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Yingqi Tang
Jacksonville State University

Hungwei Tseng
Jacksonville State University, htseng@jsu.edu

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Yingqi Tang

Houston Cole Library, Jacksonville State University, 700 Pelham Rd. N, Jacksonville, AL 36256-1602, United States

Email: tang@jsu.edu

Hungwei Tseng

Online@JSU, Jacksonville State University

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Introduction

According to the National Center for Education Statistics (2021), in 2020–21, the average tuition and fees for full-time undergraduate students at a four-year public university was $9,400 per year. In addition to this base fee, students are required to pay $1,240 for supplementary expenses such as course materials and supplies (Ma, 2021), accounting 12% of the total cost of attendance ($10,460 each year). The price of textbooks has risen, placing students under financial pressure, inhibiting their ability to pursuit higher education. Therefore, colleges and universities have been investigating the implementation of Open Educational Resources (OER) to minimize the financial load on students.

OER are freely accessible, openly licensed teaching, learning, and research materials. With the authorization of an open license, these works may be maintained, reused, updated, remixed, and redistributed (Wiley & Hilton, 2018). The United Nations Educational, Scientific, and Cultural Organization (UNESCO) established the term during its 2002 symposium on the Impact of Open Courseware for Higher Education in Developing Countries (Miao et al., 2019). In recent years, OER have gained popularity as a method for making education more accessible and affordable. These resources, such as textbooks, lectures, and audio/video recordings, are readily accessible and frequently licensed under a Creative Commons license. However, the adoption of OER in higher education is still a growing movement, and it is necessary to comprehend the factors influencing their acceptance. As gatekeepers to educational resources, academic librarians play a crucial role in the adoption and promotion of OER. Therefore, it is essential to comprehend their perspective and attitude towards OER. The Technology Acceptance Model (TAM) is a popular framework for analyzing the acceptance of technology in various fields. The objective of this study was to employ the TAM to evaluate academic librarians' perceptions and attitudes regarding OER in higher education institutions. This study's findings would shed light on the factors that influence academic librarians' acceptance of OER and inform the development of strategies to promote their utilization.

Academic libraries serve as major hubs for 21st-Century Learning by providing informational resources to support teaching, learning, and researching on campus. As such,

librarians are tasked and dedicated towards the acquisition, presentation, maintenance, and circulation of a wide variety of information. Thus, their professional skills make them an ideal candidate to work with faculty in the exploration, adoption, promotion, and preservation of OER. The Research Planning and Review Committee of Association College & Research Libraries (ACRL) listed textbook affordability and OER as an emerging topic for academic libraries in 2018 (Research Planning and Review Committee, 2018). However, for many librarians, supporting OER means adding another responsibility to their already extensive workload, which can be overwhelming. What is their understanding, experience, and perception of OER? This study aimed to examine the adoption of OER in academic libraries, and to elicit the opinions and attitudes of academic librarians toward the project.

Literature Review

Library involvement in OER initiative

Academic librarians are particularly equipped to lead OER initiatives due to their crucial roles in establishing library collections, expanding access to resources, and assisting faculty, staff, and students. A 2019 Library Journal survey of nearly 300 academic librarians reveled that libraries are becoming increasingly active in exploring affordable learning programs, with a larger percentages spearheading initiatives over provost's offices (35% versus 34%, respectively) (Library Journal, 2020a). A 2020 survey reported that 90% of academic institutions has created Open Access (OA) or OER. Advocating for an open access transition on campus and working with faculty to compile reading lists of open educational resources is a common strategy (Library Journal, 2020b). According to Bond et al. (2021), 50% of the professors at Texas Christian University have utilized OER, while 20% have generated OER content. They recommended that the library should take the lead in engaging with other campus divisions to provide training on OER and to acquire grant funding or incentives for faculty to use or create OER.

