

# RDA

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Finding Your Place on the Evolutionary Path

# Our Goals for the Session

1. Provide updated information on the progress of RDA development
2. Introduce and discuss the preliminary registration of RDA Elements, Roles and Value Vocabularies
3. Discuss current RDA development progress and how the RDF/SKOS representation can support the JSC's three metadata architecture scenarios
4. Discuss implementation planning and testing

# The Elements & Vocabularies (Diane)

Introducing the Registry and the RDA elements, roles and vocabularies

What's the relationship of this effort to the RDA work and to repurposing library legacy data?

What are the challenges in managing and maintaining this data?

Potential and challenges of a multi-language RDA

# RDA Elements Vocabulary (provisional)

## NSDL REGISTRY

Supporting Metadata Interoperability

Schema: Show detail for RDA Elements	
<a href="#">Detail</a> <a href="#">Properties</a> <a href="#">History</a> <a href="#">Maintainers</a>	
<strong>Detail</strong>	
Owner:	Metadata Management Associates
Label:	RDA Elements
<strong>Namespace</strong>	
Name:	Elements
URI:	<a href="http://RDVocab.info/Elements">http://RDVocab.info/Elements</a>
<strong>Documentation</strong>	
URL:	<a href="http://dublincore.org/dcmirdataskgroup/">http://dublincore.org/dcmirdataskgroup/</a>
Note:	This is the provisional registration of the RDA Element Vocabulary, managed by the DCMI/RDA Task Group.
Tags:	Libraries, Semantic Web
<strong>Defaults</strong>	
Status:	New-Proposed
Language:	English
<strong>Users</strong> +	
<a href="#"> List</a> <a href="#"> Get RDF</a>	

# RDA List of Elements

## NSDL REGISTRY

Supporting Metadata Interoperability

### Schema: Show detail for RDA Elements

Detail	Properties	History	Maintainers			
Label	URI	Status	Updated	Last Updated by	Actions	
Date of manufacture	.../Elements/dateOfManufacture	New-Proposed	2008-07-20 17:30	kcoylenet		
Date of promulgation of a law, etc.	.../dateOfPromulgationOfALawEtc	New-Proposed	2008-07-25 12:04	DianeH		
Date of publication	.../Elements/dateOfPublication	New-Proposed	2008-07-20 17:13	kcoylenet		
Date of signing of a treaty, etc.	.../dateOfSigningOfATreatyEtc	New-Proposed	2008-07-25 12:07	DianeH		
Date of Work	.../Elements/dateOfWork	New-Proposed	2008-04-12 19:02	DianeH		
Degree	.../Elements/degree	New-Proposed	2008-07-25 13:45	DianeH		
Devised title	.../Elements/devisedTitle	New-Proposed	2008-07-17 17:14	kcoylenet		
Digital File Characteristics	.../digitalFileCharacteristics	New-Proposed	2008-04-13 8:14	DianeH		
Dimensions	.../Elements/dimensions	New-Proposed	2008-04-12 18:49	DianeH		
Dimensions of map, etc.	.../Elements/dimensionsOfMap	New-Proposed	2008-07-22 14:04	kcoylenet		
Dimensions of still image	.../dimensionsOfStillImage	New-Proposed	2008-07-22 14:05	kcoylenet		
Dissertation or Theses Information	.../Elements/academicDegree	New-Proposed	2008-04-13 8:35	DianeH		
Distributor	.../Elements/distributor	New-Proposed	2008-07-20 17:17	kcoylenet		
Distributor's name	.../Elements/distributorsName	New-Proposed	2008-07-20 17:18	kcoylenet		
Duration	.../Elements/duration	New-Proposed	2008-07-30 8:16	DianeH		
Earlier variant title	.../Elements/earlierVariantTitle	New-Proposed	2008-07-17 17:11	kcoylenet		
Edition statement	.../Elements/editionStatement	New-Proposed	2008-08-03 10:46	DianeH		
Emulsion on microfilm and microfiche	.../Elements/emulsionOnMicrofilm	Deprecated	2008-08-24 17:53	DianeH		
Emulsion on microfilm and microfiche	...ulsionOnMicrofilmAndMicrofiche	New-Proposed	2008-07-23 12:14	DianeH		
Encoding format	.../Elements/encodingFormat	New-Proposed	2008-07-23 13:23	kcoylenet		

250 results

◀ 1 2 3 4 5 ▶

# Detail: Digital File Characteristics

## NSDL REGISTRY

Supporting Metadata Interoperability

### Schema: RDA Elements

### Properties: Digital File Characteristics

Detail

Elements

History

### Metadata +

#### Detail

Label: Digital File Characteristics

Name: digitalFileCharacteristics

URI: <http://RDVocab.info/Elements/digitalFileCharacteristics>

Description: Digital file characteristics are technical specifications relating to the digital encoding of text, image, audio, video, and other types of data in a resource.

