Library Impact Research Report

Educating and Empowering a Diverse Student Body: Supporting Diversity, Equity, and Inclusion Research through Library Collections

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Abstract

A research team from the Texas Tech University (TTU) Libraries explored methods for assessing collections related to the study and research of diversity, equity, and inclusion (DEI) topics and their discoverability by users. DEI studies have increased in prominence on academic campuses along with calls to question privilege and power structures, making DEI collections assessment critical. The TTU Libraries undertook a two-part project that surveyed user needs, collections usage, cataloging and discoverability, and user behavior in searching for and evaluating DEI resources. While the researchers were not able to identify an effective method for assessing DEI in large-scale collections, key findings indicate the potential for partnering with women's and gender studies and Mexican American and Latino/a studies and the need for increased attention on cataloging and metadata, particularly table of contents and abstract/summary fields. The research team identified that many users expressed uncertainty in searching and evaluating DEI resources and expressed interest in search enhancements for better filtering and more prominent website presence for DEI research help.

Table of Contents

Introduction

As part of the Association of Research Libraries' (ARL) Library Impact Pilot program, the Texas Tech University (TTU) Libraries participated in a pilot project on how the library contributes to equitable student outcomes and an inclusive environment. The research team, formed in 2019, comprised members from the majority of TTU Libraries' departments, including Library Technology Management and Services, Outreach and Information Services, Resources Management and Systems, User Centered Services, and User Experience. The researchers sought ways of identifying and quantifying TTU Libraries' impact on students' academic achievements in ways that can be communicated to university administration and the larger community.

Texas Tech University has been working to ensure the campus is inclusive and diverse in its service to students, faculty, and staff. TTU is proud of its designations and awards including INSIGHT into Diversity's Diversity Champion, 4.5 out of 5 stars on the Campus Pride Index, Heed Awards from Higher Education Excellence in Diversity, a Top 10 Military Friendly School designation from Victory Media & G.I. Jobs, and First-Gen Forward recognition by the Center for First-generation Student Success. In 2019, the Office of Institutional Diversity at TTU started the Leaders Engaged in Advancing Diversity (L.E.A.D.) program, which aimed at fostering cultural awareness and innovating programs for promoting diversity, equity, and inclusion in TTU's colleges, the libraries, and the School of Law.

While the libraries' involvement as a contributing member in L.E.A.D programs has been documented, no research has been initiated into how our resources are supporting and enabling these campus efforts. Inspired by one of TTU's strategic priorities, "Educate and empower a diverse student body," the research team decided to focus on student success and create methods to assess our collections and services to determine the libraries' impact on students researching diversity, equity, and inclusion (DEI) topics.

The project was completed in two phases to allow for an assessment of TTU Libraries' collections in supporting curricular goals related to DEI and an assessment of how students utilize libraries' collections and services to support their DEI research and learning. Phase 1 consisted of assessments of the libraries' collections to determine if they provided the necessary resources to fulfill the curricular needs of courses offered on diversity, equity, and inclusion topics. Initially, Phase 2 was intended to study the impact of library instruction in DEI courses to determine if it produced measurable improvements in student success in meeting curricular goals related to research. Due to COVID-19 restrictions, the research team transitioned to studying the user experience of searching for online library resources related to DEI topics, and evaluating patron ability to search for and evaluate DEI-related library resources.

Why It Matters to Research Libraries

While universities have been addressing equity, diversity, and inclusion issues for many years by opening diversity offices and starting initiatives to grow campus awareness, the focus has increased in recent years. DEI-related courses and workshops are not just offered on campuses, they have become viewed as critical by the university administration. Our society increasingly calls for everyone to question the ways that privilege power structures marginalize individuals and communities, DEI studies have continued to grow in prominence and popularity on academic campuses.

Academic libraries need to be prepared to assess their collections and services that support this DEI-related learning and research. Methods that can illustrate the impact of libraries' collections and services for student success in diversity, equity, and inclusion courses and research would help libraries address university-level strategic goals as well as departmental goals across campus.

Objectives

1. Explore methods for measuring the library collections to support curricular goals in diversity, equity, and inclusion related courses.
2. Better understand our users' behavior when searching and evaluating library resources related to diversity, equity, and inclusion.
3. Identify successes, challenges, and areas for improvement related to the library's DEI-related collections and their usability.

Hypothesis

1. The Texas Tech University Libraries' collection provides the necessary resources for teaching and study of diversity, equity, and inclusion across multiple disciplines.
2. Users are able to effectively find and evaluate research resources in the areas of diversity, equity, and inclusion from the TTU Library website.

Literature Review

While academic libraries have been addressing diversity, equity, and inclusion (DEI) issues through collection development, instruction, and services, the widening scope and importance of DEI within higher education requires increased scrutiny and critical interrogation of DEI in libraries. Published research on DEI in academic settings is becoming more plentiful, however there is still a dearth of research related to libraries' collections assessment and student success outcomes.

Researchers have looked at the importance of multicultural or otherwise DEI-related courses as a requirement within the curriculum. Many universities have these requirements. For example, at Texas Tech University, student learning outcomes state that graduating students "should be able to demonstrate awareness and knowledge of distinctive cultures or subcultures, including but not limited to ethnicity, race, gender, class, political systems, religions, sexual orientation, languages, or human geography."[1] Beyond mere learning aspirations, research on DEI-related courses has

shown substantial benefits for students. Sleeter links completion of ethnic studies curriculum to academic benefits and more inclusive campus environments.[2] Sueyoshi and Sujitparapitaya found students taking ethnic studies courses had increased timely graduate rates, regardless of their racial/ethnic composition.[3]

Research on DEI efforts in academic libraries focuses predominately on outreach and services, often omitting assessment studies of existing collections. Koury et al. documented diversity and inclusiveness programs in research libraries, concluding that academic libraries initiatives fell into three categories: creation/enhancement of collections, recruitment, and collaboration with other campus units.[4] However, none of the research surveyed discussed an assessment of current collections to meet DEI goals. Frederiksen created an annotated bibliography of resources on diversity in libraries with emphasis on collections.[5] Surveyed articles included broad discussions of diversity in collections, publishing, and outreach, but again not assessment research. A common explanation for the lack of assessment research is the complicated nature of DEI materials, which can appear in any part of the library's collection, coming from every type of discipline and subject. Due to these challenges, many research initiations have mixed success in meeting their assessment goals. Ciszek and Young surveyed research on assessing diverse and multicultural collections in a large academic library through quantitative and qualitative methods.[6] The surveyed quantitative methods included WorldCat Collection Analysis, comparison with bibliographies, using diversity codes in acquisitions, circulation and use statistics, and diversity collections statements. Qualitative methods included focus groups, interviews, and surveys. While these discussed methods were able to accomplish some of the aims of collection assessment by identifying collection deficits, the authors assert that novel approaches are needed in order be more proactive in continuous collections assessment.

Collection assessments research more typically concentrates on a specific discipline, which enables a review of a specific call number range or otherwise designated collections in a space, such as a branch library. Multidisciplinary topics can require alternate approaches and experimentation. Beals[7] engaged in assessing the strength of African art collections at three large academic libraries using White's[8] brief test methodology. The findings showed the method worked where the subject area lay in a well-defined Library of Congress classification area. However, it did not measure user satisfaction in the collection or if the collection was appropriate. Graziano approached assessing LGBTQ collections by looking at library ownership of materials cited by master's students.[9] This was a good approach for tackling a multidisciplinary field in assessing the strengths and weaknesses of a collection for cited works. The author did find the percentage of ownership was not conclusive, though, because it was only a glimpse into the total LGBTQ collection. It also did not address user satisfaction, which was alluded to in a discussion of convenience bias. Kristick created a list of diversity literary awards to assess her academic libraries' collection against peer institutions, tracking the groups represented in the titles and how the titles were published (big 5 publishers, independent presses, scholarly and university presses, and self-published materials).[10] This method was effective to identify strengths and weaknesses in DEI literature titles, and could possibly be applied to other subject areas, but did not cover patron interactions with these materials.