A literature review showed that libraries are actively engaging with OER in several ways. For example, some libraries participate in task force committees, works with the library consortium and other relevant campus entities to provide an incentive mechanism for faculty members who are interested in producing or revamping course content using OER. Some examples of motivational benefits include grants, stipends, reduced course loads, and aid with required curriculum research (Belikov & Bodily, 2016; Hess et al. 2016; McGowan, 2020;

Santiago & Ray, 2020). The library provides opportunities for continuing education and professional development in the field of OER for the faculty members. Some of the topics that are covered include copyright and licenses, adopt steps, resources, and platforms (Massis, 2016; Walsh, 2020). The library, as resource hub for an institution, has established effective methods of gathering as well as organizing, presenting, and distributing the information. Librarians utilize the LibGuide platform provided by Springshare to administer open educational resources and advocate for their adoption. These LibGuide provides not only information about OER concepts, news and trends, and research studies, but also displays popular OER-related websites (e.g. textbooks, course supplements, videos, and homework) as well as tips on how to obtain and evaluate OER (Massis, 2016). Libraries explore various publishing platforms like Pressbooks and the Open Textbook Network to host open publications made by professors (Chadwell & Fisher, 2016; Fisher, 2020; McGrath, 2018; Pitcher, 2018; Ross et al., 2018).

Another evidence of library’s involvements in OER is the recent emergence of a new librarian position titled "Open Education Librarian", solely accountable for the promotion and support of OER through the adoption and creation, with specific examples such as the building, publishing, and maintaining of an OER platform (Santiago & Ray, 2020). Additionally, some Learning and Outreach Librarian and Subject Librarian positions have been expanded to include OER responsibilities (Kimball et al., 2022). Faculty and librarians at Georgia Southern University integrated an open-source chemistry textbook into the LibGuide, which offers a dependable setting for modifying, accessing, and connecting with the university's learning management system (Cannon & Mortimore, 2020). Aside from that, many professional associations in the library field provide opportunities for professional development so that librarians can learn and exchange ideas about how to promote and facilitate the utilization of OER. These opportunities include exploring tools and creating strategies specific to the needs of different institutions (Smith & Lee, 2017).

A literature search revealed that there are very few studies that specifically analyze librarians' views toward OER and how librarians' perceptions of the usefulness and ease of use of OER influence their attitudes and intentions towards using the free resources. It is essential for librarians to have a positive attitude about the use of OER, as this inspires them to not only

utilize OER but also promote them, to actively seek out new ones, and to preserve existing collections.

Technology acceptance model (TAM) and self-efficacy

Fishbein and Ajzen's (1975) theory of reasoned action and Ajzen's (1991) theory of planned behavior were the basis for Davis's (1989) Technology Acceptance Model (TAM). TAM recognizes that individuals' likelihood to adopt technology is influenced by Perceived Ease of Use (PEOU) and Perceived Usefulness (PU) (Davis, 1989; Venkatesh et al., 2003).

The basic theoretical foundation of such expectancy-value approaches suggest that an individual's acceptance of a technology is impacted by his or her desire to use it, which is in turn driven by a set of core beliefs regarding the benefits and results of its use. Davis defined PEOU as "the degree to which a person believes that using a particular system would be free of effort" and PU as "the degree to which a person believes that using a particular system would enhance his or her job performance" (1989, p.320). PEOU reveals how effortless using technology is, while PU describes people’s beliefs that they can better perform when using technology. These two factors predict people’s Attitudes (AT) towards technology and further predict its acceptance. Previous research has examined the use of the TAM to comprehend the adoption of digital resources by librarians and suggested that the TAM could be utilized to understand the adoption of digital resources (Hong et al, 2002; Park et al, 2009; Thong et al, 2002). They suggest that to increase the adoption of digital resources, libraries should prioritize addressing the perceived ease of use and perceived usefulness of technology for librarians. According to research, both PEOU and PU influence teachers' willingness to implement technology, with PU having a greater impact than PEOU (Granić & Marangunić, 2019). Additionally, Scherer et al. (2019) argue that attitude can function as a link between PEOU, PU, and Intention (IN).

Because it is difficult to comprehend human behavior regarding technology acceptance, many models have been constructed based on Davis's version of TAM. In later studies, these models incorporate additional aspects, such as social impact, cognitive instrumental processes, and self-efficacy (Venkatesh & Bala, 2008; Venkatesh & Davis, 2000). According to Bandura's theory of self-efficacy, self-efficacy can be described as "beliefs in one's capabilities to organize and execute the courses of actions required to produce given attainments" (1997, p.3). People who have a high anticipation of their own self-efficacy are more likely to attain their goals

perform well (Bandura, 2001; Maddux, 2012). Self-efficacy is a significant motivational factor that influences an individual's affect, effort persistence, and motivation. It relates to belief and behavior and has a significant impact on adoption decisions. According to Torres (2018), a teacher's level of self-efficacy in using OER has the potential to influence their open pedagogy. Teachers that have a high level of self-efficacy find it easier to incorporate OER into their lessons and are more willing to share OER with their peers (Acker et al, 2014; Tipton, 2020).

