

**To:** Joint Steering Committee for Development of RDA  
**From:** John Attig, (former) ALA Representative to the JSC  
**Subject:** Revisions to *Categorization of content and carrier*

*Related documents:*

5JSC/Chair/10 (*RDA/ONIX Framework for Resource Categorization*  
(version 1.0))

5JSC/RDA/Part A/Categorization (*Categorization of content and carrier*)

6JSC/ALA rep/1 and responses: (Revision to *Categorization of content*  
*and carrier*)

## Background

One of the background documents to the drafts of RDA was *5JSC/RDA/Part A/ Categorization*, in which the RDA editor presented draft instructions for three RDA elements (then called Media category, Type of carrier, Content category), along with a glossary of the categories defined for these elements. The RDA elements were based on the *RDA/ONIX Framework for Resource Categorization* (version 1.0) [ROF]. An introduction to the document explained how the RDA elements were aligned with the Framework, and how the Framework had been extended in defining the RDA categories. The document also included a set of tables mapping the RDA categories to the values of the corresponding RDA/ONIX attributes (including RDA qualified categories needed to extend the Framework).

The categorization document was, in part, a response to Recommendation #1 in the “Proposal for Implementing Recommendations on the RDA/ONIX Framework”:

1. That the Framework for resource categorization set out in this document be tested by mapping RDA, ONIX, and other namespace-controlled value/code lists to it, and that the mapping be used to identify the need for any additional attributes or specified values.

Furthermore, the document constitutes the official specifications for the relationship between the RDA categories and the RDA/ONIX Framework values. The CILIP representative has recommended that RDA/ONIX Framework should be encoded in a registry similar to that used for the RDA vocabularies, and that formal mappings of relevant applications of the Framework (such as the RDA elements and the ISBD Area 0) should be provided. See [Mapping ISBD Area 0 vocabularies to RDA carrier and content vocabularies via the RDA/ONIX Framework for Resource Categorization \(ROF\): briefing/discussion paper](#) [6JSC/Chair/5]. A [mapping of the ISBD Area 0 vocabularies](#) has also been published.

The categorization document has not been updated since August 2006, and needs to be updated to take account of decisions made by the JSC subsequent to that date. These include the renaming of the three elements in question and the addition of a number of RDA categories that needed to be mapped to the Framework.

In July 2010, 6JSC/ALA rep/1 made a series of recommendations for updating the document, as well as posing several questions about the proper mapping of some RDA categories. The responses to 6JSC/ALA rep/1 supported the recommendations for updating, but failed to reach consensus on any of the problematic mappings. In addition, the responses made additional suggestions that involve revisions to some of the RDA categories and to the RDA/ONIX Framework itself.

This document addresses each of these topics in turn. The first section describes the attached revision of the categorization document. The second describes and comments on the mapping issues involving current RDA categories. The third summarizes the suggestions for further revision of the RDA categories or of the RDA/ONIX Framework.

### **Revision of *Categorization of Content and Carrier***

6JSC/ALA rep/1 made the following recommendations:

**Recommendation #1:** The categorization document should be updated along the lines proposed in the following document. The details of the revisions are subject to constituency review.

**Recommendation #2:** The mapping of the RDA vocabularies to the *RDA/ONIX Framework* should be communicated to those working on the RDA Vocabulary registry, with the request that the mapping be incorporated into the registry.

**Recommendation #3:** Remove the RDA text and the Glossary from the Categorization document; revise the initial paragraphs as appropriate.

**Recommendation #4:** The revised mapping specifications, along with the extensions to the *Framework* that they incorporate, should be communicated to the JSC's partners in the RDA/ONIX initiative, with recommendations for continued work on implementation, refinement, and extension of the framework.

The responses from all constituencies supported these recommendations.

A proposed revision of *Categorization of Content and Carrier*, based in part on comments in the responses, is attached. Because of the extent of the changes, only a clean copy is presented. The following features of the revision should be noted:

- Because the numbering of the original document (which refers to Part A of RDA) no longer corresponds to the organization of RDA, the revised document is numbered 6JSC/RDA/Categorization.
- The components of the document with ongoing significance are (1) the introductory description of the relationship between the RDA categories and the RDA/ONIX values; (2) the tables that specify the mapping; the RDA-defined extensions to the Framework; and (4) the definitions of the RDA categories. The draft RDA instructions have been deleted.
- The description that introduces the specifications has been thoroughly revised. Based on constituency comments on 6JSC/ALA rep/1, several sections have

been clarified; wording that describes the RDA categories as “proposed” has been changed to “defined”; and a tentative section on “Maintenance” has been added.

