Feeding the Insatiable Beast
Education Technology and Digitization in Special Collections Libraries and Archives

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Article abstract

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Feeding the Insatiable Beast: Education Technology and Digitization in Special Collections Libraries and Archives

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ABSTRACT

This exploratory essay foregrounds the extraction and enclosure cycle between education technology (ed-tech) vendors and public academic special collections and archives departments. Education technology vendors, subsidiaries of academic publishers, often approach special collections libraries and archives with offers to digitize collections through services that McLaughlin et al. (2023) describe as open wrapping *or* freemium *proposals. Since there seems to be no turning back, information professionals in public academic settings should, among other solutions, encourage decision-makers to negotiate preservation and conservation of physical archival materials. Drawing from the literature on commons practices, this essay introduces the concept of* reciprocal relations *to agreements between cultural heritage institutions and ed-tech companies. A reciprocal approach would disrupt the extraction and enclosure cycle and highlights the professional's role as a steward of cultural heritage collections with an understanding that digitization is not preservation. Further, it would compel private sector companies to invest in the public sector instead of simply extracting public resources for profit.*

Keywords: archives · enclosure · openwashing · special collections libraries · undercommons

RÉSUMÉ

Cet essai exploratoire met en évidence le cycle d'extraction et de mise en enclos entre les fournisseurs de technologies éducatives et les départements de collections spéciales et d'archives publiques. Les fournisseurs de technologies éducatives, filiales d'éditeurs universitaires, contactent souvent les collections spéciales et les archives publiques avec des offres de numérisation par le biais de services que McLaughlin et al. (2023) décrits comme des propositions emballage ouvert ou « freemium ». Puisqu'il ne semble pas y avoir de retour en arrière, les professionnel.le.s de l'information dans les milieux universitaires publics devraient, entre autres solutions, encourager les décideur.e.s à négocier la préservation et la conservation des documents d'archives physiques. S'inspirant de la littérature sur les pratiques communes, cet essai introduit le concept de relations réciproques aux

accords entre les institutions du patrimoine culturel et les entreprises de technologie de l'éducation. Une approche réciproque perturberait le cycle d'extraction et de mise en enclos et mettrait en évidence le rôle des professionnel.le.s en tant que gardien.ne.s des collections du patrimoine culturel, sachant que la numérisation n'est pas la préservation. De plus, cela obligerait les entreprises du secteur privé à investir dans le secteur public au lieu de simplement extraire des ressources publiques à des fins lucratives.

Mots-clés : *archives · collections spéciales · enclos · ouvertisation · souscommuns*

Iɴ the 2010 post-apocalyptic film, *The Book of Eli*, the main character, Eli, played by actor Denzel Washington, is the steward of the last copy of the King James version of the Christian Bible. His journey is to get the copy to an archive/library to save it for humanity. There are many ways to examine the film—one of them, of course, being through a theological lens (Walker 2016). Without detailing the storyline here, the film is an interesting study from a special collections perspective. One interpretation is that it serves as a critique of the role of sacred texts in social control. The antagonist of the film, played by Gary Oldman—named Bill Carnegie, interestingly enough—understands the power of the text as it relates to social control. But what I am solely focused on is a subtext of what could be interpreted as *embodied archives*. The organization and then digitization of texts moves them further away from embodiment. Pugliese alludes to my thinking when he states:

> Techno-rationality has ordered the official archive into taxonomic grids and formulaic categories: everything is at once ordered, categorized and separated … Within the archive resides 'knowledge': legitimate, hierarchically ordered and conceptually transparent. What cannot be accommodated to this regime is dispatched to the disordered domain of subjugated knowledges … naïve knowledges, hierarchically inferior knowledges that are below the required level of erudition or scientificity. (2011, 5)

Technology as mediator moves archival materials into a technocratic space—away from bodies—further distancing and diluting potential narratives based on archival collections that are uneven from the start (Lookabaugh 2022). In any case, if you have not seen the film, there is a spoiler ahead: Eli does not make it to his final destination with the physical book but has embodied the text, and a different character is present to create a transcription for the film's version of the *Great Books of the Western World*.[1] In essence, Eli becomes the surrogate of/for the sacred text—there are no options for long-term digital storage, and he does not carry a digital surrogate of the text saved to a flash drive. In defense of the human as archive and mediator in archives, I believe in the importance of working with physical materials, along with the use of technology *as a tool* to facilitate access to physical materials. I hold this

