## **Evidence Based Library and Information Practice**

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# Gauging Academic Unit Perceptions of Library Services During a Transition in University Budget Models

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#### Résumé de l'article

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Results – This survey collected 112 responses from health science administrators, faculty, and staff. Many faculty and staff members had used University Libraries services for more than 16 years. By contrast, most administrators started using the library within the past six years. Cost-share agreements intrigued participants as mechanisms for maintaining existing subscriptions or paying for new databases and e-journals. Most participants supported improving immediate access to full-text articles instead of relying on interlibrary loans. Participants desired to build upon existing knowledge of Open Access publishing. Results revealed inefficiencies in how the library communicates changes in collections (e.g., journals, books) and services.

Conclusion – A report of the study findings sent to library administration fulfilled the research aim to inform budget decision making. With the possibility of reduced funds under the new internal budgeting model to both academic programs and the library, the study supports consideration of internal cost-sharing agreements. Findings exposed the lack of awareness of the library's efforts at decision making transparency, which requires exploration of alternative communication methods. Research findings also revealed awareness of Open Educational Resources and Open Access publishing as areas that deserve heightened promotional efforts from librarians. Finally, this local survey and methodology provides a template for potential use at other institutions.

 ${\hbox{@}}$  Margaret A. Hoogland, Gerald R. Natal, Robert Wilmott, Clare F. Keating, Daisy Caruso, 2024



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## **Evidence Based Library and Information Practice**

## Research Article

## Gauging Academic Unit Perceptions of Library Services During a Transition in University Budget Models

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#### **Abstract**

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#### Introduction

In 2020, the University of Toledo (UToledo)—a large public research university in the midwestern United States—undertook a study to investigate different business models that would recognize cost savings, revenue-generation, and strategic opportunities to overcome enrollment and financial challenges. When the university administration first considered decentralized budget models, the University Libraries lent support by searching the literature and creating a LibGuide to inform the decision-making process. The published literature revealed the probability of closer scrutiny by departments under a decentralized budget model, which inspired health and medical librarians to consider a survey to increase self-awareness and address University Libraries inefficiencies (DeLancey & deVries, 2023, p. 14).

UToledo hired a consulting group to review finances and budgetary processes, and in November of 2021 distributed a 50-page report to university deans. The report focused on perceived inefficiencies within the institution, with recommendations for academic budget solutions. Based upon these recommendations UToledo decided to implement a version of the Incentive-Based Budgeting System (IBBS), which falls under the broader term of Responsibility Center Management (RCM). Under RCM, entities designated as academic units are held responsible for their own budgets and are taxed to contribute to support units. UToledo anticipated that transitioning to a decentralized model could take several years.

The university started transitioning to the IBBS model in fiscal year 2022-2023. This form of budgeting may benefit academic units, but IBBS creates challenges for libraries and other non-revenue-generating agencies. To anticipate the possible weaknesses in and effects on library services of this new budget model, a group of UToledo librarians and staff formed a research team and developed a survey to identify research habits, educational and research needs, and expectations of a specified user group composed of health science administrators, faculty, and staff as a first step. As the library is consistently operating under extremely tight budgets, the information gathered would inform the libraries' own budget decisions towards remedying perceived shortcomings. The following sections provide historical context for the IBBS model, summarize the results of the UToledo survey, and discuss ramifications for UToledo and academic libraries.

#### Literature Review

## Background

The history and terminology of the Responsibility Center Management (RCM) budget model play a critical role in understanding the purpose of this study. RCM is a type of decentralized management centered on accountability and performance, pioneered by private institutions including Harvard, the University of Pennsylvania, and the University of Southern California in the 1970s and 1980s (Hearn, et al., 2006, p. 287; Neal & Smith, 1995, p. 17; Myers, 2019, p. 14). Also referred to as "Revenue Center Management" or "Value Center Management," other institutions adopted this concept to varying degrees (For sample listings see: DeLancey & deVries, 2023, p. 17-19). In the past, declining state support provided the impetus for public academic institutions to experiment with alternatives to centralized budget models (Priest, et al., 2002, p. 2). Academic institutions in the U.S. continue to explore RCM as a solution to poor economic conditions and changing demographics; the most recent figures from a 2015 Inside Higher Ed study as reported by DeLancey and deVries (2023, p. 8,9) have RCM institutions at nearly 25%. Rutherford and Rabovsky (2018, p. 633) observed that RCM is more popular in politically conservative states that rely primarily on state funding and hypothesized the use of accountability-based

systems in these states might be a factor. Although they could not prove the latter, Rutherford and Rabovsky (2018, p. 633) proposed that accountability-based systems could play a progressively larger role in the future.

The basic premise of RCM and its derivatives is that academic units have direct responsibility for generating revenue to cover operational costs (Curry, et al., 2013). Whalen (1991, pp. 10-17) identified nine basic concepts associated with RCM that relate to decision making (proximity, proportionality, knowledge), motivation (functionality, performance recognition, stability), and coordination (community, leverage, direction). Regarding decision making, the idea is that better decisions are made at the locus of operations, size and complexity of organizations affect the degree of decentralization, and timely information is paramount. A proper balance of responsibility and authority, a stable environment, and a system of rewards and sanctions enhance motivation. Good coordination requires that central administration retain the necessary leverage to oversee the collective interests of the institution, under the realization that success of a unit means the success of the whole and that there is a clear sense of direction.

Fethke & Policano (2019, p. 172) compared centralized models commonly used in public universities in the United States to RCM and concluded that RCM has several advantages, among them transparency, responsiveness to environmental changes, cost reductions, and economic efficiency. RCM may lead to innovative course development and expanded roles for faculty in the budget process (Neal & Smith, 1995, p. 20). Critics claim RCM in academic institutions places corporate interests over academic concerns and the resulting competition is detrimental to the cohesion of the institution (Deering & Sá, 2018). While RCM may foster efficiency, the independence afforded to individual responsibility centers could negatively affect collaboration between disciplines and lead to redundancies in programs and resources if not controlled (Linn, 2007, p. 26). Under RCM, revenue-generating endeavors may take precedence and have destabilizing effects on educational policy that lead to questions ranging from cost over quality of student services to de-emphasis or loss of the higher purpose or societal obligations of an institution (Agostino, 1993, p. 25-6; Adams, 1997). Research showing that programs in the sciences and technology benefit more under RCM in the number of diplomas issued than programs in the humanities suggests the potential for STEM programs to be favored over the Humanities (Rutherford & Rabovsky, 2018, pp. 626-7, 632). Furthermore, this situation does not benefit minority students, who are typically not wellrepresented in the STEM programs (Rutherford & Rabovsky, 2018, p. 637). The potential exists for a university to become a "federation of schools", adversely affecting the cohesive mission of the institution (Neal & Smith, 1995, p. 20).

