Library Lab Final Proposal ILLiad Addon Scripting Project Tom Bruno, Head of Resource Sharing, Widener Library October 21, 2011

UPDATES TO DRAFT PROPOSAL

Per feedback from the Review Committee, I have included a section in which I identify the potential stakeholders for this proposal and include their feedback for ILLiad Addon Scripting development, which resulted in an expanded list of proposed Addons. Also at the Committee's request, I have expanded the section on assessment and metrics to present the data we currently have to measure request processing throughput in the ILLiad system. After conferring with other resource sharing stakeholders, I have also elected to modify the time frame for this proposal from 26 weeks to 13 weeks, with a week dedicated to the development of each proposed Addon and an additional week at both the beginning and end of the project.

PROJECT IDEA

The ILLiad Addon Scripting Project will develop and code a suite of custom search scripts (aka "Addons") for the ILLiad resource sharing management system. Addons are a new feature to ILLiad and greatly enhance the functionality of the ILLiad staff client, similar to extensions in web browsers. The vendor Atlas Systems currently releases its staff client with Addons which can search and import information from the Amazon, Google Search, Google Scholar, FedEx/UPS/USPS, and WorldCat API's (Application Programming Interfaces). This Library Lab proposal seeks to develop additional Addons for needs specific to the Harvard Library's resource sharing workflows.

WHAT PROBLEM IT WILL SOLVE

With the release of the Version 8 client, Atlas Systems has embraced an ethos of agile development both internally for its own operations and externally with its customers-- i.e. the global resource sharing community. By opening its staff client to radical customization, Atlas is encouraging local experimentation while at the same time crowdsourcing the development of new features and functionality. While other library systems have embraced this openness and created Addons which have resulted in significant savings of time and labor in searching/processing interlibrary loan requests, Harvard Library has lagged in this regard thus far.

HOW IT FITS WITH EXISTING ACTIVITIES

As patrons continue to discover resources which are more and more difficult for resource sharing staff to procure, it is imperative that staff be equipped with every possible tool in order to locate and fulfill interlibrary loan requests. By developing Addons which can not only automate certain advanced searches but also import citation information and other important metadata back into the ILLiad request, the ILLiad Addon Scripting

Project will leverage existing disparate online resources into a powerful suite of "one-click" search functionality. Addons can also be deployed in a manner similar to Macros in ALEPH, permitting additional automation of resource sharing workflows within the ILLiad client wherever feasible. These Addons will be sharable across all Harvard Library resource sharing units currently using the ILLiad system.

IDENTIFYING AND INCLUDING STAKEHOLDERS

After this Draft Proposal was submitted, a query was sent to the Harvard Library resource sharing community so as to identify the potential stakeholders for the ILLiad Addon Scripting Project and include their input when determining which Addons would have the greatest overall impact. Feedback was received from seven of the eleven existing Harvard ILLiad units: Widener Library/HCL, Harvard Depository, Cabot Science Library, Harvard Science Libraries, Countway Library of Medicine, Harvard Law Library, and Gutman Library, but representing a consensus of over 95% of Interlibrary Loan and Scan & Deliver operations by request volume.

Not only did this feedback confirm the initial selection of candidates for Addon development, but respondents also suggested additional potential Addons which would be beneficial to more subject-specific search and discovery as well. These suggested Addons have been added to the list below. As a result of this feedback, I have modified the time frame for this project from 26 weeks to 13 weeks, as I believe that we have sufficiently captured the Harvard Library's needs for Addon development at this time.

WHAT RESOURCES ARE NECESSARY IN THE SHORT AND LONG RUN

Our license with Atlas Systems/OCLC permits us to have as many simultaneous installations of the ILLiad client as we wish. In addition, scripting for the ILLiad client is done in LUA, an open-source scripting language. Therefore it will not be necessary to purchase/license any additional hardware or software for this project.

Required resources for this project will include a combination of release time for existing resource sharing staff (including the Head of Resource Sharing at Widener Library and one resource sharing staff member drawn from a local unit), in addition to technical staff from the Harvard Library Lab for LUA programming. Resource sharing staff and technical staff will collaborate intensively on the development and programming of the following ILLiad Addons:

- The Karlsruhe Virtual Catalog KVK Search
- Verde ERM (Electronic Rights Management) Search
- CRL (Center for Research Libraries) Search
- British Library Integrated Catalogue Search
- EthOS (Electronic Thesis Online Service) Search
- National Diet Library of Japan Search
- Russian State Library / National Library of Russia Catalog Search
- AMICUS (Library and Archives Canada) Search

- PubMed/Pubmed Central/DOCLINE Search
- ISI Web of Knowledge Search
- EMBASE Search

Other Addons may also be developed in the course of this project. Resource sharing staff and technical staff will be encouraged to identify additional avenues for Addon development and further potential customization for the ILLiad staff client during the 13-week project, making final recommendations for any subsequent phases of development at the project's conclusion. Currently however we are planning on a week of development for each individual proposed Addon, plus an additional week at both the start and conclusion of the project.

A BUDGET OUTLINE

- 13 weeks= 1 week to develop each Addon, with one additional week at the start and finish of the project
- Contract Developer- \$85/hour, 8 hours per week, 13 weeks= \$8,840
- Resource Sharing Head- 20% encumbrance (8 hours/week), 13 weeks= \$3,500
- Additional RS staff- 20% encumbrance (8 hours/week), 13 weeks= \$2,500
- TOTAL BUDGETED NEED: \$14,840

HOW TO MEASURE THE BENEFITS OF THE PROJECT

As the ILLiad resource sharing management system allows for robust reporting options, a series of "success metrics" which have already been developed by HCL Collection Logistics will be queried and studied in order to quantify the impact of Addon development on overall resource sharing operations. Currently we are able to measure request processing throughput on the ILLiad system through a series of custom Microsoft Access queries. These queries permit us to measure the amount of time it takes to process an ILLiad request from the time that a staff member opens the request to the time that they update it as sent to a potential supplier, referred it to another resource sharing workflow, or cancelled it. We are also able to measure the amount of times that a given request was "touched" by a staff member, an indicator of the overall request difficulty.

Currently the Harvard Library systemwide average staff processing time for an Interlibrary Loan borrowing request in the ILLiad system (as defined above) is 1.86 minutes per request. As searching outside of the ILLiad system requires the staff member to open a web browser and cut and paste search terms/ results back and forth between the browser and the ILLiad client, it is clear that eliminating even a small amount of additional mouse clicks or keystrokes would result in significant reduction in processing turnaround time. We have also determined that the average ILL Borrowing request is opened 2.45 times before fulfillment. Making additional enhanced discoverability resources automated and available within the ILLiad client would help obviate the need to seek expert assistance for more difficult requests, thus leading to more ILL requests being fulfilled on the first "touch".

HOW TO DETERMINE WHETHER THE PROJECT HAS SUCCEEDED OR FAILED

Using the above-mentioned success metrics as our reporting base, we will also evaluate the efficacy of the ILLiad Addon Scripting Project by measuring the rate of adoption of the developed Addons by the Harvard Library resource sharing units. Success or failure of this project will ultimately be determined by the degree to which search and processing automation saves time and labor by resource sharing staff, translating into enhanced fulfillment options for the Harvard Library patron.