"Librarianship as Citizenship": The Promise of Community-Based Learning in North American Library and Information Science Education

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This article argues for the usefulness of experiential learning as a vehicle for democratic civic engagement in North American library and information science programs. First, we explore the literature on service learning, traditionally the primary type of experiential learning in LIS. We define and provide historical context and scrutinize service learning's benefits and challenges for students, faculty, LIS programs, and parent institutions. Second, we trace the evolution of experiential learning from service learning to community-based learning (CBL); we underline the ways in which such an approach in its epistemology and its practice transcends the traditional service-learning model. Finally, we unpack the novel ways in which one iSchool's LIS program is implementing community-based learning, namely by embracing data science and design thinking in its pedagogical approach to a new three-course, twelve-credit post-Bachelor's certificate (PBC). We discuss the institutional context for the certificate, the project partners, the 12 PBC Fellows, and the curriculum, which includes three new courses (Design Thinking for Digital Community Service, Data Analytics for Community-Based Data and Service, and a capstone).

Keywords: civic engagement, community-based learning, experiential learning, LIS education, LIS pedagogy, service learning

> To learn *how* to be citizens, students must *act* as citizens.
>
> –Melaville et al. (2006), p. 1.

> We need to hear directly the voices of our community counterparts. We need to abandon the idea that we can represent the academy and speak for the community at the same time. That is not dialogue but ventriloquism.
>
> –Zlotkowski (2011), p. 25.

Characterized by a commitment to social responsibilities and duties, citizenship is defined by the *Oxford English Dictionary* as "the capacity developed by real-world public work that creates both a stake and standing in society through contribution" (see also McCook, 2000a, p. 12). In service of citizenship, education generates civic vitality and

KEY POINTS:

- Experiential learning is an optimal vehicle to promote students' civic engagement, particularly their commitment to social responsibility and to diversity, equity, and inclusion (DEI).
- As a key form of experiential learning, community-based learning (CBL) both builds upon and breaks from traditional notions of service learning.
- Drexel University's IMLS-funded "Integrating Community-Based Librarianship into LIS Education" (2019–2022) embraces CBL in offering a three-course, twelve-credit post-Bachelor's certificate (PBC).

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renews democracy (National Task Force on Civic Learning and Democratic Engagement, 2012). Torney-Purta, Cabrera, Roohr, Liu, & Rios (2015) charged the academy, including students, faculty, and administrators, and local communities collaboratively to carve out a participatory and inclusive public space for democratic civic engagement.

For students, however, the National Task Force on Civic Learning and Democratic Engagement (2012) recognized that neither full civic literacy nor full democratic knowledge and capabilities can be cultivated solely in the classroom. Students at all levels also need hands-on, face-to-face, real-world, active engagement with diverse stakeholders and perspectives. Only then—through internships, practicums, study-abroad programs, and community-based research and projects—can they wholly engage civically.

Civic engagement enhances students' understanding of and commitment to civic life. It adds, moreover, to institutions' and communities' educational, economic, and social capital (Cress, Burack, Giles, Elkins, & Stevens, 2010). Most salient, civic engagement principles such as ensuring civic literacy and an informed citizenry jibe with longstanding library and information science (LIS) values (Ball, 2008; Ball & Schilling, 2006; Hill, Streams, Dooley, & Morris, 2015; Kranich, 2005; Yontz & McCook, 2003). LIS programs are therefore ideally positioned to encourage civic engagement, most notably through experiential learning.

This article argues for the usefulness of experiential learning in North American LIS programs as a vehicle for civic engagement and for promoting diversity, equity, and inclusion (Poole, 2021b). Probing a complex contemporary phenomenon in depth, this case study (Schwandt & Gates, 2018; Yin, 2009) relies upon documentary evidence (Hodder, 2000; Wildemuth, 2009). To locate sources on both service learning and community-centric learning, we relied on citation chaining, journal browsing, and database searching and browsing (e.g., by subject, keyword, and author).

