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# Developing a Web Based Integrated Library Catalogue System for the National Print Museum

Colm O'Connor



## Abstract

This article describes the implementation of a web-based integrated library catalogue system at the National Print Museum, Dublin. The library catalogue was built using LibraryThing, a web-based, low cost, user friendly social networking cataloguing tool that allows development of a library's assets as well as an online platform for sharing other libraries' collections. The benefits of using LibraryThing as a valid resource for libraries with limited budgets and staffing constraints are considered.

**Keywords:** *LibraryThing, Library Catalogues, Social Networks*

The National Print Museum collects, documents, preserves, interprets and makes accessible the material evidence of printing craft in Ireland. The library at the museum is a small specialist reference library with just over one thousand items. Books comprise the largest part of the collection, but the library also holds journals, pamphlets and newspapers relating to printing and associated crafts.

In February 2011 the author took on the role of Museum Librarian, on a voluntary basis. At this time the library's catalogue consisted of an Excel spreadsheet. This was unwieldy to

work with and had limited searchability functions. It was only available to internal users with no access available to the public. The author decided to address these challenges by developing a system

that was user friendly and fit for purpose.

It was decided to explore the possibility of a web-based catalogue. The solution needed to satisfy two primary considerations. Firstly, the software needed to be either free or very low cost and secondly, the software needed to be user friendly for both administrators and end users of the system.

The museum first considered using an Open Source Library Management System (LMS) OPAC module such as Koha, OPALS or Evergreen. Open Source Software (OSS) is software for which the source code is freely available and which can be modified and distributed, subject to certain provisions. There are initial monetary benefits as OSS does not require a license fee. The

functionality of open source OPACs has also won plaudits (Breeding 2009) stated that the OPACs of both Koha and Evergreen (two of the most widely used Open Source LMSs) 'offer some of the features expected in next generation interfaces such as faceted browsing, relevancy ranked results and display of cover art'.

However, there are disadvantages to using OSS. While the initial purchase price of the software is generally free, Boss (2003) warns that using such software can often result in unanticipated costs : 'a library may find it needs to do a great deal more work than anticipated to adapt the software to local needs...considerably more staff expertise and time may be required to use it'. Cervone (2003) also points out that technical support costs for Open Source Software 'can be more than the costs for equivalent commercial software'. Payne and Singh (2010) note that there is a lack of research available on the "impact, functionality and effects of OSS implementations in library or information access and retrieval environments". Until this has been addressed, many libraries will feel uncomfortable committing themselves to OSS. As the National Print Museum had a limited budget and a single librarian without advanced IT skills, it was decided that using an Open Source OPAC was not feasible.

The museum then considered web based cataloguing software. This is software that allows libraries to catalogue their books and share their catalogue with the online community. There are a number of sites offering an online cataloguing service: popular sites include LibraryThing, Goodreads and Shelfari. All of these sites offer a low cost, user-friendly online cataloguing service. Ultimately the museum decided that LibraryThing best suited its needs. That Shelfari and Goodreads are both ad supported while LibraryThing is advertisement free was one factor in the decision as was the fact that a number of libraries worldwide had successfully developed online catalogues using LibraryThing and had reported positive results (Hvas 2008, LibraryThing 2012, Walser and Van Tine 2008). In Ireland, both Institute of Technology Tallaght (ITT) and Waterford Institute of Technology (WIT) have employed aspects of Library Thing to enhance their catalogues (*Irish Library News* 2010)

## About LibraryThing

LibraryThing is a web-based, low cost, user friendly social networking cataloguing tool that enables development of a library's assets as well as providing an online platform for sharing other libraries' collections. It was created by web developer Tim Spalding in 2006 and as of December 2011 had 1.4 million users and over 50 million individual books catalogued into its system (LibraryThing.com 2011). LibraryThing offers excellent value for money; the museum purchased a lifetime organizational account, with a limit of 5,000 books, for just \$25. LibraryThing is also extremely user friendly as it was originally designed with personal users in mind (Ishizuka 2006).



Figure 1. LibraryThing

## Building the catalogue

The process used to build the catalogue was straightforward. The first step in cataloguing a book was to search LibraryThing's database. LibraryThing receives its book information from almost seven hundred sources, including Amazon and Library of Congress. The users of LibraryThing also provide data such as tags and reviews as well as their own book records. The databases can be searched in a number of ways: by author, title or ISBN. Clicking one of the returned book results adds that book to your catalogue.

The quality of the data in each book record varied according to the database from which it was retrieved. While Library of Congress records can be deemed trustworthy, Walser and Van Tine (2008) noted that, 'there is no way of ensuring that Amazon.com would adhere to any Authority control in its data input'. To ensure consistency in the library's metadata, it was necessary to edit the bibliographic information of each book after it was added to the catalogue.