Beyond possessing sufficient resources for the study of DEI topics, academic libraries are also concerned with discoverability of materials and support for patrons using library collections. Clarke and Schoonmaker surveyed the most popular metadata schemas used in libraries for the ability to effectively document diversity. They found that the arrangement of key indicators of diversity into grouped metadata elements "may limit a seeker's ability to hone their search by specific descriptors of identity."[11] They were also concerned that the vagueness of terms for indigeneity and disability could hinder access points to those materials. Edge summarizes the literature about LGBTQ cataloging noting that terms, when applied, are often outdated and/or lacking

in specificity[12] exasperating patron frustrations with finding information. Howard and Knowlton looked at Library of Congress classification and subject headings for African American and LGBTQIA studies. With classification, they noted the difficulties patrons had to shelf-browse or fully conceptualize the topic due to the materials' arrangement throughout the library. With subject headings, they expressed concern that "LCSH often employ language and pre-coordinated strings that serve to 'other' historically marginalized people."[13] Herrera conducted a study of gender and racial differences in undergraduate library collections. Her study concentrated on diversity and found the collection served the women and minority groups equally well as members of the control group.[14] She acknowledged the study should be expanded to include other areas such as "disability, sexual orientation, economic status, age, and geographic affiliation."[15]

The research literature shows that many librarians are concerned with the diversity of academic libraries collections and whether those collections are supporting student and faculty research in inclusive and equitable ways. However, they often fall short of their aims, due to the complexity of cataloging and locating DEI materials in collections. Additional research studies are necessary to continue this critical investigation into whether academic libraries are effectively supporting DEI research and inquiry through their collections and services.

Methodology

The research team used multiple approaches gathering both quantitative and qualitative data in two phases. Quantitative and qualitative data came from online survey instruments (Appendix I and II) intended to capture faculty perceptions of the library's collections in support of DEI-related courses. Surveys were chosen as the method because they require less time investment for participants and can allow for broader participation with the ability to respond anonymously, which creates less potential for participant censoring of their responses. Collections-related quantitative

data, intended to capture library collections' strengths, weaknesses, usage, and discoverability, was collected through holdings reports, usage reports, request reports, and analysis of metadata fields. Quantitative and qualitative data came from online user experience interviews (Appendix III), which captured user behavior in searching and evaluating the library's collection for diversity, equity, and inclusion resources in their discipline.

Originally, the research team planned to look directly at library instruction's impact on DEI-related courses and student success in curricular goals. The initial plan would have seen subject specialist librarians providing targeted library instruction in certain DEI-related courses to assist students in searching and evaluating library resources for a research project. Quantitative and qualitative data would have been collected through pre- and post-tests and interviews, instructor assessments of student success in attaining curricular research goals, and an analysis of student use of library resources in final reports. Due to COVID-19 restrictions and the ensuing unpredictability of course modalities and assignments, the researchers pivoted to user experience studies as a more library-controlled method to examine student success in searching and evaluating library DEI resources.

Key Performance Indicators

In Phase 1 the researchers measured the collection based on availability of materials compared to awards lists, usage reports, and faculty requests to assess overall usage.

In Phase 2 the researchers measured key indicators concerning user satisfaction and the perceived difficulty of searching library resources through quantitative survey methods, using structured and closed-ended questions to understand the views of library users.

Resources Required

For Phase 1 of the project, the research team consisted of seven members. The experience of those team members included three reference and instruction librarians (Callender, Heinz, Veeder), two electronic resources librarians (De León and Oliver), one visual resources/instruction librarian (Schumacher), and one assessment/technology librarian (Sappington). During Phase 1 data gathering, the team was assisted by one staff member and two student assistants. Two of the members also had previous cataloging experience which provided excellent perspectives on the online catalog resources. The electronic resources librarians were able to provide perspective on how those resources were represented and made accessible. Having reference librarians serve on the project was critical to identify how patrons use the library and how librarians serve them. For Phase 2 of the project, Sappington, De León, Schumacher, and Callender remained on the team, and the user experience librarian (Vardeman) was added to support the change in research focus. User experience research skills were necessary to investigate patrons' search behavior and satisfaction with using library resources.

The time this research team invested in the research spanned two and a half years, with weekly or bi-weekly meetings depending on the status of the research. Sappington and De León shared responsibility for administrative duties including communications and reporting documents to ARL and the IRB. Schumacher, Sappington, Vardeman, and De León took lead in authoring the final report.

In addition to personnel, the team used Alma (the library's online system), Excel (data analysis), SharePoint (to store and share documents the team was using), Springshare's LibWizard (for conducting a survey), Microsoft Teams (for online team meetings), Calendly (for scheduling research sessions), and Zoom (to interview users and record how they searched the library's systems).

Phase 1

Methods

The research team used a course syllabi scan to look for instructor assigned resources for DEI related topics. Online surveys through LibWizard were used to collect feedback from faculty on the library's collections and availability of resources pertaining to DEI for research and class assignment purposes. The first survey was intended to collect responses on how instructors were using the library for class assignments in courses related to DEI. This survey was not successful because we received a very low response rate from instructors. The second survey changed some of the questions and the target audience but did not yield any better results. After having little success with the surveys, we switched to assessing the collection based on course syllabi and special awards, given by organizations, for DEI materials. We also reviewed the lists of several awards given to literature of a diverse nature. We compared the lists of resources and awards to the library's collection to determine if they were owned by the library in anticipation this would provide a better analysis of what was available to researchers. This provided more information but was still somewhat limited in results. The research team wanted to determine if the library owned or had access to the materials. However, they knew that the library owned more DEI materials than only those on awards lists, including titles that were not easily findable through the discovery service.

Researchers considered using circulation statistics for DEI materials but since those materials do not fall under a particular call number it made it difficult to narrow down for which resources to request data. The same issue existed with interlibrary loan (ILL) materials. In addition to call number issues, there were also privacy issues that would have been involved in using circulation and ILL records. Usage reports, faculty request reports, and catalog record analysis were used to identify collection gaps, strength, and discoverability.

Findings

Phase 1 of the project consisted of four parts, which together sought to gauge the ability of the collection to support current student curricular needs in DEI-identified courses and, more broadly, faculty research and instructional needs on DEI topics. Researchers experienced difficulties with faculty participation in syllabi scans and surveys, so those measures were not able to confirm our hypothesis, but they did point to potential issues with resource discovery and awareness of libraries' resources. Faculty requests and e-book usage highlighted specific disciplines that were actively researching DEI issues and might be potential collaborators for future collection development and outreach. Lastly, an assessment of books receiving awards tagged for DEI or given by groups and organizations dedicated to advocating for historically underrepresented groups provided targeted data. However, this method was not able to expand to a full collection assessment. The researchers were able to use the targeted list to interrogate the completeness of catalog records as potential impediments to discovery, an area that would benefit from future research.