Comment: Associated with the FRBR Manifestation entity.

Type: property

Status: New-Proposed

Language: English

Note: Definition source: RDA 3.20.0.1.1

 List  Get RDF



# RDF Display for Individual Element

This XML file does not appear to have any style information associated with it. The document tree is shown below.

```
- <rdf:RDF xml:base="http://RDVocab.info/Elements">
  <!-- Schema: RDA Elements -->
  - <rdf:Description rdf:about="http://RDVocab.info/Elements">
    <dc:title xml:lang="en">RDA Elements</dc:title>
    <skos:note rdf:resource="This is the provisional registration of the RDA Element Vocabulary, managed by the DCMI/RDA Task Group."/>
    <foaf:homepage rdf:resource="http://dublincore.org/dcmirdataskgroup"/>
  </rdf:Description>
  <!--Property: Digital File Characteristics-->
  - <rdf:Property rdf:about="http://RDVocab.info/Elements/digitalFileCharacteristics">
    <rdfs:label xml:lang="en">Digital File Characteristics</rdfs:label>
    <rdfs:comment xml:lang="en">Associated with the FRBR Manifestation entity.</rdfs:comment>
    - <skos:definition xml:lang="en">
      Digital file characteristics are technical specifications relating to the digital encoding of text, image, audio, video, and other types of data in a resource.
    </skos:definition>
    <rdfs:isDefinedBy rdf:resource="http://RDVocab.info/Elements"/>
    <reg:status rdf:resource="http://metadataregistry.org/uri/RegStatus/1002"/>
    <skos:note xml:lang="en"> Definition source: RDA 3.20.0.1.1 </skos:note>
  </rdf:Property>
</rdf:RDF>
```

# RDA Roles Vocabulary

## NSDL REGISTRY

Supporting Metadata Interoperability

### Schema: Show detail for RDA Roles

[Detail](#) [Properties](#) [History](#) [Maintainers](#)

#### Detail

Owner: Metadata Management Associates  
Label: RDA Roles

#### Namespace

Name: roles  
URI: <http://RDVocab.info/roles>

#### Documentation

URL: <http://dublincore.org/dcmrdataskegroup/>  
Note: Based on JSC Document: 5JSC/LC/11  
Tags: role terms

#### Defaults

Status: New-Proposed  
Language: English

#### Users +

[List](#) | [Get RDF](#)

# RDA Role Properties List

## NSDLREGISTRY

Supporting Metadata Interoperability

### Schema: Show detail for RDA Roles

Detail	Properties	History	Maintainers			
Label	URI	Status	Updated	Last Updated by	Actions	
Abridger	.../roles/abridger	New-Proposed	2008-07-21 13:27	DianeH		
Actor	.../roles/actor	New-Proposed	2008-07-21 14:14	DianeH		
Addressee	.../roles/addressee	New-Proposed	2008-07-21 14:02	DianeH		
Animator	.../roles/animator	New-Proposed	2008-07-21 13:28	DianeH		
Annotator	.../roles/annotator	New-Proposed	2008-07-23 7:43	DianeH		
Architect	.../roles/architect	New-Proposed	2008-07-21 13:40	DianeH		
Arranger of Music	.../roles/arrangerOfMusic	New-Proposed	2008-07-21 13:30	DianeH		
Artist	.../roles/artist	New-Proposed	2008-07-21 13:41	DianeH		
Author	.../roles/author	New-Proposed	2008-07-21 13:43	DianeH		
Binder	.../roles/binder	New-Proposed	2008-07-23 7:44	DianeH		
Braille Embosser	.../roles/brailleEmbosser	New-Proposed	2008-07-23 7:32	DianeH		
Broadcaster	.../roles/broadcaster	New-Proposed	2008-07-23 7:38	DianeH		
Cartographer	.../roles/cartographer	New-Proposed	2008-07-21 13:46	DianeH		
Caster	.../roles/caster	New-Proposed	2008-07-23 7:32	DianeH		
Choreographer	.../roles/choreographer	New-Proposed	2008-07-21 13:48	DianeH		
Cinematographer	.../roles/cinematographer	New-Proposed	2008-07-21 13:31	DianeH		
Collection Registrar	.../roles/collectionRegistrar	New-Proposed	2008-07-21 13:36	DianeH		
Collector	.../roles/collector	New-Proposed	2008-07-21 13:37	DianeH		
Collotyper	.../roles/collotyper	New-Proposed	2008-07-23 7:33	DianeH		
Compilation Editor	.../roles/compilationEditor	New-Proposed	2008-07-21 13:32	DianeH		