Purpose of the study

Are academic librarians prepared to transition into a new role in an environment where opportunities and challenges coexist? We as educators in this Open Learning environment continue to ask ourselves this question. This research aimed to gain a deeper understanding of librarian adoption of OER using a mixed-methods research design. The objective of the quantitative section was to determine the link between each variable in TAM to predict librarians' inclinations to embrace OER. The technology acceptance model (TAM) (Davis, 1989; Kim et al., 2015) was used to explore librarians' perceptions of the ease of use, usefulness, and self-efficacy of OER, as well as how these characteristics affect their attitude and intention toward OER and associated practices. While the qualitative study with open-ended questions was to discover participants' reflections on their viewpoints regarding OER adoption. The investigations were directed by the following research questions:

RQ1a: Will Perceived Usefulness (PU) influence librarians' Self-efficacy (SE) of using OER?

RQ1b: Will Perceived Ease of Use (PEOU) influence librarians' Self-efficacy (SE) of using OER?

RQ2a: Will Perceived Ease of Use (PEOU) influence librarians' Attitude (AT) about using OER?

RQ2b: Will Perceived Usefulness (PU) influence librarians' Attitude (AT) about using OER?

RQ3: Will librarians' Self-efficacy (SE) influence their Attitude (AT) towards using OER?

RQ4a: Will librarians' Attitude (AT) influence their Intentions (IN) of using OER?

RQ4b: Will librarians' Self-efficacy (SE) influence their Intentions (IN) of using OER?

RQ5: What types of OER have librarians been used and created?

RQ6: What are the experiences, challenges, and perspectives of librarians as it relates to OER?

Method

Data in this mixed-methods design study were collected through web-based survey and several open-ended questions aimed at learning more about academic librarians' perspective on OER, including their openness, enthusiasm, and plans to start using them. Survey questions were adopted partially from the questionnaires of Kim et al.'s TAM model (2015). All of the items were assessed on a five-point Likert scale, ranging from "strongly disagree" to "strongly agree". PEOU and PU consists of three items individually. A sample question for PEOU was, "I find OER on the Internet easy to use", while a sample question for PU was, "Use of OER will improve academic productivity". Moreover, SE was measured by two survey items and a sample question was, "I have the necessary skills for using OER". In addition, AT and IN contains three items individually. A sample question for AT was, "I am positive towards OER" and a sample question of IN was, "I intend to continue using OER in the future" (see Appendix A). Three open-ended questions on participants' OER adoption experiences, challenges, and expectations were also included to enrich the quantitative results with qualitative information.

A request for participants was made to several listservs of professional librarianship associations, including the American Library Association, College & Research Libraries, Chinese American Librarians Association, and the Joint Council of Librarians of Color. A web-based survey using Google Forms was used to collect the data. The survey was distributed in September 2022 and was made available for one week. The collected data was analyzed with the IBM SPSS Amos 29.0 application. The Pearson correlation, regression analysis, and path analysis were used to explain the relationships between librarians' views, attitudes, and intent to use OER. The results offer a methodological contribution to the library and information science literature.

Results

We received data from 213 valid respondents who work in academic libraries, 45.5% (*n* = 97) of which were from universities with doctoral or advanced professional programs, 23.5% (*n* = 50) from 2-year colleges and community colleges, 18.3% (*n* = 39) from universities with graduate programs, 10.3% (*n* = 22) from universities with undergraduate programs, and 2.4% (*n* = 5) from other institutions. Approximately 66.2% (*n* = 141) of librarians worked in public service, 21.6 % (*n* = 46) in administration, 10.3% (*n* = 22) in technical service, and 1.9% (*n* = 4) were unidentified (see Table 1).

Table 1
Information on participants' demographics (N = 213)

Classification of Institutions	
Associates 2-year College/Community College	23.5% (50)
University with undergraduate programs	10.3% (22)
University with graduate programs	18.3% (39)
University with doctoral or advanced professional program	45.5% (97)
Others	2.4% (5)
Position	
Administration	21.6% (46)
Public Service	66.2% (141)
Technical Service	10.3% (22)
Unidentified	1.9% (4)

The internal consistency reliability was determined by examining the Cronbach alpha value. Cronbach's alpha provides a score between 0 and 1, with values greater than 0.7 indicating acceptable level of reliability (Dunn, 1989). The results of Cronbach alpha and average score of five variables were reported in Table 2. The average PEOU score was 3.52 (SD = .76, α =.77), PU was 3.77 (SD = .84, α =.85), SE was 3.89 (SD = .99, α =.91), AT was 4.25 (SD = .82, α =.92), and IN was 3.71 (SD = .93, α =.78).