Syllabi Scan

The researchers' first undertaking, occurring in spring 2019, was a syllabi scan of courses tagged as related to diversity, equity, and inclusion. The researchers identified a total of 93 courses across most of the colleges at Texas Tech University: Human Sciences (5), Agricultural Sciences & Natural Resources (1), Architecture (1), Arts & Sciences (52), Education (14), Media & Communication (2), Visual & Performing Arts (4), All-University Programs [University Studies, Women's & Gender Studies] (12). Most courses were identified by the university as meeting the multicultural requirement, and researchers added additional courses through keyword searching of variations on diversity, equity, or inclusion terms within the course descriptions. Of those 93 courses, only 33 of the identified courses met the criteria of having a publicly accessible syllabus no more than two years old including assigned information resources. From those syllabi, the researchers categorized and documented the TTU

Libraries' holdings for 169 total resources (duplicate titles were removed, but multiple editions were treated as separate resources).

The collected syllabi came from Anthropology, Architecture, Community, Family and Addiction Services, Education, Human Development and Family Sciences, History, Human Resource Development, Music Education, Sociology, and Women's & Gender Studies. The format categories included books (67), book chapters (19), articles (53), media (21), and other (9). The category of "other" included equipment, databases, and websites. Table 1 shows the availability of the identified materials in TTU Libraries' collection in either physical or electronic format. Seventy percent of identified information resources (119 of 169) exist in TTU Libraries digital or physical collections, with some available in both formats.

Format	Total	Physical	Electronic	Not in the Collection
Book	67	38	14	23
Book Chapters	19	6	7	7
Articles	53	8	40	6
Media	21	6	8	9
Other	9	1	3	5
Total (Percentage)	169	59 (35%)	72 (43%)	50 (30%)

Table 1: Availability of the DEI course syllabi identified resources at TTU Libraries

Discoverability of libraries' materials is a key data point. Researchers did a basic keyword search for the title in our discovery service "OneSearch," running off Primo by Ex Libris. Table 2 shows that only 32 percent of the identified TTU Libraries collection resources came up on the first page of search results at the time of testing (39 out of 119). This indicates that almost 68 percent of the resources might be missed

by students if they do not load more results beyond the initial ten OneSearch retrieves or use filters or advanced search features.

Format	OneSearch First Page
Book	20
Book Chapters	4
Articles	6
Media	9
Total	**39**

Table 2: DEI course syllabi identified resources retrieved on first page of search results

The low percentage of usable courses and small pool of identified information resources impacted the effectiveness of the syllabi study for assessing our hypothesis that TTU Libraries has adequate resources to support current students' curricular needs for DEI-related courses. However, the issue with discoverability prompted additional questions that researchers used when adjusting our research questions in later aspects of Phase 1 and into Phase 2.

Surveys

Due to the inability to get a significant pool of information resources used in DEI-related courses through syllabi scans, in fall 2019, the researchers moved to survey methods to gauge faculty perceptions of library resources for diversity, equity, and inclusion. This would support teaching and research in their disciplines including topics, specific information sources, and ideas for new library resources or services. An additional goal of the survey methods was to find faculty that would be interested in further contact with the researchers, with the potential for interviews or focus groups to expand on the goals of the survey.

The researchers launched the "Faculty Survey for DEI" (Appendix I) in September 2019 to a selected pool of 45 instructors identified from the syllabi scan as currently teaching a DEI course. Despite repeat solicitations, only nine faculty members filled out the survey, and zero faculty agreed to be contacted directly by researchers. While we were not able to generalize results due to the low response rate, it is interesting to note most survey takers skipped questions regarding how the library could improve on DEI. Only two respondents answered the question, "What additional resources or services do you recommend the library offer to assist in your instruction of DEI?" Both mentioned streaming video as beneficial. Two respondents answered the question, "How can the library better support research and instruction concerning diversity, equity, and inclusion?" One wrote, "I don't think I can make a legit recommendation here," and another wrote "I have no idea." These responses indicate that faculty teaching DEI may not have considered the impact of library resources and services, and the researchers took another direction with the next survey attempt.

The Department/Program Chair Diversity, Equity, and Inclusion survey (Appendix II) was sent to 57 faculty members who hold administrative positions as department or program chairs. The goals of this survey were to identify any disciplines where the chair might see deficiencies in aspects of the libraries' collection to support DEI studies and gauge receptiveness for increased libraries' services and collections. The researchers were unable to get usable data, due to a low response rate with only six participants taking the survey. For questions regarding collections assessment, respondents did not indicate disagreement that TTU Libraries provides strong collections for DEI studies in their disciplines. However, multiple respondents selected the neutral or no opinion options. This is similar to the responses from the last survey, and while the sample was too low for generalization, it may point to issues where faculty are unclear or unaware of TTU Libraries' resources for DEI studies in their discipline.

Faculty Requests and E-Book Usage

Next, the researchers turned to acquisitions and usage data to identify faculty interest in DEI related resources and if that tracked with e-book usage data. To gauge faculty requests for resources, researchers used the interlibrary loan (ILL) request form where faculty can indicate if they recommend the purchase of a resource by TTU Libraries, indicating a strong research or instructional need. The researchers looked at the 300 books purchased through this process for FY 2019 (September 2018 to August 2019) to see what titles could be linked to DEI topics and if the data indicated weaknesses in the collection. From scrutinizing the titles and subject headings for the books, 33 resources were identified as linked to DEI subjects, 11% of the total requests.

While this was a small dataset, there is a strong implication that there is faculty interest in expanding our collections to better support research on Women's and Gender Studies (WGS) and Mexican American and Latino/a Studies (MALS). An analysis of title keywords and subject headings for the 33 DEI related ILL faculty purchased requested books revealed some major topic areas. Thirteen books were related broadly to race and equity with terms like "inequality," "social equity," "race discrimination," racism," "race identity," "race, class and power," and "group identity." WGS accounted for eight books with keywords and phrases including "women's rights," "gender," "gender nonconformity," "gender identity," "misogyny," "ecofeminism," "gendered space," "sex differences," "female masculinity," "feminism," and "queer." MALS related to six books with "Chicano empowerment," "immigrants," "borderlands," and "Hispanic American and mass media" being listed in subjects. The researchers decided to see if these results were replicated in usage data by considering e-book usage data for the same period on one platform: EBSCO. An analysis of title keywords and subject headings revealed 88 titles related to WGS and 48 titles related to MALS out of 2,117 total titles.

Findings indicate a strong engagement with WGS and MALS research at TTU and that TTU Libraries could be well positioned to cultivate stronger relationships with and support for affiliated faculty and students. Comparing the faculty purchase requests

and a subset of e-book usage data with course enrollments indicates a larger research interest in WGS and MALS than course-related data might indicate (Table 3). Looking at WGS, TTU established the program in 1981 with an undergraduate minor, adding a graduate certificate program in 2006. As an interdisciplinary program, most of the teaching faculty have appointments in other colleges but are affiliated with women's and gender studies and teach cross-listed courses. This can make it more difficult to gauge collection needs and provide outreach about TTU Libraries' collections and services as faculty are spread across campus. TTU launched a minor in Mexican American and Latino/a studies (MALS) in 2018, consisting of three required courses, and four additional courses available to be chosen by students from a list representing a broad range of disciplines. Unlike the WGS program, MALS courses are not cross-listed, therefore, the researchers chose to disregard the course options that are more broadly focused such as "Race and Ethnicity" and "Diversity and Cultural Competence in the Workplace." While collectively representing around 0.5% of all course enrollments at TTU for FY 2019, selected data points indicate an outsized usage of TTU Libraries holdings and an interest in expanding the collections in WGS and MALS research areas.