A transition to an RCM model requires the identification of academic "responsibility centers" (typically colleges) and nonacademic "support units" (such as the libraries) within the organization. In some cases, the administration receives separate funding, and other non-academic areas such as athletic departments remain independent from the system (Jaquette, et al., 2018; Deering & Lang, 2017, p. 103). The online listing of institutions that utilize RCM models is evidence that this budget model may work for some institutions, although evidence of failure exists (Carlson, 2015, p. 4; Deering & Lang, 2017, p. 96). Successful implementation is dependent on the ability of central administration to coordinate with the academic units (Deering & Sá, 2018); one strategy used to premeditate a successful implementation is to incorporate RCM to select units beforehand. Using this strategy, Deering and Lang (2017) looked at five case studies and reported that only two institutions made the full transition to RCM—the others chose to return to a centralized budget model or an alternative model.

#### RCM in Libraries

Few publications exist that discuss RCM models in libraries. Riggs (1997, p. 8) predicts libraries will "experience greater decentralization in the budgeting process" and asks questions that address how the library might fit into this model. As previously mentioned, libraries are typically support units; libraries receive funding in the form of taxes—known as subvention—from the programs. Cases exist where an academic unit may be responsible for a library (Linn, 2007, pp. 26). Cuillier & Stoffle (2011, p. 792) discussed library for-credit courses and potential revenue generation by the library as their institution transitioned to RCM. Englebrecht (Englebrecht, 2004, Section 1.1.3. para. 1) noted faculty showed much greater interest concerning costs for the cancellation of journals after RCM implementation. Indeed, RCM makes it likely that academic units would pay more attention to library services and resources (Neal & Smith, 1995, p. 20; DeLancey & deVries, 2023, p. 8). Also discussed is the need to devise a new two-part library budget—a central budget for databases and reference materials, and a separate "faculty" budget for books, journals (non-electronic and stand-alone subscription of e-journals), serials, and the article delivery system (Englebrecht, 2004, Sections 1.2.2. para. 1 and 1.2.4 para. 1). The article outlines a new formula for fund allocation on the various programs that account for such things as the number of students, researchers, research output, support needs, and costs.

In an examination of various budget systems for library resource allocation, Linn (2007, pp. 25-26) notes one benefit of RCM—the lessening of inefficiency afforded by the rollover of funds. Neal and Smith (1995, pp. 18-19) also detail the process for developing a seven-factor cost allocation formula for services provided to academic departments. The formula assesses taxes on undergraduate services, technical services, and costs related to personnel, space, non-space, and general operating costs, as well as a "common good" tax. Rogers (2009, p. 550) writes that while Penn State successfully implemented RCM, the libraries under this system are "viewed as a conspicuous source of overhead and inhibits our integration into the teaching, learning, and research continuum." The need for accurate assessment of library services and resources is stressed to counteract negativity leveled at the library.

Most recently DeLancey and deVries (2023) studied the impact of RCM on academic libraries from a leadership perspective by interviewing five library deans from institutions, who had Carnegie classification(s) similar to those of the researchers, to learn about their experiences with RCM at their respective libraries (pp. 11-13). With the lack of established service agreements between the libraries and academic units, how the universities determined budget allocations from the revenue generating units remained unclear. The deans expressed concerns about the process of budget reductions under the RCM model. In all but one case, academic units purportedly contributed library funding disproportionate to revenue produced by those units. The libraries in question reported none of RCM's stated benefits of transparency and efficiency. Outcomes were not compared to other institutions, and there was a difference of opinion as to whether this would be possible due to the variables unique to institutions such as the number of librarians to students and faculty, unequal operating expenses, inflationary concerns, and differing priorities. The authors ultimately determined they could not directly compare outcomes due to the unique variables represented by the respective institutions. RCM in these libraries did not account for inflation in the pricing of library resources; these experiences demonstrate that the need to justify costs exists under any budget model. By contrast, one library's placement under a division that could retain surplus revenue proved advantageous (p. 15). The deans advise having a thorough understanding of RCM from the standpoint of the library and of the institution's accreditation standards and recommend being cognizant of its effect on other institutional entities (pp. 13-14). Communicating how the library's budget operates and advocating for the library is essential, as is being self-critical and mindful of fluctuations in the profession and the needs of their institutions. The researchers admit to the

small sample size and unknown effects from the COVID pandemic on their budgets as study limitations and recommend benchmarking against institutions using both centralized and decentralized budget models (p. 15).

#### **Aims**

As STEM programs benefit more from RCM (Rutherford & Rabovsky, 2018), this study sought to improve the University Libraries' understanding of the needs and perceptions of the University of Toledo health science community regarding services and resources. The results would aid in setting the libraries' budget priorities and provide ideas for adjusting or improving services. Plus, anticipating the possibility of reduced funding to the library for funding essential resources, the goal is to explore opinions of departmental budget authorities towards cost-sharing. Additionally, study results would provide richer qualitative data for use in future decision making and, if needed, for development of a plan or formula for fund allocation under RCM.

#### Methods

An acquisitions and collection management librarian, two health science liaisons, an electronic resources librarian, and a staff member reviewed the literature (Rutner & Self, 2013) and considered the purpose, questions, and cost of using two different nationally recognized and validated collection services surveys. Lack of consensus in the literature concerning data analysis of LibQual+ (Scoulas & De Groote, 2020) and cost of MISO (Baker, et al., 2018; Allen, et al., 2013) led to development and administration of a local survey.

#### Survey Design

The data collection tool consisted of an 18-question online survey created using a free version of Air Table (2022), which included one mandatory (consent to participate) and 17 optional (multiple choice, open response, and ranking) questions. These questions focused on two areas: The most pertinent topics to the University of Toledo health science community and University Libraries services or collections most influenced by changing internal budget models. The survey did not include any questions from validated surveys.

Two questions collected demographic information and status (tenure track, tenured, not tenure eligible), because these factors could influence use of library services and collections.

The next questions focused on implications to internal budget model changes. Because of high resource costs and budget limitations, University Libraries have occasionally sought to partner with academic areas by entering into cost-share agreements within the institution to finance new and ongoing esubscriptions. These informal agreements typically occur with the department or college that most benefits from access to the resource, particularly when the scope of the resource under consideration is discipline specific. Though neither panacea nor free of administrative complications, selective resource cost-sharing has the potential for locally counteracting financial inequities in a transparent manner. Recognizing that only Department Heads and Deans have the authority and funding to enter into such agreements, the question was displayed only to the administrative study participants.

Due to universal promotion of select services (e.g., Electronic Journals by Specialty) by university librarians, the survey included a Likert scale (1= Poor or 5=Excellent) to gauge how the local health science community uses these services.

Two emerging topics with budgetary influence—Open Education Resources (OER) and Open Access (OA) publishing—inspired questions. In 2019, the University Libraries started investigating the feasibility of supporting OER initiatives as a cost-saving measure (Bridgeman, 2021). One survey question sought to understand how the local health science community currently accesses and uses OER given that the university libraries provide minimal support. Another sought to gain perspective about OA publishing.

Finally, to capture previously unaddressed questions and to solicit any other comments, the survey concluded with two open response questions.

## **Pilot Testing**

Two University Libraries health science liaisons, who did not participate in the research study, and the health science library director piloted the questions. The first round of testing resulted in revisions to existing questions and removal of one question that no longer fit the aims and scope of the project. A librarian, who specializes in health science library collection services at another university, also completed the pilot survey, resulting in additional revisions. The original University Libraries colleagues then completed one final pilot survey.