77 results

◀ 1 2 3 4 ▶

# RDA Role: Author

## NSDL REGISTRY

Supporting Metadata Interoperability

### Schema: RDA Roles

#### Properties: Author

[Detail](#)[Elements](#)[History](#)

#### Metadata +

##### Detail

Label:	Author
Name:	author
URI:	<a href="http://RDVocab.info/roles/author">http://RDVocab.info/roles/author</a>
Description:	A person, family, or corporate body responsible for creating works that are primarily textual in content, regardless of media type (e.g., printed text, spoken word, electronic text, tactile text) or genre (e.g., poems, novels, screenplays, blogs). Use also for persons, etc., creating new works by paraphrasing, rewriting, or adapting works by another creator such that the modification has substantially changed the nature and content of the original or changed the medium of expression.
Comment:	
Type:	property
Status:	New-Proposed
Language:	<a href="#">English</a>
Note:	

[List](#) | [Get RDF](#)

# RDF for RDA Roles Vocabulary (all)

```
- <rdf:RDF xml:base="http://RDVocab.info/roles">
  <!-- Schema: RDA Roles -->
  - <rdf:Description rdf:about="http://RDVocab.info/roles">
    <dc:title xml:lang="en">RDA Roles</dc:title>
    <foaf:homepage rdf:resource="http://dublincore.org/dcmirdataskgroup/">
    <skos:note rdf:resource="Based on JSC Document: 5JSC/LC/11"/>
  </rdf:Description>
  <!-- Properties -->
  <!-- Property: Writer of Added Text-->
  - <rdf:Property rdf:about="http://RDVocab.info/roles/writerOfAddedText">
    <rdfs:label xml:lang="en">Writer of Added Text</rdfs:label>
    - <skos:definition xml:lang="en">
        A person, family, or corporate body contributing to an expression of a primarily non-textual work by providing text for the non-textual work of another creator (e.g., writing captions for photographs, descriptions of maps).
      </skos:definition>
    <rdfs:isDefinedBy rdf:resource="http://RDVocab.info/roles"/>
    <reg:status rdf:resource="http://metadataregistry.org/uri/RegStatus/1002"/>
  </rdf:Property>
  <!-- Property: Writer of Added Lyrics-->
  - <rdf:Property rdf:about="http://RDVocab.info/roles/writerOfAddedLyrics">
    <rdfs:label xml:lang="en">Writer of Added Lyrics</rdfs:label>
    <rdfs:subPropertyOf rdf:resource="http://RDVocab.info/roles/writerOfAddedText"/>
    - <rdfs:comment xml:lang="en">
        For lyric writing in collaboration with a composer to form an original work, see Lyricist (X.1.1).
      </rdfs:comment>
    - <skos:definition xml:lang="en">
        A writer of added text that contributes to an expression of a musical work of a composer by writing words for songs.
      </skos:definition>
    <rdfs:isDefinedBy rdf:resource="http://RDVocab.info/roles"/>
    <reg:status rdf:resource="http://metadataregistry.org/uri/RegStatus/1002"/>
  </rdf:Property>
```

# Status of the DCMI/RDA Work

- All elements/subelements approved by JSC as of their meeting in April 2008 have been registered on the NSDL Registry (<http://metadataregistry.org>)
- WG is pausing to re-group, continuing to consider the possibilities as RDA is poised to release:
  - Tackling the management/maintenance conundrum (a huge issue)
  - Beginning to work on an RDA Application Profile (as a method of associating properties with value vocabularies)
  - Considering multi-language extension