First, we define and provide historical context for service learning and discuss its benefits and challenges. Second, we trace the evolution of service learning into community-based learning; we underline how such an approach both enriches and departs fruitfully from a traditional service-learning model. Finally, we unpack one North American iSchool's LIS program's novel implementation of community-based learning, namely by embracing data science and design thinking in its new post-Bachelor's certificate.

Service learning in LIS

Defining service learning

Oak Ridge Associated Universities ushered in the term service learning in 1964 (Becker, 2000). A philosophy and a pedagogy, service learning combines theory-based classroom content and its application through structured experiential learning, namely civic, community, and professional engagement. Writ large, service learning involves developing collaborations and relationships, working onsite with community partners to address community-identified projects or problems and critical reflection (ALISE, 1990; Ball & Schilling, 2006; Becker, 2000; Bishop, Bruce, & Jeong, 2009; Hatcher, Bringle, & Hahn, 2017; Kimmel, Howard, & Ruzzi, 2016; Lim & Bloomquist, 2015; McCook, 2000c; Roy, 2001). While earning academic credit, students "'serve to learn' and 'learn to serve'" (Ball & Schilling, 2006, p. 278). Whether undertaken over the course of a semester or in the shorter term, service learning in LIS may involve consulting, fieldwork, internships, community organization volunteerism, independent studies, seminars, theses, capstone projects, or some combination (Becker, 2000; Caspe & Lopez, 2018; Roy, 2001).

Service learning hinges on reciprocity and reflection. First, reciprocity entails engagement by and respect among students, instructors, and community members; all stakeholders profit from the experience (Ball, 2008; Yontz & McCook, 2003). Second, reflection encourages students to question the extant social order and even to effect progressive social change (Bishop et al., 2009). It should be structured (e.g., through class discussion, conversations with peers or instructors, and journal writing whether shared or private) and regularly undertaken. It should link the service experience to course-based learning objectives and allow for feedback and assessment from all stakeholders (Ball & Schilling, 2006; Chu, 2009; Hatcher et al., 2017; Kuh, 2008; Roy, 2009; Yontz & McCook, 2003).

Reflection encourages students to question the extant social order and even to effect progressive social change (Bishop et al., 2009). For example, one Master's student in a Literacy and Community Engagement course noted that her reflection fostered not only course-based learning but also learning related to overarching theoretical concepts such as equity of access, advocacy, and social justice (Bloomquist, 2015).

The historical trajectory of service learning

Service learning harks back conceptually and practically to the Morrill Act (1862) and to Jamesian and Deweyan pragmatism (Yontz & McCook, 2003). Notably, Dewey focused on experiential learning as well as education for a democratic citizenry (Becker, 2000; Cuban & Hayes, 2001; Kimmel et al., 2016). Scholars such as Paulo Freire (2000), Donald Schön (1995), and David Kolb (2014) augmented these foundational contributions (Ball, 2008). Schön, for example, promoted "knowing-in-action": "We should think about practice as a setting not only for the application of knowledge but for its generation," he contended (p. 29). In like mind, Kolb maintained that experiential learning stimulates lifelong learning by syncretizing personal development, education, and work.

Though the frequency of offerings waxed and waned, LIS programs historically complemented classroom instruction with experiential learning (Ball, 2008; Brannon, 2014; Coleman, 1989). Melvil Dewey proselytized for experiential learning as early as 1896; the University of Illinois took a similar tack as early as 1907 (Roy, 2001). Other service learning milestones included the High John Project at the University of Maryland (1969–1972), the Alternative Week and the Sight, Sound, Society course at the University of Buffalo (1971–1972), and Syracuse University's seminar on creating a public library (1970s) (Peterson, 2009).

