

**Needs Assessment Study of
Texas Academic, Public, and School Libraries:
Final Report**

Submitted by

**The Texas Center for Digital Knowledge
University of North Texas**

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EXECUTIVE SUMMARY

Introduction

This document contains the final report with the summary of the findings, conclusions, and recommendations for consideration by the TIFB Library Working Group as part of the Needs Assessment Study of Texas Academic, Public and School Libraries as defined by the April 1, 2002, Project Plan. The report is the work of the Needs Assessment Study Team, Texas Center for Digital Knowledge at the University of North Texas. The study was conducted during the period of February through September 15, 2002. Funding for the study was provided by Telecommunications Infrastructure Fund Board (TIFB).

Study Objectives

The purpose of the Needs Assessment study was to investigate the extent to which TIFB funds have had an impact on Texas academic, public, and school library media center libraries. The Needs Assessment Study Team used a set of framing questions, a document review, and a series of focus groups with participants from a representative cross section of all types of libraries. At the mid point of the study, an Open Forum was held at the Texas Library Association Conference in March 2002, to obtain further input. In addition, the Study Team developed and distributed a series of surveys designed to discover the impact of TIFB grants on each type of library. The full report contains a discussion of the various data gathering activities, including the focus group sessions, and results from the questionnaires distributed to academic, public, and school library media centers.

Summary Results of Data Gathering Activities

Use of TexShare Databases

- TexShare databases have become a critical part of library service for all types of libraries.
- The academic libraries are the heaviest users.
- Public libraries and schools are more likely to report having never used the databases.
- Size appears to influence the use of the databases with smaller libraries being less likely to use the databases than larger libraries.
- The data for the public libraries show that 100% of the larger libraries use the TexShare databases heavily or daily, while 51% of the medium sized public libraries and only 12% of the small public libraries report using the databases heavily or daily.

Use of Non-TexShare Databases

- A majority of the academic libraries (52.7%) use non-TexShare databases heavily, 32.3% say they use them daily, 12.9% say they use them weekly and 1.1% say they use them monthly.
- A small number 1.1% say they do not use non-TexShare databases.
- Thirty percent (30%) of the public libraries said they use non-TexShare databases at least daily, 43% say they used them a few times per month, 25% of the libraries never use non-TexShare databases.
- Twenty-six percent (26%) of schools use the databases heavily or daily, 33% weekly, 26% monthly.

Purpose for Using Online Resources

- In academic and school library media centers, online resources are being used to actively support curriculum needs.
- Academic libraries most frequently use online resources to create instructional materials and to get Internet images.
- School library media centers use online resources most frequently to do basic research, to enhance class instruction, to get information from the Internet for lessons, and to promote Texas Library Connection (TLC) databases.
- Public libraries use online databases for basic research to answer reference questions, to look up journal, magazine and newspaper materials, to search for information on computer technology, literature, and medical/health information.

Common Application Software used in Libraries

- Word processing is the most commonly mentioned software, followed by electronic mail and anti-virus software and web browsers.
- Academic and public library staff is most likely to use word processing software, e-mail, anti-virus software, web browsers and spreadsheet software.
- School library media centers said they used web browsers more frequently than academic or public libraries.
- All types of libraries provide a platform of personal computers and laser printers for staff.

Remote Access

- Academic libraries are most likely to provide authentication methods for users to provide access to selected resources, with 91% of the academic libraries using authentication, schools, 50%, and public libraries, 34%.
- Proxy server with login/password is the chosen method of access for all three types of libraries. Two thirds of the academic and school respondents said they use this method, as do 45% of the public libraries.

Websites and Technical Support

- Nearly all academic libraries have their own websites; 97% of the academic libraries said they have a website as compared to 61% of the public libraries and 53% for school libraries.
- Academic libraries felt external technical support was more likely to be adequate (91.6%), while 77% felt their own in-house technical support was adequate and 67% said their campus wide technical support was adequate.
- Schools felt that the technical support they received from their District was “very adequate” or “adequate” in 77% of the school libraries.

Access

- Most academic libraries (92.4%) provide at least one workstation for those with physical disabilities. Eighty-two percent (82.4%) of public libraries and 80% of school library media centers said they offer workstations for those with physical disabilities.
- Six percent (6%) of academic libraries said they provide Spanish instructions for online resources. Twelve percent (12%) of the public libraries said they offer Spanish language instructions.
- Few libraries provide any access in other languages, and less than 5% of the academic libraries provide online instructions in languages other than English or Spanish.