# Multilingual Possibilities

- Other language labels (and other properties) within a single vocabulary
  - Shared URIs
  - Group-based maintenance (members of the German language maintenance group would have language default to German when signed on)
  - Specific language outputs for notifications, updating, etc.
- Separate vocabulary with linkages and mappings
  - Separate URIs
  - Maintenance of mappings and links an additional task
  - More difficult to find areas where vocabularies diverge
  - Easier to extend if necessary or desirable

# Example: Hebrew GMDs (Vocab)

**NSDLREGISTRY**  
Supporting Metadata Interoperability

**Vocabulary: Show detail for Hebrew GMDs**

[Detail](#) [Concepts](#) [History](#) [Versions](#) [Maintainers](#)

**Detail**

Owner:	Hebraica Team
Name:	Hebrew GMDs
URL:	
Note:	
Community:	
Status:	Published
Language:	English

**URI**

Base Domain:	<a href="http://metadataregistry.org/uri/">http://metadataregistry.org/uri/</a>
Token:	HGMD
URI:	<a href="http://metadataregistry.org/uri/">http://metadataregistry.org/uri/</a>

**Users +**

[List](#)  [Get RDF](#)  [Get XML Schema](#)

# Hebrew GMDs (Property List)

**NSDLREGISTRY**  
Supporting Metadata Interoperability

**Vocabulary: Show detail for Hebrew GMDs**

Detail	Concepts	History	Versions	Maintainers	
Preferred Label	URI	Status	Updated	Actions	
✓ משאב אלקטרוני	...//HGMD/1001	Published	2007-04-23 15:02		
✓ תמליל הצגה	...//HGMD/1003	Published	2007-07-26 12:32		
✓ דיזור	...//HGMD/1008	Published	2008-08-21 8:36		
✓ הקלטה קול	...//HGMD/1007	Published	2007-07-26 14:31		
✓ הקלטה וידאו	...//HGMD/1006	Published	2007-07-26 14:30		

5 results

(cc) BY

# Hebrew GMDs (Property Detail)

**NSDLREGISTRY**  
Supporting Metadata Interoperability

**Vocabulary: Hebrew GMDs**  
**Concepts:** הקלטת קול

**Detail**    Properties    History

**Detail**

Preferred Label:	הקלטת קול
Language:	English
URI:	<a href="http://metadataregistry.org/uri//HGMD/1007">http://metadataregistry.org/uri//HGMD/1007</a>
Top Concept?:	✓
Status:	Published

**Properties**

preferred label	הקלטת קול	Hebrew	Published
alternative label	Sound recording	English	Published

[List](#) | [Get RDF](#)

# Hebrew GMDs (Property Detail RDF)

```
- <rdf:RDF>
  <!-- WARNING: This is a single-concept fragment -->
  <!-- Scheme: Hebrew GMDs -->
  - <skos:ConceptScheme rdf:about="http://metadataregistry.org/uri/">
    <dc:title>Hebrew GMDs</dc:title>
    <skos:hasTopConcept rdf:resource="http://metadataregistry.org/uri/HGMD/1001"/>
    <skos:hasTopConcept rdf:resource="http://metadataregistry.org/uri//HGMD/1003"/>
    <skos:hasTopConcept rdf:resource="http://metadataregistry.org/uri/HGMD/1008"/>
    <skos:hasTopConcept rdf:resource="http://metadataregistry.org/uri//HGMD/1007"/>
    <skos:hasTopConcept rdf:resource="http://metadataregistry.org/uri//HGMD/1006"/>
  </skos:ConceptScheme>
  <!-- Concept: הקלטת קול -->
  - <skos:Concept rdf:about="http://metadataregistry.org/uri//HGMD/1007">
    <skos:inScheme rdf:resource="http://metadataregistry.org/uri/">
    <skos:prefLabel>הקלטת קול</skos:prefLabel>
    <skos:altLabel>Sound recording</skos:altLabel>
  </skos:Concept>
</rdf:RDF>
```

# RDA development progress

- RDA database scenarios
  - Evolution of the catalogue record
  - Reprise (partial) of RDA Satellite presentation at IFLA
    - {branch}
- What about the guidance text?
- Current status of the RDA product

# Guidance text (“the rules”)

- What do I put into the elements?
  - Which vocabulary do I use?
  - Where do I find the content, and how do I transcribe it?
    - What is the title of this book/website/photograph?
- Taking into account language (of the source and the cataloguer), measurement systems, etc.
- The rules (cataloguing code) govern the quality, consistency and completeness of the content of the metadata record