The next step involved identification of health science decision makers by viewing college websites, the university's online directory, and information from departmental liaisons. In late October 2022, the University of Toledo Social, Behavioral, and Educational Institutional Review Board approved the study. Prospective study participants received the survey by email in mid-November and early December. An error in the Air Table survey design displayed a question for health science administrators to all study participants, which led to adjustment of the question and disregarding the non-administrator responses when analyzing the data. Data collection ceased on December 18, 2022. Due to varying and limited numbers of results, collected data did not undergo statistical (Bakker, 2022) or qualitative analysis.

#### Results

An email containing a link to the survey was sent to 550 health science administrators, faculty, and staff. The response rate was 20% (n=111).

Question 1: I have been employed at The University of Toledo for \_\_\_\_\_.

This question collected 111 responses. Study participants, as seen in Figure 1, consisted of primarily faculty (80%, n=89), with the remaining respondents evenly split between staff (10%, n=11), and health science administrators 10% (n=11) who self-identified as Dean or Department Head. Most participants, (41%, n=46) have 16 or more years of experience at the University of Toledo and with the University Libraries.

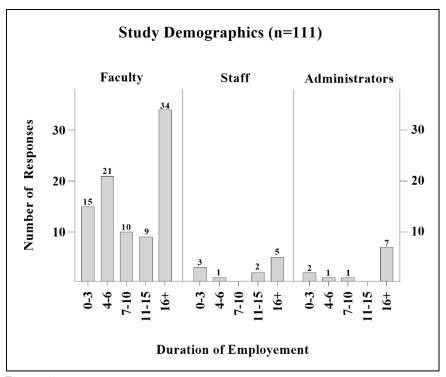


Figure 1 2022 Study participant demographics and years of employment at UToledo.

Question 2: My current role at [The University Of Toledo is\_\_\_\_. I am in a \_\_\_\_\_ position.

Of the 87 faculty participants who completed the question on promotion options, 36% (n=31) selected "tenured", and 28% (n=24) are in tenure track positions. The varied experiences of study participants provided multiple perspectives on the challenges and opportunities facing the University Libraries as they prepared for the first year of IBBS.

*Question 2a*: If the Mulford Health Science Library gave you lead time (e.g., up to 3 months in advance of the deadline), would your department or college consider contributing funds to maintain or obtain a new print or electronic subscription?

This question collected 11 responses from the administrative study participants. Most health science administrators responded "Yes" (n=3), "No" (n=3), and "Other" (n=3) but only a few (n=2) responded with a "Maybe" to the question. For participants who selected "Other," they stated lack of budget money to pursue such an opportunity.

*Questions* 4-8: Use 1(poor) or 5 (excellent) stars to show your satisfaction with how the Mulford Library provides access to\_\_\_\_\_.

Researchers selected these questions due to widespread promotion of these services and to assess effectiveness of these services for faculty, staff, and learners, who primarily access only the electronic resources via the library website.

Participants could show satisfaction (e.g., "Poor" (1) to "Excellent" (5)) with the most utilized services, as seen in Figures 2-5.

## Electronic Journals by Specialty

All but four participants (n=107), as shown in Figure 2, answered this question. Half of participants (50%, n=54) selected "Excellent" and over a third of participants (34%, n=36) selected "Very Good." A smaller number of participants (13%, n=14) selected "Good." A few participants (3%, n=3) selected "Ok" (2%, n=2) or "Poor" (1%, n=1).

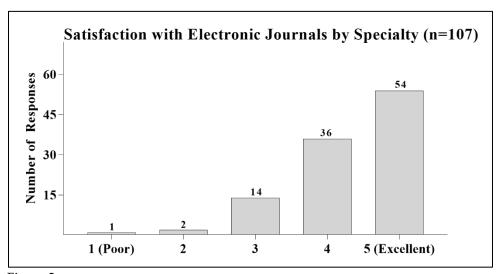


Figure 2 Study participants' satisfaction with electronic journals by specialty.

## Speed of Interlibrary Loan

Of the 102 participants who completed this question, most, as shown in Figure 3, (60%, n=61) considered the speed of interlibrary loan to be "Excellent," and many (29%, n=30) considered the service to be "Good." A smaller number of participants (11%, n=11) considered the service to be "Ok" or "Poor."

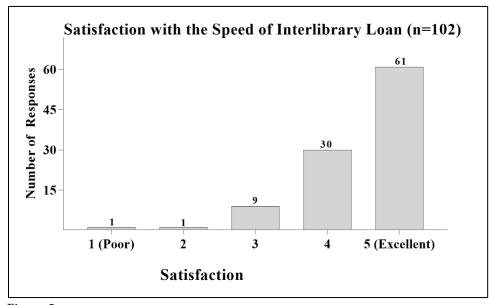


Figure 3 Satisfaction of study participants with the speed of interlibrary loan.

## Literature Searches

This question received 94 responses. Most participants, as shown in Figure 4, (73%, n=69) considered the quality of literature searches to be "Excellent." Smaller numbers of participants (19%, n=18) selected "Very Good." A few participants (7%, n=7) considered the service to be "Ok" or "Poor."

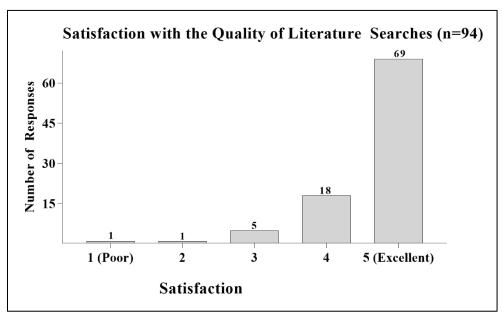


Figure 4 Satisfaction of study participants with the quality of literature searches.

## Open Educational Resources (OER)

The question on OER garnered 94 responses, as shown in Figure 5. Most participants (54%, n=50) considered the availability of OER to be "Excellent." Over a quarter of participants (28%, n=26) selected "Very Good." The fewest numbers of participants selected "Good" (13%, n=12) and "Ok" (4%, n=4) or "Poor" (2%, n=2).

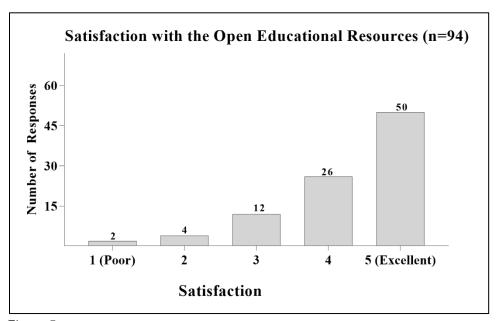


Figure 5 Satisfaction with availability of Open Educational Resources.

## Question 9: How do you obtain journal articles?

This question collected 308 responses as seen in Figure 6. Many participants (33%, n=102) obtained journal articles from PubMed and or used other Library Databases (24%, n=74). Under a quarter used Google Scholar (21%, n=65), a personal subscription (14%, n=44), and the smallest numbers selected Other (4%, n=13) or Departmental funded journal subscription (3%, n=9). Fewer than 1% (n=1) selected Not Applicable.