If a book cannot be found in LibraryThing's databases it can be added manually using a blank manual entry form. As the majority of the books in the museum's library are quite rare, most of the books were added to the catalogue by this method. A disadvantage of adding books manually was that it was time consuming, taking approximately 5-10 minutes per book.

An alternative to adding books individually is to use the mass import feature. This allows multiple records to be added at the same time using an Excel spreadsheet. In practice this feature was not of great use to the museum's library. For books to be added to the catalogue each record in the spreadsheet must have an ISBN. The majority of books in the museum's catalogue, due to their age and the fact that many have been printed privately, do not have an ISBN. Even when books did have an ISBN the added record would still require additional editing of the metadata. The museum found that using the mass import feature was not significantly quicker than importing books item by item. For other libraries however, with more accessible or common books, the mass import feature may well prove very beneficial.





Figure 2. List view and classification

The museum encountered some difficulty adding the classification of the book to the book record. LibraryThing only provides fields for Dewey or Library of Congress classification. However, the Print Museum uses an internal classification scheme. A workaround solution was found by adding the classification of each book to the comments field, preceding the classification number with “Shelfmark:” (figure 2)

Book covers add a pleasing visual element to the LibraryThing catalogue. LibraryThing has over one million book covers catalogued in its system (Hadro 2008) and covers can also be retrieved from Amazon. Users can choose from a selection of covers for each uploaded book or manually upload their own covers. Most common books will already have a cover photo in LibraryThing’s databases but the rarity of many of the museum’s books necessitated the photographing and manual uploading of many book covers.

On an average working day 40–45 books were added to the catalogue. Overall the project took a single librarian about 160 hours.

## The Catalogue

**Profile home page:** Each LibraryThing member has a profile home page. Here the museum entered information about and contact details for the library (See figure 3). The profile page also acts as a portal into the catalogue through the embedded search box.



Figure 3. Profile home page

**Customisable catalogue:** The layouts of LibraryThing catalogues are extremely customisable. In figure 2 the standard list

view can be seen, displaying the museum’s preferred fields of ‘Author’, ‘Title’, ‘Date’, ‘Tags’ and ‘Comments’.

There is the option of displaying other fields such as ‘ISBN’, ‘Rating’, and ‘Dewey Decimal Classification’ as well as many others. On the right hand side of the page there are links to social networking information, such as user reviews and other users who share the same book and also to editing options. Other views include the ‘cover view’ (figure 4) and the ‘tag view’ (figure 5). Libraries can set a preferred viewing style and layout and visitors to the catalogue are encouraged to use this through a pop up which appears when they access the catalogue.



Figure 4. Cover view

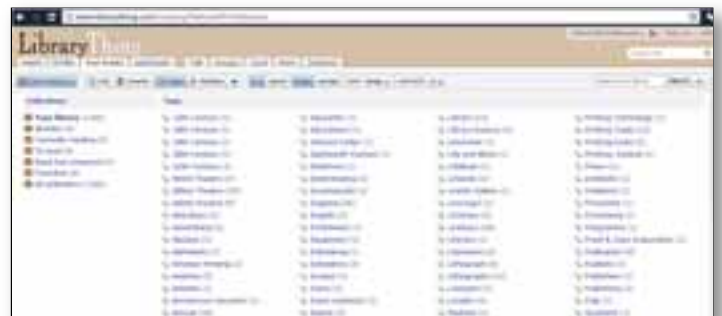


Figure 5. Tag view

**Tagging:** Tags are an important element of LibraryThing. When adding an item to their library, users are invited to ‘tag’ the item with keywords they feel best summarise that resource. Tags are a means of allowing users to create their own personal vocabulary, as opposed to relying on rigid, strictly controlled vocabularies such as Library of Congress subject headings. Collections of user tags are called ‘user vocabularies’ or ‘folksonomies’ (Vander Wal 2007). Lu *et al* note that the use of personal tags can aid in information retrieval: ‘In social tagging systems taggers and searchers at the same time, therefore the probability that indexers and searchers will agree on the subject of a given resource and use the same combination of terms to express the given subjects would be higher in social tagging systems than in other indexing and metadata creation systems’. Other advantages of tagging include the fact that personal vocabulary adapts quickly to new concepts and terms (Mathes 2004) and that users are empowered through participating in the cataloguing process (Lu *et al* 2010).

Tagging as a means of indexing resources has also attracted some criticism: Guy and Tonkin (2006) state that user generated tags are often imprecise and overly personalised and 'the result is an uncontrolled and chaotic set of tagging terms that do not support searching as effectively as more controlled vocabularies do'. The museum attempted to overcome this potential problem by tagging consistently and objectively.