1. The Bible was not included in the collection of *Great Books of the Western World* because it was widely available when the volumes were first published—not for any ideological reason.

belief because, besides researchers—a mostly privileged class—who have difficulty traveling to different sites to access collections, there are marginalized populations who have not had the opportunity to visit a special collections library and/or archive and they have not had the experience of viewing and/or handling cultural heritage materials—whether or not the materials are from a traditional archive or a community archive.

In the excitement to digitize special collections, and even with a mandate to increase access to cultural heritage collections, special collections libraries and archives have opened to the extraction and enclosure of public archival collections by ed-tech vendors without any commitment to an investment in the preservation management and/or conservation of physical materials (extraction/enclosure). Focused on a specific problem in academic special collections libraries and archives, this essay employs Nesmith's (2023) discussion on the entanglement of digital public archives and Big Data as an entry point for a discussion on the extraction and enclosure cycle between ed-tech vendors and special collections libraries and archives from a scholar-practitioner perspective. Both public libraries and public academic libraries, though organized and managed in different ways, have common settler colonial, exclusive, and racist histories and are organized around similar ideas. That said, this essay seeks to regard special collections and archives as part of a cultural commons—part of a collection of shared intellectual resources accessible to the public.

Since there seems to be no turning back, professionals should, among other solutions, urge library and archives senior management and administration to negotiate preservation and conservation of physical archival materials. Padilla identified points of exploitation in working with for-profit publishers and laid out the endgame of "[comingling]" with technology vendors, noting, "As we reflect on the generative potential of collections as data, we must also consider the threat of enclosure. This line of thinking spans collections, infrastructure, and, ultimately, you and me" (Padilla 2018, 296-297). In short, private wealth is being extracted or generated from public cultural heritage materials (Nesmith 2023, 502).

Education Technology and the Commons in Special Collections and Archives

Digitization in Special Collections and Archives

Digitization/mass digitization has been in libraries and special collections libraries and archives for some time. Alice Prochaska (2009) understood some of the problems

that arise with institutional eagerness to digitize archival collections. Demonstrating a good grasp of the issues, Prochaska wrote:

> The digitization of special collections has always been a complicated picture … Ownership issues in the digital environment are no simpler than those surrounding physical artifacts. Given the acceleration of mass digitization, the continuing conflicts between publishers and libraries that show no sign of reaching resolution, and an exponential increase in the technical solutions that are on offer, visions of the future seem elusive. (Prochaska 2009, 13-14)

It is therefore surprising that over the past 15 years, the profession has paid scant attention to the specific problem of ed-tech's extraction and enclosure of special collections. Perhaps it is because professionals are managing a host of issues and responsibilities that this problem seems out of our control (Warren and Scoulas 2021). But it is now an imperative to acknowledge that digitization of archival collections has served as a for-profit entry point to archival materials for ed-tech vendors. Because of disinvestment in higher education, there has been an overreliance on technological solutions to the problems of deferred maintenance of buildings and a significant reduction in capital projects (Greenfield and Natalia 2023). It may appear as if digitization is not connected to disinvestment; however, simply looking around institutions where archival materials are stored would tell a different story (Fleischer and Calzonetti 2018). With cuts to resources and staffing, the long-term expense and value of digital solutions is yet to be determined. While attempting to meet the research needs of users, special collections libraries and archives have not only signed onto bad agreements, but they have not required investment from ed-tech vendors or advocacy for collections care from researcher communities. Both information professionals and humanists have documented the potential in digitized materials—researchers often demand digital access to materials—but lack a basic understanding of the labour and money required to maintain, administer, and digitize archival collections. In a study on how humanities/digital humanities scholars use archival materials, Audenaert and Furuta (2010) found that:

> Digital libraries hold the potential to serve as both valuable resources for finding and disseminating the results of scholarship as well as sites to support research in process. We need to consider the role of digital libraries as evolving resources designed to support the entire life cycle of a research project. This life cycle should include the initial digitization of material, the ongoing analysis of what material and the ultimate publication of long-lived scholarly resources. (291)

What is often absent in such conclusions is that librarians and archivists are rarely, if ever, mentioned—information professionals and the financial advocacy needed to support scholarly production is always rendered invisible. Most often, disciplinary scholars have been trained to do research as individuals, but with an awareness

that they are part of an ongoing conversation embedded in a research community with a history. The disregard for the partnership between librarians/archivists and researchers violates an aspect of a commons practice, reciprocal relations, discussed later in this essay.