# Why are the guidelines not open access?

- As the objects being described change/evolve over time (as well as functional requirements), the content guidelines must also evolve
- And remain consistent, etc. and meet the RDA goals of applicability to all types of object in an international context
  - Requiring communication, consultation, consensus
- This costs!
  - And costs must be recovered

# RDA business environment

- Significant change from AACR (printed book) to online service
  - One user (cataloguer) > many simultaneous users
  - Fixed text + batch updates > continuous updates
- One-off purchase > license
- Details are still being discussed
  - But RDA will not price itself out of the market
- Other issues include translations, augmentations, commentaries, local/community examples, etc.

# Current status

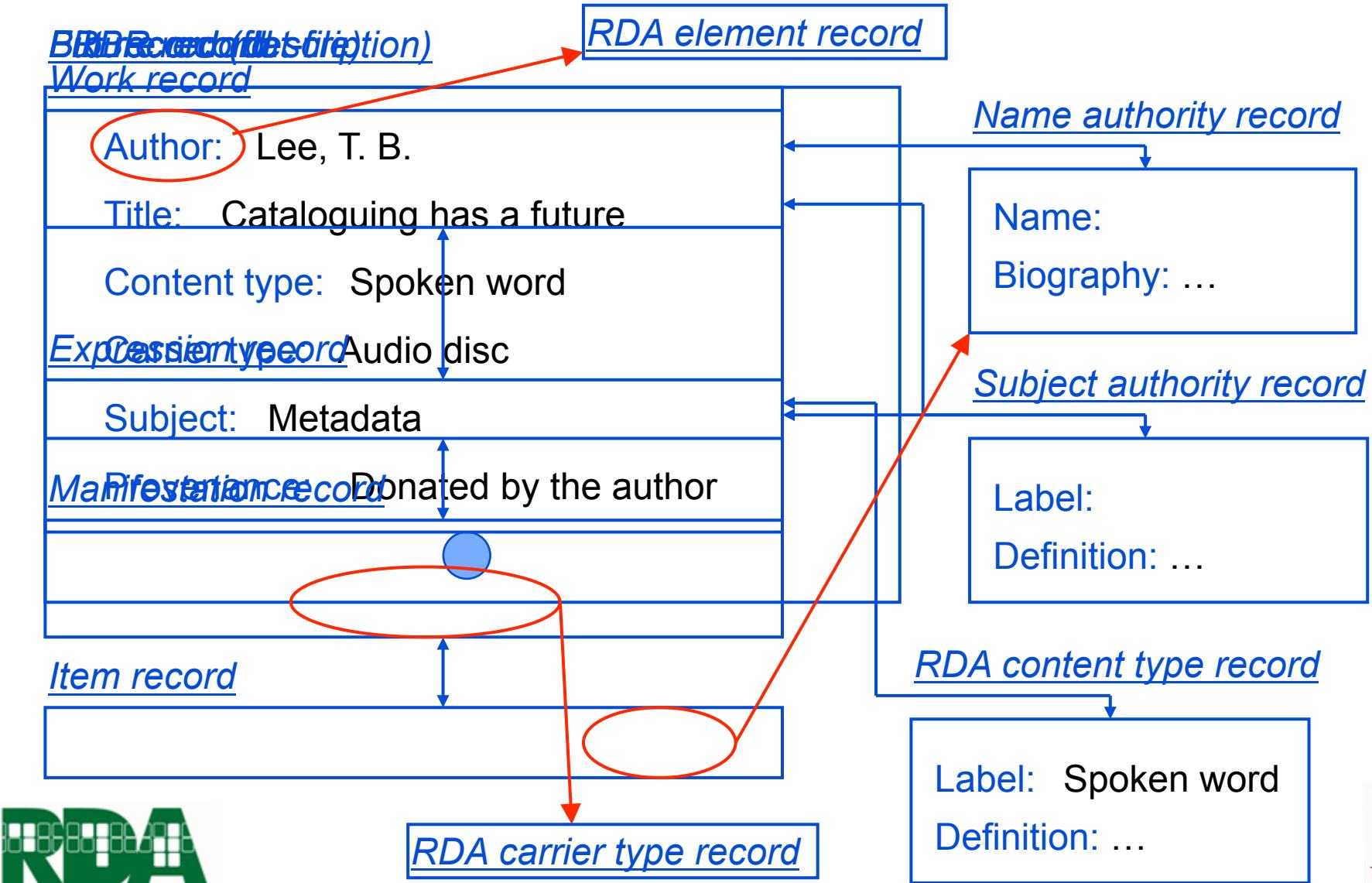
- “Final” version (1.0) to be released June 2009
  - (Three months behind initial schedule)
    - Not bad, and not a significant delay
      - To allow worldwide community review of the complete text
- Complete review text to be released October 2008
- Will be the “product” package
  - Not the (unwieldy) PDFs of individual chapters
- Product includes guidance text, elements, value vocabularies
  - + full examples, contextual workflows

