## Resource Description and Access: From AACR to RDA\*

by F. Tim Knight\*\*

Abstract: The new cataloguing guidelines Resource Description and Access (RDA) have recently been released and are set to replace the Anglo-American Cataloguing Rules. An evaluation period led by the Library of Congress is currently underway and it is likely that the implementation of RDA will begin sometime in mid-2011. This paper looks briefly at the origins of RDA, provides a high level overview of RDA and reviews some of the major differences that cataloguers and library users can expect to find between RDA and AACR2.

RDA - Resource Description and Access will be a new standard for resource description and access, designed for the digital world.

Built on foundations established by the Anglo-American Cataloguing Rules (AACR), RDA will provide a comprehensive set of guidelines and instructions on resource description and access covering all types of content and media.

RDA will enable users of library catalogues and other systems of information organization to find, identify, select, and obtain resources appropriate to their information needs.

--Statement of Purpose for RDA<sup>1</sup>

The information environment is complex. And, as a result, the cataloguing rules that guide the description of resources found in this environment are equally complex. This is nothing new. The library profession has lived with this situation for years, successfully applying the Anglo-American Cataloguing Rules (AACR2) and meeting the challenges necessary to describe and provide access to information resources. Since its implementation in 1981, AACR2 has been evolving, adapting and reacting to the changes in the information environment. However, by relying on a format-based approach to resource description that emphasizes the description of a physical item, AACR2 reveals deep roots, firmly planted in an information environment based on print resources. In a digital world, where the physical object has lost its primacy, an approach that can quickly capture descriptive information for any resource in the information environment becomes necessary.<sup>3</sup> That new approach is RDA: Resource Description and Access.<sup>4</sup> This paper will look briefly at the origins of RDA, provide a high level overview of RDA, and then discuss some of the major differences cataloguers and library users can expect to find between RDA and AACR2.

<sup>©</sup> F. Tim Knight 2010

<sup>\*\*</sup> F. Tim Knight is the Head of Technical Services at the Osgoode Hall Law School Library at York University. He has been involved with the development of Resource Description & Access (RDA) as the CALL representative on the Canadian Committee on Cataloguing since 2007.

This statement is part of the Strategic Plan for RDA, 2005-2009, online: Joint Steering Committee for Development of RDA <a href="http://www.rda-jsc.org/docs/5strategic1rev2.pdf">http://www.rda-jsc.org/docs/5strategic1rev2.pdf</a>.

See Rule 0.24 which states in part that, "... the description of a physical item should be based in the first instance on the chapter dealing with the class of materials to which that item belongs ... the starting point for description is the physical form of the item in hand, not the original or any previous form in which the work has been published." Anglo-American Cataloguing Rules, 2d ed (Ottawa: Canadian Library Association, 1998) at 8 [AACR2R]. The rule was revised in the 2002 revision but an emphasis on the physical "item" remains.

<sup>3</sup> For a discussion on the development and need for RDA please see my article, F. Tim Knight, "Cataloguing Rules! The Road to RDA" (2009) 28:2/3 TALL Ouarterly 1, online: York Space <a href="http://pi.library.yorku.ca/dspace/handle/10315/2550">http://pi.library.yorku.ca/dspace/handle/10315/2550</a>.

RDA is available by subscription only via the RDA Toolkit, however the final draft used for review can be found at: RDA Full Draft (31 October 2008), online: RDA Toolkit <a href="http://www.rdatoolkit.org/constituencyreview">http://www.rdatoolkit.org/constituencyreview</a> [RDA Full *Draft*].

As successful as the Anglo-American Cataloguing Rules had been over the years, there had been various problems and calls for revision. This culminated in the International Conference on the Principles & Future Development of AACR held in Toronto in 1997. Some of the concerns that this conference focused on were the improved handling of serial resources, issues between the intellectual content and the carrier of that content, and the role of cataloguing rules in an online environment. Tom Delsey, who would later become the editor for RDA between 2005 and 2009, was concerned about the underlying structure of AACR and made some suggestions that can be summed up in the following statement: "Understanding data in the context of logical attributes and the association of each attribute with a specific entity or object becomes particularly important as we deal with the adaptation and extension of the rules to accommodate new media and new forms of intellectual or artistic expression." As we will see a little later on, this approach to data modelling lays the groundwork that leads to RDA.

