Statewide ILS Based on Open-Source Software – Report on the Viability for Colorado Libraries

Reason for the Study

In broad terms, libraries in Colorado are interested in exploring alternatives to current vendor-based products based on two widely-held assumptions: open source ILS products offer a significant economic savings; and open-source solutions offer libraries control over their ILS development agenda.

This report summarizes the findings of a statewide task force charged with asking questions about the technology, the current viability for Colorado, and the costs associated with a potential statewide ILS based on open-source software, like Evergreen or Koha.

Everything read, discussed and learned by the task force is exposed and accessible through an open Google Groups site, including recordings of phone calls and interviews. This process was designed to encourage transparency and honest dialogue.

Not covered in this summary: explicit guidance for individual libraries poised to decide for themselves between proprietary, commercial ILS options and “free” open-source ILS options. The focus for the study has been to assess the viability for a statewide ILS and report in broad terms the pros, cons and costs. However, many of the findings and references can be informative for libraries considering open-source ILS products on their own.

Pros of a Statewide ILS Based on Open Source

A number one benefit for an open-source ILS solution is the ability of the participating libraries to directly control the development of features and functions of their system. The open-source code behind the ILS is not owned by a vendor, but instead “belongs” to the community.

System enhancements can be created or paid for by any member of that software’s “open source community,” and then voluntarily contributed back, for the benefit of the full community.

If locally operated, a data center or multiple data centers could be developed to serve various geographic regions of Colorado. In an ASP situation (application service provider), the ILS software could be moved from one hosting company to another.

Resource sharing among libraries is enhanced in a broader statewide system. ILL and use of library materials increases. A union catalog is possible. A union list of patrons is possible.

Features of leading open-source solutions increasingly match up with the basic features offered by commercial, vendor solutions.

For library patrons, the features and functions of the public interface to the ILS could be designed to be consistent among libraries across the state and conducive to the user experience regardless of what library the patron frequents.

The Process

- All details and documents on the Google Groups site: http://groups.google.com/group/open-source-co-libraries
- Project web site created and bibliography assembled. Core list of questions developed.
- Phone interviews/conference calls conducted. Full recordings available on the web site.
- White paper drafted, reviewed and released to the Colorado library community.
- Future: discuss findings within the broader library community during a statewide ILS “summit” or series of town hall meetings.

Future Challenges

- Bringing CO library stakeholders up to speed about the future of open-source ILS options and technologies
- Creating an environment where open and rational statewide dialogue can occur.
- Arriving at consensus about Colorado’s next steps as a library community.

Task Force Members

- Jim Duncan (Chair), State Library
- Joel Robinson, Marmot Library Network
- Gem Stone Logan, High Plains Library District
- Lori Smith, State Library
- Judy Van Acker, Colorado Library Consortium (CLiC)
- Cookie Wolf from, Automation System Colorado Consortium (ASCC)
Leading open-source ILS products offer snappy, user-centered interfaces without requiring purchase of add-on or extra-cost modules.

For library staff members, the features and functions of back-end parts of the ILS would be consistent between libraries. Of course, this is a benefit (like the public interface consistency) regardless of whether or not the ILS is based on open-source software or commercial software.

With interest growing in libraries, there is a corresponding growth in companies like Liblime and Equinox that not only develop or host open-source systems, but companion companies like Alpha-G Consulting that provide specialized services, like ILS transition and migration.

Cons of a Statewide ILS Based on Open Source

Culturally and historically speaking, Colorado libraries are accustomed to local autonomy and control. Libraries will be required to make compromises under a collaboratively-planned and governed system. Some libraries may choose to opt out of participating.

Open source does not mean cheap or free; as with any ILS product, it requires significant support and investment.

Establishing a shared governance structure (which would guide the operations and management of a statewide ILS) will be a complex and politically-difficult process in a state where local control is highly valued. This process will require that financial, operational and technical details be settled long before development or implementation of a shared ILS system. This process will take as long as two or more years.

Open source ILS products are new when compared to commercial products that have been developed and sold for many years. Questions remain about the long-range future for these open-source technologies if a critical mass of developers does not materialize to sustain and improve these open-source systems.

Service providers (development, hosting and training) that offer support for open-source ILS products are well-intentioned, but new in the marketplace. Questions remain about the ability of these companies to “scale up” to meet increased demand from a growing potential market of diverse libraries and consortia.

Increased control over the development agenda for a statewide ILS means increased responsibility for any organization overseeing the system. It must strategically plan and fund those developments in consort with the open-source community. Not all organizations are comfortable or knowledgeable about what is required to successfully play such a development and customization role—essentially serving as an ILS vendor.

It is not clear whether or not a single, statewide open-source ILS can satisfy and serve the needs of all types of libraries: public, school, academic and special libraries.

As many libraries know, migration of a mission-critical system like an ILS can be rife with technical challenges, and as some would attest, involves some degree of “pain.” Change is inherently difficult. The transition to an open-source ILS would be no different, in that data must be moved, rules and policies must be translated and staff trained.