# RDA vocabularies and concepts

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Depute Director, Centre for Digital Library Research  
University of Strathclyde, Glasgow, Scotland

Presented at the IFLA Satellite Meeting on RDA  
August 8, 2008, Québec City, Canada

# Database/format scenarios



<http://dublincore.org/dcmirDataTaskgroup/>

This Task Group is for collaborative work to enable broader use of the Resource Description and Access (RDA), building on agreements made at a meeting held at the British Library April 30/May 1, 2007. Participants in the meeting came from DCMI and other Semantic Web groups, and the RDA development effort. The Task Group is led by Diane Hillmann (then of Cornell University, now at Syracuse University) and Gordon Dunsire of Strathclyde University.

The planning for the London meeting was originally located on the DC-Libraries Wiki Some information gathered for the meeting, including documents, agendas, a meeting packet, and other information of historical interest remains at that location.

## Wiki Pages

- Use cases [Use Cases](#)
- Cataloger Scenarios [Scenarios](#)
- User Scenarios [userScenarios](#)
- Developer Scenarios [devScenarios](#)
- Analysis task 1 [analysisTask1](#)
- Analysis task 2
  - List of in-line vocabularies from RDA [RDAVocab](#)
  - List of in-line vocabularies from MARC (for information) [MARCVocab](#)
- Application Profiles
  - rda-a and rda-b [rda-a](#)
  - Application Profile design examples [apDesigns](#)

- [FrontPage](#)
- [RecentChanges](#)
- [FindPage](#)
- [HelpContents](#)

- [Edit](#)
- [View](#)
- [Diffs](#)
- [Info](#)
- [UnSubscribe](#)
- [Raw](#)
- [Print](#)

## Act

- [AttachFile](#)
- [DSP2XML](#)
- [DeletePage](#)
- [LikePages](#)
- [LocalSiteMap](#)
- [SpellCheck](#)

## Se

Title:

Done

(Likely to require use of the RDA/ONIX Framework ontology)

**As a** public library user, **I want** to identify all the manifestations held by the library which are motion pictures **so that** I can watch something while waiting for the rain to stop.

## Scenario 10

(Likely to require use of the RDA/ONIX Framework ontology)

**As a** visually-impaired library user, **I want** to exclude all the manifestations held by the library which are not primarily audio **so that** I can use the resources effectively.

## Scenario 11

**As a** historian-researcher, **I want** find all works published in a certain city over a particular period of time, even though the name of the city may have changed as regimes changed **so that** I can analyze publishing patterns.

## Scenario 12

**As an** avid reader of romance novels **I want** to find all of the books by a particular publisher of that genre **so that** I can see if there are any that I haven't read.

## Scenario 13

**As an** No hablo inglés. **I want** Quiero libros en español. **so that** puedo leer.

## Developer Scenarios

### Scenario: Linking to Authority Files

The catalog has both bibliographic records and authority records. Authority records contain valid values for particular fields. The authority records also contain additional information about the values, such as non-preferred forms of the value and instructions on usage. To integrate the non-preferred forms into the user interface, the developer must create a link between the value in the bibliographic record and the value in the authority record. This link must remain intact even if the preferred form of the value changes, and even if the metadata creator chooses to use a non-preferred form as the display form. *Karen Coyle*

### Scenario: Enrichment

The system obtains a search result record and wishes to obtain further information from ancillary Sources to enrich the record displayed to the user. Simple (existing) case is the addition of cover art to book records, utilizing a control number. More complex case is identifying where a copy of the retrieved work may be obtained (library loan, bookseller, online download, etc.), using various bib data. The authority link case you sketched out is a close cousin here. *Peter Noerr*