Progenitors of the High John project, Bundy and Wasserman (1967) advocated passionately for experiential learning. "Practice in conventional libraries," they contended, "tends only to reinforce current conventions rather than to encourage new departures, the search for radical solutions to old problems, or the type of experimentation necessary if libraries are to advance" (p. 125). Bundy and Wasserman's encouragement notwithstanding, only after a quarter-century did investment in service learning *qua* civic and community engagement and development burgeon—in LIS and in higher education more broadly (Butin, 2007; Edwards, Robinson, & Unger, 2013; Eyler, 2002; Kolb, 2014; McCook, 2000a, 2000b, 2000c, 2001; McCook & Jones, 2002; National Task Force on Civic Learning and Democratic Engagement, 2012; Yontz & McCook, 2003). As the Carnegie Foundation for the Advancement of Teaching's Boyer (1994) remonstrated, most institutions' missions included service as well as research and teaching; fulfilling the former commitment seemed unprecedentedly urgent.

Experiential learning under various auspices subsequently made further if still modest inroads in disciplines such as education and social work as well as in LIS (Ball, 2008; Hatcher et al., 2017; Huggins, 2017; Roy, 2001; Saltmarsh & Zlotkowski, 2011). *Library Journal*'s editor in chief Berry (2005) even endorsed experiential learning as a "practice prerequisite."

Relatively few community-based concepts or methods permeated LIS by the late 2000s, however.[1] Some stakeholders expressed ambivalence: Was service learning worthwhile or anti-intellectual? After all, it seemed not to pursue knowledge solely for knowledge's sake (Peterson, 2009). What was more, scholars struggled to evaluate service-learning activities. Despite positive anecdotal evidence, there remained scant empirical evidence to support claims for service learning's efficacy (Becker, 2000; Eyler, 2002; Hatcher et al., 2017). Albertson and Whittaker (2011) and Caspe and Lopez (2018) lamented the lack of a standardized curricular or pedagogical framework to instantiate service learning in ALA-accredited programs.

Although Mehra and Robinson (2009) remained sanguine about experiential learning's potential "to create holistic, democratic, fair, equitable, and just information systems and services that are meaningful to all people" (p. 22), the salience and status of experiential learning persisted as a subject of debate in LIS and in higher education writ large (Bird, Chu, & Oguz, 2015; Huggins, 2017).

Benefits of service learning in LIS

Service learning represents a vehicle for higher education's civic renewal (Saltmarsh & Zlotkowski, 2011). Service learning, argued Overall (2010), should constitute a pillar of the LIS curriculum. Scholars advance claims both numerous and sweeping for service learning's benefits to students, faculty, LIS programs, and universities.

Students

For students, service learning amalgamates theory and practice, deepens understanding, develops key skills, encourages professionalization, aligns with adult learning patterns, and promotes diversity, equity, and inclusion (DEI).

First, optimal student learning occurs through an amalgamation of theory and practice (praxis), which service learning ideally embodies (Albertson & Whitaker, 2011; Ball, 2008; Ball & Schilling, 2006; Becker, 2000; Berry, 2005; Bundy & Wasserman, 1967; Caspe & Lopez, 2018; Coleman, 1989; Cooper, 2013; Eyler, 2002; Hughes-Hassell & Vance, 2016; Overall, 2010; Yontz & McCook, 2003). Students benefit not only from curricula and courses that help them grasp the traditions, values, theories, and research underpinning

LIS but also from the experiences and skills development opportunities that prepare them for practice (Becker, 2000). As Freire (2000) insists, "Education is . . . constantly remade in the praxis. In order to *be*, it must *become*" (p. 84).

Second, in foregrounding praxis, service learning encourages a deeper understanding of course content (Becker, 2000; Eyler, 2002; Hatcher et al., 2017; Hughes-Hassell & Vance, 2016; Mehra & Singh, 2016; Overall, 2010; Yontz & McCook, 2003). Just as this deeper understanding encourages more robust learning experiences, so too does serving authentic community needs and producing tangible deliverables shore up student investment (Ball & Schilling, 2006; Roy, 2009).

