INTRODUCTION:
Librarians commonly engage in survey research, both within the library for practical, day-to-day problem solving and data collection, and/or professionally for theoretical research used for tenure and promotion purposes. Although there are myriad methodologies from which to choose, survey research tends to be a popular choice of academic librarians. This type of research has historically been time consuming and cumbersome—lots of paper and envelopes…lots of stamp licking. Mind-numbing, wrist-wrenching data entry. Then comes the data analysis!

The Internet is a medium that can be used to streamline the process of conducting survey research and offers advantages over traditional survey mediums like the face-to-face interview, telephone interview, and paper-based survey. Among the advantages are the potential for quick response rates via Web forms or e-mail, as well as monetary savings related to postage, stationary, or long-distance charges. In this article, we will provide practical tips for using the Internet for survey research, as well as advice and lessons learned from our experience using the Internet to conduct a large survey project on little or no budget.

BACKGROUND:
For many of us in academic libraries, conducting research is just one of many activities in which we are expected to engage. We often do not have the luxury of time to apply for and write research grants, or we simply choose not to in order to devote our limited time to other projects. With restrictive budgets and time constraints, many librarians need a cost effective and manageable way to conduct survey research without compromising the integrity of their study. Such was our situation. After numerous conversations about what we wanted to accomplish, as well as research into the resources offered at our respective campuses, we determined that we could conduct a major survey research project with no extra funding, using only the resources provided to us on our respective campuses.

Surveys can be conducted by email, the web, or a combination of both. Our survey was mounted on a web page (Boff, n.d.) and our letter soliciting responses was sent by email. You might think, “How time consuming!” That was one of our biggest concerns until a “techie” friend of ours (let’s be honest…Kris’ husband) told us about “mail-merge,” a method of merging a Microsoft Word Document (our letter), a Microsoft Excel spreadsheet (our list of potential survey respondents), and the Outlook email used at Kris’ institution. (Kris phoned the User Services Department on her campus prior to attempting this to determine whether this would cause any load problems for the local email server. It didn’t.) Setting up and testing the mail-merge took about two hours. The mail-merged survey was started on a Tuesday evening around 7:00 pm and took approximately 18 minutes to send more than 700 e-mails. As we expected, notices of 113 undeliverable emails were re-
ceived due to expired email accounts or addresses that were entered incorrectly into the Excel spreadsheet at the NRC. Needless to say, the most time consuming portion of this survey was not sending the email cover letter, but tracking down email addresses for the 113 undeliverable emails. Overall, however, we were very pleased with the mail-merge and satisfied when we received a return rate of more than 50%.

**OUR ADVICE:**

**The Internet is a Valid Survey Medium**

Based on our literature review, conversations with statistical experts, and our own experience conducting a large survey, we have learned that when done properly, the Internet can be a valid, reliable, and efficient tool that librarians should take advantage of in conducting their survey research.

Prior to embarking on our project, we consulted with statistical experts on our respective campuses to determine if our particular survey would work as a web-based survey. We also did our homework, in the form of a literature review, to determine what other researchers were learning about this type of survey research. A July 2001 C&RL article (Perkins) shed some light on the subject, as did articles from other disciplines, namely psychology and education. We were particularly interested in articles comparing the reliability of paper-based surveys with that of online surveys (Hancock, 2000; Mertler, 2002; Schonlau, 2002; Stanton, 1998). These articles confirmed our hunch that the web would be an appropriate medium for our survey, and gave us the confidence to proceed with our project.

Your first concern, however, should not be the medium, but the soundness of your methodology.

**Know Your Stuff**

Concerns regarding the validity surveys, regardless of format, are always justified. The quality of research in librarianship has been criticized (McClure, 1991). While the purpose of this article is not to rehash how to properly design a survey, or how to find a statistically significant survey population, the best advice we can give you is to “know your stuff.” In this case, “your stuff” is your research methodology. Survey research conducted by librarians, especially research that you hope to get published in a scholarly publication, should conform to proper survey methodologies as outlined in standard librarianship texts (Busha, 1980; McClure, 1991; Powell, 1997). Journal editors are looking for more quantitative and qualitative research from librarians. As Hernon and Schwartz (2002) explain, “Understanding what research is and valuing its contribution to the theory and practice of LIS should not be the exception but, rather, the expectation of all of us in this profession” (p. 207).