### Scenario: Other copies

Using various bits of the bib metadata try to discover other copies of the work at alternate locations. This is a function that comes up in federated search situations where a major part of the requirement is the "find the most available copy" function. This needs identified bib elements useful for discovery, and also some form of equivalence between the Source systems. This is regularly done now, but requires 'human intervention' and lots of maintenance in general. *Peter Noerr*

## Scenario 1: A new expression for an existing simple work

- [Edit](#)
- [View](#)
- [Diffs](#)
- [Info](#)
- [Subscribe](#)
- [Raw](#)
- [Print](#)

### Link to Scenario 1 Analysis: [Scenarios/1](#)

Jane Cataloger is assigned to work on a gift collection. Her first selection is a Latvian translation of Kurt Vonnegut's "Bluebeard: a novel." She searches the library database for the original work, and finds:

- Author: Kurt Vonnegut
- Preferred Title for the Work: Bluebeard: a novel.
- Form of Work: Novel
- Original Language of the Work: English

with links to the following expression information:

- Language of Expression: English
- Content Type: Text

and one manifestation:

- Edition Statement: 1st trade edition.
- Place of Production: New York
- Publisher: Delacorte Press
- Date of Production: 1987
- Extent: 300 pages
- Resource Identifier:  [0385295901](#)

Jane begins her description by linking to the existing Work entity. She then creates an expression description:

- Language of Expression: Latvian

Done

- [AttachFile](#)
- [DSP2XML](#)
- [DeletePage](#)
- [LikePages](#)
- [LocalSiteManager](#)
- [SpellCheck](#)

Se

Title:

Text:

## Scenario 1

### Information Recorded by the Cataloger

Jane Cataloger is assigned to work on a gift collection. Her first selection is a Latvian translation of Kurt Vonnegut's "Bluebeard: a novel." She searches the library database for the original work, and finds:

- Author: Kurt Vonnegut
- Preferred Title for the Work: Bluebeard: a novel.
- Form of Work: Novel
- Original Language of the Work: English

```
@prefix : <http://www.example.com/placeholder-for-rda-element-vocabulary-namespace/> .  
@prefix v: <http://www.example.com/placeholder-for-rda-value-vocabularies-namespace/> .  
@prefix o: <http://www.example.com/placeholder-for-other-namespaces-i.e.-out-of-scope-for-rda/> .  
@prefix rdfs: <http://www.w3.org/2000/01/rdf-schema#> .  
#@base <http://www.example.com/rda/scenarios/1/> .  
  
<A>  
:author <B> ;  
:workTitle "Bluebeard: a novel"@en ;  
:formOfWork v:Novel ;  
:languageOfWork v:English .  
  
<B> rdfs:label "Kurt Vonnegut" .
```

with links to the following expression information:

- Language of Expression: English
- Content Type: Text

- [FrontPage](#)
- [RecentChanges](#)
- [FindPage](#)
- [HelpContents](#)

- [Up](#)
- [Edit](#)
- [View](#)
- [Diffs](#)
- [Info](#)
- [Subscribe](#)
- [Raw](#)
- [Print](#)

- [Attachment](#)
- [DSP2X](#)
- [DeletePage](#)
- [LikePage](#)
- [LocalSite](#)
- [SpellCheck](#)



## rda-b Application Profile

- Delete
- Like
- Location
- Specification

This is the same as the rda-a application profile except that it adds some constraints relating to minimum and maximum occurrences. By adding minimum occurrences, fields as designated as mandatory or optional. By adding maximum occurrences, the repeatability of fields is defined. The result is:

### XML file

- title - mandatory, not-repeatable
- creator - optional, repeatable
- publisher - optional, repeatable
- place of publication - optional, repeatable
- date of publication - optional, not-repeatable
- extent - mandatory, not-repeatable
- media type - mandatory, not-repeatable
- note - optional, repeatable
- language (of expression) - optional, repeatable
- identifier (for the manifestation) - optional, repeatable

Below is a visualization of the description set.