Continuing the focus on user communities and digitization, Kachaluba et al. (2014) explored differences and challenges in decision making in humanities print and digital collection development. They concluded that "*selective duplication* and bundled pricing models, together with informed either/or decisions, allow humanities faculty to benefit from the research opportunities offered by digital technology as well as print artifacts" (Kachaluba et al. 2014, 104). It is an information professional's work to facilitate the research of their users, but in the current neoliberal university, researchers do not seem to be aware of the funding model of university libraries, the pricing structure of academic publishers, and how oftentimes researcher wants and needs outpace a university library budget. In other words, an acceleration of digitization exacerbates the belief that information professionals are inconsequential. Soon enough, without consideration of thoughtful commons practices, disciplinary faculty will also be inconsequential (Schwartz 2014).

Williamson et al. (2022) found that "Amazon, Google, and Microsoft have become significant governance actors, operating through networks and relationships to influence and intervene in education, and as a result are introducing new governing technologies into educational settings in the form of hardware, software, data analytics, and algorithms" (6). Most concerning is that "technology companies that process and use student data, then, need to be understood as enacting new techniques of governance within schools, by producing data for institutional decision-making and by reshaping educational practices around the affordances and constraints of platforms and infrastructures" (Williamson et al. 2022, 6). As an extension of neoliberal practices, state administrators of higher education and technocrats make easy bedfellows.

Lindquist and Long (2011) interviewed faculty, undergraduate, and graduate students registered in humanities courses to gather information on the needs of this user community in order to develop a digital educational tool for the ease of digital primary source use and literacy. They found that "educational technology is used selectively" in the classroom "in order to save time but misses the opportunity to more fully support faculty pedagogical goals or contribute to the student learning experience" (Lindquist and Long 2011, 235). With the collection of large amounts of data, technology companies have been able to track these needs and propose curated digital teaching kits to address learning goals and pedagogy. From student interviews, they found that "[students] derive great enjoyment from the powerful

emotional and sensory connection to the past that they experience from working with original documents. While facsimiles do not offer the tactile experience of the originals, they do convey many of the visual qualities that appeal to students. Students reported favoring digital facsimiles for their availability, breadth of choice, and manipulability" (Lindquist and Long 2011, 235). There is the general implication that digitization saves time and makes materials more accessible to students and faculty, and that is debatable. That said, this essay does not argue for restrictions on technology in special collections and archives—circumstances are way past that point—but again proposes a reciprocal arrangement with ed-tech companies that includes a balance of user needs and investment in the preservation of physical materials.

Currently, researchers are responding to what they consider to be frustrations about access with the creation of software applications such as Sourcery. It appears that Sourcery would function as a cloud digital repository for previously scanned archival materials from special collections libraries and archives potentially from across the globe. Further information about this planned resource is not available, and the service has not gone live at the time of the writing of this essay. However, digital access solutions such as this not only breach and damage the librarian/ researcher relation, but also have the potential to violate copyright and any intellectual rights that a university might hold. In examining the role of library professionals and embodied archives, Lookabaugh (2022) writes, "To view archives as embodied political spaces allows us to be accountable to the violent histories of colonial and state archives and the varied positions from which people interact with them while not erasing the labor of archivists, librarians, and others who in the present actively work to repair, transform, and create new tellings of history through archives" (1040). This cloud solution to the desire for instant access to archival materials moves to further erase the labour of special collections and archives professionals. By moving to replace human interaction with technology, academic researchers create the conditions for the automated university.