Table 2
Descriptive statistics and reliabilities of the measurements

	PEOU	PU	SE	AT	IN
Mean	3.52	3.77	3.89	4.25	3.71
Std. Deviation	0.76	0.84	0.99	0.82	0.93
Cronbach's Alpha	0.77	0.85	0.91	0.92	0.78

The relationships between PEOU, PU, SE, AT, and IN were investigated using multivariate correlational analysis and Pearson correlation coefficients. All five variables were correlated significantly. AT had the strongest connection to IN (r =.67, p < .001), and the correlation between PU and SE was the weakest (r = .25, p < .001) (see Table 3).

Table 3
Intercorrelations of the subscales in PEOU, PU, SE, AT, and IN

Variable	PEOU	PU	SE	AT	IN
PEOU	-	.32**	.51**	.43**	.41**
PU		-	.25**	.65**	.47**
SE			-	.44**	.58**
AT				-	.67**
IN					-

Note. ** p <.01

Table 4 demonstrates the path coefficient for every path as well as its significance. Six of the seven research questions were validated by the path analysis, with p-value set at 0.05 as the significance threshold. Except for RQ1a: Perceived Usefulness (PU) → Self-efficacy (SE), with the value of the standardized path coefficient of 0.1 (p > .05).

Table 4
Regression results for OER adoption by participants

Path	Path Coefficient	**P**	Results
SE <--- PU	0.10	0.11	No
SE <--- PEOU	0.48	**	Yes
AT <--- PEOU	0.14	0.02	Yes
AT <--- PU	0.54	**	Yes
AT <--- SE	0.23	**	Yes
IN <--- AT	0.51	**	Yes
IN <--- SE	0.36	**	Yes

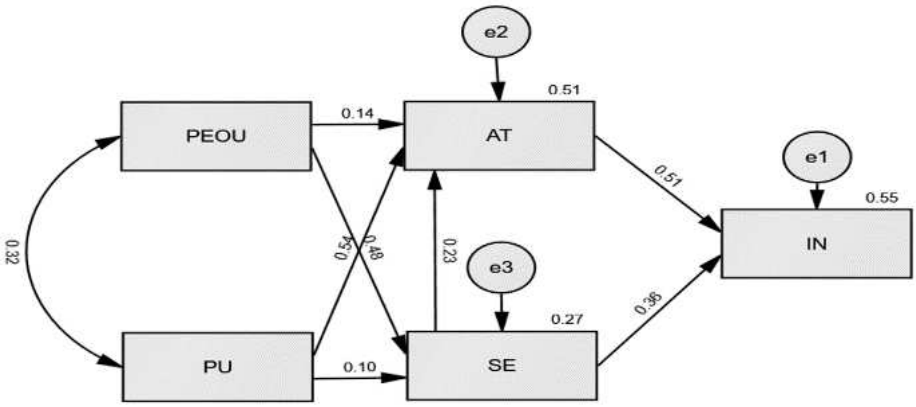
Note: ** p<.001

A structural equation model analysis was performed on the five variables (PEOU, PU, SE, AT, and IN). First, path model fit tests were performed using AMOS, and the results of the path analysis indicated a good fit: χ^2 (2, N = 213) = 2.02, p > .05, Discrepancy Divided by Degree of Freedom (CMIN/DF = 1.011), Root Mean Square Error of Approximation (RMSEA = .007), and Comparative Fit Index (CFI = 1.000) (Hu & Bentler, 1998; Kline, 1998; MacCallum et al, 1996; West et al., 2012). Next, the final model accounted for 51% (R^2 = .51) of the variance

in AT for PEOU, PU, and SE, while 27% (R^2 = .27) of the variance in SE for PEOU and PU (See Figure 1). In addition, AT and SE explained 55% (R^2 = .55) of the variance in IN. Overall, the findings of the research revealed that the structural equation model fit the data well and that Perceived Ease of Use, Perceived Usefulness, and Self-efficacy were statistically significant predictors of librarians' Attitude toward adopting OER.

Figure 1

Diagram illustrating the TAM model of OER adoption by academic librarians.