In a digital environment AACR2 quickly becomes mired in its book-centred, print-based past. The cataloguing process itself has become a page flipping exercise, navigating from the chapter on serials, to the chapter on electronic resources, to the chapter on sound recordings when trying to describe a resource like the podcast The Law Librarian. It would be much easier to focus on the content and less on the form or format that the content takes. Focusing on print formats and then "classes of materials" was a perfectly logical way for AACR2 to evolve. The 'book' was, after all, the fundamental object that the cataloguing rules had originally set out to describe. But, as Karen Coyle and Diane Hillmann point out, "Descriptive rules based on predictable, stable and named 'sources of information' (title pages, colophons, etc.) about a resource, with a prescribed order of preference, were not adaptable to resources without title pages or pages, and not suitable for resources that existed in a state of constant change." Describing resources as book-like things is clearly problematic in the digital environment. Trying to maintain a system oriented around the finite, self-contained book format leaves the library profession walking backward into the future.

Coyle and Hillmann were referring to the inadequacies of AACR2, but their article is really a harsh criticism of RDA. This is largely because, at the time the article was written, RDA appeared to be nothing more than a set of cataloguing guidelines dressed up in AACR clothing. The authors felt that the profession had progressed very little from the early 1980s: "Since the development of the first OPACs, libraries have been trying to move forward while dragging behind them the ball of a century of legacy data and the chain of an antiquated view of the bibliographic universe." This sums up the problem nicely and clearly states the challenges that face the profession. At this stage it is hard to make a clean break from the past because we have invested so much energy into our AACR/ISBD/MARC past.

In his paper, "The Anglo-American Cataloguing Rules and their Future," Robert W. Manning describes the objective of this conference as providing the Joint Steering Committee (JSC) "with guidance on the direction and nature of future cataloguing rule revision." Robert W. Manning, "The Anglo-American Cataloguing Rules and their Future" (Paper delivered at the 64th IFLA General Conference, 16-21 August 1998), online: IFLA http://archive.ifla.org/IV/ifla64/083-126e.htm>. See also the scope and archived papers for this conference on the JSC website: <a href="http://www.rda-jsc.org/intlconf1.html">http://www.rda-jsc.org/intlconf1.html</a>>.

<sup>6</sup> Tom Delsey, "Modeling the Logic of AACR" (Paper delivered at the International Conference on the Principles and Future Development of AACR, 23-25 October 1997) at 7, online: Library and Archives Canada <a href="http://epe.lac-bac.gc.ca/100/200/300/jsc">http://epe.lac-bac.gc.ca/100/200/300/jsc</a> aacr/modeling/r-bibun.pdf>.

<sup>7</sup> The Law Librarian, online: Blog Talk Radio <a href="http://www.blogtalkradio.com/thelawlibrarian">http://www.blogtalkradio.com/thelawlibrarian</a>.

<sup>8</sup> Karen Coyle & Diane Hillmann, "Cataloging RDA: Resource Description and Access: Rules for the 20th Century", online: (2007) 13:1/2 D-Lib Magazine <a href="http://www.dlib.org/dlib/january07/coyle/01coyle.html">http://www.dlib.org/dlib/january07/coyle/01coyle.html</a>.

<sup>9</sup> Ibid.

That article was published in early 2007 and a few months later a couple of significant announcements radically changed the direction and development of the RDA guidelines. The first was the formation of the Dublin Core Metadata Initiative (DCMI)/RDA Task Force, a collaborative effort aimed at developing an RDA Dublin Core Application Profile. It is beyond the scope of this paper to go into the details of the DCMI/RDA collaboration, but many feel this collaboration helped legitimize the work of RDA, especially in the eyes of some of the non-library metadata communities, and will make it much more likely that RDA will be useful in a semantic web or linked data context. Attracting the interest of metadata communities outside of the library profession is one of the goals of the RDA initiative and an important aspect for the future of libraries and library data.

The second announcement, decided during the JSC meeting in October 2007, was to reconceptualize RDA by incorporating the Functional Requirements for Bibliographic Records (FRBR) and the Functional Requirements for Authority Data (FRAD). FRBR was issued in 1998 by the International Federation of Library Associations (IFLA). The aim of FRBR is to "produce a framework that would provide a clear, precisely stated, and commonly shared understanding of what it is that the bibliographic record aims to provide information about, and what it is that we expect the record to achieve in terms of answering user needs." Work on FRAD (then known as the Functional Requirements and Numbering of Authority Records or FRANAR) began in 1999 and has a similar goal to provide a common approach to thinking about authority data and builds on and broadens the FRBR model. 12

Both of these conceptual models were developed by analyzing existing bibliographic records and authority data, defining the entities, listing their attributes, and identifying relationships between the entities to develop an entity-relationship model. The attributes and relationships were then mapped onto four user tasks: to find, to identify, to select, and to obtain. This exercise represented an effort to distill past practice in terms that could be modelled in future data applications. But critics of RDA have questioned the validity of the user tasks and mistrust the origin and applicability of FRBR to the current information environment. In many respects their criticisms are valid. However, if we accept that this is a solution that accommodates our legacy data and builds bridges to the future, then we, as users of RDA, will need to better understand these conceptual models.