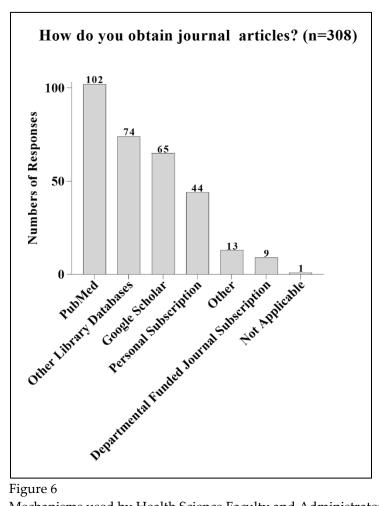


Figure 6 Mechanisms used by Health Science Faculty and Administrators to obtain journal articles.

*Question 10*: An article is not immediately available in full text. From the statements below, please indicate what you would do next\_\_\_\_\_?

This question received 111 responses. Most participants (34%, n=38) searched Embase or PubMed and placed interlibrary loan requests (28%, n=31) to obtain full-text articles. Some (19%, n=21) searched Google Scholar or asked the library liaison or library (14%, n=16) for full-text articles. The smallest number of participants (4%, n=4) selected Other or Not Applicable less than (1%, n=1).

Question 11: When you have a research or other library related question(s), what do you do?

This question collected 111 responses as shown in Figure 7. Most participants (53%, n=59) selected "Email your Library Liaison." Then, participant responses dropped significantly: 14% (n=15) selected "Stop by Mulford library for assistance," 13% (n=14) chose "Not Applicable," 10% (n=11) selected "Use the Ask Us IM/Chat feature on the library website," 8% (n=9) chose "Other," and 3% (n=3) selected "Make an appointment (e.g., Calendly, Bookings) with your Library Liaison."

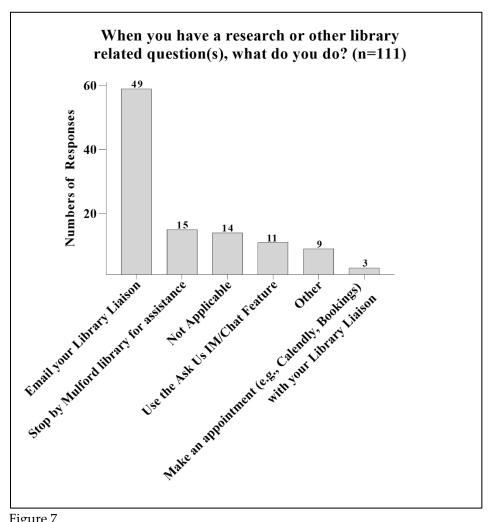


Figure 7
Steps taken by health science faculty, staff, and administrators to get answers.

#### Open Access (OA) Publishing

This question captured 110 responses. Many participants (45%, n=49) published one or more articles in OA journals as seen in Figure 8. If funded, some (16%, n=18) would consider publishing in OA journals. Fewer than a quarter of participants, (22%, n=24) had not published in an OA journal. A small number (4%, n=4) selected "I have a different opinion" and 4% (n=14) selected "Not applicable."

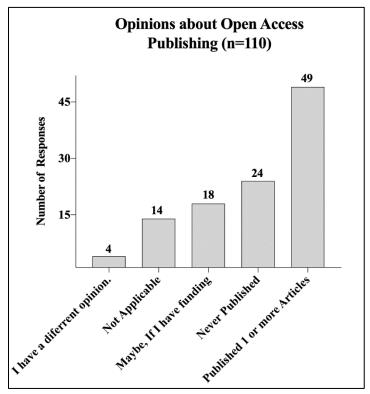


Figure 8 Faculty, staff, and administrators' opinions on Open Access article publishing.

Question 13: What is your preferred way to stay current with the Mulford Health Science Library?

This question collected 111 responses. Participants prefer to receive information about the Mulford library via "Departmental Email" (41%, n=45), "Newsletter" (31%, n=34), "Announcements," e.g., posting to the library website (14%, n=16), "Not Applicable" (6%, n=11), "Other" (5%, n=5), and "Social Media" (4%, n=4). For those who selected "Other," three participants selected "library website" and one selected all the responses.

Question 14: What information would you like to see in a University Libraries Annual Report?

This question gathered 111 responses. Of those, most participants (59%, n=66) chose "Journals added to the collection." The number of responses then dropped considerably with 11% (n=13) choosing "Trends and New Services" (e.g., "Renovations to the Library," (9%, n=10), "Journals, E-books, etc. removed from the collection," and "Not Applicable" (6%, n=7).

*Question 15*: In your opinion, how could the Mulford Health Science Library provide better support (e.g., teaching, research, etc.)?

This question received minimal responses, but the following themes emerged around communication:

- Improve communication on campus (e.g., discuss current services with new and existing faculty).
- Solicit faculty input before cancelling journal, database, or e-book subscriptions.
- Hire more librarians.
- Improve communication with departments (e.g. communicate new or cancelled journal and e-book titles, promote department specific services).

Service recommendations consisted of four main themes:

- Easier and expanded access to online books, journals, etc. from all locations.
- Provide more mentoring and instruction sessions on how to conduct literature searches for faculty and learners.
- Include a graduate success staff and a writing tutor in a library office. Improve statistical support for doctoral students.

Question 16: What else would you like to share with us?

This question received 22 responses ranging from positive support for the work of college liaisons and the library, comments about how the library would manage with the changing internal budget model, suggestions for communicating information and services to employees based at the health system or in other off-campus locations, and a few comments expressing dissatisfaction with how the University Libraries handled specific situations (e.g., interlibrary loan). One participant stated that they did not use the Mulford Health Science Library.

#### Discussion

The literature review provides the background on RCM and underscores the potential impact of moving to such a model. Some points that are brought out in the literature, such as the importance of communication to a successful transition and the downgrading of the importance of the library ("a conspicuous source of overhead") (Rogers, 2009, p. 550), provided the impetus for conducting the survey.

## Cost-sharing

Cost sharing is a topic typically referenced to consortium deals and interlibrary loan in the library literature, and not discussed in relation to RCM. This is an important consideration for The University of Toledo, given that the library might incur reduced funds under RCM. Of the eleven survey results, three respondents reacted positively, with an additional two responding neutrally to our question seeking insight on academic units' current attitude toward this subscription funding model. This is significant because the success of these informal agreements relies on an initial and ongoing willingness to work together for mutual benefit. As the unit responsible for subscription administration, cost-sharing does come with a certain amount of financial risk to libraries, particularly if the contributing college or department ends participation at any time during the contract cycle. Libraries should consider working

with interested departments or colleges to formalize the process by creating documentation detailing the responsibilities and expectations for each party and including the timeframe when the agreement may next be renewed or dissolved.

#### Electronic Journal and Book Subscription Changes

Starting in Fall 2022, some liaisons formed committees of faculty and staff, who work in the curriculum, to assist with determining how to spend allocated funds on print or electronic books (e-books) and to rearrange existing print collections to improve accessibility and use of the Mulford health science library collections. While the cost for e-books is substantial, the format provides access to high yield content for offsite faculty, who consult and use it when developing materials for courses. In tight fiscal years, faculty input makes reaching consensus on tough decisions slightly easier (Gorring, et al., 2023).