Because special collections libraries and other cultural institutions were viewed as and often operated as private spaces, and in some cases still do, for-profit entities have been able to seize on the still new paradigm of the increased access/open ethos of the cultural heritage sector. Education technology vendors profit from repackaging open archival collections, sometimes doing so with the incautious support of library administrators, managers, special collections librarians and digital archivists. McLaughlin et al. (2023) note that academic publishing companies currently use two models of extraction and enclosure: *open wrapping* and the *freemium* model. Open wrapping is when publishers include additional services alongside open educational

resources, in a sense "wrapping" those services around the OER to extract fees. And the freemium model is one that many librarians should be familiar with "where instructors are given access to one of these services temporarily or until they reach a particular threshold, at which point they are asked to pay or are prompted to encourage their institution to purchase the product" (McLaughlin et al. 2023, 332). Freemium is better known as the trial subscription and in special collections and archives, publishers often offer digitization services, repackaging archival materials in the form of the digital teaching kit, and persuade librarians that this will increase access (McLaughlin et al. 2023). Granted, in some cases digitization increases access, therefore reducing physical use, the need for paper photocopies, and travel, representing a reduction in negative environmental impacts of archival research (Tansey 2023). And as some have argued, because of the stage of climate change in which we find ourselves, there is a need for some enclosure practices as a practical matter (Harvey 2011, 102). However, profit-driven ed-tech vendors work counter to increased access by enclosing digitized archival collections. Indeed, Watters notes, "'openness' in the political realities of 21st Century capitalism: 'having an appearance of open-source and open-licensing for marketing purposes, while continuing proprietary practices'" (quoted in Sanders and Bowie, 2020).

Cultural studies scholars seem to understand the stakes of ed-tech's encroachment on universities. In defense of the role of cultural studies scholars and the open movement in universities, Goggin (2012) contends that cultural studies/communication scholars "urgently need to analyze, draw attention to, and critique the profound, new kinds of enclosure that imperil the university's traditions of learning, research, critical inquiry, and the openness of varieties of reason . . . Not least because the social imaginaries of towers in the cloud, or learning as crowdsourcing, or apps as pedagogy come with materialities also, and quite specific, often anti-democratic investments" (20). As an outsider within[2] academic libraries, I implore academics to not only critically engage ed-tech moves through their scholarly publications, but to identify ways to actively resist.

Additionally, ed-tech companies often extract for-hire intellectual labour of information professionals and subject specialists for digital collections, e-textbooks, and e-teaching kits; ed-tech siphons intellectual labour from public institutions—there are no royalties paid to the creators/writers or to the public institutions that allow the ed-tech sector access to archival collections. And although outside of the scope of this discussion, copyright should also be considered when working with

2. A term coined by sociologist and Black feminist theorist Patricia Hill Collins (1999), the outsider within acknowledges the difficult social position in which Black women find themselves while working in the academy. Collins explains professionals like herself "found ourselves caught between groups of unequal power . . . hierarchies of race, or class, or gender, or in my case, the interaction among the three" (Collins 1999, 85).

ed-tech vendors (Padilla 2018; Prochaska 2009). That is, not only do information professionals currently educate users on basic copyright, but work done with ed-tech vendors can eventually complicate an already complex subject, as text, image, and technology entwine, it often leads to different ways for ed-tech companies to create impenetrable policies around access and reproduction (Clark and Chawner 2014). It is curious that non-profit, most often public institutions have left their assets open to a type of recycled plunder by for-profit ed-tech.

Another access point of exploitation can be through digitization departments. Digital asset managers are sometimes the first point of contact between ed-tech vendors and digitized, born-digital, or yet to be digitized archival collections. In theory, IT and digitization departments work in concert with special collections and university archives to fulfill user needs—departments should consult with each other for the benefit of the collections and researcher community. However, in practice, because of the differing mandates, tensions often arise. Simply, digitization departments can enter or reinforce agreements that are antithetical to special collections. Consulting with both special collections colleagues and using data collected from use tracking and digital collections search offer a more complete picture (Cocciolo 2016, 130-131).