The FRBR entities fall into three groups. Group 1 entities represent the intellectual/artistic content. Group 2 entities refer to the creators of the Group 1 entities. Group 3 entities deal with the subjects of the Group 1 entities. For the sake of simplicity we will focus on the Group 1 entities: work, expression, manifestation, and item (also known as WEMI). The "work" and "expression"

<sup>10</sup> British Library Metadata Services Standards, *Data Model Meeting*, online: British Library <a href="http://www.bl.uk/bibliographic/meeting.html">http://www.bl.uk/bibliographic/meeting.html</a>>.

<sup>11</sup> International Federation of Library Associations and Institutions, Functional Requirements for Bibliographic Records: Final Report (September 1997; amended and corrected through February 2009) at 2, online: International Federation of Library Associations <a href="http://www.ifla.org/files/cataloguing/frbr/frbr\_2008.pdf">http://www.ifla.org/files/cataloguing/frbr/frbr\_2008.pdf</a>> [FRBR Report]. Compare this to the Statement of International Cataloguing Principles, which informs the principles used in RDA. International Federation of Library Associations, Statement of International Cataloguing Principles (2009), online: International Federation of Library Associations <a href="http://www.ifla.org/files/cataloguing/icp/icp\_2009-en.pdf">http://www.ifla.org/files/cataloguing/icp/icp\_2009-en.pdf</a>>.

<sup>12</sup> For an excellent overview of both of these conceptual models see Pat Riva, "FRBR and FRAD: Foundations for RDA" (Presentation delivered at the CALL/ACBD 46th Annual Conference, 25-28 May 2008), online: Canadian Association of Law Libraries <a href="http://www.callacbd.ca/conferences/2008/presentations/riva.ppt">http://www.callacbd.ca/conferences/2008/presentations/riva.ppt</a>.

<sup>13</sup> Ibid at slide 5.

<sup>14</sup> FRBR Report, supra note 10 at 8.

<sup>15</sup> See for example the discussion started by Shawne Miksa on the NGC4LIB discussion list, online: NGC4LIB Archives <a href="https://listserv.nd.edu/cgi-bin/wa?A2=ind0910&L=NGC4LIB&T=0&F=&S=&P=57660">https://listserv.nd.edu/cgi-bin/wa?A2=ind0910&L=NGC4LIB&T=0&F=&S=&P=57660>.</a>

entities are abstract representations of the intellectual/artistic content; the "manifestation" and "item" entities are the physical embodiment of the work or expression. If you are new to this terminology, it may take some time getting used to, but consider the "manifestation" and "item" as the information object of interest to users and the "work" and "expression" as something that facilitates access to and relationships between these objects.

Let us try to understand these entities by drawing on an example from something you might find in your law library. Consider the loose-leaf service, *Electronic Evidence in Canada*, by Graham Underwood and Jonathan Penner. The "item" is the blue binder containing a few hundred loose-leaf pages that the cataloguer consults while creating a catalogue record. This will also be the object the lawyer or law student expects to find when she goes to retrieve it from the shelf. This "item" is one copy of several thousand in the "manifestation" that the publisher produced in 2010. This is familiar territory. In our library we may have decided not to update our copy and instead bound the loose-leaf pages into a green hard cover volume. This makes our copy different from the updated copy in the original blue binder, but it is still an "item" and the content would still be considered part of the "manifestation" originally issued by the publisher.

When Underwood and Penner began working on this book they set out to explore the "treatment of electronically-stored information as evidence, and how the rules of evidence apply to it." This was the seed of the idea for their intellectual "work." They probably worked together for a number of years preparing and realizing an "expression" of their "work." Once completed they presented their final "expression" with the four parts (The Nature of ESI, Pre-litigation Management of ESI, Managing ESI, Use and Presentation of ESI at Trial), appendices, and an index, to the publisher who printed the looseleaf pages several thousand times and put them into several thousand blue binders creating the set of books that make up the "manifestation." We saw the marketing flier, placed an order and received the "item" which we then processed and added to our library collection.