Supplementary Reading

- A Q&A document, well worth reading, details many of the more direct questions that have been posed by libraries in Indiana. Questions YOU also may have! This document is associated with the Evergreen Indiana (EI) project, coordinated by the state library, which is starting to gear up with its open source ILS initiative. Read: http://www.in.gov/library/files/egFAQ.pdf


The Landscape for Colorado

- At the writing of this report, only one library in Colorado was operating with an open source ILS: the John C. Fremont Library in Florence. This library was hosting its own ILS.

- An initiative has stirred up related to a possible statewide ILS, though the discussion is not limited to open-source solutions. This effort is being spearheaded by a several public library directors. The topic was discussed during a May meeting of the Denver metro area library directors, then broadened through discussions at the Public Library Directors’ Forum held in June, in Aspen.

- Library Research Service, a unit of the State Library, coordinated a survey about public library expenditures for ILS systems and software, with the hopes of gaining some insight to how much is spent by public libraries across Colorado.
Costs of a Statewide ILS Based on Open Source

Cost savings for a group of libraries can be achieved when compared to every individual library “going it alone.” This savings is not due to the open-source ILS options per se, but rather a typical result of any cooperative purchasing situation. The Marmot Library Network and ASCC group are two examples within Colorado that demonstrate cost savings for participating libraries.

Startup costs would not be insignificant, despite the “free” open-source software. With these types of systems, the costs are shifted from vendor licenses, maintenance, support and training...to management of product development, application development and related programming, maintenance, support and training.

Migration costs would include cleanup of bibliographic and patrons records and potentially circulation data; translating rules and policies for material handling and circulation to a new ILS; extracting records from multiple existing commercial ILS systems around the state and converting those records to be readable by an open-source system; retraining staff in new functions and features, and more.

Annual operational costs would exceed $1 million. Expenses would include: data center costs (if locally hosted and maintained) or hosting (if using a commercial application service provider model); software development and support; operations and technical support; training support; content development; staff travel; office equipment and supplies; and other operational costs.

Factors to consider that decide viability for a statewide ILS and that affect both planning and the bottom line costs for implementation:

- geography of Colorado;
- size and diversity of the library community potentially involved;
- staffing required to operate and support a centralized system;
- identifying sustainable funding sources;
- establishing a responsive and thoughtful governance structure;
- developing strategic directions for a statewide ILS;
- migrating libraries from existing ILS systems; and more…

Summary

Readers are challenged to draw their own conclusions about the viability of a statewide ILS. This whitepaper is designed to encourage discussion and to expose key questions for library decision makers.

- Is Colorado ready for a statewide ILS? Do libraries want a statewide ILS? What types and sizes of libraries are interested? How would this work for multiple types of libraries?
- Are libraries willing to pool their resources? Are libraries prepared to relinquish local control and compromise with other libraries on aspects of the ILS that may require standardization?
- Where does the funding come from? Is the State Library going to finance this? How much will this cost individual libraries?
- What statewide services are libraries willing to give up to get a
different statewide service, like an ILS?

- What unique challenges would a statewide ILS initiative face because of the geography and size of Colorado?
- Does it make sense to have one data center, or multiple data centers, or perhaps have this hosted by a commercial provider? Would every library be part of one single catalog “instance” or would there be several? How scalable are open-source systems for serving different types and sizes of libraries? What local level of control and/or customization would be available?

**Just the Facts, Folks – Some Tidbits to Consider**

Open Source ILS – integrated library system software that is free to download and use. A distributed community of programmers develops the software, creating new features and enhancements. Those developments are contributed back centrally, for all to use.

Although some people assume that free, open-source ILS products translate to lower costs when compared to vendor solutions, the reality is that for individual libraries, costs can be nearly the same depending on the library’s situation. With open source, the costs are just distributed in a different way. Total cost of operation, support and development should be tallied for open-source solutions just as these costs would be assessed when considering vendor products.

Libraries need not manage, customize or develop their own open-source ILS solutions. Both LibLime (Koha and Evergreen) and Equinox (Evergreen) are leading companies offering for-fee services for bib record conversion, system development, consulting and training, as well as full-service application hosting.

Georgia PINES originally started in late 1999 with a vendor-based ILS: SIRSI’s product. Its replacement, Evergreen, was developed in-house. Last year, key developers of the Evergreen ILS left state employment and created their own private company (Equinox) to continue developing and supporting the product.

Georgia PINES does not operate a true statewide ILS. Only public libraries utilize the Evergreen-based ILS operated by the PINES staff, and larger metropolitan systems in the state are noticeably absent (like the Atlanta-Fulton Public Library System and the Live Oak Public Libraries near Savannah). Of the 58 public library systems in Georgia, 48 are participating. PINES supports 270 public library facilities, serving 1.8 million patrons.

Central funding for PINES is provided through the Georgia governor’s office. Startup required funding of $1.6 million. The annual operating budget for the ILS alone exceeds $1.1 million. This includes technology expenses, development costs, support, training, travel, supplies and more. When fully staffed, PINES will have a core staff of seven professionals.

Evergreen currently lacks an acquisitions module, however it was under development by the Univ. of Windsor at the writing of this report. Koha already offers such a module. Both systems play nice with RFID.

Koha has a Z39.50 server. Evergreen does not have a Z39.50 server, but it is part of the development “roadmap.” Libraries utilizing Evergreen would not be searchable through either the Colorado Virtual Library or SWIFT.