Discipline	ILL Purchase Requests	Accessed EBSCO E-Book	Courses Offered	Course Enrollment
TTU Total	300	2,117	3,964	348,753
WGS	8 (2.7%)	88 (4.2 %)	49 (1.2%)	1,052 (0.3%)
MALS	6 (2%)	48 (2.3%)	23 (0.6%)	575 (0.2%)

Table 3: Women's and Gender Studies (WGS) and Mexican American and Latino/a Studies (MALS) data points for TTU library research and course enrollment FY2019

Award Books

The researchers compiled a list of titles that received awards between 2014 and 2019 for DEI content from a total of 38 different professional organizations, non-profit foundations, and cultural institutions. International in scope, these awards recognize titles and authors that highlight underrepresented communities in fiction and nonfiction and for audiences from adult to children. The list comprised 2,034 titles after 222 duplicates were removed. In spring 2020, TTU Libraries held 455 books in print or electronic format, 22.3% of the total titles. Table 4 documents each awarding entity and how many titles TTU Libraries held in spring 2020. TTU Libraries held above 50% of the titles for 14 of the entities and over 25% for 28 of the entities. A closer look at the titles showed that TTU Libraries did not hold many of the titles classified within children's and young adult books categories, accounting for the low holdings for entities like ALA's Rainbow Round Table (Stonewall Book Awards) and Empowering Latino Futures (International Latino Book Awards). Kristick completed a study (published after the researchers' study) that tracked a total of 2,408 titles from 20 awarding entities, which features some overlaps with the researchers' list.[16] Kristick identified that Oregon State University had 21.7% of the identified list and that eight peer institutions held between 23.55% and 39.08% of the list. While the researchers' list of award book titles only shares an overlap of 12 awarding entities with Kristick's, it is reasonable to compare TTU Libraries' holdings percentage, which is at the low end of the range identified in Kristick's study. The percentage of titles not held by TTU is large enough to warrant discussions about collection development practices and what workflows might be implemented to increase our acquisitions of DEI award titles.

Awarding Entity	Total Titles	TTU Libraries Holdings	TTU Libraries Holdings (Percent)	Print	Electronic
(AAS) Assoc. for Asian Studies	79	34	43%	4	31
(AfAA) Assoc. for Afric. Anthro.	12	8	66.7%	0	8
(AHA) Amer. Hist. Assoc.	37	23	62.2%	5	18
(AILA) Amer. Indian Lib. Assoc.	23	2	8.7%	2	0
(ALA RRT) Amer. Lib. Assoc. Rainbow Round Table	24	3	12.5%	2	1
(ALAA) Assoc. Latin Amer. Art	13	6	46.2%	2	5
(AMS) Amer. Music. Society	8	5	62.5%	2	4
(APAA) Asian Pac. Amer. Lib. Assoc.	60	15	25%	11	4
(APSA) Amer. Poli. Sci. Assoc.	5	2	40%	0	2
(ASA) Afric. Studies Assoc.	10	4	40%	1	3
(ASA) Amer. Studies Assoc.	5	2	40%	1	1
(ASA) Australian Soc. Of Authors	4	0	0%	0	0
(AWSS) Assoc. Women in Slavic Studies	21	15	71.4%	9	9
(BCALA) Black Caucus-Amer. Lib. Assoc.	84	40	47.6%	31	9

Awarding Entity	Total Titles	TTU Libraries Holdings	TTU Libraries Holdings (Percent)	Print	Electronic
The Cleveland Foundation	21	14	66.7%	13	1
Empowering Latino Futures	1140	97	8.5%	69	32
Gilder Lehrman Center for Study of Slavery, Resistance, and Abolition	11	7	63.6%	5	2
Hindu Literary Review	32	4	12.5%	4	0
Hurston/Wright Foundation	6	0	0%	0	0
Jewish Book Council	90	29	32.2%	14	15
Kibble Literary	25	5	20%	5	0
Karachi Lit. Festival	21	6	28.6%	2	4
Lambda Literary Foundation	147	33	22.4%	28	5
(LAWCHA) Labor and Working-Class Hist. Assoc.	8	6	75%	3	4
Man Group	6	4	66.7%	4	0
(MESA) Middle East Studies Assoc.	18	4	22.2%	1	4
(MLA) Modern Language Assoc.	23	10	43.5%	4	8
Nat. Academy of Letters, India	5	2	40%	2	0
(NAACP) Nat. Assoc. for the Adv. Of Colored Ppl.	168	54	32.1%	46	9

Awarding Entity	Total Titles	TTU Libraries Holdings	TTU Libraries Holdings (Percent)	Print	Electronic
(NACCS) Nat. Assoc. Chicana and Chicano Studies	6	4	66.7%	2	4
(NAISA) Native Amer. and Indigenous Studies Assoc.	6	4	66.7%	1	3
(NWSA) Nat. Women's Studies Assoc.	31	12	38.8%	3	9
(OAH) Org. of Amer. Hist.	12	10	83.3%	4	9
(OMC) Ontario Ministry of Cult.	20	7	35%	4	3
Publishing Triangle	19	6	56.3%	2	4
South African Literary Awards	44	7	15.9%	1	6
(WHA) West. Hist. Assoc.	8	7	87.5%	2	6
Women's Prize Trust	6	2	33.3%	1	1

Table 4: TTU Libraries collection data of DEI Awards books organized by awarding association/entity

Because the researchers had identified potential issues with the searching of DEI materials during the syllabi scan where 68 percent of records were not retrieved in the first page of results, they hypothesized that catalog records for DEI materials might not be robust enough for discoverability. While the analysis of the catalog records for these award books showed that most records have sufficient subject headings and most print records met cataloging standards, the inclusion of Table of Contents and Abstract/Summary fields was more sporadic and had the potential to limit discoverability and evaluation of materials within the library catalog. Tabulating

subject headings in the records for all print and electronic award titles held by TTU Libraries, Table 5 shows that 81.3% of the catalog records had at least three subject headings. Looking at records for print holdings only, the researchers evaluated a subject heading's depth by looking at the number of subheadings included for each subject heading. Table 6 shows that 78.5% of subject headings included at least one subheading with 36.4% of the subject headings having at least two subheadings. Overall, subject headings seem to be sufficiently applied in number and depth to aid discovery. Looking at table of contents (505 field) and abstract/summary (520 field), Table 7 shows that only 48.1% or records included a table of contents and only 64.4% of records included an abstract or summary, with 36.5% of records having both the table of contents and abstract/summary. Print and electronic records were similar in percentage that contained both fields, with print records more likely to include an abstract or summary and electronic records more likely to include a table of contents. However, looking at cataloging standards as indicated in the MARC Leader 17 encoding field, 250 records (93.6%) were identified as full level with 199 records at "full level," fifty at "full level cataloging input by OCLC participating library," and one record at "full level, material not examined." The remaining seventeen records either had unknown levels of cataloging or were at less-than-full or prepublication levels. When looking at circulation statistics for print titles acquired until 2020, 170 (63.7%) print items had been checked out with 133 (49.8%) having multiple checkouts, indicating that cataloging deficiencies do not seem to be affecting print circulation.