Third, service learning inculcates essential transferable skills. These include technical, leadership, critical thinking, problem solving, decision making, moral and ethical reasoning, negotiation, communication and collaboration, interpersonal (peers, instructors, community members), citizenship, and lifelong learning (Albertson & Whitaker, 2011; Albertson, Whitaker, & Perry, 2011; Ball & Schilling, 2006; Becker, 2000; Caspe & Lopez, 2018; Eyler, 2002; Gilliland, 2014; Huggins, 2017; Hughes-Hassell & Vance, 2016; Kimmel et al., 2016; O'Brien, Freund, Jantzi, & Sinanan, 2014; Overall, 2010).

Fourth, service learning socializes students into LIS professional practice, identity, and values (Ball, 2008; Cooper, 2013; Huggins, 2017; O'Brien et al., 2014). By dint of this process, students apprehend and appreciate the complexity and dynamism of the LIS profession and realize they are prepared to contribute, a phenomenon that Oberg and Samek (1999) called "humble empowerment." More pragmatically, students gain the opportunity to make contacts, to clarify their career goals, to network, and to enhance their marketability (for example, by including projects or deliverables on their vitas) (Ball & Schilling, 2006; Coleman, 1989).

Fifth, LIS programs welcome non-traditional students such as career-changers. Service learning aligns with adults' problem-centered and goal-directed learning patterns and preferences. Since adult students bring work and life experiences and responsibilities to the classroom, they may parlay course material into practical application (Ball & Schilling, 2006; Becker, 2000; Cooper, 2013; Yontz & McCook, 2003). By supporting multiple theories of learning, moreover, service learning offers more flexibility to diverse groups of students (Cooper, 2013).

Sixth and perhaps most important, service learning facilitates an understanding of and nurtures a commitment to diversity, equity, and inclusion (DEI), cultural competence, and social justice (Ball, 2008; Ball & Schilling, 2006; Becker, 2000; Caspe & Lopez, 2018; Cuban & Hayes, 2001; Eyler, 2002; Hatcher et al., 2017; Hughes-Hassell & Vance, 2016; Mehra & Singh, 2016). This is especially vital given the historical underrepresentation in LIS of marginalized groups (Poole, Agosto, Greenberg, Lin, & Yan, 2021). For example, in UCLA's Ethics, Diversity, and Change in the Information Professions course, students developed egalitarian relationships with community members anchored in reciprocity, reflection, dialogue, and understanding (Chu, 2009). Similarly, in the University of Arizona's Equity of Access for Diverse Populations course, service learning helped students understand both the reasons for Latinx people's limited access to information and technology (economic, linguistic, lack of experience) and their future needs (enough computers, sufficient time available on computers, Spanish-language resources) (Overall, 2010).

Faculty, LIS programs, and institutions

Notwithstanding its payoff for students, service learning benefits faculty, LIS programs, and institutions. First, service learning enhances teaching effectiveness, surfaces the common good as an explicit pedagogical value, and promotes communication, coordination, and collaboration with other disciplines, departments, and units such as the libraries (Albertson & Whitaker, 2011; Becker, 2000; Eyler, 2002; Hughes-Hassell & Vance, 2016; O'Brien et al., 2014; Yontz & McCook, 2003).

Second, service learning encourages LIS programs to engage the pressing needs of LIS practitioners and community partners and thus to (re)evaluate their curricula (Becker, 2000; Coleman, 1989; Huggins, 2017). Service learning may therefore bestow greater recognition and visibility on LIS programs, instructors, and students in their communities, in their parent institutions, and among practitioners (Becker, 2000; Coleman, 1989; Yontz & McCook, 2003).

In much the same way, finally, service learning enriches relationships between universities and local communities (Ball & Schilling, 2006; Becker, 2000; Eyler, 2002; Yontz & McCook, 2003). Students at the University of Alabama's SLIS, for example, partnered with a local nonprofit agency, Resources for Independence (RFI), to provide personal support and technology literacy training for people with intellectual disabilities (Albertson & Whitaker, 2011; Albertson et al., 2011).

Challenges of service learning

Though scholars eagerly adduce the benefits of service learning, they concede that it poses challenges for students, faculty, and institutions as well.