The fifth research question was a multiple-choice question aimed to identify the OER types used and created by librarians. According to the findings, the top three OER used were textbooks (71%), multimedia (52%), and reading material (45.3%), with 19.2% of respondents reported not using OER at all. According to findings related to the creation of OER, the top three OER content types developed were reading material (26.6%), multimedia (22.9%), and policies/procedures (20.1%). 50% of the participants reported that they have not created any OER content (see Table 5).

Table 5: Types of OER used and created

Item	Used	Created
Homework assignments	49 (22.9%)	35 (16.4%)
Multimedia (music, video, audio)	112 (52%)	49 (22.9%)
Policies and procedures	73 (34.1%)	43 (20.1%)
Quizzes or tests	49 (22.9%)	37 (17.3%)
Reading material	97 (45.3%)	57 (26.6%)
Textbooks	152 (71%)	27 (12.6%)
None of the above	41 (19.2%)	107 (50%)

In order to address the sixth research question, a set of three open-ended inquiries were administered to elicit insights into the experiences, challenges, and expectations of OER implementation among the participants. First, we were interested in what librarians' experience

with OER has been. The responses reflected a variety of experiences and opinions. Some participants have had great experiences with OER. These positive experiences illustrate the potential benefits of OER, most notably its ability in reducing the cost of education for students, providing more flexibility and customization in teaching materials for faculty, and providing access to a wide range of useful resources. Some participants were involved in working groups to develop OER regulations and best practices, while others attended in workshops and professional development to learn more about OER. Some participants' experiences were not so positive. They noted that OER repositories can be difficult to navigate, and that faculty are dubious about its quality. They also claimed that several professors expressed that it is time-consuming to convert course materials from traditional textbooks to OER materials. The following quotes are examples from some positive reflections:

- *My experience with OER has been positive. I believe that it is a benefit to students and increases the chance that they will read course material. I also make sure to read any OE[R] books or resources that I use before assigning them to make sure they are accurate and credible*.

- *As more faculty are adopting, they are seeking the library's assistance for legitimate OER material*.

The following are examples of negative experiences:

- *On the whole, the quality is lacking. It's not what professors are looking for, and they especially miss the support materials, such as test banks and instructor editions of textbooks. We usually end up going with a library e-book instead of a true OER*.

- *Varying degrees of quality can be difficult to locate with many (and increasing) repositories, faculty is dubious about it. But student preference for print is huge. They beg to take home reserve textbooks but have zero interest in the unlimited user access ebook.*

Next, we wanted to understand the challenges librarians have faced when promoting OER. Participants reported challenges of promoting OER were: (1) OER collection is still in development, resulting in a lack of dependability, peer review, usability, and accessibility. (2) There is insufficient administrative recognition of faculty and librarian efforts to implement OER. Librarians lack the power to promote adoption without institutional support. (3) Faculty members are more comfortable with known course design tools and materials. Publisher content

with material ancillaries, the ready-to-use aspect of commercial course materials, and licensed resources appeared to be more cost effective to them. Both faculty and librarians feel that examining and applying potential OER texts is too much of a burden when coupled with other responsibilities. The following quotes capture some of these circumstances:

- *Everyone supports the idea of OER but the struggles to actually locate, curate, and implement are daunting*.

- *It is challenging to promote OER as a librarian because we do not have a big staff and do not have one librarian dedicated to OER adoption/creation. We also do not hold much power on our campus as far as impacting course materials go*.

- *1.Capacity - competition for faculty time/bandwidth relative to their other responsibilities, 2. institutional use of adjunct faculty with little leverage on textbook adoption in courses where OER could be most impactful, 3. Commercial course materials that save faculty time/effort (e.g. test banks, instructor resources), 4. Licensed resources are in some cases more cost effective/practical than OER development/adoption*.