# of Subject Headings	# of Catalog Records
0	7
1	29
2	49
3	56
4	90
5	60
6	62
7	46
8	22
9	10
10	10
11	9
12	1
13	1
14	1
18	1
19	1

Table 5: Catalog records arranged by number of subject headings

Subject Depth	# of Subject Headings	Example
Main Headings	1,345	African Americans
>=1 subheadings	1,056	African Americans—Suffrage
>=2 subheadings	489	African Americans—Suffrage—Alabama
>=3 subheadings	193	African Americans—Suffrage—Alabama—Selma
>=4 subheadings	38	African Americans—Suffrage—Alabama—Selma—History
>=5 subheadings	5	African Americans—Suffrage—Alabama—Selma—History—20th century
6 subheadings	2	African Americans—Suffrage—Alabama—Selma—History—20th century—Juvenile literature

Table 6: Catalog Record depth as shown by number of subheadings

Type	505 Field	520 Field	Both 505 and 520 Fields
Print (267 titles)	114 (42.7%)	208 (77.9%)	100 (37.5%)
Electronic (211 titles)	123 (58.3%)	99 (46.9%)	79 (37.4%)
Total (455 titles)	219 (48.1%)	293 (64.4%)	166 (36.5%)

Table 7: TTU Libraries award title records 505 and 530 field analyses

While the researchers were not able to prove our hypothesis about the lack of robustness in catalog records affecting discoverability of DEI resources, this area could be investigated further in future research. With the increasing practice of catalog records receiving little to no librarian intervention after ingestion from publishers or vendors, DEI resources could be at particular risk of negative impacts as often the DEI content might be a secondary or tertiary facet of the resource. Also, many researchers looking at DEI content are concerned with certain populations or locations that might be noted in tables of contents or abstracts/summaries rather than subject headings.

Taken together, the findings from Phase 1 highlight the difficulties in identifying DEI resources (even for some disciplinary faculty), the potential for partnering with women's and gender studies (WGS) and Mexican American and Latino/a studies, and the need for increased attention on DEI titles and their cataloging. Researchers also used Phase 1 findings to provide background, insights, and support when analyzing Phase 2 data.

Data

Syllabi Scan

Gathering and analyzing the data required significant researcher time for limited data. Researchers were only able to use syllabi for 35 percent of the courses, due to unavailable syllabi or syllabi without assigned information resources. The researchers did gain access to initially inaccessible syllabi by requesting help from institutional information technology for broken links and corrupted file formats. They also requested syllabi from faculty. However, these efforts yielded minimal results. In the past few years, in compliance with Texas House Bill 2504, more public information for courses has been made available so future collection of syllabi may be improved. Automation of syllabi gathering could potentially be implemented. However, as course focuses can shift, individual course identification for DEI topics would need to

occur each semester. If librarians are already doing syllabi scans and analysis for other curriculum-based instruction or collection strategies, automation may be worth the investment.

Surveys

The survey(s) conducted throughout the duration of the study provided insight regarding Texas Tech University Libraries resources and adequacy in support for research and courses taught. There were several iterations of the survey that were primarily conducted at the inception of the study. In the initial survey, the participants comprised faculty or instructors that were identified in the syllabi scan as those who conducted or taught courses related to or within the diversity, equity, and inclusion realm. The survey questions helped identify if and how faculty or instructors included DEI concepts within their students' coursework (see Appendix I). The researchers solicited participation for this survey by (1) contacting the identified faculty/instructors via email and (2) contacting the L.E.A.D. Fellows (Leaders Engaged in Advancing Diversity, a program initiated by the University's Division of Diversity, Equity, & Inclusion) via email to aid in helping spread the word about the survey.

As stated previously in the results, the researchers ran into obstacles of getting little to no participation on the initial survey with the identified faculty and instructors who had been contacted. Out of forty-five participants solicited, only nine participants submitted answers, and zero consented to be contacted for further consultation. Because of the lack of sufficient data obtained, the researchers modified the survey to include department/program chairs. This iteration of the survey looked at the perspective of department/program chairs with regard to resource support provided by the library relating to diversity, equity, and inclusion. The survey conducted not only looked at a different audience but utilized a different measurement, the Likert scale, in collecting data for the statements in Appendix II. The scale was adapted from "Strongly agree, Agree, Neutral, No opinion" to "Most Helpful to Least Helpful." The

team encountered similar obstacles while conducting both surveys. Faculty and instructors, as well as chairs of departments were reluctant to participate in the surveys. The research team solicited input from 57 program/department chairs, with only 6 participants.

The team felt that this data was not adequate to represent the entire Texas Tech faculty/instructors' desires and needs in this subject area. The researchers then decided to change course to review the collection and determine whether what the library had in print and electronically was supportive of DEI in general (see results for faculty requests and award books). No costs were incurred for either of the surveys as incentives were not given to solicit participation. With the current campus-wide emphasis on DEI efforts as well as the increased awareness of systemic racism following nationwide protests against police brutality during 2020, more students and faculty are involved in social justice efforts. It may prove to be a better time than it was before the pandemic to conduct original or follow-up surveys regarding DEI resources. In future endeavors, researchers should allocate funds for incentives within any proposals to continue this type of study to increase participation and for other needs. It would also be beneficial if researchers targeted all faculty and staff on campus who are instructors and/or who develop courses.

Award Books

Data for collection holdings of award books and associated metadata classification for catalog records involved researcher and student assistant time for searching and recording. Gathered data on catalog metadata fields might be able to be automated for specific search queries that can be formulated using other metadata fields but are not feasible for award books or complex topics like DEI, which do not fit within one set of searchable cataloged parameters. Additional cataloging would need to be completed to make automation of this data effective, which might be worthwhile if the research question were more narrowly defined.

Phase 2

Methods

In Phase 2, the team wanted to understand the user experience of searching for online library resources related to DEI topics as well as evaluate how and whether patrons could successfully find suitable resources. The research team developed the following research questions:

- How do students search for diversity, equity, and inclusion resources in the library?
- Which resources do they search for?
- What terms do they use to find DEI resources?
- Do they adjust their search when they do not find what they want?
- Are they satisfied with the amount and quality of results they get in their search?
- How do they identify a DEI resource that fits their needs?

The researchers developed a usability test script that instructed students to use the library website to search for up to three sources they could use to learn more about a topic related to diversity, equity, and inclusion in their field of study. The script included a series of pre- and post-test questions. See Appendix III for the test script and interview questions.

This phase of the project entailed recording participants' computer screens and comments while the users navigated the library website to search for resources. To recruit participants, the researchers sent an announcement via email to students serving on the Library Student Advisory Board, volunteers in the User Experience unit's volunteer pool, and to students enrolled in the for-credit LIBR1100 information literacy course. The announcement directed volunteers to sign up to participate via Calendly for a research session held on Zoom.

A researcher moderated virtual sessions with thirty-two library patrons between April 30 and July 18, 2021. Each participant consented to having the Zoom session recorded. A mix of undergraduate, graduate, faculty, and staff affiliated with TTU participated. Most sessions took between 15 and 30 minutes. Participants received a $20 Amazon e-gift card for their time. The IMLS (Institute of Museum and Library Services) grant funded the gift card incentive. Recruiting enough research participants was difficult in other projects during the pandemic, so the grant-funded incentives certainly contributed to the sizeable participant pool for this project.

To analyze the data, the researchers used an Excel spreadsheet to record observations and participants' responses to interview questions. The researchers reviewed the videos, transcribed important comments, and logged what resources participants searched, what search keywords they used, the number of searches conducted, which filters were used to refine results, and other relevant observations. Researchers used mixed methods to measure some variables qualitatively and others through quantitative analysis to identify findings and determine recommendations.

Findings

The participants in this phase were a mix of undergraduate and graduate students, with a few faculty and staff participants as illustrated in Table 8. Unexpectedly, graduate students responded to our recruiting invitations more actively than undergraduates. More than half the participants were doctoral students. The overrepresentation of advanced researchers in our participant pool is a limitation of our research. They reported more experience with searching library resources, and doctoral students were more likely to search multiple resources—not only the library's discovery tool, OneSearch.