- The tables have been modified to add (a) a final column that gives a numeric summary of the mapping specifications in terms of ROF values; (b) columns that represent the RDA-defined extensions to the Framework (these replace footnotes in the 2006 version). RDA qualified categories are identified by highlighting in the tables.
- A listing of all the RDA-defined extensions — either RDA-defined values for RDA/ONIX attributes or RDA-defined sub-values for RDA/ONIX values — has been added.
- Listings of the RDA values for Content Type, Media Type, and Carrier Type have been updated, with definitions from the RDA Glossary.
- The tables and the two lists of values provide a complete set of specifications for the RDA categories and their mapping to ROF values. It is anticipated that this will allow the document to be used as a framework for maintaining and further extending the RDA categories.
- At some point, a procedure should be developed for proposing changes to either the RDA categories or to the Framework. The latter cannot be done until the governing structure for maintaining the Framework has been agreed upon by the ROF partners.

## Issues Relating to Current RDA Carrier Categories

6JSC/ALA rep/1 raised issues relating to three of the current RDA Carrier Type categories. Each of these issues is described, and the JSC responses are reported. As there was no consensus, some comments have been included on ways of resolving the issues.

### Issue #1: Film roll

In the definition of “film roll” the type of film is not limited to “motion picture film”. Tom Delsey, who raised this issue, believed that this was deliberate, in order to cover a roll of photographic film containing stills. However, it is not obvious that the RDA/ONIX definition of “projector” is broad enough to include a light table or other similar device that would commonly be used to view a roll of photographic film.

**projector** An optical device consisting of a light source, lens system, and image holder for projecting an image on a screen or other surface.

*Question:* Does the JSC agree that “projector” is sufficiently broad?

*JSC responses:*

ACOC: [Prefers the revised definition proposed by BL.]

BL: The RDA/ONIX definition ... seems broad enough to encompass light tables or other devices of that type, but this could be made explicit in the scope. The BL also notes that inclusion of “image holder” in the definition may exclude types of projectors used to project computer displays. The OED definition refers only to a light source and lens system. The definition could be changed as follows:

**projector** An optical device ~~consisting of~~ containing a light source and lens system, ~~and image holder~~ for projecting an image on a screen or other surface.

CCC: Yes, but this should be made explicit in scope [the ROF definition?].

CILIP: Agrees with LC that the existing definition is not sufficiently broad and suggests that the revised definition, proposed by the BL, removing the suggestion that the image to be projected requires a “holder”, broadens the definition adequately.

LC: No; if we wish to continue to use the term to cover the broader range of viewing devices, this should be explained in the intended scope.

***Comment and Recommendation:*** There seems to be agreement that the current scope of “film roll” and the ROF definition of “projector” do not match. There did not seem to be any sentiment for changing the former. Therefore, I recommend that the JSC propose to the other ROF partners to revise the definition of “projector” as suggested by the BL. Note that until this is done, the specifications for mapping “film roll” to ROF are not valid.

## **Issue #2: Volume**

The final RDA definition of “volume” doesn’t make a binding obligatory, although the ROF value “binding” is what distinguishes “volume” from “sheet”. 6JSC/ALA rep/1 proposed that “volume” be mapped to two values of the ROF Housing Format attribute: “binding” and “not applicable”. This mapping is ambiguous, and it was suggested that the mapping to “not applicable” be removed.

**Question:** Does the JSC agree that the mapping of “volume” to the ROF Housing Format value “not applicable” should be removed? Is the mapping otherwise adequate?

### ***JSC responses:***

ACOC: Given the RDA definition of volume, it would appear that either “binding” or “not applicable” may be valid values. Further discussion is needed to differentiate terms so that only one value for Housing Format is appropriate in each case.

BL: In RDA, “volume” is defined as “One or more sheets bound or fastened together to form a single unit”. In RDA/ONIX, “binding” is defined as “An outer cover affixed to a gathering of one or more *sheets*. Therefore a binding is applicable to some, but not all volumes, meaning that both “binding” and “not applicable” are appropriate. As the category label should not map to more than

one primary value of Storage Medium Format, there must be a problem with the label or with the definition of “binding”. This needs to be discussed further.

CCC: Uncertain; recommend that this be referred to the RDA/ONIX group.

CILIP: Agrees that [the mapping to “not applicable”] should be removed. More work on definitions is needed so that volumes and sheets can be better distinguished.

LC: No. Isn't this mixing different categories? One is the carrier, the other is a housing (subtype of carrier?). This again makes it clear that these issues should be re-discussed for the RDA/ONIX values with the representatives from the ONIX community. We certainly should have those agreements with the ONIX community before having them “cast in stone” in a registry.

LC (replying to issue #3): This points out that there is not a one-to-one mapping going on. One should be allowed to declare a Housing Format or not that applies to the situation at hand — some volumes will have a housing (be bound) and others will not.