Students

Student challenges include mindset and expectations, logistics, sites, commitment and relationships, and stereotyping and bias. First, some students chafe at non-traditional coursework or at relying on team-based work for their grades; interpersonal tensions may also undercut projects (Ball & Schilling, 2006).

Second, logistical challenges may crop up. For instance despite the brevity and rigidity of the academic calendar (semester, quarter, etc.), students need time to acclimatize to the scoping, pace, workflow, and responsibility of service learning (Ball & Schilling, 2006; Mehra & Robinson, 2009). With respect to timing, moreover, programs may expect students to find their own mentors, arrange for their own placements, and settle on a problem space (Cooper, 2013). Further, the expected time commitment may prove onerous, even prohibitive, for some students (Chu, 2009).

Third, sites themselves offer challenges. These include not only the sites' geographic location given students' other time commitments, but also whether they suit students' interests and offer meaningful and challenging work (Bossaller, 2016; Chu, 2009). Additionally, tension between student goals and those of community members may arise. At the University of British Columbia, for example, students wrestled with a disjuncture between their training and the demands of their community partners (undergraduate students) (O'Brien et al., 2014).

Fourth, students may struggle to find amenable community partners or to develop projects and cultivate relationships with these partners (Ball & Schilling, 2006; Bossaller, 2016; Mehra & Robinson, 2009). Along these lines, they may find their community partner(s) unresponsive, inefficient, or preoccupied with other duties (Chu, 2009). For students, however, service learning must represent a genuine investment; community members may depend on the former not only to maintain that investment but also to share authority and credit (Roy, 2009). Sustaining projects and the relationships that support them numbers among service learning's most daunting challenges (Ball & Schilling, 2006).

Fifth, service learning may give rise to or reinforce pernicious stereotypes about diverse communities—and even engender condescension. Both sedulous planning and instructor-mediated reflection remain essential (Berry, 2005; Hughes-Hassell & Vance, 2016).

Faculty

Service learning demands much of faculty members (Ball & Schilling, 2006; Butin, 2007; Chu, 2009; Coleman, 1989; Roy, 2001). Faculty members, for example, grapple with an already crammed curriculum, on the one hand, and the need to create new programs or courses to accommodate service learning, on the other. Second, faculty who undertake service learning may be chary of abandoning a familiar, controlled classroom milieu. Third, faculty must connect funders, partners, sites, and students, and both facilitate and monitor community engagement activities. Fourth, faculty face budget constraints that may undercut key service-learning components such as site visits. Fifth, faculty must invest time and effort advocating for service learning. This risks alienating more traditionally minded colleagues, who may shy away from service learning as a distraction from research. Sixth, the challenge of formally assessing service learning and justifying investment in it persists.

Institutions

Despite their almost unanimous if nebulous commitment to service, institutions' missions rarely commit to working beyond the campus. As a result, they generally lack the requisite infrastructure to do so. What is more, most service learning depends upon soft money, usually from external sources, which hamstrings sustainability (Butin, 2007).

Institutional, faculty, and student challenges—all suggest that stakeholders can neither take service learning responsibilities lightly nor take service learning's benefits for granted.

The rise of community-based learning (CBL)

Flying in the face of service learning acolytes, scholars such as Bishop et al. (2009), Mehra and Robinson (2009), Rickards (2015), and Mehra and Singh (2016) challenged traditional models both of "service" and of "outreach." These models reputedly connoted a missionary mentality that considers communities deficient and in need of uplift, thereby truncating community members' agency. Similarly, in traditional service learning, objectives rarely develop from the community's lived experience; this potentially foregrounds student outcomes at community members' expense.

