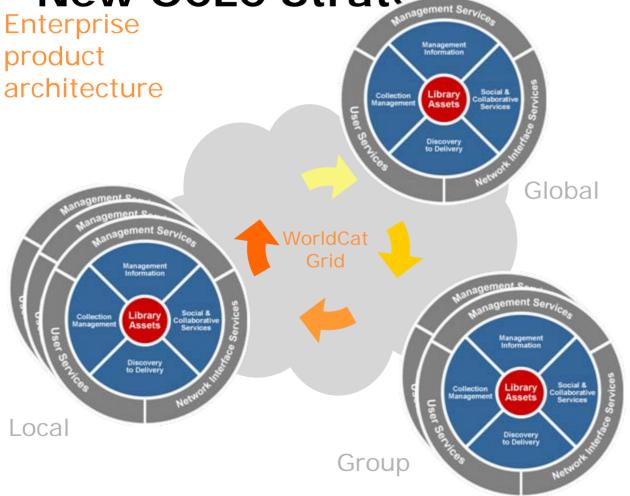
**Greg Zick, Vice President Digital Collection Services** 

ARL Research Library Leadership Fellows



#### **Future Direction**

- New OCLC Strategy





#### **Presentation Outline**

- Digital Collection Creation
- Institutional Repositories
- Digital Repositories
- OCLC Future Directions

# One way to digitize all the world's collections

- List all the institutions that have collections?
  - Institutional Registry
- List all the collections at each institution
  - Archive Grid
- Digitize the items in the collections
  - Digital Registry
- Create the Digital Collection
  - CONTENT
- Archive original TIFFS
  - Digital Archive
- Add to Global Digital Repository
  - Harvest metadata into WorldCat

### **Digital Collection Creation**

CONTENTdm



Assess users' needs and collections'

conditions

Convert your materials to digital collections and create metadata

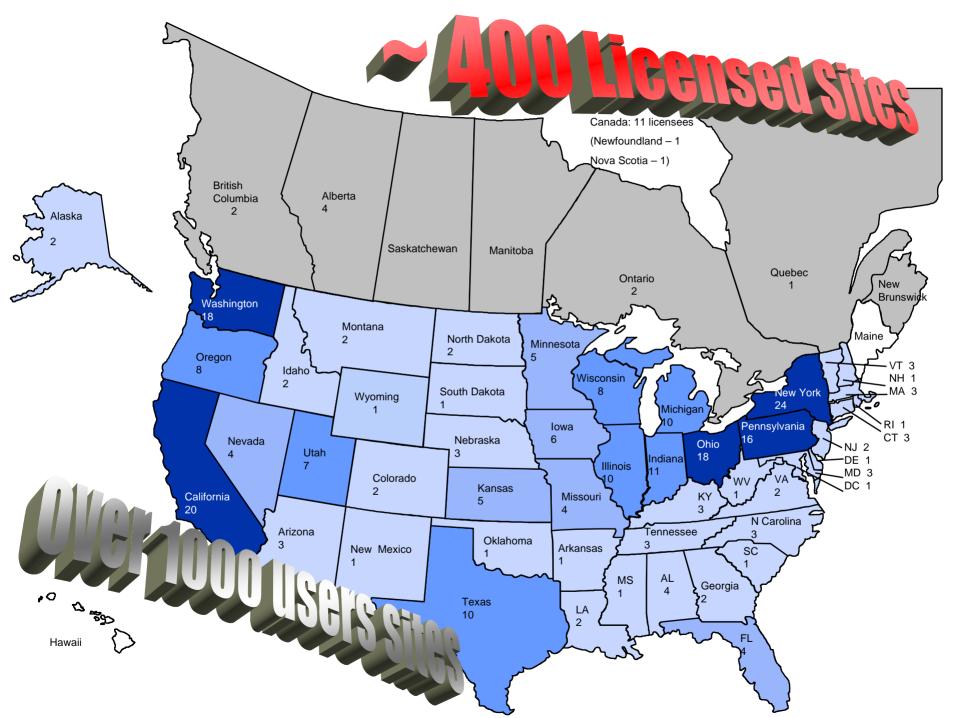
WorldCat

Expose your digital collections while providing Web access

Organize and store your digital collections

#### What is CONTENTdm?

- A complete software solution developed by DiMeMa
- Store, manage and access your digital collections
- For organizations of all types and sizes from academic libraries, historical societies, public libraries and other collaborators
- Showcase a wide range of media types from photos and documents to audio and video files