Special Collections

- Twenty-five percent (25%) of the academic libraries said that they have digitized a portion of their collection and made them available on the web.
- Only 4.8% of public libraries said they had special collections materials on the web.
- One percent (1%) of school library media centers said they had collections that have been digitized.
- Thirty nine percent (39%) of the academic libraries said they have finding aides while only 8.3% of the public libraries said they do and 3 percent of the school library media centers.

Training Issues

- Learning how to use the TexShare/TLC databases and using other online databases are the most important current training needs for all types of libraries.
- Learning how to use the TexShare/TLC databases and using other online databases are also reported as the most important future training needs for all types of libraries.
- Academic and school library media centers were most likely to attend training offered by in-house trainers or by commercial vendors.
- Public libraries were most likely to attend TIFTech Training or commercial training.
- Almost 50% of the staff in all three types of libraries received at least one day of training.
- A significant number of library respondents reported no training days for staff. School library media centers reported in 40.9% of the cases that they received no training, 36% of public libraries and 23% of academic libraries said they had received no training days.

Distance Learning Issues

- Academic libraries provide more distance learning capability than public libraries.
- Only 26% of the public libraries said they have distance learning via the Internet; 4% said they had videoconference capability and 3% said they had teleconference capability.
- School library media centers, report that 29% have T-Star access, 36% have Internet access, 29% have videoconference capability, and 15% have teleconference capability.

TIFB Impact on Libraries

Increase in Student Use

- All libraries said they are serving more students than a year ago.
- Two-thirds of the academic libraries (65.6%) said they were serving more students and estimated the increase from 8% to 35%.
- Seventy-two percent (72%) of school library media centers reported an increase.
- Seventy-one percent (71%) of public libraries say they are seeing more school students in the library than a year ago.

Other Sources of Local Funding

- Thirty-seven percent (37%) of public libraries said they had developed other sources of local funding as a result of TIFB funding.
- Fifteen percent (15%) of academic libraries said they were able to develop other sources of local funding.
- Nine percent (9%) of the school library media centers said they were able to leverage additional funds

Grants from Other Sources

- Forty-six percent (46%) of public libraries said they had developed other grants.
- Seventeen percent (17%) of academic libraries said they were able to develop other grants as a result of TIFB funds.
- Five percent (5%) of school library media centers said they had been able to obtain other grants from other sources

Partnerships with Community Entities

- Forty-two percent (42%) of public libraries reported partnerships with other community institutions.
- Thirty percent (30%) of academic libraries reported they had developed partnerships with other community institutions.
- Ten percent (10%) of the school library media centers said they had established partnerships

Partnerships with TIFB-Eligible Entities

- Twenty-nine percent (29%) of academic libraries reported partnerships.
- Thirty-three percent (33%) of public libraries reported partnerships.
- Twenty percent (20%) of school libraries reported partnerships.

Sustainability

- Equipment updates and sustaining the technical platform were the most important factors for all libraries to maintain their current level of access, followed by enhanced connectivity and access to more online databases.
- Libraries indicated that the three most important factors in integrating technology into the library are having access to hardware and software, the quality of computer technology available, and staff technology skills.
- Barriers to Internet use in libraries were lack of adequate funding, costs of technology, cost of training, and limited time of staff for using technology.

Future Needs

- All types of libraries report that keeping up with equipment replacement in the next one to three years will be their most important issue.
- Public and school libraries were more concerned about security issues and adequate technical support, while academic libraries were more concerned about access to online databases and being able to hire staff with technical skills

Key Study Findings

Access to Online Databases

- Licensing and implementation of high quality electronic information resource databases has radically enhanced the service capabilities of Texas libraries.
- Wide and almost universal adoption of the Internet and the World Wide Web makes it important that libraries fully integrate these tools as part of their basic service platform.
- Texas libraries have the ability to acquire, store, manage, and provide wide access to a broad array of high quality, credible, carefully selected, and well organized electronic information resources, whether locally produced or sourced from external vendors.