***Comment and Recommendation:*** There does not seem to be any sentiment for changing the RDA definition of “volume”. Therefore, I see at least two options (there are probably others):

Option 1: Map volume to both “binding” and “not applicable”. This seems ambiguous, but may not be. The main problem seems to be how to interpret the two values: presumably we intend that either condition satisfies the definition (“or”), not that both conditions must be satisfied (“and”).

Option 2: Divide “volume” into two Carrier Type categories: *bound volume* and *unbound volume*. The former would be mapped to “binding”; the latter could be mapped to “not applicable” — but it might be preferable to add an RDA-defined value “fastening,” as that is the alternative to “binding” in the definition of “volume”; “fastening” would also distinguish “unbound volume” from “sheet”. I would recommend this option; note that we could add an RDA-defined sub-value without needing to make any changes to the ROF specifications.

### **Issue #3: Object**

The new Carrier type “object” was one of the final decisions of the JSC before the initial release of RDA. At the time, it was noted that none of the values of the ROF attribute Storage Medium Format applies. This seems to be an anomaly; in all other cases, one of the values of an ROF attribute has been checked. This suggests that a value for “none of the above” should be proposed for addition to the values for the Storage Medium Format attribute.

**Question:** Does the JSC agree?

***JSC responses:***

ACOC: The definition of Storage Medium Format, i.e. “The physical form of the material on which the content of the resource is stored” seems to be applicable;

therefore, a category for “other” or “none of the above” should be added. It should be possible to add additional specific values to Storage Medium Format over time with the agreement of the ONIX community. However, we will need to avoid overlap with RDA’s Base Material.

BL: No, I think this needs more discussion by the RDA/ONIX group. The definition of Storage Medium Format would certainly include naturally occurring objects and artifacts, as defined by RDA Object. It does not appear to be desirable to categorize these either by exception, “none of the above”, or generalization, “other”. Consideration could be given to which values could be added to more usefully describe objects, for example, “polygon”, “block”, “flake”.

CCC: “Other” (rather than “none of the above”) might be an appropriate addition but recommend that this be referred to the RDA/ONIX group.

CILIP: Disagrees. If the only value for Object as a Housing Format is going to be “not applicable”, is it premature to introduce it?

LC: We observe that a “none of the above” only tells a user what it is not, so the catch-all term might be “other”, but we should have a process to declare other categories rather than using such terms.

***Comment and Recommendation:*** Neither of the choices offered are terribly attractive.

- a) “Other”: Gordon Dunsire points out that defining “other” here turns the vocabulary for Storage Medium Format into an exhaustive categorization and a closed list; it would no longer be possible to add new values to the list, because they would all have been covered by “other”! I don’t think that is what we want, so I would not recommend this.
- b) “Not applicable”: Several responses note that Storage Medium Format is definitely applicable to objects. Therefore, mapping to such a value would be a misstatement. So I don’t recommend this either.
- c) I see no alternative but to raise this issue with the ONIX community and jointly seek a solution. In the meantime, there would be no valid specifications for mapping “object” to ROF.

#### **Issue #4: Miscellaneous recommendations involving current RDA categories**

- 4a) Carrier type “aperture card”: This is currently mapped to the ROF Storage Medium Format value “sheet”. However, there is an RDA-defined sub-value for “card”. I recommend that this category be mapped to “card”.
- 4b) Carrier types “microfilm cartridge” and “microfilm reel”: These are currently mapped to Intermediation Tool “microform reader”. However, there is an RDA-defined sub-value for “microfilm reader” to which “microfilm cassette” has been mapped. I recommend that these two categories also be mapped to “microfilm reader.”

## Suggestions for Revising the RDA Categories and/or the RDA/ONIX Framework

### MEDIA TYPE

- **Computer as a Media type.** Several constituencies raised issues regarding the use of “computer” as an Intermediation Tool and Media type:

*LC:* We do not agree. LC prefers “digital” – an adjective, so it is not in contradiction with the Intermediation Tool “computer” – used here as a noun. We acknowledge that RDA now uses “computer” but feel it should be revisited to avoid this conflict.

*CILIP:* The CILIP rep is inclined to agree with LC’s comment regarding the Media Type table. Digital media (video, sound, text, etc.) are all identical: patterns of bytes on a medium, interpreted as “media” by software. Any computing device with sound and video cards, with the right software, can play any digital media. Analogue media (video cassettes, cassette tapes, etc.) are all different in both device and recording formats. Nothing can play every format in any one medium, let alone them all. Thus I prefer “digital” as the Media Type and “computer” as the carrier, as this represents the openness of digital media and their single playing device.

However, “computer” seems an ever more old-fashioned term, as computers turn into small, portable devices. Maybe “digital device” as a carrier might be a better pairing with “digital” as a Media Type?

*BL:* BL agrees with the use of the term “computer” to make it clear that this is content which requires processing. This maps directly to the intermediation type. Use of “digital” might be considered, but this may be ambiguous in the context of audio and video content.