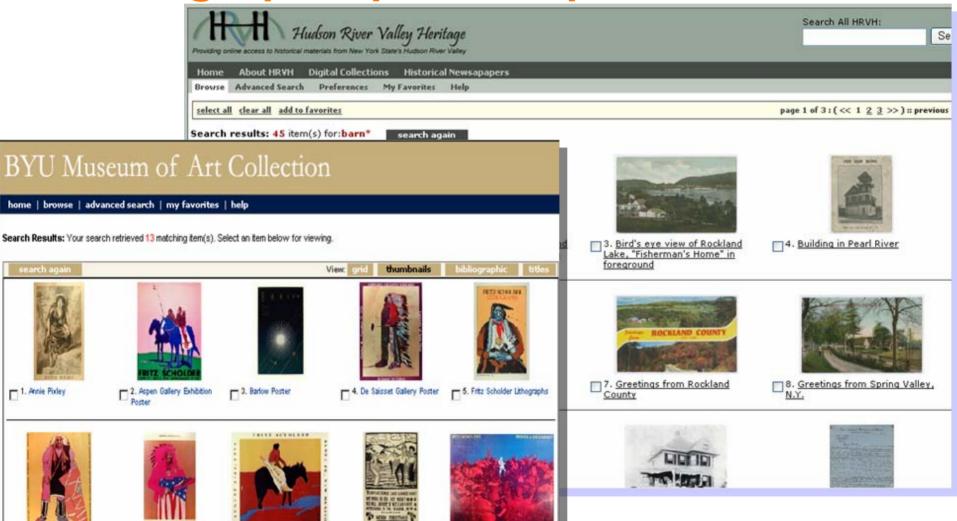
## **Building partnerships and CONTENTdm digital collections**

- Multi-regional or statewide consortia:
   AK, CA, FL, IA, IL, IN, NE, MN, MO, NY,OH,
   PA, WI
- Mountain West Digital Library 20 members
- Western Waters Digital Library 30 members
- Columbia River Basin Ethnic History Archive
- Digital Library of Appalachia -12 members
- Historically Black Colleges and Universities Library Alliance
- Upper Mississippi Valley Digital Image Archive
- REALIA Project –Assoc. Colleges of the Midwest, Assoc.
   Colleges of the South and the Great Lakes College Assoc.
- Consortium of Liberal Arts Colleges (CLAC)
  - 62 members