Over half (59%, n=66) of the study participants requested timely communication regarding journals added to the collection. By contrast, only a few participants (9%, n=10) requested a list of journals or e-books being removed from the collection. The University Libraries does attempt to achieve this by maintaining a LibGuide that presents, by fiscal year, e-resource additions, and cancellations at the subscribed product level. This assumes, however, that end users know which subscription agreement includes a specific e-book or full-text journal title. For new single-title material purchases the University Libraries provided a new materials list, created using the built-in search and export functionalities within the integrated library system's cataloging module. Communicating the transfer of journal titles between publishers, which occurs sporadically and in and out of large subscription packages each year, presents additional challenges, as does changes in the distribution rights of e-resource aggregators and educational streaming video providers.

In response to the study participant requests for improved communication, in Summer 2023, some liaisons contacted faculty and departments to solicit opinions about journals and e-book platforms slated for cancellation before making recommendations.

Existing workflows hint at a pathway towards better compiling and distributing a title-level listing of the abundance of materials shifting in and out of the institution's e-subscription access. The large-scale and high frequency of changes complicates how this metadata could be presented so that it would be both useful and efficient for patron use—a simple title list would likely overwhelm patrons. Any action on this front will require more contemplation, adequate workflow planning, and additional collaboration with the cataloging librarian.

#### **Open Educational Resources**

The use of open educational resources continues to show promise as a cost-reduction measure (Bliss, Hilton, Wiley, & Thanos, 2013; Bridgeman, 2021; Delimont, Turtle, Bennett, Adhikari, & Lindshield, 2016; Watson, Domizi, & Clouser, 2017); The Scholarly Publishing and Academic Resources Coalition (SPARC) reported a billion dollars in savings through the use of OER between 2013 and 2018 (Allen, 2018). Over half (54%) of UToledo survey respondents expressed satisfaction with the library's efforts to supply open educational resources; therefore, promoting OER and educating faculty on the benefits of OER is worthwhile for possible cost savings to academic units under RCM. Additionally, health science liaisons could work with faculty to make capstone projects, or a semester long project culminate with creation of an OER book, template, or patient education material, which could be used in university clinics (Kirschner, et al., 2023, Bradley, 2023, Giannopoulos, et al., 2021, Lierman, 2021). fewer staff and a

diversity of needs do make assisting with such requests challenging (Sugrim, et al., 2019). Such initiatives, however, would improve the understanding of OER at UToledo. University librarians could complete an OER certificate program, provide better support, and perhaps encourage the health sciences community to consider creating OER materials.

#### **Open Access Publishing Agreements**

The participants demonstrated more familiarity with OA publishing than the researchers anticipated, especially considering the modest amount of financial support historically supplied by the University and University Libraries. Survey results showed that 49 respondents published in OA journals before Calendar Year (CY) 2023, which is not insignificant in this context. For nearly a decade, the University Libraries' financial facilitation of open access article publication by external publishers remained limited to its consortial participation in SCOAP3, which focuses on publications in high-energy physics. At the same time, paid subscriptions remained the dominant business model offered to libraries and readers for gaining access to peer-reviewed journal content. Increasing subscription costs and end-user demand for a broader resource portfolio outpaces the University Libraries budgets, further restricting local experimentation in financially supporting OA publishing.

With the current market shift widening the availability and variety in open access publishing models and their financial-support infrastructure, in 2019 the University Libraries via the OhioLINK consortium entered into an Article Processing Charge (APC)-based open access pilot project. Due to the modest initial financial investment and unexpected rate of participation, the pilot program ended early on account of exhausted shared funding halfway through the estimated runtime. For calendar year 2022, the University Libraries via the OhioLINK consortium entered its first major publisher transformative agreement, or "read and publish" agreement. This not only licensed access to full-text journal content for library patrons within the consortium but also provided a pathway for supporting local researchers seeking to participate in open access article publishing. Soon after, the University Libraries via OhioLINK entered four additional read and publish agreements between 2022 and 2024. It is understood by the authors of this study that other open access funding sources from within the University remained equally limited over time, and that local scholars have traditionally sought external funding sources for the coverage of any fees related to OA publication of their works.

Commentary on OA received through the survey's open responses indicates an opportunity for enhanced library services to strengthen researchers' abilities to navigate the current and forecasted OA publication landscape. This could include disseminating greater information on its financial implications at the institutional level, as more APC and non-subscription cost models gain prominence in the scholarly communications market, as well as increased guidance on the pre-submission evaluation of journals and the quality of peer review undertaken. Current predictions indicate that open access will not result in cost-savings for academic libraries (Hulbert, 2023, p.37). University Libraries should strategically engage local stakeholders to ensure an open future is adequately funded under the RCM model.

## Responses to Study Participant Recommendations

Many participants requested improved support for medical students preparing for licensure examinations, procedural skills, and contemporary practice patterns. The materials medical students use for studying, specifically reliance on question banks and non-traditional study tools, changed significantly. Companies marketed these new products to students, colleges, departments, and schools but did not offer institutional subscriptions until 2021 (Burk-Rafael, et al., 2017; O'Hanlon & Laynor, 2019;

Shultz & Berryman, 2020; Tackett et al., 2018). Health science libraries now face the added challenge of choosing to renew a journal, which faculty and learners would use, or a package of e-books, which primarily faculty use.

Other department or program specific requests included purchasing software or products. Additionally, some participants requested that the University Libraries communicate collection decisions and updates regarding library renovations via a department email or newsletter. Participants requested improved full-text access to the complete portfolios of Nature, Science, Annual Reviews, and other society journals. They also requested that the University Libraries work with OhioLINK to offer a broader set of journal subscriptions. Liaisons plan to review how the University Libraries communicate information and potentially adjust techniques to improve patron engagement.

## Communicating and Marketing Library Services and Collections

The University Libraries use a variety of marketing strategies to promote services and online-and-print collections including social media. Despite the University Libraries' existing efforts, only five respondents (4.5%) chose social media as their preferred way of staying informed of the health science library's services and changes. Current social media messages focus on students and learners, which could contribute to minimal following by faculty. The health science library could spend time crafting social media messages on topics of interest to the entire University community and of particular interest to faculty, e.g., Open Access (Fonseca, 2019) and cost-sharing. This takes lots of time, dedication, and it does not guarantee that faculty will adjust how they discover changes to the library (Hill, 2015). Survey data confirmed health science liaisons should spend time reading, crafting messages, and getting permission to include content of interest to faculty within departmental and college emails. Making these communication adjustments could improve the perception and use of the Mulford health science library.

#### Limitations

This study describes one university library's experience. After receiving a study reminder email, approximately 25 study participants contacted researchers to share that they had already completed the survey; future teams may want to rethink how they distribute the data collection tool. A technical glitch resulted in additional responses to one question. Assuring the anonymity of survey participants prevented researchers from creating department, program, or college-specific responses.