### CARRIER TYPE

- **Carrier types Book and Volume:**

*LC:* LC continues to be bothered by our deleting the most common of all terms, understanding the ambiguity of “book”; would like to see this decision revisited.

- **Carrier type Object.** Should this be a single category? Or should there be separate categories for artifacts and naturally-occurring objects? Are there even more specific types of objects that ought to be identified? [BL and LC raised this issue.]

- **Additional Carrier type: Playaway**

*LC:* The existence of Playaways and other emerging types of carriers needs to be allowed for – which is a reminder that the JSC needs an agile mechanism to address additions and changes in a timely way

**CILIP:** The CILIP rep is inclined to agree with the LC comment (b9) on the Carrier Type table regarding Playaways. There is a class of digital device which uses proprietary software and formats to isolate its content from the native universality of digital content. Another example would be Amazon's Kindle. Devices like this will need to be enumerated as Intermediation Tools.

- **LC proposal for new Carrier types**

On 18 April 2013, LC proposed two new Carrier type categories. On 19 April 2013, Gordon Dunsire suggested how these might be mapped to ROF. The following is a summary of how this could be done:

**Add “audio wire reel”**

Glossary definition: Reel or spool of steel or stainless steel wire upon which audio signals are magnetically recorded.

ROF mapping:

storageMediumFormat = roll

housingFormat = reel

intermediationTool = audio player

**Add “audio belt”**

Glossary definition: A loop of flexible plastic or magnetic film on which audio signals are mechanically recorded, commonly known under the trade name Dictabelt.

ROF mapping:

storageMediumFormat = roll

housingFormat = not applicable

intermediationTool = audio player

Gordon notes: I need a little bit more information about “audio belt”. Are the mandrels for rotating the belt part of the equipment, or part of the belt; in other words, does the belt have a “cassette” Housing Format (in ROF terms)? If yes, the new carrier type will have the same base category as the existing “audiocassette”; if not, it will have the same base category as “audio roll”. Either way, similar issues arise.

My understanding (JCA) is that the mandrels are part of the device and that there is no housing as such, which confirms the “not applicable” value for Housing Format.

Gordon noted that both mappings are ambiguous; see discussion of “Ambiguous mappings” below.



## CONTENT TYPE

- **Form/Genre:**

*LC:* We suggest broader discussion of this issue, as genre/form should not be just for cartographic and computer resources and we need to sort out the relationships with Form of Work.

- **Computer as Content type**

*LC:* The definition of “computer” needs to expand to cover any device that presents digital resources.

## OTHER

- **Ambiguous mappings**

In revising the tables, I noted that there are several instances in which two or more RDA categories have the same ROF specifications. These are highlighted in red in the right-hand column of the tables.

The issue here is whether the mappings of RDA categories to ROF values are intended to be *unique*. If unique mappings are intended, then there are several RDA categories that do not meet this standard.

Gordon Dunsire raised this issue in a slightly different way in discussing the ROF mappings for LC’s proposed Carrier types “audio wire reel” and “audio belt”.

“audio wire reel” as a carrier type would have the ROF base category: storageMediumFormat = “roll”; housingFormat = “reel”; intermediationTool = “audio player”. This is the same base category as the existing “audiotape reel”. The RDA carrier types already contain such duplicate categories, and the expectation is that other RDA elements will be used to qualify and distinguish them, for example Recording medium (RDA 3.16.3). In this case, both carrier types have the same recording medium (“magnetic”), so some other RDA Sound characteristic element will need to be used, or otherwise a general Note on manifestation or item; I can’t see anything immediately obvious.

Note: this analysis supposes that “wire” belongs to the primary ROF value “roll” for storageMediumFormat. RDA can make “wire” an explicit subvalue of “roll”, and thus produce a distinguishable base carrier category for “audio wire reel”. The ROF allows this, and this approach is used in John’s proposals in 6JSC/ALA rep/1; for example for “card” as a subvalue of the primary value “sheet” in storageMediumFormat. ALA and JSC should decide whether to do this in advance of any discussions about extending the ROF. The discussion should cover the similar case of audio recordings made on straight lengths of wire; I do not know if such a system ever existed, but if so, “wire” would be a subvalue of “strip”, and careful definitions would be required.

My observation is that Storage Medium Format does not in fact identify the storage medium in all cases; in some cases, it identifies the general shape of the storage medium (roll, sheet, strip, etc.), not the actual medium on which the content is stored (film, tape, wire, etc.). This suggests that it would be appropriate to define sub-values that would allow unambiguous mapping.

The first question, however, is whether we wish to have unique ROF mappings for each RDA category. If so, appropriate RDA-defined sub-values need to be added to the RDA application of the Framework.