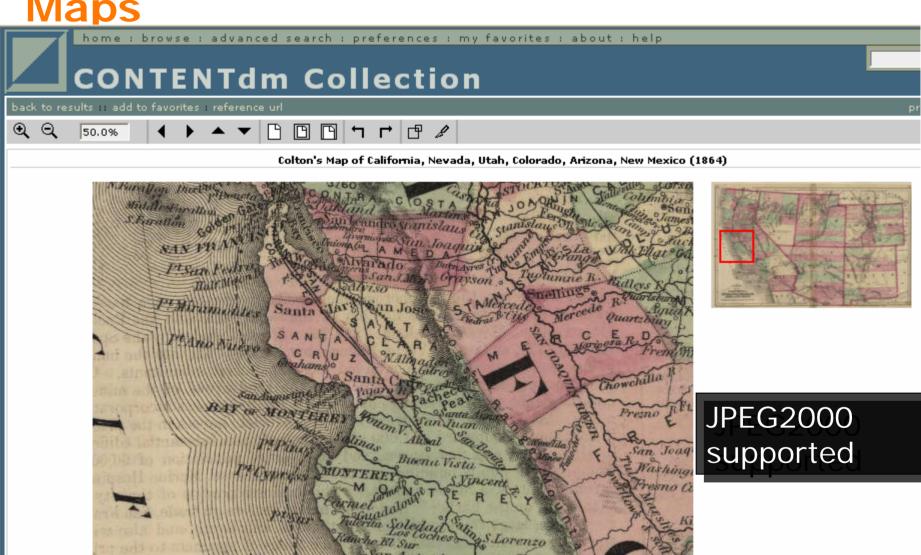


## Images:

Photographs, posters, postcards



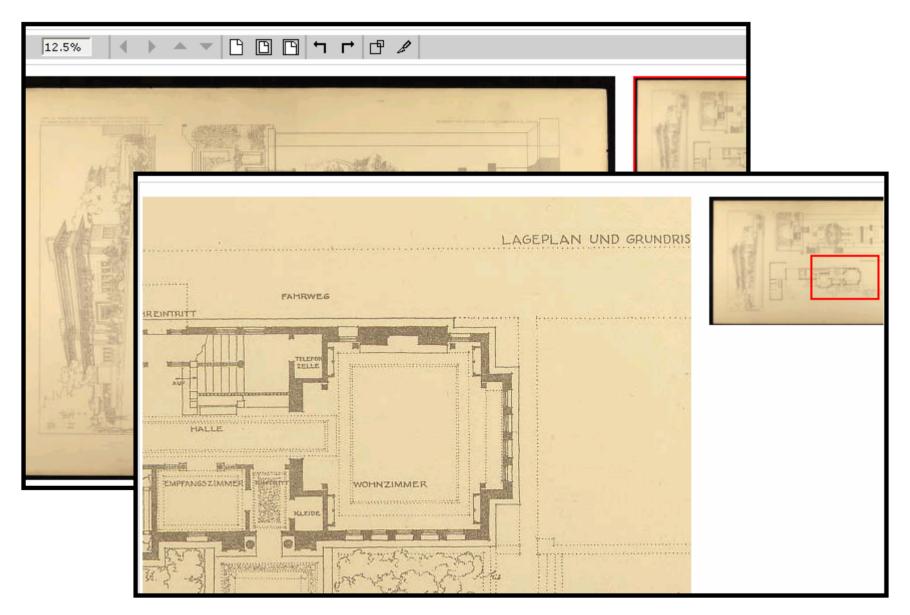
#### Maps



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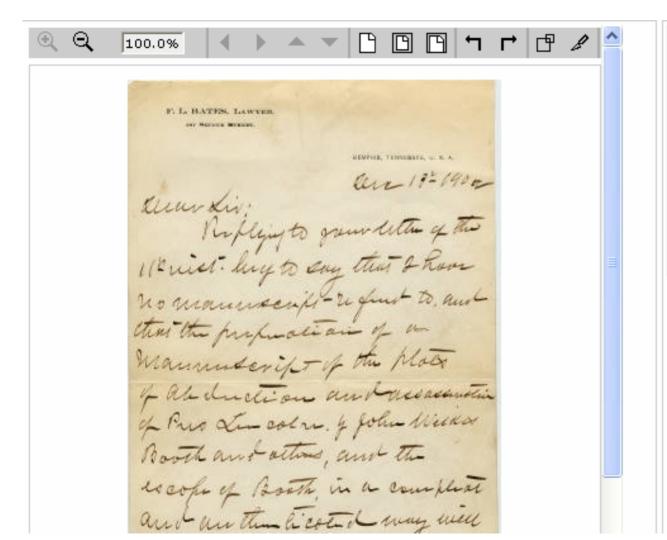
S.Benito Miguelita

### Zoom and Pan



#### **Documents:**

#### Text-based letters, journals, diaries and more



Dec. 13, 1902 Dear Sir:

Replying to your letter of the 11th inst. beg to say that I have no manuscript referred to, and that the preparation of a manuscript of the plots of abduction and assassination of Pres. Lincoln by John Wilkes Booth and others, and the escape of Booth, in a complete and authenticated way will require the expenditure of time, labor and money, and

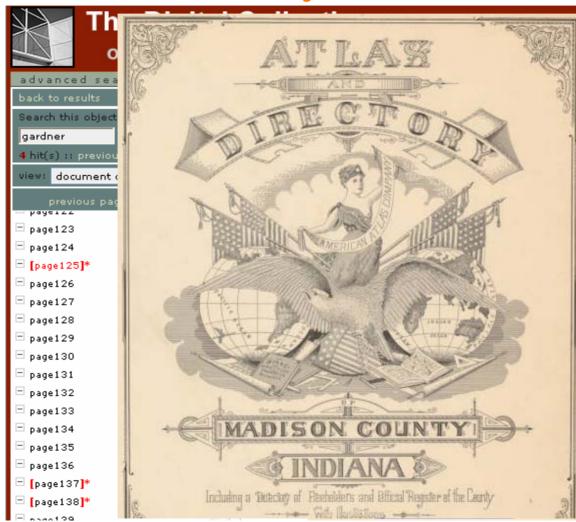
before beginning the undertaking

should require that we

Transcribed text becomes searchable!

#### **Documents:**

Text-based letters, journals, diaries and more



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Dobson, Caswell J., Summitville. Dovle, Rachel and John, Summity Davis, Julian, Summitville. Dean, Wm. A. and E. E., Summity Easton, Nancy, Summitville. Eakins, Eleanor B., Elwood. Ellsworth, Wm. A. and Wife, andria. Free, Orizon, Rigdon. Forrest, Elivira, Summitville. Forrest, I. D., Elwood. Ferguson, Walter S., Indianapolis Finch, Jubal A., Elwood. Greenlee, Wm., Summitville. Gardner, John A., Summitville. Griffee, John, Summitville. Greenlee, Prudence A., Orestes. Gemmill, Andrew, and E. Drav Rigdon. Greenlee, Andrew, Orestes.

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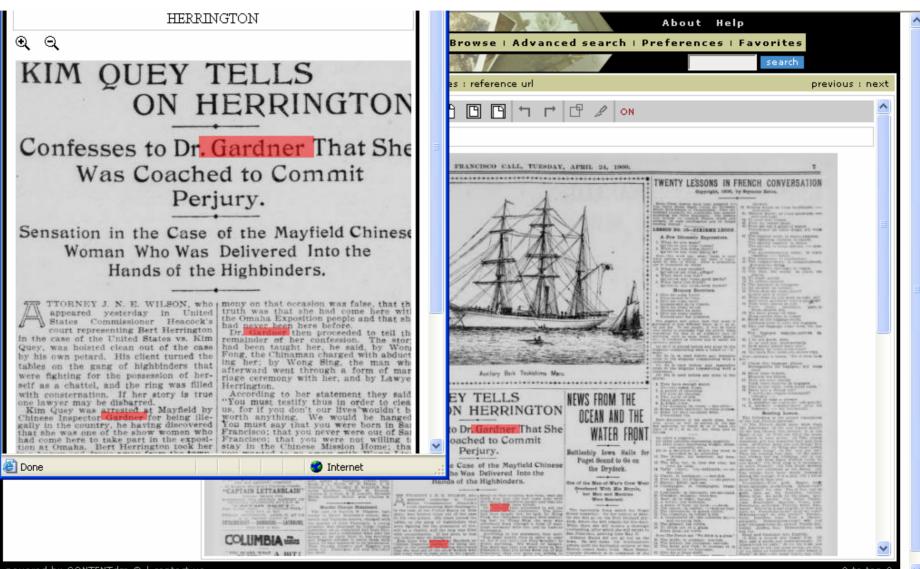
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#### CONTENTS