## Conclusion

The move to responsibility-based budget models continues to be an option as institutions of higher learning struggle to contend with the reality of shrinking financial support. Under these circumstances, academic units in transition have more incentive to make libraries accountable for how funds are spent for resources and services. Such changes provide an opportunity for libraries to assess how they do business and ensure effective communication and transparency with all stakeholders, especially those most affected by the disruption.

The purpose of the study is to uncover inefficiencies in library operations, clear up misconceptions by both users of library services and library personnel to avoid the perception of the library as "a conspicuous source of overhead" (Rogers, 2009, p. 550). Researchers also seek to counteract negative feelings resulting from how the library gets its budget by providing an accurate assessment regarding use of library services and collections. Libraries have much to offer in RCM budgeting, but this hinges on

clear communication. While study participants are generally content with the delivery of services and level of access to needed resources, they still expect improved access to journals, full-text articles, and exam materials. Should the fiscal situation improve, health science liaisons could consult both departments and the recently updated Clinical Useful Journals list before resubscribing to or acquiring any journals (Klein-Fedyshin & Ketchum, 2023).

Based upon open-text responses from participants, a disconnect in communication exists between the UToledo libraries and the university community. By conducting this study, the University Libraries have an improved understanding of users' wants and needs. Additionally, the libraries now know the information sources patrons consult to keep up with changes in the college and at The University of Toledo. The data collected by this study can inform existing communication of library processes, promotion of open access, and opportunities for cost sharing. Completion of the Open Educational Resource (OER) certificate, for example, will improve UToledo's ability to support creation of OER materials. Ideally, in the future UToledo could hire a dedicated librarian to support university wide OER initiatives. It is worth considering the cost and staff time involved in developing and maintaining any new or existing initiatives. Libraries would benefit from using local or validated surveys to regularly assess community needs and the use of services. Such data is particularly beneficial for libraries striving to establish a firm footing for anticipated institutional changes.

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#### **Author Contributions**

Margaret A. Hoogland and Gerald R. Natal\*: Conceptualization, Data curation, Formal analysis, Investigation, Methodology, Project administration, Writing – original draft, Writing – review & editing Robert Wilmott: Investigation, Data curation, Formal analysis, Methodology, Writing – original draft, Writing – review & editing Clare F. Keating: Data curation, Formal analysis, Methodology, Writing – original draft, Writing – review & editing Daisy Caruso: Data curation, Writing – original draft, Writing – review & editing

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#### References

Adams, E. M. (1997). Rationality in the academy: Why responsibility center budgeting is a wrong step down the wrong road. *Change*, 29, 58-61. <a href="https://dx.doi.org/10.1080/00091389709602338">https://dx.doi.org/10.1080/00091389709602338</a>

Agostino, D. (1993). The impact of responsibility center management on communications departments. *Journal of the Association for Communication Administration*, 22(1), 23 –26. <a href="https://stars.library.ucf.edu/jaca/vol22/iss1/4/">https://stars.library.ucf.edu/jaca/vol22/iss1/4/</a>

- Allen, N. (2018). 1 billion in savings through open educational resources. *SPARC News*. <a href="https://sparcopen.org/news/2018/1-billion-in-savings-through-open-educational-resources/">https://sparcopen.org/news/2018/1-billion-in-savings-through-open-educational-resources/</a>
- Allen, L., Baker, N., Wilson, J., Creamer, K., & Consiglio, D. (2013). Analyzing the MISO data: Broader perspectives on library and computing trends. *Evidence Based Library and Information Practice*, 8(2), 129–138. <a href="https://dx.doi.org/10.18438/B82G7V">https://dx.doi.org/10.18438/B82G7V</a>
- Baker, N., Furlong, K., Consiglio, D., Holbert, G.L., Milberg, C., Reynolds, K., & Wilson, J. (2018).

  Demonstrating the value of "library as place" with the MISO survey. *Performance Measurement and Metrics*, 19(2), 111–120. https://dx.doi.org/10.1108/PMM-01-2018-0004
- Bakker, C.J. An Introduction to Statistics for Librarians (Part One): Types of Data. *Hypothesis: Research Journal for Health Information Professionals*, 34(1). https://doi.org/10.18060/26428
- Bliss, T. J., Hilton, J., Wiley, D., & Thanos, K. (2013). The cost and quality of open textbooks: Perceptions of community college faculty and students. *First Monday*, 18(1), 7. <a href="https://doi.org/10.5210/fm.v18i1.3972">https://doi.org/10.5210/fm.v18i1.3972</a>
- Bradley, K., Shaw, D. R., Lee, B., Symons, J., & Hernandez, G. (2023). eBooks: A novel approach to education and training offering savings and resources. *Journal of Continuing Education in Nursing*, 54(9), 394–397. https://doi.org/10.3928/00220124-20230816-04
- Bridgeman M. (2021). The Rutgers University Libraries Open and Affordable Textbook (OAT) Program. *Medical Reference Services Quarterly*, 40(3), 292–302. <a href="https://doi.org/10.1080/02763869.2021.1945864">https://doi.org/10.1080/02763869.2021.1945864</a>
- Burk-Rafel, J., Santen, S. A., & Purkiss, J. (2017). Study behaviors and USMLE Step 1 performance: Implications of a student self-directed parallel curriculum. *Academic Medicine: Journal of the Association of American Medical Colleges*, 92(11S), Association of American Medical Colleges, Learn Serve Lead: Proceedings of the 56th Annual Research in Medical Education Sessions), S67–S74. <a href="https://doi.org/10.1097/ACM.00000000000001916">https://doi.org/10.1097/ACM.000000000000001916</a>
- Carlson, S. (2015). Colleges 'unleash the deans' with decentralized budgets. *Chronicle of Higher Education,* 61(22), A4-A6.
- Cuillier, C., & Stoffle, C. J. (2011). Finding alternative sources of revenue. *Journal of Library Administration*, 51(7-8), 777-809. https://dx.doi.org/10.1080/01930826.2011.601276
- Curry, J. R., Laws, A. L., & Strauss, J. C. (2013). *Responsibility Center Management: A guide to balancing academic entrepreneurship with fiscal responsibility*. National Association of College and University Business Officers.
- Deering, D., & Lang, D. W. (2017). Responsibility center budgeting and management "lite" in university finance. *Planning for Higher Education*, 45(3), 94-109.
- Deering, D., & Sá, C. (2018). Do corporate management tools inevitably corrupt the soul of the university? Evidence from the implementation of responsibility center budgeting. *Tertiary Education & Management*, 24(2), 115-127. https://dx.doi.org/10.1080/13583883.2017.1398779