**Talk to People**

Before you begin, talk to anyone conducting survey research on your campus. Send an announcement via your campus email system to solicit support from other faculty/researchers who may have worked out some of the technical aspects of online survey research. Another likely group to solicit advice and help from are the people in the information technology division on your campus. They will know if your campus has the correct type of software and servers to, for example, handle the transfer of data from a web form to some sort of spreadsheet software such as Access or Excel. In our situation, we did not have the proper software such as Coldfusion or VBScript that enabled the data from the web form to be directly dumped into a spreadsheet. Colleen’s campus did, however, have an office that employed a human (of all things!) to enter the data for us (free of charge!) Again, we would not have known about this resource had we not hit the pavement and started talking with other researchers. Finally, consult with your campus’ office for institutional research in order to gather ideas. Their job is to keep current regarding research trends and innovations.

**Explore Campus Resources**

If you are working on a limited budget, find out what resources you have available on your campus to help you. Ideas to investigate include: web design, CGI scripting assistance, data entry, and statistical analysis and reporting. The Information Technology department at Colleen’s institution had developed very basic CGI scripts to process online web forms. She worked with them to insert minimal, but specific, scripts into our HTML coding that would require that certain fields be filled out by the respondent. If the respondent neglected to fill out their Institution Name, Respondent Name, and Respondent Email Address, the form would have automatically bounced back to them for clarification. Colleen also had access to a data entry service and a statistical analysis center where she could get assistance with data entry and data analysis.

**Our Survey: Example of the Process**

Using our survey as an example, the steps below outline the basic process for implementing a web-based survey.
Survey Research on Little or No Budget, continued

• Ask around to determine what is technologically possible on your campus.
• Based on the questions you decide to ask, start building your web page. Contact your IT department to see if it is possible to have submittable web forms on your campus server. Just about any HTML manual has explanations for creating forms. One of our favorites is Sams Teach Yourself Web Publishing with HTML and XHTML in 21 Days by Laura Lemay, Denise Tyler, and Rafe Colburn. When building your form, keep the following in mind:
  • Think carefully about the names you assign to the various fields. They should be short, but should also make sense so that you do not have to constantly refer back to the survey when working with the responses.
  • You should give some thought to the survey design when coding your form, because there are a few options. You can create radio buttons for the responses, which ensure that the respondents choose only one response per question, or you can create check boxes that enable your respondent to select several responses.
  • Think about which fields you want to require respondents to fill out. We had a student employee who works on our web pages create the java scripts that required certain fields to be filled out, or the form would bounce back to the respondent.
  • (Note: Want help creating an online survey? There are many web-based companies geared specifically towards helping you create and host your online survey. A detailed list can be found by searching the Google category: Computers > Software > Marketing > Surveys. An additional listing of some free services can be found at http://www.librarysupportstaff.com/4surveys.html#free.)
• If you are having the data from the online form sent directly to an email account, rather than having it sent to a program to be dumped directly into a spreadsheet, you may want to consider having an email account dedicated to your survey project, or setting up a filter in an existing email account so that all incoming surveys go directly to a specific project-related folder.
• Develop a cover letter to send out to your respondents. Make sure it includes who you are, why you are conducting the survey, directions for filling out the survey, and a link to the web form. Be sure to specify a reasonable deadline for the responses.
• Set up a mail-merge.
• Give yourself some time to follow up on tracking down new email addresses for messages that might bounce back.
• Send out a follow-up cover letter via a second emailing.

Now comes the hard work of analyzing the data and writing the article. By utilizing the Internet for survey research, much of your time and energy can be saved for the intellectual challenge of analyzing your data, rather than expending it on the logistical hassles that accompany administering a survey the traditional way. In addition, more timely analyses will be afforded by employing this media.

Bibliography