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Income Payments to Individuals, by States, 1929-38 John L. Martin Survey of Current Business: Vol. 20, No. 04 (April 194)	0)	es. various branches of the mining and	. 101	

#### **Documents:**

#### Newspapers



#### Audio/video

#### PUBLIC **EVERETT** LIBRARY Northwest Collection

Northwest Collection Browse Collections City of Everett - Washington Contact us

Search Results: Your search retrieved 3 matching item(s).

Click on the thumbnail or title to view the item and corresponding description.

#### EVERETT PUBLIC

Northwest Collection Browse Collections

Title: Jack Leonard Miller interview

United States--Washington (St Location:

Date:

Photographer:

Subject:

Jack Leonard Miller (1889 - 1986) was one of the 74 Wobblies arrested following the Everett Massacre and charged with killing deputy Notes:

Jefferson Beard. An articulate spokesman for the I. W. W., Jack was interviewed many times for film, video, radio and written histories.

Hear an edited segment from an interview done by writer Jim Casey, at that time a columnist for the Everett Herald.

Original Format: Cassette tape interview

**Everett Public Library** Repository:

Order Number:

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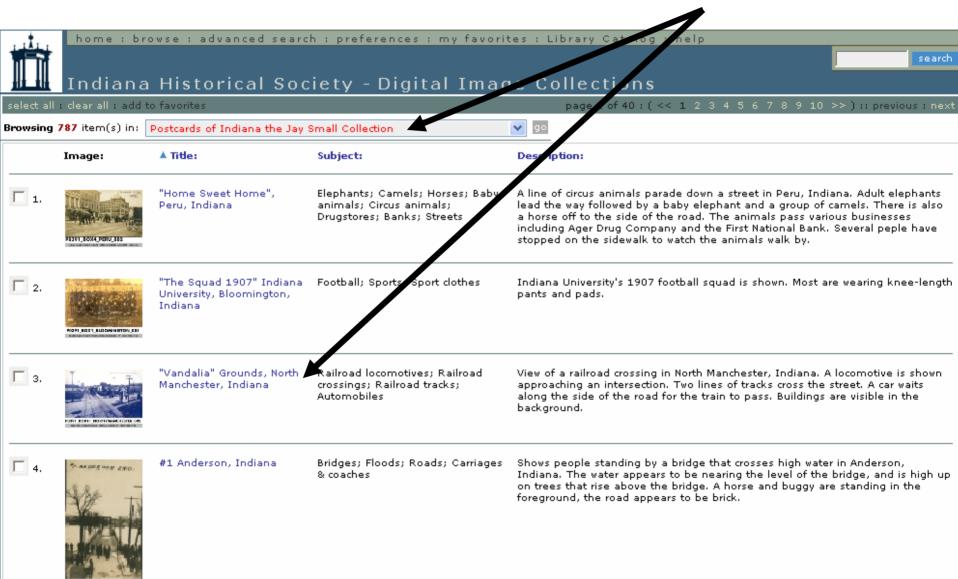