- De Groote, S. L., Aksu Dunya, B., Scoulas, J. M., & Case, M. M. (2020). Research productivity and its relationship to library collections. *Evidence Based Library and Information Practice*, 15(4), 16–32. <a href="https://doi.org/10.18438/eblip29736">https://doi.org/10.18438/eblip29736</a>
- DeLancey, L., & deVries, S. (2023). The impact of Responsibility Center Management on academic libraries: An exploratory study. *Portal: Libraries & the Academy*, 23(1), 7-22. https://dx.doi.org/10.1353/pla.2023.0005
- Delimont N., Turtle E. C., Bennett A., Adhikari K., & Lindshield B. L. (2016). University students and faculty have positive perceptions of open/alternative resources and their utilization in a textbook replacement initiative. *Research in Learning Technology*, 24, 29920. <a href="https://doi.org/10.3402/rlt.v24.29920">https://doi.org/10.3402/rlt.v24.29920</a>
- Engelbrecht, J. (2004). The changing of the guard, or: Moving from print to "e" with a new financial model. *IATUL Annual Conference Proceedings*, 14, 1.
- Everall, K., & Logan, J. (2017). A mixed methods approach to iterative service design of an in-person reference service point. *Evidence Based Library and Information Practice*, 12(4), 178–185. https://dx.doi.org/10.18438/B87Q2X
- Fethke, G. C., & Policano, A. J. (2019, 01/01/). Centralized (CAM) versus decentralized budgeting (RCM) approaches in implementing public university strategy. *Journal of Education Finance*, 45(2), 172-197.
- Fonseca, C. (2019). Amplify your impact: The insta-story: A new frontier for marking and engagement at the Sonoma state university library. *Reference & User Services Quarterly*, *58*(4), 219. <a href="https://dx.doi.org/10.5860/rusq.58.4.7148">https://dx.doi.org/10.5860/rusq.58.4.7148</a>
- Giannopoulos, E., Snow, M., Manley, M., McEwan, K., Stechkevich, A., Giuliani, M. E., & Papadakos, J. (2021). Identifying gaps in consumer health library collections: A retrospective review. *Journal of the Medical Library Association*, 109(4), 656–666. https://doi.org/10.5195/jmla.2021.895
- Gorring, H., Duffy, D., Forde, A., Irving, D., Morgan, K., & Nicholas, K. (2023). How research into healthcare staff use and non-use of e-books led to planning a joint approach to e-book policy and practice across UK and Ireland healthcare libraries. *Health Information and Libraries Journal*, 40(1), 114–119. https://doi.org/10.1111/hir.12469
- Hearn, J. C., Lewis, D. R., Kallsen, L., Holdsworth, J. M., & Jones, L. M. (2006). "Incentives for managed growth": A case study of incentives-based planning and budgeting in a large public research university. *The Journal of Higher Education*, 77(2), 286-316.
- Hill, K. (2015). Usage of social media in the University of North Carolina at Chapel Hill health science library: A case study. *UNC Chapel Hill Theses*, MP4205.
- Hulbert, I. G. (2023, March 30). *US Library Survey 2022: Navigating the New Normal*. <a href="https://doi.org/10.18665/sr.318642">https://doi.org/10.18665/sr.318642</a>

- Huron Consulting Group. (2021). *Huron Consulting report to the deans*. <a href="https://utaaup.com/huron-consulting-report-to-the-deans/">https://utaaup.com/huron-consulting-report-to-the-deans/</a>
- Jaquette, O., Kramer, D. A., & Curs, B. R. (2018). Growing the pie? The effect of responsibility center management on tuition revenue. *Journal of Higher Education*, 89(5), 637-676. https://doi.org/10.1080/00221546.2018.1434276
- Kent State University. (n.d.). *Comparative RCM models*. Retrieved May 7 from <a href="https://www.kent.edu/budget/comparative-rcm-models">https://www.kent.edu/budget/comparative-rcm-models</a>
- Kirschner, J., Monnin, J., & Andresen, C. (2023). Gaining ground: OER at 3 health sciences institutions. *Hypothesis: Research Journal for Health Information Professionals*, 35(2). <a href="https://doi.org/10.18060/27410">https://doi.org/10.18060/27410</a>
- Klein-Fedyshin, M., & Ketchum, A. M. (2023). PubMed's core clinical journals filter: Redesigned for contemporary clinical impact and utility. *Journal of the Medical Library Association*, 111(3), 665–676. <a href="https://doi.org/10.5195/jmla.2023.1631">https://doi.org/10.5195/jmla.2023.1631</a>
- Lierman, A. (2021). Textbook alternative incentive programs at U.S. universities: A review of the literature. *Evidence Based Library and Information Practice*, 15(4), 105–123. https://doi.org/10.18438/eblip29758
- Linn, M. (2007). Budget systems used in allocating resources to libraries. *Bottom Line: Managing Library Finances*, 20(1), 20-29. https://dx.doi.org/10.1108/08880450710747425
- Lopez, E., Bass, M.B., Danquah, L.E. (2022). Trends in...medical library essential services. *Medical Reference Services Quarterly*, 41(1), 95-107. <a href="https://doi.org/10.1080/02763869.2022.2021039">https://doi.org/10.1080/02763869.2022.2021039</a>
- Myers, G. M. (2019). Responsibility center budgeting as a mechanism to deal with academic moral hazard. *Canadian Journal of Higher Education*, 49(3), 13-23. https://dx.doi.org/10.47678/cjhe.v49i3.188491
- Neal, J. G., & Smith, L. (1995). Responsibility center management and the university library. *The Bottom Line*, 8(4), 17-20. <a href="https://dx.doi.org/10.1108/eb025455">https://dx.doi.org/10.1108/eb025455</a>
- O'Hanlon, R. & Laynor, G. (2019). Responding to a new generation of proprietary study resources in medical education [commentary]. *Journal of the Medical Library Association*, 107(2), 251-257. <a href="https://dx.doi.org/10.5195/jmla.2019.619">https://dx.doi.org/10.5195/jmla.2019.619</a>
- Priest, D., Becker, W., Hossler, D., & St. John, E. (2002). *Incentive-based budgeting systems in public universities*. Edward Elgar.
- Riggs, D. E. (1997). What's in store for academic libraries? Leadership and management issues. *Journal of Academic Librarianship*, 23(1), 3. <a href="https://dx.doi.org/10.1016/S0099-1333(97)90065-3">https://dx.doi.org/10.1016/S0099-1333(97)90065-3</a>
- Rogers, C. (2009). There is always tomorrow? Libraries on the edge. *Journal of Library Administration*, 49(5), 545-558. <a href="https://dx.doi.org/10.1080/01930820903090938">https://dx.doi.org/10.1080/01930820903090938</a>