Lastly, Teräs, et al. (2020) point out the acceleration of ed-tech's encroachment of university teaching and learning during the early years of the COVID-19 pandemic. There was lots of handwringing and concern about students' skill-gap and knowledge loss during the time of quarantine and limited school operations, where ed-tech companies identified opportunities to further infiltrate education:

> In the Covid-19 [*sic*] pandemic, the hypothesis of 'broken education' offers an opportunity to ed-tech businesses to sell untested solutions which sometimes have little to do with proper teaching and learning philosophies. As these tools become rooted in teaching practice, it becomes difficult to go back. In addition, and more disturbingly, some of these tools employ login requirements and tracking cookies to capture and gather data that can be monetized in the future. (Teräs et al. 2020, 870)

Through the deployment of the freemium model during COVID-19 quarantine, ed-tech companies were able to expand their online teaching arm, and as a result, institutions became further dependent on services. Not only do ed-tech companies extract valued resources from public institutions, but they also undermine expertise for profit. All that to say, special collections and archives professionals, senior management, and administrators should begin to devise ways through commons-like practices to disrupt the extraction and enclosure cycle.

The Commons/the commons/Undercommons

The Commons

From the International Association for the Study of the Commons (2023), the origins of Commons come from a medieval European understanding of land management or how communities during that period shared land:

> Most generally, [commons] can be used to refer to a broad set of resources, natural and cultural, that are shared by many people. Traditional examples of commons include forests, fisheries, or groundwater resources, but increasingly we see the term commons used for a broader set of domains, such as knowledge commons, digital commons, urban commons, health commons, cultural commons, etc. (n.p.)

Cultural heritage institutions fall under what Holder and Flessas (2008) term as the cultural/historic commons and state:

> Less drastically, the definition of what is in the cultural commons turns on questions of copyright, authorship and patentability. These questions become especially contested in the realms of genetic science and bio-prospecting, and also in the area of indigenous knowledge. Ownership in this area becomes a debate as much as a legal technology. The questions of who, or what group, can 'own' pieces of culture in the modern world form a large part of the emerging discourse of the 'the commons.' (303-304)

Holder and Flessas (2008) emphasize that professionals in the cultural heritage sector are negotiating notions of ownership, an expansive idea of shared culture—weighing questions about what can be shared—and they contend that manifestations of cultural commons are place based. Although public and academic libraries have been participating in Commons practices and renovating the colonial library into Commons-like spaces, the institutions are part of an "'emerging commons'" . . . the concept of social commons . . . of intellectual and cultural commons" (Fournier 2013, 435). Generally, Commons discourse is rooted in large-scale, geographical land and water resources, and this essay employs the Commons in significantly narrower terms. While there are those who are critical of the notion of the Commons in library and information science and archives—count the author as one of those professionals—decision-makers should consider certain Commons practices to disrupt the extraction and enclosure cycle. That said, there are many reasons to be critical of the Commons movement in libraries and one of them is the historical legacy of the Commons in libraries that is steeped in settler colonialism and white supremacy (Benoff 2022). Because of this legacy, libraries and archives' continued position in the socio-political landscape of the U.S. and Canada will always be implicated in the subjection and subordination of Black, Indigenous, people of color, and other marginalized groups. And perhaps public libraries can claim a closer relation to the Commons, having a more reciprocal relation with the surrounding

community than academic libraries, as academic libraries still operate under paywalls—our business relationships with for-profit publishers betray the access paradigm.

Many manuscript collections held in academic institutions are of the official record, but ed-tech's extraction and enclosure cycle often function to re-subjugate histories and reinscribe social relations while further suppressing the conscripted knowledge of marginalized peoples. Proposals for open access models of educational resources, information, scholarship, finance (e.g., cryptocurrency), and land in the Commons model strike me as arrangements between predominantly white and privileged classes. As has already been witnessed, open and/or Commons resources are still vulnerable to neoliberal and technocratic exploitation. Further, alternative currencies such as Bitcoin, which may be considered as a Commons solution, are terrible for the environment[3] (Yüksel et al. 2022; Carter 2021; Kolbert 2021; Egiyi and Ofoegbu 2020).