3. Jack Leonard Miller interview

#### **Browse**

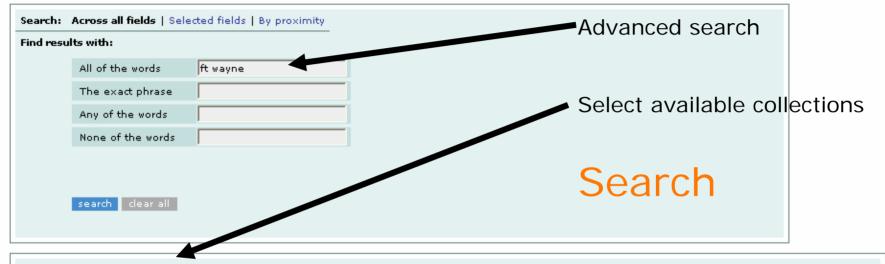




home: browse: advanced search: preferences: my favorites: Library Catalog: help

search

#### Indiana Historical Society - Digital Image Collections

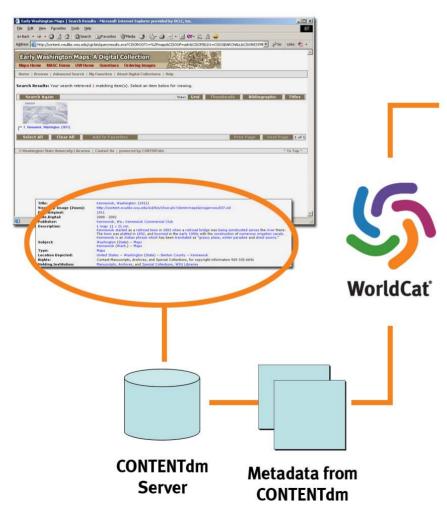


#### Select specific collections:

- ✓ Alexander Gardner Lincoln Glass-Plate Negative
- Art of Mary Lyon Taylor
- ▼ Christmas Greetings
- ✓ Civil War Materials
- ▼ Daniel R. Weinberg Lincoln Conspirators Collection
- ▼ Indiana Through the Seasons
- ▼ Indianapolis Recorder
- ✓ Jack Smith Lincoln Graphics Collection
- ▼ James Whitcomb Riley -- Hoosier Poet
- ✓ Karl Bodmer Prints
- ✓ Lew Wallace in New Mexico
- ✓ Madam Walker

- ▼ Miscellaneous Images from IHS Photo Collections
- ▼ Native American Portraits from the Aboriginal Port folio
- ✓ Nineteen's 19
- ▼ Notable Hoosiers
- ▼ Other Lincoln-Related Manuscripts in the Collection
- ▼ Panoramic Photograph Images
- ▼ Photography of O. James Fox: 1945-1960
- ▼ Postcards of Indiana the Jay Small Collection
- ▼ Treasures from the Indiana Historical Society
- W.H. Bass Photo Company
- ▼ W.H. Bass Photo Company--Indiana Rail Transportation Images
- ▼ W.H. Bass Photo Company--Pamela Tranfield Memorial Collection

### Discovery: WorldCat harvesting & Open WorldCat





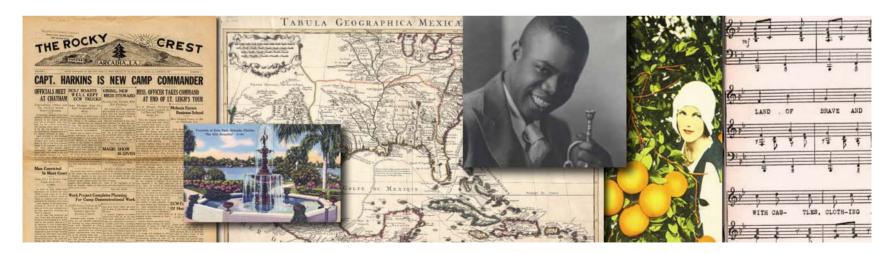




### One system, many solutions

CONTENT provides comprehensive solutions for your historical digital archives

Photographs, diaries, slides, newspapers, books, letters, audio and video oral histories, maps –all your digital assets!



http://www.contentdm.com/customers/

- Connexion digital import
  - New option for OCLC catalogers
  - Add digital resources to CONTENTdm via Connexion cataloging process
- Benefit
  - More options for building digital collections
  - Catalog using most convenient process for the organization

## Connexion digital import

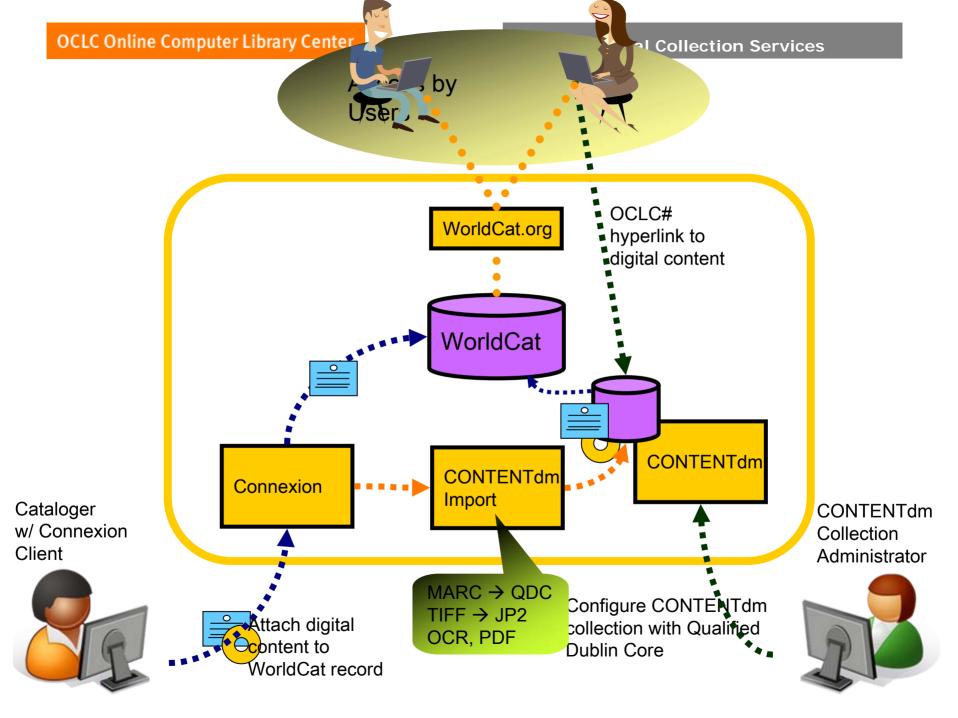
- Add items to CONTENTdm via the Connexion Client
- Digital collection growth built into cataloging workflow
- WorldCat MARC record crosswalked to Qualified Dublin Core and added to CONTENTdm
  - OCLC number stored in CONTENTdm a global persistent identifier
- Digital items accessible by FirstSearch, WorldCat.org and WorldCat Local
- Requires OCLC Cataloging subscription, CONTENTdm license and CONTENTdm Hosting Services