[attachment:rda-b.jpg](#) [attachment:rda-b.pdf](#)

[RefreshCache](#) for this page (cached 2008-09-22 00:42:54)

[EditText](#) of this page (last edited 2008-08-27 11:45:49 by KarenCoyle)

Title:

Text:

Done

XML			
= version	1.0		
= encoding	UTF-8		
Comment			
edited with XMLSPY v2004 rel. 4 U ( <a href="http://www.xmlspy.com">http://www.xmlspy.com</a> ) by Karen Coyle (private)			
<b>DescriptionSetTemplate</b>			
= xmlns	<a href="http://dublincore.org/xml/dc-dsp/2008/01/14">http://dublincore.org/xml/dc-dsp/2008/01/14</a>		
= xmlns:xsi	<a href="http://www.w3.org/2001/XMLSchema-instance">http://www.w3.org/2001/XMLSchema-instance</a>		
= xsi:schemaLoca...	<a href="http://dublincore.org/xml/dc-dsp/2008/01/14">http://dublincore.org/xml/dc-dsp/2008/01/14</a> <a href="C:\daisy\Business\dcmi\dcmi-dsp.xsd">C:\daisy\Business\dcmi\dcmi-dsp.xsd</a>		
<b>DescriptionTemplate</b>			
= ID	resource		
= maxOccurs	1		
= minOccurs	1		
<b>StatementTemplate (10)</b>			
ID	= ID	= minOccurs	Property
1	title	0	<a href="http://RDVocab.info/Elements/title">http://RDVocab.info/Elements/title</a>
2	creator	0	<a href="http://ifla/namespaces/frbr/Entities/1005">http://ifla/namespaces/frbr/Entities/1005</a>
3	publisher	0	<a href="http://RDVocab.info/Elements/Publisher">http://RDVocab.info/Elements/Publisher</a>
4	placeOfPublication	0	<a href="http://RDVocab.info/Elements/placeOfPublication">http://RDVocab.info/Elements/placeOfPublication</a>
5	dateOfPublication	0	<a href="http://RDVocab.info/Elements/dateOfPublication">http://RDVocab.info/Elements/dateOfPublication</a>
6	extent	0	<a href="http://RDVocab.info/Elements/extent">http://RDVocab.info/Elements/extent</a>
7	mediaType	0	<a href="http://RDVocab.info/Elements/mediaType">http://RDVocab.info/Elements/mediaType</a>
8	note	0	<a href="http://RDVocab.info/Elements/note">http://RDVocab.info/Elements/note</a>
9	languageOfExpression	0	<a href="http://RDVocab.info/Elements/languageOfExpression">http://RDVocab.info/Elements/languageOfExpression</a>
10	identifierForTheManifestation	0	<a href="http://RDVocab.info/Elements/identifierForTheManifestation">http://RDVocab.info/Elements/identifierForTheManifestation</a>

The simplest metadata statement describes a property that takes a simple string value ("literal"), with no constraints.

```
<?xml version="1.0" encoding="UTF-8"?>
<DescriptionSetTemplate xmlns="http://dublincore.org/xml/dc-dsp/2008/01/14" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:schemaLocation="http://dublincore.org/xml/dc-dsp/2008/01/14
C:\dcmi\dcmi-dsp.xsd">
    <DescriptionTemplate ID="resource" >
        <StatementTemplate ID="title" type="literal">
            <Property>http://RDVocab.info/Elements/title</Property>
        </StatementTemplate>
    </DescriptionTemplate>
</DescriptionSetTemplate>
```

## Mandatory and Repeatable

Both description templates and statement templates can be coded as mandatory/optional and repeatable/not repeatable. This is done using the values "minimum" and "maximum". The most commonly used values are:

- "minimum = 0" means that the element is optional (the element is not required) [DEFAULT]
- "minimum = 1" means that the element must appear at least once. (the element is required)
- "maximum = 1" means that the element can only appear once (the element is not repeatable)
- "maximum = infinite" or "maximum = [any non-negative number here]" means that the element can appear more than once, up to the maximum number (the element is repeatable) [DEFAULT]

The following code defines a property ("title") that is required and not repeatable:

```
<?xml version="1.0" encoding="UTF-8"?>
<DescriptionSetTemplate xmlns="http://dublincore.org/xml/dc-dsp/2008/01/14" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:schemaLocation="http://dublincore.org/xml/dc-dsp/2008/01/14
C:\dcmi\dcmi-dsp.xsd">
    <DescriptionTemplate ID="resource" >
        <StatementTemplate ID="title" type="literal" minoccurs="1" maxoccurs="1">
            <Property>http://RDVocab.info/Elements/title</Property>
        </StatementTemplate>
    </DescriptionTemplate>
</DescriptionSetTemplate>
```

<http://dublincore.org/dcmirDataTaskgroup/>