Academic Status	Number of Participants
Sophomore	1
Junior	2
Senior	4
Master's	3
Doctoral	18
Faculty	2
Staff	2
Total	**32**

Table 8: Academic status of phase 2 participants

Participants started from the library homepage, displayed in Figure 1. Twenty-nine out of the thirty-two participants used OneSearch as a method for searching diversity, equity, and inclusion resources in the library during the study, with twenty of these participants only utilizing OneSearch for all searches. This was likely the "default" option because of its prominence on the library homepage. Table 9 shows that Google Scholar was the second-most searched resource, with individual databases and research guides being less popular.
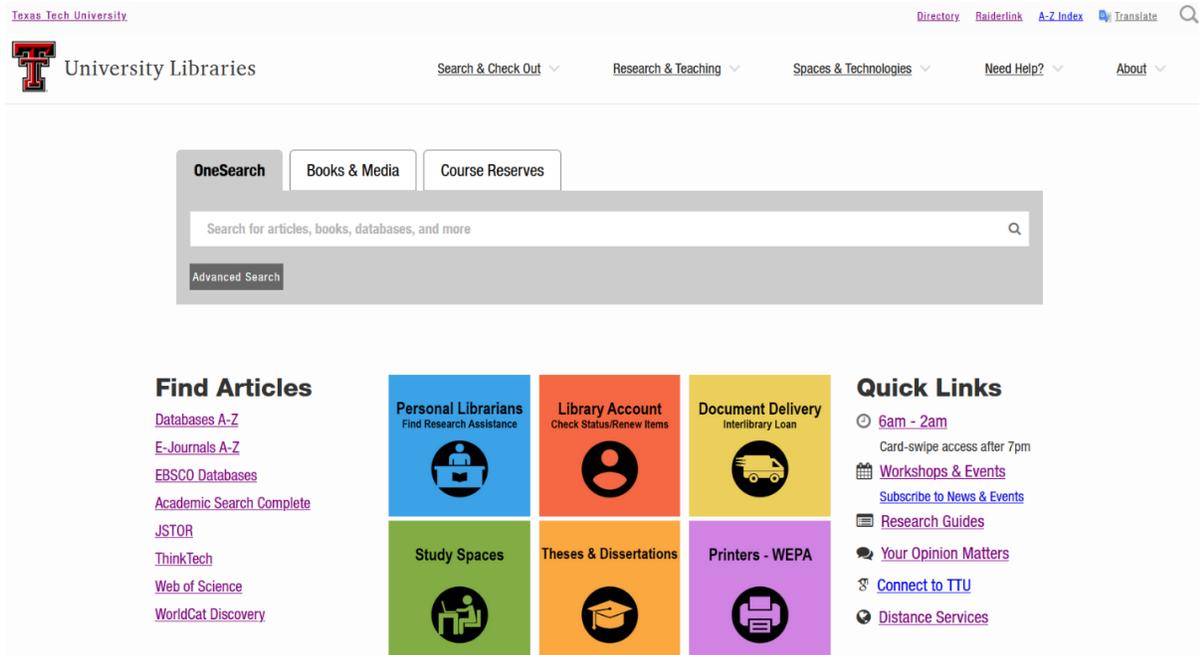
Figure 1: Screenshot of Texas Tech University Libraries website homepage

Library Resource Searched	Number of Participants
OneSearch (discovery tool)	29
Google Scholar	7
Academic Search Complete	3
Other EBSCO database	3
Research guides (LibGuides)	2

Table 9: Number of participants who searched specific resources

Overall, users were satisfied with the amount and quality of results they obtained in their search. Participants liked the resources available, with 26 of 32 participants stating that they were satisfied. However, participants' reflections on the ease or difficulty of the search were mixed, as illustrated in Table 10. Eighteen participants said the process was easier than expected, seven were neutral, six said it was more difficult than expected, and one user did not answer.

Participant Reported Ease or Difficulty Searching for Resources	Number of Participants
Easier than expected	18
Neutral	7
More difficult than expected	6
Did not answer	1

Table 10: Participant reported ease or difficulty of search

Search Strategies

Ten of the participants simply searched for their topic plus the words "diversity," "equity," and/or "inclusion." Those ten participants had a variety of experience levels and classifications, with no clear correlations. Table 11 shows the most frequently used search terms by participants. The term "diversity" occurred most frequently in user searches, followed by "inclusion." Beyond those, it was difficult to identify consistent themes in the search terms people selected, because the topics varied widely. The terms "communication" and "technical" were likely used more frequently because multiple participants were affiliated with the Technical Communication

department. Article words (a, an, the), conjunctions (and, or), and other minor words (of, etc.) were excluded from this analysis.

Search Keyword	Occurrences
Diversity	14
Inclusion	5
Communication	5
Technical	5
Politics	4
Online	4
Writing	4
Teaching	3
Learning	3
Gender	3
Education	3
Feminism	3
Equity	3
Black	3

Search Keyword	Occurrences
Search	3
American	3

Table 11: Frequency of search words chosen by participants

Participants tended to conduct multiple keyword searches to find resources they believed were useful as seen in Table 12, with 21 of 32 participants conducting two or more searches. Participants also used the discovery tool filters as another option to narrow the results. This result indicates that most participants adjusted their search when they did not see what they wanted or expected on the first attempt. A participant said that the results were "not as great" or relevant when searching using broad terms.

Number of unique searches conducted	Participant count
0	2
1	9
2	11
3	8
4	2

Table 12: Number of searches conducted by participants

Participant Recommendations

The researchers asked participants what would make it easier for them to find DEI resources, which the researchers then grouped into eight main categories as outlined in Table 13. The most common suggestions related to discovery search enhancements. Of 11 requests for changes to the discovery tool, 8 participants suggested adding filters to refine results. That may have been a result of researchers specifically asking the participants who used search filters whether the filters were helpful or not. Multiple participants wanted the ability to narrow the results to DEI subjects.

Participant Recommendations	Count
Search enhancement	11
Library website	6
Research guides (LibGuides)	4
Better understanding of DEI	2
Librarian help	2
Catalog enhancement	2
Collection enhancement	2
Promote resources	2
Total	**31**

Table 13: Count of recommendations per category

Another recurring theme was the recommendation to improve aspects of the library

website. Participants suggested posting links or icons that provided a starting point and directed people to curated lists with featured resources. They expressed this would make it clear that supporting DEI efforts was a library and university priority. Participants asked for more librarian support through chat assistance, classroom training, and research guides that explain how library resources function and offer recommended resources. The recommended catalog enhancements were that catalog records always include an abstract and indicate which databases have DEI-related content; this already occurs, and diversity, equity, and inclusion databases are tagged in MARC field 692 for Local Subject Added Entries.

Complementing the participants' recommendations, the researchers observed that if students had a better understanding of DEI, their searches would be more successful. Librarians could promote understanding through providing glossary definitions of key terms or tutorials and instruction on how to obtain research on DEI topics. However, this is an issue for the entire campus to address. Other researcher recommendations included tutorials on library systems and displaying guides and channels to obtain librarian assistance more prominently.

Users voiced common perspectives when asked what helped them identify valuable resources. Item titles as well as the description or abstract were the components that users most often used to determine how relevant a source would be. The format was also cited frequently as indicative of quality—peer-reviewed articles were the most sought-after publication type. A journal or author's reputation was another factor for many users. How recently the source was published was important to some users. A few participants stated that they looked to see whether the item was available online or in print.