### Connexion digital import

- Metadata choices for cataloging
  - Connexion client (MARC)
  - CONTENTdm (DC, QDC, VRA)
    - Acquisition Station
    - Web-based Add option
- Serials support
  - Use "Attach Digital Object" in Connexion client for each issue in a serial item
  - 856 link will automatically retrieve a search results page with links to each issue stored in CONTENTdm

#### Connexion digital import

- In Connexion Client:
  - Attach Digital Content to existing record
  - Select CONTENT on collection
  - Select file(s) from local computer/network
  - Replace command
- System processes metadata and file for import into CONTENT
  - Digital item sent to CONTENTdm collection
  - MARC metadata mapped to Qualified Dublin Core
  - Compound object creation, JPEG2000 conversion, and OCR or PDF processing, if applicable
  - Thumbnails generated
  - Link added to 856 field in WorldCat record

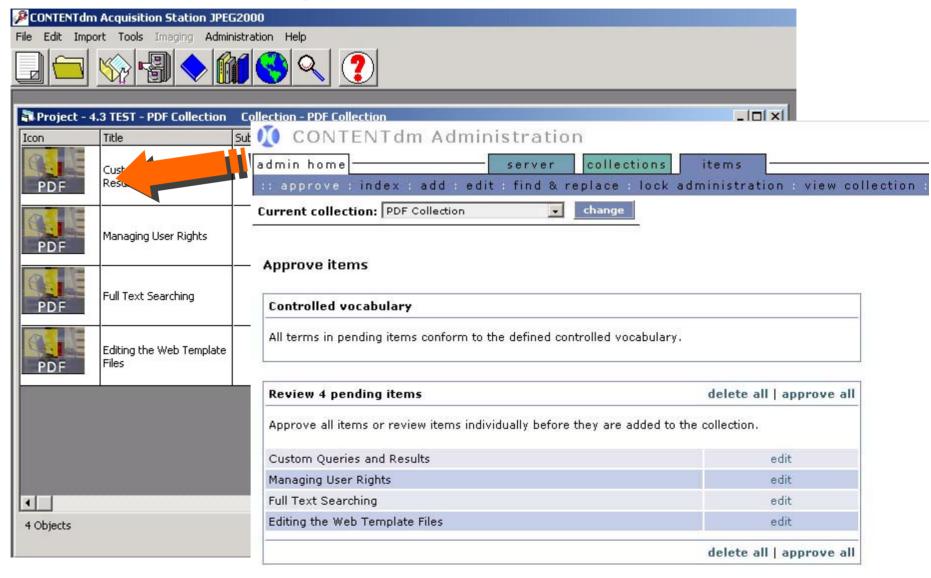


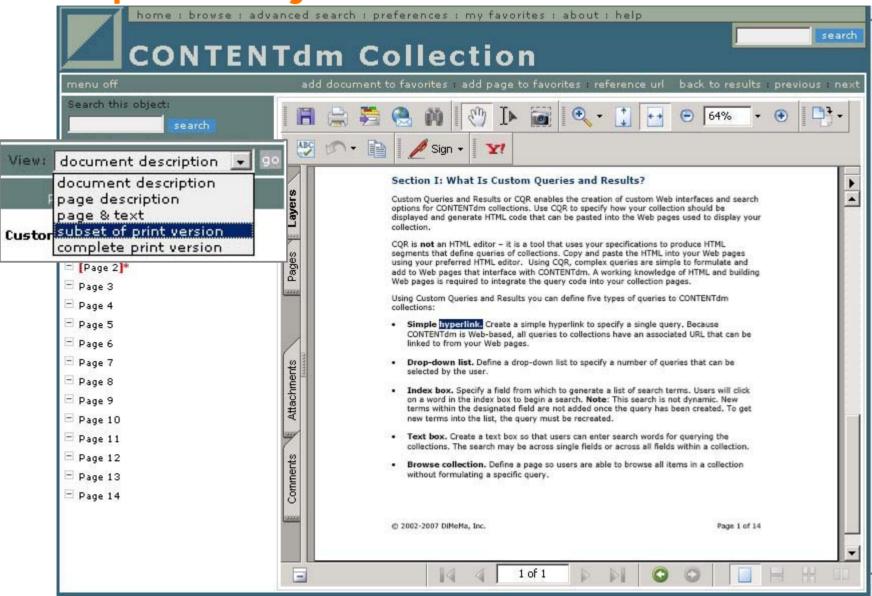
- Improved PDF handling
  - Convert multiple-page PDF files to CONTENTdm compound objects
    - Subset print options
  - Search term highlighting within PDF files
  - Creation of thumbnail images from PDF files
  - Improved text extraction from PDF files
- Benefits
  - More efficient processing of PDF documents
  - Single database of ALL digital resources
  - Better end user experience