Finally, to better understand the potentials growth of OER in the near future, we asked them how they would envision their institution of implementing OER in five years. Some responders advocated for complete adoption of OER resources and a "textbook zero" strategy, with some seeing the gradual process of adoption dependent on institutional support, funding, and policy changes. In addition, the significance of employing an OER librarian, funding specialized funding and professional development programs, and advocating for regulatory reforms was highlighted. Respondents felt that implementing OER would require a combination of resources, support, and incentives. It was anticipated that the use of OER would increase, and the library would play a role in promoting and supporting it. Most respondents were positive regarding the implementation of OER as reflected in the following quotes:

- *I think it will have grown but unless it is an institutional priority, it won't gain too much traction.*

- *I think the upper administration will continue to strongly encourage faculty to use OERS to replace textbooks and help with student costs. But I think it will be a continual learning process requiring time from faculty to constantly keep it fresh.*

- *I would envision my institution implementing OER's by using them as either a replacement resource for textbooks in some classes or the library switching to more of an emphasis on using them in research guides for accessibility purposes.*

- *Assuming high quality resources continue to be produced and indexing continues to improve, I anticipate OER will become the norm.*

Discussion

The study employed multivariate correlational analysis to examine the associations between five variables: PEOU, PU, SE, AT, and IN. The results revealed that each of the five factors were significantly correlated. The correlation between AT and IN was the strongest, indicating that there is a substantial relationship between librarians' attitude toward OER and their intention to utilize it. If librarians have a positive view of OER, they may consider them as an opportunity to increase their productivity and work efficiency. Furthermore, they may have a greater goal to utilize it. Alternately, librarians with a negative view of OER (e.g., poor quality, difficulty of use, etc.) may view it as a burden or as an unnecessary addition to a subscripted resource and have less intentions to use it. In terms of the relationships between SE and two exogenous variables (PEOU and PU), findings suggest that librarians perceive easy-to use OER as being associate with self-belief rather than feelings of usefulness when using it. Additionally, personal characteristics, prior experiences with OER, or peers influence may have a greater impact on self-efficacy than perceived usefulness.

Furthermore, the study used path analysis to explore the impact of PEOU and PU using OER on academic librarians' SE, and AT, as well as the impact of SE and AT towards their Intention (IN) of using OER. The result suggested that these factors significantly impact librarians' intentions to use OER. In addition, PEOU, PU, and SE have positive effects on AT, with PU making the most significant contribution to AT. Our findings also confirm Scherer's et al. (2019) argument that attitude can function as a link between PEOU, PU, and IN. Librarians are more likely to use OER if they view the resources as more useful and easier to use, leading to greater confidence in employing them. Moreover, when librarians believe that OER will improve their job performance or personal life, they tend to have a more favorable attitude toward it. The results of this study are consistent with those of previous research in the field suggesting that PEOU and PU were two important factors influencing the acceptance of resources (Acker et al, 2014; Park et al, 2009; Tang et al., 2020; Thong et al., 2002; Tipton, 2020). However, this study found that in addition to PEOU and PU, SE is a significant predictor of librarian attitudes and a

mediator for predicting intentions. Self-confident librarians are more likely to see the benefits of OER and confidently integrate them in their library. Additionally, Self-efficacy can influence the level of support librarians provide in the promotion the adoption of OER among their patrons. Self-confident librarians are more likely to provide training, tutorials, and other forms of support, and to take an extra mile to assist their users in utilizing OER.

The study around the usage and creation of various types of OER by librarians indicate that open textbooks have a high rate of usage, while multimedia and reading materials are the two areas in which OER has been used and contributed most. Multimedia and reading materials related to library services and resources, guide students in acquiring the information literacy skills, are frequently employed in teaching information literacy (Tang & Tseng, 2014; Tomaszewski, 2023; Yu et al., 2018). In conjunction with the findings derived from the open-ended inquiries, it was determined that librarians fulfill a pivotal function in facilitating the adoption of OER, as well as being adopters themselves. It is worth noting that the adoption of OER within a library can vary depending on a variety of institutional factors, such as the library's overall approach to OER, policies and guidelines, technological infrastructure, and prevalent institutional culture. Future research endeavors may aim to distinguish between the supportive and adaptive roles that librarians assume. This could involve examining the frequency and extent of their involvement in advocating and facilitating the adoption of OER, or assessing the frequency and extent to which they incorporate OER into their daily practices such as teaching, reference, and collection development.