the commons

From the mid 1970s to early 1980s, I lived in a multiethnic/racial, mixed-income urban commons/cooperative building[4] in the Woodlawn neighborhood of Chicago. Based on a mélange of Protestant Christian theological principles and liberation theology, the Covenantal Community was an idea that sprung from a desire to make the urban commons material and a resistance to the commons model frequently used before our community building's organization, that of living with one person as the head of the living commons. Each member of the community brought with them a level of expertise that was used to contribute to the community (e.g., building rehabilitation, cooking, music, administrative, teaching, etc.). Further, the community established an urban garden (open to neighborhood residents) and owned an additional building with units rented to lower-income neighborhood community members—residents with a historical relation to Woodlawn. Covenantal Community members belonged to farming collectives in Aurora, Illinois, and shared property in Michigan. I learned how to seed and grow vegetables and fruits, had access to cultural events that I would never have had access to if my mother had not been one of the organizing members of the community established in cooperation with University Church and faculty at University of Chicago's School of Divinity. With an awareness of commons being

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3. There are debates in the literature about cryptocurrency and block chain carbon footprint versus energy consumption, and similar in debates about fossil fuels, there is no clear consensus on the use of alternative solutions—even in some of the literature from the Global South. Much of the environmental/climate science/engineering literature can be inaccessible to the layperson, so I have referenced some popular articles.

4. I am making a distinction between the commons from my lived experience, and "the Commons" described in the literature.

rooted in settler colonialism, I do not share my lived experience to romanticize commons living; there were many problems (Nonini 2017, 26), but it is not exactly the Commons I found currently described in the literature for this article (Bollier 2020). Simply, the Commons in the literature reads like an extension of a society based on corporatism, technocracy, and white supremacy it is not the commons of which my family was a part, and we would be excluded from the Commons. The cooperative model that I was raised in was embedded with shared resources, shared childcare responsibilities, and shared expertise and training. From memories of this lived experience, I propose commons practices as I understand them. No matter how many interior architectectural changes happen in physical spaces, I am not suggesting that traditional libraries can become commons, but that librarians and archivists should further pursue commons practices to preserve shared intellectual resources.

Undercommons

There are, of course, debates around attempts to live in Commons. Fournier notes, "Capitalism has always relied on a process of enclosure of the commons, of the expropriation of 'autonomously produced commonwealth' (quoted in Hardt and Negri, 2009: 41)." Basically, in attempting to implement Commons living, there is almost no escape from capitalism.

As this discussion is mostly focused on public cultural heritage institutions, it would be irresponsible of the author to not briefly include a counter-vision about the university as Commons. As a Black woman in an academic library, I often interrogate my position as a special collections librarian. Because of my professional background in songwriting, copyright, and publishing, my natural inclination is to disrupt traditional/capitalist models of exclusivity and ownership. I learned the hard way about intellectual property rights because if you are an unknown quantity in the music business, most contracts are drafted to exploit that. That is, many starter music contracts extract copyright and publishing from artists—it is standard. So, after filling the position in special collections, and inheriting the responsibility of managing copyright permissions, I was somewhat ambivalent about it. And to work for traditional memory institutions is a difficult position for those who are both members of historically oppressed groups and underrepresented in their professions. I again acknowledge the privilege of my position; however, I am reminded daily that due to my phenotype, my position only matters in particular contexts—if that.

In response to the idea of the university as commons, Harney and Moten (2013) introduced the Undercommons. A complex intellectual exercise in poetics and Black optimism, Harney and Moten (2013) challenge the (white) critical academic who simply acknowledges existing problems in the neoliberal academy and the world.

They contend that it is not enough to be critical and then train students in critical analysis of those problems:

> The Undercommons might by contrast be understood as wary of critique, weary of it, and at the same time dedicated to the collectivity of its future, the collectivity that may come to be its future. The Undercommons in some ways tried to escape from critique and its degradation as university-consciousness and self-consciousness about university consciousness, retreating, as Adrian Piper says, into the external world. (Moten and Harney 2004, 111.)