- PDF files can be imported using standard options
  - Single or batch import via Acquisition Station
  - Web-based Add option
  - Connexion digital import
- Thumbnail images are automatically generated from the PDF when the item is added to the collection
- Text is extracted from the PDF and inserted into the full text search field when the item is added to a collection
  - Collection must have full text search field and that field must be empty when PDF is added to the collection

#### CONTENT dm 4.3

- When compound object conversion is enabled, CONTENTdm:
  - Creates a compound object based on the page order of the PDF.
  - Generates a page-level metadata record for each page.
  - Extracts text from the PDF, converts it to UTF-8, and inserts it into the full text field of the associated page level record.
  - Generates thumbnail images of each page of the PDF. The thumbnail image of the first page will also be used for the compound object.
  - Retains the original PDF file for export and printing.
  - Displays the PDF compound object in a compound object viewer with each page of the PDF accessible from the left navigation menu.
  - Highlights search terms in the PDF.
  - Provides an option to select a subset of the PDF to print or save.



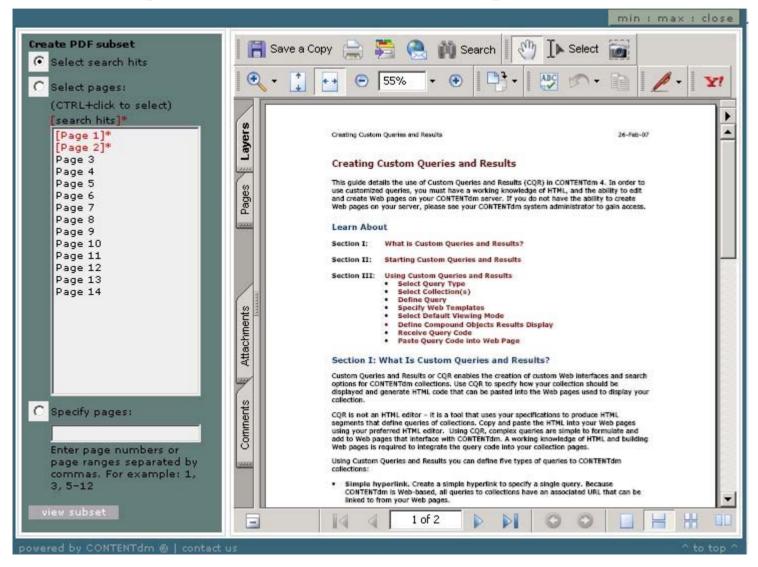


#### **PDF Enhancements**

#### Printing and downloading

- Complete print version
  - Original PDF file retained for printing and saving
- Subset of print version
  - Select a subset of pages from the PDF to view, save, or print
  - Select all pages with search hits or pick individual pages or page ranges
  - Do not have to wait for large download if only need a few pages
  - Also available for non-PDF compound objects when they have been processed using the OCR Extension

#### Printing and downloading



- Reduce the size of file that is downloaded for viewing
  - An entire PDF may be several MB but individual pages are much smaller
  - View a page within large PDF without downloading the full document
  - Increase speed of access to view
- Provide full text indexing by page not document
  - No secondary search required to find specific content in PDF
- Print only the information you need
- Better end-user experience!

#### CONTENT dm 4.3

- Quick and efficient for collection builders!
- PDF pages of compound object do not count against total number of items on the server!
- Ideal for born digital documents!
  - Theses, dissertations, government documents, epublications, and more...

#### **Digital Repository**

#### - future directions

- Automatic WorldCat registration and links
  - Register and replicate
  - Web-based user controlled mapping DC, MARC, VRA
  - Auto add WorldCat record #
- Seamless/transparent WorldCat ingest
- Update of all digital items with unique WorldCat reference number
- Integration with all features and functions of WorldCat.org
- Local branding and customization