- Rutherford, A., & Rabovsky, T. (2018). Does the motivation for market-based reform matter? The case of responsibility-centered management. *Public Administration Review*, 78(4), 626-639. https://dx.doi.org/10.1111/puar.12884
- Rutner, J. & Self, J. (2013). Still bound for disappointment? Another look at faculty and library journal collections. *Evidence Based Library and Information Practice*, 8(2), 114-128. https://dx.doi.org/10.18438/B8XS5Z
- Scoulas, J.M., & De Groote, S., L. (2020). University students' changing library needs and use: A comparison of 2016 and 2018 surveys. *Evidence Based Library and Information Practice*, 15(1), 59-89. <a href="https://dx.doi.org/10.18438/eblip29621">https://dx.doi.org/10.18438/eblip29621</a>
- Shultz, M., & Berryman, D.R. (2020). Collection practices for nontraditional online resources among academic health sciences libraries. *Journal of the Medical Library Association*, 108(2), 253-261. <a href="https://dx.doi.org/10.5195/jmla.2020.791">https://dx.doi.org/10.5195/jmla.2020.791</a>
- Sugrim S., Schimming L., & Halevi, G. (2019). Identifying e-books authored by faculty: A method for scoping the digital collection and curating a list. *Journal of the Medical Library Association*, 107(1), 103-107. <a href="https://dx.doi.org/10.5195/jmla.2019.514">https://dx.doi.org/10.5195/jmla.2019.514</a>
- Tackett S., Slinn K., Marshall T., Gaglani, S., Waldman, V., & Desai R. (2018). Medical education videos for the world: An analysis of viewing patterns for a YouTube channel. *Academic Medicine*, 93(8), 1150-1156. https://dx.doi.org/10.1097/ACM.00000000000002118
- Watson, C. E., Domizi, D. P., & Clouser, S. A. (2017). Student and faculty perceptions of OpenStax in high enrollment courses. *The International Review of Research in Open and Distributed Learning*, 18(5). <a href="https://doi.org/10.19173/irrodl.v18i5.2462">https://doi.org/10.19173/irrodl.v18i5.2462</a>
- Whalen, E. L. (1991). Responsibility center budgeting: An approach to decentralized management for institutions of higher education. Indiana University Press.

## **Appendix**

Data Collection Instrument Title: Health Science Campus Library Collections and Electronic Resources Survey

#### **Mandatory Question:**

University Libraries

3000 Arlington Avenue, MS 1061

Toledo, Ohio 43614

Phone # 419-383-4214

## ADULT RESEARCH SUBJECT - INFORMED CONSENT FORM

Health Science Campus Library Collections and Electronic Resources Survey

Principal Investigator:

Margaret Hoogland, Associate Professor and Clinical Medical Librarian, 419-

383-4214

Other Investigators:

R. Derek Wilmott, Assistant Professor and Acquisitions and Collection

Management Librarian, 419-530-7984

Gerald Natal, Associate Professor and Health Human Services Librarian, 419-530-4227

Purpose: You are invited to participate in the research project entitled "Health Science Campus Library Collections and Electronic Resources Survey," which is being conducted at The University of Toledo under the direction of Gerald Natal, Derek Wilmott, and Margaret Hoogland. The purpose of this study is to help the research team better understand how members of The University of Toledo Health Science Campus community access and use of the Mulford Library resources (e.g., e-books, e-journals, databases, etc.).

Description of Procedures: This research study will take place online in the AirTable platform. On the landing page of the online survey, you will be asked to read the IRB approved consent. If you select yes, you will see questions asking how you access articles and use Mulford Library Services. Then you will be asked to provide input on how the University Libraries communicate with you. Upon completing the last

question, the survey will close and your commitment concludes. Estimated time from start-to-finish is 15 minutes.

Potential Risks: You may experience minimal discomfort as you reflect upon and share your experiences about working and interacting with the Mulford Library during their time at The University of Toledo. Although a breach in confidentiality is possible with any research study, Gerald Natal, Derek Wilmott, and Margaret Hoogland will be taking every possible precaution to minimize this from happening.

Potential Benefits: You receive no direct benefits from completing this survey. The field of library and information science may benefit from this research by reviewing collected data and rethinking how libraries allocate funding and time to existing services and resources. Additionally, responses might inspire the study team to develop or to modify existing services. Other fields may also benefit by learning about the results of this research.

Confidentiality: Collected data will be stored in a password protected location available only to members of the study team. To assist with protecting your confidentiality, please do not include identifying information in any of the open response questions.

Voluntary Participation: The information collected from you may be de-identified and used for future research purposes. As a reminder, your participation in this research is voluntary. Your refusal to participate in this study will involve no penalty or loss of benefits to which you are otherwise entitled and will not affect your relationship with The University of Toledo, any of your classes, Mulford Library, or the University Libraries. You may skip any questions that you may be uncomfortable answering. In addition, you may discontinue participation at any time without any penalty or loss of benefits.

Contact Information: If you have any questions at any time before, during, or after your participation please contact a member of the research team: Gerald Natal (419-530-4227), Derek Wilmott (419-530-7984), or Margaret Hoogland (419-383-4214). If you have questions beyond those answered by the research team or your rights as a research subject or research-related injuries, the Chairperson of the SBE Institutional Review Board may be contacted through the Human Research Protection Program on the main campus at (419) 530-6167.

#### CONSENT SECTION – Please read carefully

You are making a decision whether or not to participate in this research study. By clicking yes, you indicate that you have read the information provided above, you have had all your questions answered,

and you have decided to take part in this research. You may take as much time as necessary to think it over.
By participating in this research, you confirm that you are at least 18 years old.
Study Number: 301563-UT
Exemption Granted: 10/14/2022
1. I have been employed at The University of Toledo for (Single Select)
<ul> <li>A. 0-3 years</li> <li>B. 4-6 years</li> <li>C. 7-10 years</li> <li>D. 11-15 years</li> <li>E. 16+ years</li> </ul>
2. My current role at The University of Toledo is (Single Select):
<ul> <li>A. Department Head</li> <li>B. Dean</li> <li>C. Staff Member (e.g., Executive Assistant, Research/Education Coordinator, etc.)</li> <li>D. Faculty Member</li> </ul>
2a. If the library gave you lead time (e.g., up to 3 months in advance of the deadline), would your department or college consider contributing funds to maintain or obtain a new print or electronic subscription? (Single Select)
<ul> <li>A. No – we have no interest in doing this.</li> <li>B. Maybe – we need more than 3 months to consider entering into such an agreement.</li> <li>C. Yes</li> <li>D. Other</li> </ul>
2b. If your option is not listed, please describe without using identifying information. (open response)
2c. I am in a position. (Single Select)
<ul><li>A. Tenure Eligible</li><li>B. Tenure Track</li><li>C. Tenured</li><li>D. Not Applicable</li></ul>
4. Electronic Journals by Specialty (rating)
5. The Speed of interlibrary Loan (rating)
6. Literature Searches (rating)

- 7. Open Education Resource (e.g., promotion, curation, marketing, etc.) (rating)
- 8. What other programs or services would you like the Mulford Library to investigate for the Health Science Campus Community? (open response)
- 9. How do you obtain journal articles? Please select all that apply. (multiple response)
- 9a. If you have a different way of accessing full-text articles, please consider sharing the steps with us. As a reminder, please do not include identifying information in your response. (open response)
- 10. An article is not immediately available in full text. From the statements below, please indicate what you would do next\_\_\_\_\_ (single select)
- 10a. If you have a different process that is not described above, please consider sharing the steps with us. As a reminder, please do not include identifying information in your response. (open response)
- 11. When you have a research or other library related question(s), what do you do? (single select)
- 12. Open Access publishing makes journal articles immediately available and the "cost" to publish (e.g., Article Purchasing Charge) varies by journal and article type. Which of the following statements best defines your view of Open Access publishing? (single select)
- 13. What is your preferred way to keep up with the Mulford Library? (single select)
- 14. What information would you like to see in a University Libraries Annual Report? (multiple select)
- 15. In your opinion, how could the Mulford Library provide better support (e.g., teaching, research, etc.)? (open response)
- **16.** What else would you like to share with us? (open response)