Simply, the critical academic is always in a state of stasis: extracting from the surrounding Undercommons, but never truly subverting neoliberal practices of the university. University-consciousness is to understand your positionality in the university community and adhering to the norms and values of that community. And self-consciousness is to develop sociopolitical awareness and turn a critical eye to both your position in the university and the world, and taking action based on that positionality. Schwartz (2014) agrees with Harney and Moten (2013) and goes even further in calling out academic disciplines broadly, arguing "A brief sociology of knowledge may help explain why even some self-defined 'radical' or 'critical' academics have trouble comprehending the political economy of higher education" (Schwartz 2014, 508). In his focus on the neoliberal university and contingent and tenured faculty, Schwartz (2014) identifies and enumerates resultant negative impacts of forty years of cuts to higher education. He identifies what ails academics—labour reorganization and a significant reduction in resources within universities that disconnects tenured academics from the university community; hence, what sometimes negatively impacts the work of academic librarians. His recommendation is to be a good academic citizen—identifying ways to implement commons-like practices acknowledges that the university *is* a community—and would require subversion of some current practices on campus. But the neoliberal university almost fosters bad university citizenship, as the focus is always on a research community that lies just beyond university walls (Schwartz 2014, 515).

Regarding the library digital commons, Soudias (2021) similarly proposes that both public and academic libraries start by "acknowledge[ing] their institutional and organizational limitations, so as to be able to actively minimize the dual commodification of knowledge and access to knowledge under informational capitalism" (48). Soudias' point acknowledges the tension between the critical academic librarian/information professional and the neo-liberal institution. Professionals may be able to implement small changes over time, but those small changes may not necessarily lead to dramatic shifts in practice because of institutional obstacles. That said, challenges with and to a new approach should not stop information professionals from effecting change.

Reciprocal Relations

In meditating on solutions to the problem of the extraction and enclosure cycle, I identified the term *reciprocal relations* in the Commons literature. Libraries have long seen the benefit of and sought out ways to implement shared resource models through consortia specifically (Pal 2016). As a result, basic ideas about shared resources, mutual aid, and reciprocal relations are familiar concepts in librarianship (Seiter 2022; Pal 2016). For instance, many special collections librarians work with exhibit loan agreements. The borrowing institution will sometimes offer to return borrowed items in better condition than what they were received by offering to fund small conservation jobs, provide custom enclosures, or offer to mat and frame items—in other words, they offer support for preservation management in exchange for use. In contrast, ed-tech companies approach libraries to extract profit by locking down shared resources behind paywalls. So, in thinking about digitization agreements between libraries and ed-tech companies, libraries should draft mutually beneficial agreements. Introducing a reciprocal clause in digitization agreements shores up the role of special collections and archives professionals as stewards through financial contribution to the care of physical materials. While the concept of reciprocal relations is rooted in natural resources, the general idea can be applied to relations with ed-tech companies. Diver et al. (2019) argue, "Reciprocal relations highlight how some groups give back to a given resource or place, while others primarily extract benefits … foregrounding reciprocal relations may help communities to delegitimize rights holders who are violating resource health. Reciprocal relations privilege restorative, place-based actions to increase health and abundance. How can we tend before we take?" (Diver et al. 2019, 423). Again, the authors address natural resource sharing; however, the sentiment is the same. How can library decision-makers negotiate "tend before we take" agreements with ed-tech vendors? I propose the inclusion of a clause in digitization agreements that either allocates a percentage of profit generated by ed tech companies or a fee-based model with monies going directly to the preservation and/or conservation of rare books and special collections.

Conclusion

Digitization agreements between ed-tech companies and special collections libraries and archives that are based on reciprocal relations, and specifically proposed in this article, agreements that include a preservation management/conservation clause, are a move towards disrupting the extraction and enclosure cycle. As public and academic library settings have come under fire in the culture wars over the past ten years, many library managers and administrators do not necessarily have the tools to avert fascistic attacks, which can make implementing bolder proposals

near impossible. However, senior managers and administrators have the power to transgress extraction/enclosure agreements with modest demands. While there are examples of reciprocal relations in the Commons literature, there were no documented cases of what is specifically proposed in this essay. Future research will provide cases of reciprocal relations between special collections libraries and archives, and academic publishers (ed-tech vendors). It may also be beneficial to explore the philosophical underpinnings of individualism and collectivism in shaping how professionals think about commons practices, particularly with a focus on the question whether the philosophical paradigm we are currently in is applicable to underrepresented professionals who have historically been represented as subjects in official archives (Koons 2019; Gordon Nembhard, 2018; Mills 1997, 110-111). That is, fundamentally, social organization rooted in white supremacy influences what we think about shared resources—natural or scholarly.

ABOUT THE AUTHOR

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