Participants' considerations for determining the suitability of resources	# of participants who stated they would use
Description or abstract	17
Title(s)	13
Publication date	11
Keywords [did not specify where they viewed keywords]	7
Format (electronic or print)	5
Material type (peer-reviewed journal, newspaper, book, etc.)	5
Author	5
Publisher or journal	5
Works cited	3
Times cited	2
Material length	1

Participants' considerations for determining the suitability of resources	# of participants who stated they would use
Subject headings	1
Reviews	1
Table of contents	1

Table 14: How participants said they determined whether resources fit their needs.

Data

Researchers collected data from transcriptions, notes, usability tests, and interview recordings conducted via Zoom. Researchers collected data on participant search constructions including the number of resources searched, number of searches, search keywords, and filters used. Related observations included any points where the researcher perceived that participants experienced struggles or misconceptions as well as comments describing participants' search or evaluation process. Notes were compiled in an Excel spreadsheet, and researchers agreed on codes used to group search strategies and identify common themes.

The costs associated with data collection and analysis included 32 $20 gift cards distributed to the participants and researcher time to perform the user experience interviews and additional analysis. Researchers needed to watch the recordings, transcribe, and make notes for each task and question answer, and agree on codes and interpreting participant actions and comments.

We experienced some difficulty recruiting a broad range of participants, and our pool was made up of more than half doctoral students. In the future, we might choose to

either screen participant classification prior to acceptance or use different recruitment strategies to target other demographics and classifications within our larger user base. It would be beneficial to repeat this research into user searching and evaluating DEI-related library resources after enhancements have been made to collections, cataloging, and related research and instructional resources.

Value

The study of DEI collections is imperative in libraries, as we should be at the forefront of guiding users to scholarly information that highlights and discusses these complex topics. For libraries to fulfill this aim, they need to have methods for measuring and evaluating their collections for supporting users' diversity, equity, and inclusion learning and research.

The research team experienced difficulties in meeting our first objective for collections assessment. The methods used had to be readjusted a few times before we were able to achieve any reliable data that could measure the library's collection and online resources. The assessment of collections with other topics has been more straightforward since they were able to relate to a specific Library of Congress call number. With diversity, equity, and inclusion there was more of a challenge since these topics can be subtopics in many different areas and thus classified under many different call numbers. The most success was found in evaluating faculty requests of DEI resources from interlibrary loan and e-book usage. There was a small amount of data collected but there were strong implications of research interest particularly from faculty in women's and gender studies and Latino/a studies. However, these findings did not provide enough value for the time and effort expended.

The cataloging and metadata research data pointed to concerns about discoverability pertaining to DEI resources that can prove challenging to search and evaluate. While the researchers were not able to use the data to prove a link between lack of

robustness of catalog records and discoverability for DEI resources, the questions raised were useful in crafting our research questions for Phase 2 and helping to understand our second and third objectives.

The user experience interviews were able to highlight aspects of user behavior in searching and evaluating DEI library resources, notably participant confusion over DEI concepts. Overall, this project pointed out that while that library does hold many resources pertaining to DEI, researchers may not have the knowledge base to confidently begin their searches. The researchers did identify challenges and areas for improvement including opportunities to promote collections materials, librarians as research specialists, and define the libraries' commitment to DEI.

Lessons Learned

Research into diversity, equity, and inclusion collections and discoverability should continue. Post-pandemic needs have changed throughout campus, particularly with the use of various teaching modalities, as well as more participation in diversity efforts on campus and the university being designated a Hispanic Serving Institution. The Division of Diversity, Equity, and Inclusion therefore changed its vision and restructured its offices to better serve TTU's community. With such changes, it was expected that the researchers would have garnered better participation from the campus, especially with the identified participants recruited for the surveys, as they specifically taught courses or topics related to DEI. The challenges the research team encountered included low survey participation, struggles with identifying DEI resources and materials available within the catalog, allocation of funding, and the IRB process, among other areas. As addressed earlier in the report, the research team had low participation with both surveys conducted. This was despite the attempts made at contacting individuals to complete the survey. The team was not able to conduct an audit as this was not addressed primarily in the initial proposal, and for a large institution such as Texas Tech, it was deemed costly. The team then turned to

other avenues to look at the resources that were already available. A smaller audit was attempted—only looking at specific sections of the library's collection that were considered areas that would output good sources of data. However, it was found that many of the records lacked substantial information that hindered searching, utilizing only terms such as "diversity," "equity," and "inclusion." The team discussed how MARC records are utilized within cataloging—how many of the records are downloaded as-is, with no intentionality of obtaining those with enriched data. Because the library adheres to Library of Congress's policies and procedures, complete records' (those with abstracts or descriptions) subject term listings are not easy to officially change. The libraries' current work processes do not currently practice the manual enhancement of records within the cataloging department itself. Items that would be deemed DEI-related would not be found because there is no indication of relatable terminology within the records. A complete record for TTU Libraries' standards includes title, author, and publication date and would only include summaries, abstracts, or extra subjects listed if they were already included in the downloadable record.

Learning the ins and outs of navigating the IRB (Institutional Review Board) process, including the campus's policy and procedures, the online system, and training that each of our team was required to take was another lesson learned. The team was required to take, CITI Training that involved several sections before being able to apply for an IRB. With that came the institution's process for applying for and receiving grant money specifically within the time frame of the request. With the lack of data in previous attempts, it had been concluded that the team involve the user experience librarian to conduct an additional study with regard to students' approaches of searching for DEI materials within the libraries' catalog. For this part of the study, the team considered the use of incentives to increase student participation. The process involved getting a special exemption from Texas Tech Research Services because the funds were not allocated and included in the proposal at the start of

research and IRB submission. The process of obtaining the approval took longer than expected.

Because of the nature of the research and the drawbacks of low participation, the team learned to utilize the many outlets that were afforded to a few of us who were connected to other areas on campus. As stated earlier, the team reached out to the campus' L.E.A.D. Fellows (Leaders Engaged in Advancing Diversity). The team also utilized other members' and colleagues' affiliations with the Faculty Senate and Dean's Council.

When it was difficult to proceed with the research plan, the research team changed what they thought was needed and approached the problem(s) with different mindsets and tactics. The team had to think outside of the box for different areas of the study. As discussed beforehand, the team varied their approaches to raise participation. Conducting audits also led to researching ways to informally conduct the audits of the collection or parts of the collection. When the approach was not successful, the team better understood the need for more completeness or need for a call for enhancement of MARC records. The team also became aware that there was a need to be inclusive, not just within DEI, but inclusive of all majors, disciplines, and programs on campus, and somehow still be focused on the task at hand.

The original intent of Phase 2 was to measure the success of library instruction on courses taught in the areas of diversity, equity, and inclusion. However, due to COVID-19 pandemic, the team then had to change course. In March 2020, the university had to shut down due to the pandemic, and courses typically taught in person have moved to virtual or hybrid modalities. This limited what the team would have access to and impacted teaching faculty's willingness to partner with librarians in piloting new course-based research and instruction, and as such the team ventured towards non-course-based alternatives for the study.

The researchers would consider adjusting the design of the pre- and post-usability test interview questions. For example, when participants were asked to rate their experience level using the library website to find resources, the question could explicitly ask about the frequency with which the participant used the website. A separate question could ask how they would rate their skill level.

Recommendations

Researchers identified two common threads in the findings for both phases of the research study that present potential for future research. The first relates to the complexity of DEI research and how it can stymie researchers because it manifests differently according to the field of study. The second is how current cataloging practices impact effective access and discoverability of DEI library resources.