#### **OCLC Enterprise Strategy**

#### "Discovery to Delivery" Collection Curation

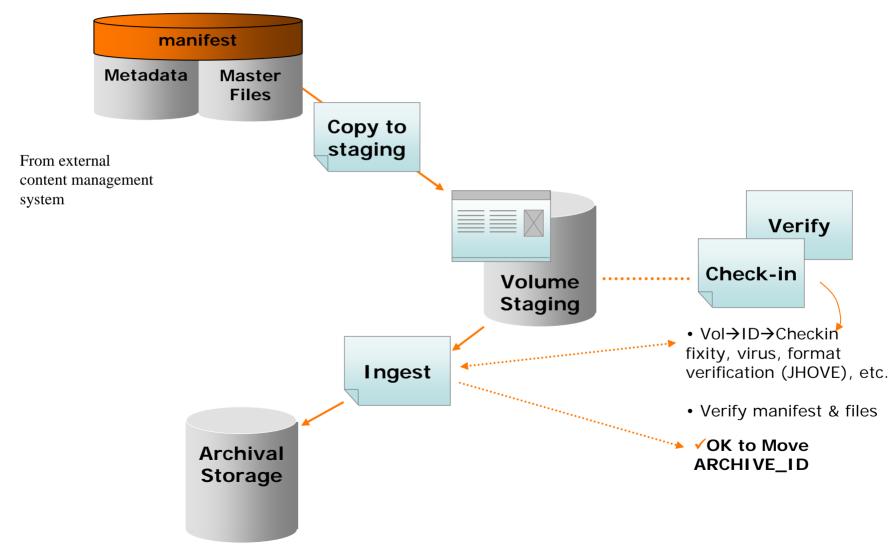
- Consumer Platform
  - WorldCat.org "Indiana Cotton Mills"
- Management Systems
  - WorldCat Local "Hegg Alaska Photographs", "meed"
- Content Platform
  - Digital Repository
  - Digital Archive
- Network Services
  - Use statistics
  - Collection Analysis

#### **Digital Collection Services**

#### **Digital Archive – re-engineered**

- Development of storage infrastructure in Dublin
- Redefinition and packaging of Digital Archive for market
  - long term archiving of digital masters
  - opportunity to reprocess as software improves
    - example OCR
- Significantly reduce cost of service
- Two modes
  - With repository
  - Mirroring

### Digital Archive workflow for other systems Type A service: batch mirror



## Digital Repositories cooperative advantage

- Broaden use of the repository
  - Cultural heritage organizations
  - Institutional Repositories
  - Government documents
- Integrate with library tools and systems
  - Connexion
  - WorldCat.org
  - WorldCat Local

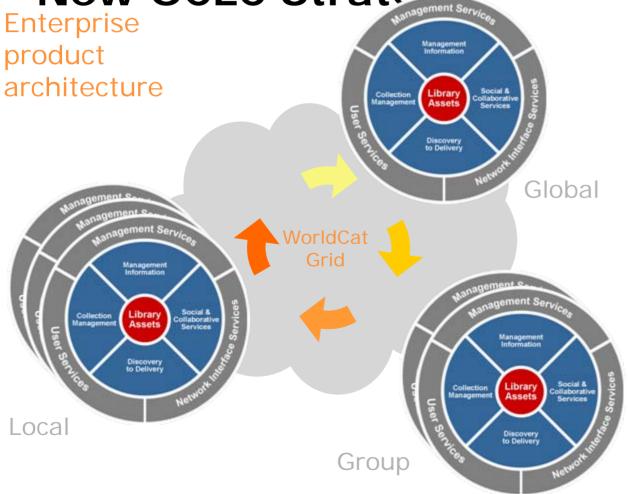
## Digital Repositories cooperative advantage

- Integrate with other content
  - Journals
  - Books, manuscripts
  - Audio and video
- Increase the value, reduce the costs
  - Search across institutional collections
  - Search within the larger scope of content
    - WorldCat.org
  - Reduce cost through shared services



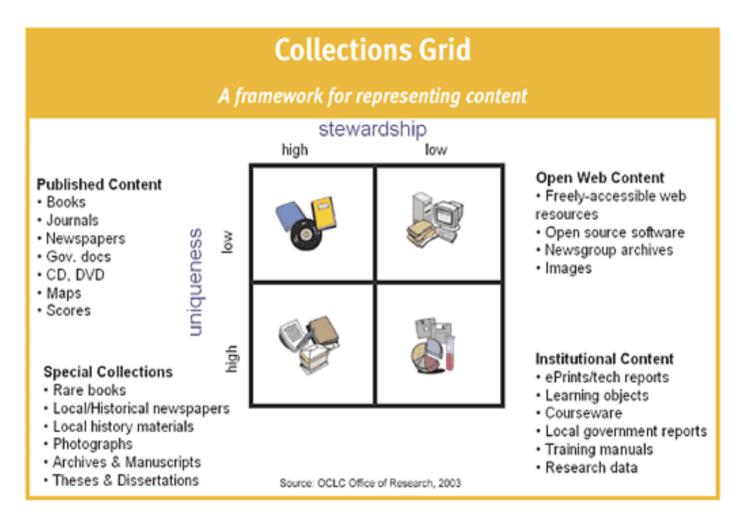
#### **Future Direction**

- New OCLC Strategy





# Future direction - Products and services to support the collections grid



# Future direction - support for the full range of library content

- dContent
- eContent
- "Digital Stacks"

Thank you

Questions?

email: Greg\_Zick@oclc.org