Mathes (2004) notes that the barriers to entry to systems using personalised tagging are lower than those using controlled vocabularies; participating in these systems 'is far easier in terms of time, effort and cognitive cost'. As the Print Museum only had one librarian with a limited timescale for the project, this was a particularly attractive aspect of the tagging system used by LibraryThing.

## Social Networking

In addition to its cataloguing tools, LibraryThing also has a number of social networking features. LibraryThing offers book recommendations based on your collection and enables libraries to connect and form online communities with others who have similar interests. There are active forums and book groups within these communities encouraging interaction between users. LibraryThing also gives users access to reviews and ratings and also offers statistics about your collection. Though useful, LibraryThing's social networking features are not compulsory; there is the option of keeping your catalogue private. This option is useful for those not wishing to display their catalogue before it is finished.

## Conclusion

The implementation of the OPAC has been very successful. The library now has a user friendly, professional looking and easily searchable catalogue. The goal of creating a user friendly and fit for purpose catalogue was achieved within four months by a single librarian. Awareness of the library has increased and the catalogue has generated considerable interest in the library both from librarians and the general public. A number of librarians from across the country have been in touch with the author with regard to implementing a LibraryThing catalogue in their libraries.

This project demonstrates that much can be achieved by just one librarian working on a voluntary basis. At a time when many libraries are facing monetary difficulties the author hopes that the success of this project provides evidence that library service levels can be maintained and even enhanced despite a limited budget.

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## Referenced Websites

Evergreen: <http://open-ils.org/>  
 Goodreads: <http://www.goodreads.com/>  
 Koha: <http://www.koha.org/>  
 LibraryThing: <http://www.librarything.com/>  
 National Print Museum: <http://www.nationalprintmuseum.ie/>  
 OPALS: <http://www.opals-na.org/>

## References

- Boss, R., W., (2005) "Open Source" Software. Available at: <http://staging.ala.org/ala/mgrps/divs/pla/plapublications/platechnotes/opensource2008.doc> (Accessed February 19th 2011).
- Breeding, M., (2009) "The Viability of Open Source ILS", *Bulletin of the American Society for Information Science and Technology*, 35(2): 20-25.
- Cervone, F., (2003) "The Open Source Option", *Library Journal Net Connect*, Summer: 8-12. Available at: <http://www.libraryjournal.com/article/CA304084.html>. (Accessed February 22nd 2011)
- Guy, M. & Tonkin E. (2006) "Folksonomies: Tidying up Tags?" *D-Lib Magazine*, 12(1). Available at <http://www.dlib.org/dlib/january06/guy/01guy.html> (Accessed December 14th 2011)
- Hadro, J. (2008). "LibraryThing Releases One Million Free Covers" *Library Journal*, 133(14):21-22
- Hvas, Anna (2008), "Cataloguing with LibraryThing: as easy as 1, 2, 3!" *Library Hi Tech News*, 25(10):5-7
- "Library ITT Dublin Goes Mobile!!" *Irish Library News*, Available at <http://www.librarycouncil.ie/irishlibrarynews/past-issues/december-2010-308/a19/> (Accessed December 12 2011)
- Ishizuka, K. (2006). "A Book Lover's MySpace" *School Library Journal*, 52(10): 24-25
- Librarything.com. "Tour". Available at <http://www.librarything.com/tour> (Accessed December 10th 2011)
- Librarything.com. "LibraryThing for Libraries. Waterford and Deschutes". Available at <http://www.librarything.com/blogs/thingology/2007/07/librarything-for-libraries-waterford-and-deschutes/> (Accessed December 10th 2011)
- Lu, Caimei; Park Jung-ran & Hu Xiaohua (2010). "User tags versus expert-assigned subject terms: A comparison of LibraryThing tags and Library of Congress Subject" *Journal of Information Science*, 36(6):763-779
- Mathes, Adam (2004) "Folksonomies—Cooperative Classification and Communication Through Shared Metadata". Available at <http://www.adammathes.com/academic/computer-mediated-communication/folksonomies.html> (Accessed February 12th 2011)
- Payne, Alexandria & Singh, Vandana (2010) "Open Source Software Use in Libraries". *Library Review*, 59 (9):708-717
- Vander Wal, Thomas (2007) "Folksonomy Coinage and Definition" Available at <http://vanderwal.net/folksonomy.html> (Accessed December 11th 2011)
- Walser, Richard; Van Tine, Melissa (2008), "Cataloguing a Small Library Using LibraryThing", Southern Connecticut State University Department of Information and Library Science, Field Project Summer 2008: Final Report". Available at <http://home.southernct.edu/~walserr1/courses/585LibraryThing.htm> (Accessed December 7th 2011)