Implication

This study provides librarians, educators, and administrators with practical implications for understanding and further enhancing librarians' acceptance of OER. As evidenced by the Technology Acceptance Model in this study, PEOU, PU, and SE have a positive effect on librarians' attitudes, which in turn affects their tendency to use OER. When campaigning for the use of OER in academic libraries, it is critical to persuade librarians of the accessibility and ease of use of OER. First, designers of OER repositories should enhance the design and functionality of the repository to increase librarians' perception of its usability (Tang et al., 2020). An effective strategy to encourage the adoption of OER is by offering librarians user-friendly tools/platforms, resources to support discovery, and providing them with explicit guidelines, best practices, and

support. Second, it is also imperative to emphasize the usefulness of OER and enhance librarians' confidence in utilizing these resources. Through professional development opportunities such as workshops, seminars, and training, librarians who have successfully adopted OER can share their success stories, lessons learned, and recommendations. Seminars like these can also help librarians in gain familiarity and confidence with OER. When librarians understand the value of OER and how to access them, they are more likely to utilize and advocate for it among faculty and students. Promoting OER through collaboration within professional groups can also foster a sense of community and provide a space where librarians can share ideas and learn from one another (Cummings-Saul's et al., 2018). Third, partnership with faculty to identify OER that align with the learning outcomes and aims of the curriculum, determine areas where OER can serve as a complement or substitute for conventional materials, and subsequently integrate these resources into the pedagogical framework. Finally, administrators should provide direct support to motivate librarians. Examples include recognition and rewards for supporting and promoting OER, financial assistance and opportunities for professional development, and appropriating resources and tools for developing OER.

By implementing these suggestions, libraries and institutions can improve librarians' perceived ease of use, usefulness, and confidence in adopting OER, resulting in more adoption and usage of open educational resources on campus. In addition, the professional skills of librarians in information literacy could be a significant added benefit of embracing OER in institutions. Their knowledge can be used to evaluate the credibility and relevance of OER. As such, they will be more likely to gain confidence in the material, promote integration of OER into their repository, organize and tag materials with metadata to make resources more discoverable and accessible and apply knowledge of copyright and Creative Commons Licensing to ensure that materials in the repository are shared legally and ethically. Furthermore, a librarians' positive attitude towards OER can foster greater collaboration with faculty, instructional designers, and other stakeholders to build and implement the repository in a way that fits the demands of the campus community.

Limitations

With these findings and suggestions in mind, it is important to note the limitations of this study to inform continued research. This study assumed that librarian acceptance of OER is

influenced by three factors named PEOU, PU, and SE, which may not fully explain the complexity of the decision-making process of individuals. External factors such as social influence from peers, colleagues, family, and friends, motivation and encouragement from administrators can impact one's attitude to use OER. Additionally, an individual's own objectives, aspirations, values, and past experiences can influence their views and beliefs regarding OER. Motivational and social factors that influence the acceptability of OER, as well as institutional policies and support for the acceptance of OER, can be the subject of further research. This study focuses on the perceptions and perspectives of librarians regarding the utilization of OER; however, it is not established with certainty whether these beliefs directly led to their actual utilization of OER. Future research could examine the actual use of OER and compare it to their perceptions and beliefs.

Conclusion

The study presented that the TAM can be used in predicting librarians' desire to adopt OER. The three factors, PEOU, PU, and SE were identified as significant predictors of librarians' attitude toward OER. In addition, librarians' Attitude and Self-efficacy have a significant effect on their intention to use OER. Librarians who exhibit a greater degree of proficiency in utilizing Open Educational Resources, hold a positive perception of the usefulness of OER, and perceive OER as being easy to use are more inclined to accept OER. These findings, in accordance with previous studies, state the necessity of librarians to possess the knowledge, skills, and appreciation of these resources to increase their likelihood of adoption. There is an undeniable need for continual education and support regarding the implementation of OER. Additionally, implementing OER requires the collaboration of higher-level administrators, faculty members, librarians, instructional designers, and other campus departments. This study has the potential to inform strategies and practices for promoting the acceptance and use of OER among librarians, which can ultimately benefit the libraries and their patrons.

Appendix A. Technology Acceptance Model (TAM) scales

Scales	Item
Perceived Ease of Use (PEOU)	I find OER on the Internet easy to use.
	It is easy to become skillful at using OER.
	It is easy to access information in OER.
Perceived Usefulness (PU)	Use of OER will improve academic productivity.
	Use of OER will increase students' learning performance.
	Use of OER will enable students to accomplish tasks more quickly.
Self-efficacy (SE)	I have the necessary skills for using OER
	I feel confident in finding information in OER
Attitudes (AT)	I am positive towards OER.
	Studying through OER is a good idea.
	Studying through OER is a wise idea.
Intentions (IN)	I intend to check news about OER frequently.
	I will always try to use OER in my daily life.
	I intend to continue using OER in the future.

Note: Adopted partially from the questionnaires of Kim et al.'s TAM model (2015)

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