RDA provides the guidelines needed to determine which attributes should be recorded for each of the entities with some of these attributes identified as being "core elements":

As a minimum, a resource description for a work, expression, manifestation, or item should include all the core elements that are applicable and readily ascertainable. The description should also include any additional elements that are required in a particular case to differentiate the resource from one or more other resources bearing similar identifying information.<sup>17</sup>

However, it is worth noting this comment from a memorandum issued in 2008 from Deirdre Kiorgaard, then Chair of the JSC:

By definition the core element set does not provide comprehensive support for all of the FRBR/FRAD user tasks. Therefore it is important that local agencies give careful consideration to those additional data elements necessary to support the needs of their users. <sup>18</sup>

This is reminiscent of the levels of description found in AACR2 (AACR 1.0D).

<sup>16</sup> Graham Underwood & Jonathan Penner, *Electronic Evidence in Canada*, loose-leaf (consulted on 18 October 2010), (Toronto: Carswell, 2010), ch 1 at 1.

<sup>17</sup> RDA Full Draft, supra note 4, 0.6.1.

<sup>18</sup> Deirdre Kiorgaard, *RDA Core Elements and FRBR User Tasks* (5 November 2008) at 4-5, online: Joint Steering Committee for Development of RDA <a href="http://www.rda-jsc.org/docs/5chair15.pdf">http://www.rda-jsc.org/docs/5chair15.pdf</a>>.

Some of the attributes will be common across all of the entities, for example, the title, form and date. The language is a particularly important attribute for the expression entity. However, it is the attributes for the manifestation that will be the most significant for cataloguers and for users searching the library catalogue. These attributes include title, statement of responsibility, the publisher, place of publication and date, the extent (e.g. number of pages, volumes, CD-ROMs, etc.), and an identifier like the ISBN. The item would have attributes like the call number for the book or the fact that we have decided to bind our copy of the loose-leaf manifestation. Again, these are concepts and processes with which cataloguers and users are familiar.<sup>19</sup>

So what are some of the big differences between AACR and RDA? Some of the familiar terminology used in AACR has been changed in RDA. For example, what we referred to as a "heading" in AACR is now considered an "access point," either an "authorized access point" or a "variant access point." The "uniform title" is now referred to as the "preferred title for a work" and "see references" are now also called "variant access points." Some terms we used to abbreviate will now be spelled out in full. This means that the rather cryptic,

```
[S.l.: s.n.], 1973
```

will become,

[Place of publication not identified]: [publisher not identified], 1973.

And here is a much clearer statement of the extent of an item:

```
xvii, 537 p., [32] p. of plates : ill. (some col.)
```

which spelled out in full becomes

```
xvii, 537 pages, 32 pages of unnumbered of plates: illustrations (some colour).
```

Changes like these should help catalogue users more easily interpret the results they retrieve when searching the library catalogue.

The GMD (general material designator), which in AACR appeared in square brackets after the title proper, will be replaced with three new data fields: the media type; carrier type; and content type. For example, for an electronic resource you will no longer see this:

A digest of the laws of England [electronic resource] / by Sir John Comyns.

Instead, you will now see something like this:<sup>20</sup>

A digest of the laws of England / by Sir John Comyns.

Content Type: text Media Type: computer Carrier Type: online resource

<sup>19</sup> See RDA Full Draft, supra note 4, 0.6.2–0.6.3; C.f. FRBR Report, supra note 10 at 31-49.

<sup>20</sup> Details on how this might display in your catalogue will depend on your library system and the local policies of your library.

If this were an electronic resource available on CD-ROM then the Carrier Type would be described as a "computer disc." Or, for the print version the Media Type would be "unmediated" and the Carrier Type would be "volume."

Another significant change is the discontinuation of the so-called "rule of three." In AACR this rule came into play when a statement of responsibility named more than three persons or corporate bodies. The cataloguer was instructed to use only the first named author followed by the "mark of omission" and adding "et al." in square brackets (AACR2 1.1F5). This is no longer a part of RDA, although it may still be used optionally by replacing "et al." with 'and others' (RDA 2.4.1.5). One of the goals of RDA is to facilitate the use of data from other sources such as publisher data, or metadata that might be embedded as part of an electronic resource. Therefore RDA wants to use this data as it is, as it appears on the resource, as it is transcribed (RDA 1.7). Data can therefore be collected without the need for human intervention, leaving cataloguers free to do what they do best: subject analysis of the intellectual content.