For the first thread, because DEI affects so many aspects of life, resources in many different areas may contain useful research information. Additionally, diversity, equity, and inclusion as terms are often not defined consistently, which can cause uncertainty and make the concepts too broad for people to parse down to specific topics, search terms, and resources. Recommendations from the findings of this research study identified potential ways to address patron difficulty narrowing down a topic or search. One strategy that could be studied is partnering with departmental faculty to identify research topics and questions in their field. Setting up this partnership as a true information-sharing collaboration could translate faculty and student research interests into library collection development criteria, curated resource guides, and instructional strategies for searching and identifying relevant library resources. Librarian expertise in knowledge management and research could help faculty identify new gaps in DEI research, improve student engagement with DEI topics, and implement more targeted information and visual literacy instruction for successful attainment of student learning outcomes.

Another strategy would be to implement recommendations that address the libraries' web presence and outreach and re-run the user experience testing from Phase 2. This would allow the data collection to indicate whether these recommendations supported patron ability to locate and evaluate libraries resources for DEI research. Implementations could include placing a prominent link to DEI on the libraries' website that would collect resources, guides, and tutorials curated for every college. This area could emphasize the importance of DEI to the libraries, the university, and to each department and provide a place where patrons could easily get connected with librarians that can help them work through their research needs. Communications and marketing could promote these resources through attention-provoking visuals and social media posts. These resources could also be highlighted in the discovery search interface (OneSearch), by cataloging them and linking them to specific key terms. They could then display near the top of the results list for searches utilizing tagged DEI terminology.

The second thread, cataloging and discoverability, would be more difficult to address as many of the practices are outside of individual libraries' control. While enhancing library catalog records is feasible for smaller collections, the time commitment to tackle larger scale cataloging projects would be difficult for most libraries to implement. Research into what types of cataloging tweaks would be most effective could help identify ways librarians can advocate for more large-scale changes in cataloging practice that might involve collaborations between multiple libraries or even vendors. Would universally having the abstract in article records or table of contents in book/e-book records have a major impact on discoverability? Would the cataloging of additional information, such as studied population or author identity, vastly improve discoverability and user experience? If so, would there be a way to implement these into the processes at the publisher, journal, or vendor level? Researching these cataloging and discoverability needs has the potential to assist librarians as they try to help their patrons research DEI topics.

Appendix I. Faculty Survey for DEI

In any of your courses, do you require your students to use library resources for diversity, equity, and inclusion?

- Yes
- No

In your diversity, equity, and inclusion courses, what types of student research assignments are required? (check all that apply)

- Research paper
- Literature review
- Annotated bibliography
- Discussion posts/papers
- Presentation
- Poster
- Multimedia project
- Group project
- None
- Other (please specify)

Where do you recommend students begin researching their DEI topic? (check all that apply)

- Wikipedia
- Google Scholar
- Instructor supplied materials
- Specific databases or journals
- OneSearch (library search box)
- Ask a librarian
- Other (please specify)

What top resources and services do you recommend students use for research on diversity, equity, and inclusion?

What additional resources or services do you recommend the library offer to assist in your instruction of DEI?

In your opinion, how would you describe the library's resources in the support of diversity, equity, and inclusion studies on campus?

- No support
- Some support
- Enough support
- Strong support
- Other

When researching diversity, equity, and inclusion, what do you consider the top three research sources for your discipline? Please provide titles of journals, books, websites, specific databases, etc.

How can the library better support research and instruction concerning diversity, equity, and inclusion?

Do you teach from?

- On Campus
- Online
- Both

Which best describes your role at Texas Tech University?

What department/program are you affiliated with?

To help the library better meet the needs of your students, would you be willing to share the course syllabus used in your diversity, equity, and inclusion course(s)? If so, please send an email to…

May we contact you for follow-up? If so, please provide an email address.

Appendix II. Department/Program Chair Diversity, Equity, and Inclusion Survey

What department/program are you affiliated with?

Please describe topics that you see as most relevant to diversity, equity, and inclusion (DEI) studies in your department.

Please list any current or future courses in your department's curriculum that you would designate as DEI focused.

Are there any resources that your department/program has identified as key resources for DEI studies in your discipline? Please list prominent resources (books, journals, primary sources, streaming media, etc.) below:

TTU Libraries provide resources that support: [Strongly Agree, Agree, Neutral, Disagree, Strongly Disagree, No opinion]

- DEI studies in my discipline
- Student assignments in DEI courses
- Faculty research in DEI studies

TTU Libraries has a strong collection of: [Strongly Agree, Agree, Neutral, Disagree, Strongly Disagree, No opinion]

- Books and e-books in DEI studies
- Journals in DEI studies
- Primary sources in DEI studies
- Media (video, audio, images, multimedia, etc.) in DEI studies

Please sort the options below based on how helpful they would be for faculty and students in your department/program. (1=Most Helpful, 5=Least Helpful)

- Collection of DEI e-books for all disciplines
- Library workshops on resources for DEI studies
- Specific DEI library resources on discipline subject guides
- Subject guide of DEI library resources for all disciplines
- Personal librarian consultations for faculty teaching DEI courses

What additional resources, collections, or services do you recommend TTU Libraries provide to support DEI studies?

May we contact you for follow-up? If so, please provide an email address.

Appendix III. Observation Tasks and Interview Questions

Pre-test questions

1. What is your academic classification?
   - o Freshman
   - o Sophomore
   - o Junior
   - o Senior
   - o Master's
   - o Doctoral

2. What is your major or department?

3. Which of these statements best describes your experience level in searching the library website?
   - o I use the library website to find resources all the time.
   - o I use the library website to find resources a few times per semester.
   - o I use the library website to find resources a few times per year.
   - o I do not use the library website to find resources.

4. Have you previously conducted research on a topic related to diversity, equity, and inclusion?

5. Could you tell me what you expect to find when you search for diversity, equity, and inclusion resources? [May prompt to explain if needed.]

Task to observe

Think of a topic related to diversity, equity, and inclusion in your major or field of study. Using the library website, please search for up to three sources that you could use to learn more about that topic.

Post-test questions

1. Think back to what you expected to find before you searched. Are you satisfied or dissatisfied with your results?

2. Was the search easier or more difficult than you expected? [May prompt to explain what was easy/what was difficult.]

3. [If they used the filters on the left sidebar] Were the filters to tweak your results helpful or not helpful?

4. What did you look for to help you decide whether a result was a good resource for you?

5. What would make it easier for you to find DEI resources?

6. Is there anything else about your experience today that you'd like to tell us?

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Endnotes

[1] Texas Tech University, *Multicultural Requirement Learning Outcomes.*

[2] Sleeter, *The Academic and Social Value of Ethnic Studies.*

[3] Sueyoshi and Sujitparapitaya, "Why Ethnic Studies," 86–102.

[4] Kelly, "Applying the Tiers of Assessment," 585–591.

[5] Frederiksen, "Diversity in Libraries," 224–228.

[6] Ciszek and Young, "Diversity Collection Assessment in Large Academic Libraries," 154–161.

[7] Beals and Gilmour, "Assessing Collections Using Brief Tests and WorldCat Collection Analysis," 104–107.

[8] White, *Brief Tests of Collection Strength.*

[9] Graziano, "LGBTQ Collection Assessment," 114–127.

[10] Kristick, "Diversity Literary Awards," 151–161.

[11] Clarke and Schoonmaker, "Metadata for Diversity," 187.

[12] Edge, "A Subject 'Queer'-y," 81–90.

[13] Howard and Knowlton, "Browsing through Bias," 86.

[14] G. Herrera, "Undergraduate Library Collection Use and Diversity," 763–774.

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