Access to Technological Resources and Services

- Texas libraries need to focus on continually increasing knowledge of and improving access to the resources located within their institutions.
- Basic access levels Texas residents currently enjoy will be likely to degrade fairly rapidly unless libraries focus more attention and resources on issues of sustainability.
- The integration of various electronic information resources (such as local OPAC's, TexShare, TLC, or other online databases, office software, educational software, Internet search engines) into an easy to use interface is a key issue for most libraries and work has just begun on this issue.
- Security issues are important for libraries and a significant number of libraries reported that library staff members appear to be uncertain of their knowledge of this area. Libraries are looking for an agency or organization that can provide leadership, guidance, and training in this area.

Immediate Technology Needs

- Texas libraries will need planning help to continually update and upgrade the basic technology platform as new technology and services become available.
- Increasing bandwidth requirements, acquiring wireless technology, and replacing equipment are also important concerns.

Future Technology Needs

- Libraries are most concerned about maintaining the quality of their technology platforms, being able to hire staff, maintaining security, providing training, securing adequate bandwidth, and adding more online services.

Learning, Education, Training and Staff Development

- Training opportunities are a critical requirement for all types of libraries. It would be difficult to overemphasize this need.
- Training needs were consistently ranked among the top three issues for all types of libraries
- More training is needed to better equip library staff to train and to assist library users.
- The new technology environment of the Internet drives training needs for the staff, public, teachers, faculty, students, and public users.
- The most important training needs are to train library staff and users on the availability and use of the TexShare/ TLC databases and related resources.
- Libraries desire TIFB to play a role in addressing training issues and determining future training topics and training delivery methods.
- Librarians and technologists need to become partners in order to plan and train together.
- It will be important that libraries take full advantage of the installed technology base and TIFB's technology investment to deliver more training to the desktop.
- While many libraries have used and benefited from TIFB-provided training, it is critical to know that a significant percentage of public and school libraries report they have access to no training.

Impact of TIFB Funding

- TIFB has allowed Texas libraries – which were way behind other states in the integration of database resources - to catch up and stay abreast; “if it wasn't for TIFB we'd be 30 years behind.”
- TIFB has brought collaboration that has saved money.
- Collaboration has been an important benefit in closing the gaps between the haves and have-nots; TIFB has been a great equalizer by providing funds for the broad population to have access to technology.

- TIFB funding can be used to create incentives and matching requirements so as to encourage local entities to assume funding responsibility for library technology services.
- TIFB funds have had a pronounced impact on the service delivery and the technology platform for all types of libraries.
- TIFB funds have changed and improved library service for Texans. All libraries said they are serving more students than a year ago.
- More people are being served now.
- There are new and different types of library users: more teenagers; more people doing job searches and resumes; and more unemployed people coming who have lost access to their work computers.
- Collaboration on TIFB grants has been important in bringing together different types of libraries and in helping libraries cooperate with different agencies and community groups.
- A number of libraries said they were able to increase library services at the same time as staff has been reduced and that they had managed this because of technology. Patrons now get better service and it takes less staff time.

Sustainability

- Sustainability and security are key future issues.
- For the future, all types of libraries said that that keeping up with equipment replacement in the next one to three years will be the most important issue, along with security concerns, and training for users and staff.
- Having funds for equipment is the critical sustainability issue for all types of libraries.
- All libraries express concern that having adequate technical support and access to staff with technical skills will be critical.

Awareness

- Creating broader awareness of the new online resources and services is an unfinished job.
- Public awareness of the contributions of TIFB funding to library technology and resources is not common.

Key Conclusions and Recommendations

Four key areas composed the framework for the conclusions and recommendations: building sustainability, broadening adoption and utilization of online resources through training, achieving equity among libraries, and addressing security needs.

- The Needs Study Team concludes that TIFB should seek to extend its mandate beyond the initial ten-year legislative term. Without continuing support from TIFB (or another similar state body) local libraries will not be able to maintain the significant, demonstrable improvements in public access to the Internet and access to a wide array of both state and locally funded electronic library resources that have gone online as a result of TIFB.
- Sustainability will be, by necessity, a partnership of libraries, their funding agencies, external funding agencies, state and federal funding agencies, and the TIF Board.
- It will be critical that TIFB programs focus on ways to deepen and broaden the utilization by all Texans of the technology innovations provided through the TIFB grant funding.
- The innovation cycle remains incomplete until the public becomes much more aware of these resources.
- The importance of providing accessible ongoing training for users and library staff cannot be overemphasized.
- Training for staff and users in all types of libraries will unlock the full benefit of the TIFB funded resources.