The "rule of three" also comes into play, for example, when naming treaties with three or more signatories. In AACR if the treaty had three or more signatories it would be entered under the treaty title on its own (AACR 25.16B2). In RDA the treaty will be entered under the "authorized access point" for the first named signatory and the "preferred title" with the preferred title for treaties being "Treaties, etc." (RDA 6.29.1.15). Multilateral treaties, where the first signatory is not known, will use the name by which the treaty is commonly known (RDA 6.19.2.7). RDA will continue the AACR practice of naming a treaty by a single government when the treaty is between the single government and two or more governments (this is an exception under RDA 6.29.1.15). For bilateral treaties the AACR practice to use the government that came first alphabetically in English has been dropped. Instead, the first-named signatory and the preferred title for the treaty will be used (RDA 19.2).

After much anticipation the RDA Toolkit was finally released on June 23, 2010 and free access was made available until the end of August. This coincided with the beginning of an evaluation period initiated by the Library of Congress and a group of 25 American libraries to test the feasibility of implementing RDA. The necessity for the testing of RDA grew out of cautions expressed in the Final Report of the Working Group on the Future of Bibliographic Control.<sup>22</sup>

In response to concerns about RDA raised by the Library of Congress Working Group on the Future of Bibliographic Control, the three U.S. national libraries--the Library of Congress (LC), the National Library of Medicine (NLM) and the National Agricultural Library (NAL)--made a commitment to the further development and completion of RDA. The three libraries agreed to make a joint decision on whether or not to implement RDA, based on the results of a test of both RDA and the Web product. <sup>23</sup>

For a three month period beginning in September RDA test records will be created by these libraries and the record creation experience recorded and evaluated. In the New Year these records will be analyzed and feedback from the library community will be gathered. A final decision on whether to

<sup>21</sup> That is, media "perceived directly through one or more of the human senses without the aid of an intermediating device." *RDA Full Draft: Glossary* (31 October 2008) at 45, online: RDA Toolkit <a href="http://www.rdatoolkit.org/constituencyreview">http://www.rdatoolkit.org/constituencyreview</a>>.

<sup>22</sup> See section 3.2.5 in *On the Record: Report of the Library of Congress Working Group on the Future of Bibliographic Control* (9 January 2008) at 29, online: Library of Congress <a href="http://www.loc.gov/bibliographic-future/news/lcwg-ontherecord-jan08-final.pdf">http://www.loc.gov/bibliographic-future/news/lcwg-ontherecord-jan08-final.pdf</a>>.

<sup>23</sup> Library of Congress Bibliographic Control Working Group, *Testing Resource Description and Access (RDA)*, online: Library of Congress <a href="http://www.loc.gov/bibliographic-future/rda/">http://www.loc.gov/bibliographic-future/rda/</a>>.

implement RDA in American libraries will be made some time in the spring of 2011. However, it seems likely that we may have passed the point of no return. Although library communities outside of the U.S., including Library and Archives Canada, are waiting for the results of these U.S. tests, they appear to be committed to implementing RDA regardless of the outcome. Work on creating training materials has begun and a number of workshops focusing on preparing libraries for RDA have been given and more are planned.

In many ways RDA is a work in progress. Trying to position the library community so that our data will be both relevant in future applications while continuing to maintain a connection to our legacy data has created a number of challenges. In the short term we will continue to use MARC, ISBD punctuation and our current library systems. Because of this, Barbara Tillett has referred to RDA as a "bridge" that strives to connect our past with our future. On the surface nothing much will have changed. The process of cataloguing will essentially be the same with a little more emphasis placed on cataloguers' judgment and treating resources in a more homogeneous fashion. RDA, through the conceptual models of FRBR and FRAD, provides a common language and an entity-relationship approach to our library data that may encourage non-library metadata groups to work with us and share in the development of a common information future. It is an interesting point in the history of libraries. RDA has the potential to succeed in moving the library profession forward into the future.

<sup>24</sup> Barbara Tillett, "RDA Changes from AACR2 for Texts" (12 January 2010) (webcast), online: Library of Congress <a href="http://www.loc.gov/today/cyberlc/feature\_wdesc.php?rec=4863">http://www.loc.gov/today/cyberlc/feature\_wdesc.php?rec=4863</a>.