- Shifting rapidly toward desktop training delivery, with appropriate support and documentation, will be the next step for TIFB in helping grantees take full advantage of TIFB resources.
- It is important for TIFB to address the equity issue by reckoning with a significant but diminishing number of libraries, principally smaller school libraries and public libraries, that are not yet benefiting from the resources available from TIFB grants
- Libraries need special support and assistance in the near term to better manage the security of resources purchased or licensed with TIFB funds.

Recommendations

The Needs Study Team summarizes the recommendations in eleven broad categories.

Sustainability Recommendations

Changes in library infrastructure, information content, and staffing requirements have been so large and sweeping that the time horizon for full integration will stretch at least another 10 years into the future. As access to the Internet and online resources increasingly becomes a “public good” there must be a means to sustain these resources equitably for use by all Texans.

Security Recommendations

The ability of many TIFB library grantees to adequately manage security issues shows signs of being outstripped by the pace of technological change. The rapid deployment of modern electronic networked information resources and services has brought into sharper focus the need for a broad statewide approach to ensuring the critical library systems and information resources are secure from physical or virtual damage.

Planning Recommendations

The rapid change in the fundamental library service platform brought about by the integration of new computer and networking equipment, new types of connectivity, and new information delivery models, such as TexShare and TLC, coupled with changing and expanding expectations of network savvy library users, brings into focus the need to help libraries update their planning model to reflect these new realities.

Anywhere, Anytime Access Recommendations

The new paradigm for information access is rapidly shifting to an “anytime/anywhere” model, requiring libraries to change their traditional service model from “will get it for you as soon as we can and you are welcome to pick it up at the library” to a new model that endeavors to deliver information the user wants at the time and place that the user chooses.

Incentive Recommendations

There should be more incentives and matching requirements, as well as clear grant guidelines, to encourage local entities to assume funding responsibility for library technology services.

Training Recommendations

The Texas library community is ready for new training approaches that take full advantage of the installed and evolving technology base and TIF’s investment in libraries to date. Study findings point to the need for major changes and improvements in training programs for basic, advanced, and ongoing training focusing on a very broad array of training needs. It is time to rethink programs that provide training and support to TIFB grantees, and indeed to all Texas library/media personnel, to ensure that basic

fundamental needs are adequately addressed in a comprehensive way. No single organization can accomplish this complex task.

Awareness Recommendations

The ultimate success of a statewide effort to extend broad equitable access to modern electronic resources will be limited unless all Texans know about these resources.

Measurement Recommendations

Broad public and legislative support for expensive public infrastructure development programs requires the recipients of such support, in this case, libraries, to convincingly demonstrate the benefit to Texas through robust and meaningful outcomes-based measurement and evaluation.

Collaboration and Leveraging Recommendations

The resource demands dictated by TIFB's mandate to bring broad connectivity and equitable access to high quality information to all Texans will best be met when Texas libraries, working closely together and in cooperation with other stakeholders, discover new ways to build an excellent shared system in the most cost effective and cost efficient way with the least duplication of effort and expenditure.

Equity of Access Recommendations

From its inception, TIFB has been working toward broad equitable statewide access to modern networked services; while great strides have been made, benefiting Texans of all communities, more work remains to complete the "final mile."

Proven Practices

The speed of change in library related technology applications is accelerating. The Needs Study Team believes that Texas libraries will derive tremendous benefit from the systematic identification and application of existing "Proven Practices"

Near Term Funding Priorities for Grant Programs

Based on the recommendations above, the Needs Study Team believes that the following priorities should guide the development of the next cycle of TIFB grants.

- Promoting sustainability in hardware, software, information resources, and connectivity among local institutions, including securing the safety of these resources. The Needs Study Team assumes that the Library Working Group has already determined and acted on the paramount need to safeguard the TexShare/TLC database investment.
- Ensuring that all Texans enjoy basic access to electronic technology and information resources through their schools and libraries by completing connectivity to eligible entities.
- Finding strategies to deepen and broaden the learning opportunities for staff and members of the public that will bring about fuller use of the rich array of electronic resources now available in Texas libraries and that will be added in coming years.
- Achieving greater public awareness and use of TIFB funded online resources, training, and equipment.

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