Because of these perceived shortcomings in the service learning model, some scholars advanced a more community-centric pedagogical approach. As a 2015 IMLS report enjoined, "We need to expand our notion of the communities we serve, making sure that universal, inclusive design principles result in services that meet the needs of those we may not see in our buildings on a regular basis: the underserved from all ages, ethnicities, socio-economic conditions, and locations, and those with varying abilities and disabilities" (Hill, Proffitt, & Streams, 2015, p. 13). Situating students in a community-centric experiential learning paradigm thus aligns with IMLS's emphasis on libraries as local, public service-oriented community catalysts and assets (Norton & Dowdall, 2017). Community building and civic engagement must form part of each library's organizational culture—and each librarian's weltanschauung (McCook, 2000a, 2000c).

Scholars in various fields—sociology (Jakubowski & Burman, 2004; Mooney & Edwards, 2001; Wickersham, Westerberg, Jones, & Cress, 2016), language learning (Jorge, López, & Raschio, 2008; Jouet-Pastre & Braga, 2005; Pellettieri, 2011), statistics (Schofield, 2012), participatory public art (Stephens, 2006), social work (Ishisaka, Farwell, Sohng, & Uehara, 2004), teacher education (Lowenstein, Martusewicz, & Voelker, 2010), and design and technology education (Shannon, 1992)—advocated for community-based learning (CBL). Like service learning, CBL fuses academic learning with democratic community engagement and civic responsibility, nurtures reciprocal partnerships among faculty, students, and community organizations, surfaces critical reflection, and yokes community engagement to course learning outcomes. Similarly, like service learning, CBL conveys benefits including, inter alia, praxis, enriched understanding and learning, skills development (management and leadership, teamwork and interpersonal, problem solving, critical thinking, technical, citizenship, and lifelong learning), and professional development and socialization (Bishop et al., 2009; Mehra & Robinson, 2009; Melaville, Berg, & Black, 2006; Rickards, 2015).

Despite its commonalities with service learning, however, community-based learning represents a fundamental epistemological and practical shift. Etymologically, service harks to slave, whereas community harks to joint ownership. The term "community-based learning" therefore represents a broader, more inclusive, and less historically freighted term than "service learning." CBL encourages a focus on local place and local space in terms of joint stewardship. It evokes Tönnies's (2001) notion of *Gemeinschaft*—organic community shored up by kinship and fellowship ties as well as shared customs and history.

CBL premises a commitment to working with instead of in service to the community. Pooling knowledge and resources, community members and the university co-create programs to tackle social problems (Lindy Center for Civic Engagement, 2018; Rickards, 2015). Not de facto experts who impose upon the community, students are fellow community members. CBL, in short, vouchsafes students dynamic, engaged learning experiences that address real-world problems and spur salutary social change.

Other scholars also centered community in reconceiving experiential learning. In a parallel line of inquiry to CBL, Bishop et al. (2009) stumped for an approach premised on community inquiry. Likewise both Chu (2009) and Mehra and Robinson (2009) favored the concept of community engagement, citing its rhetorical neutrality, its countering of negative perceptions about LIS professionals' societal roles, and its connoting a fruitful blend of learning, collaborative activity, power redistribution, and community building.

Complementing this scholarly focus on community-centric librarianship, the Institute of Museum and Library Services recently identified "community competencies" as foundational twenty-first century LIS professional priorities (Sands, Toro, DeVoe, Fuller, & Wolff-Eisenberg, 2018, p. 9). Understanding community engagement in the context of information services, developing user-centric skills in leadership and management, honing critical thinking and problem-solving skills, and sensitively fostering communication and collaboration in culturally diverse environments—all represent community competencies. Experiential learning in communities themselves, not only in a traditional classroom setting, enables the development of such competencies.

Whether under the umbrella of engagement or inquiry or competencies, CBL represents a promising new venue for collaborative experiential learning, democratic co-creation, and civic engagement. It retains the advantages of service learning even as it jettisons service learning's putative baggage. Drexel University's Department of Information Science harnesses these benefits in its community-based learning—and librarianship—work.

Community-based learning in practice: Community-based librarianship

The institutional context

Supported by a three-year IMLS Laura Bush Twenty-First Century Librarian Program award, in 2019 Drexel University's Department of Information Science launched "Integrating Community-Based Librarianship into LIS Education," a three-course, twelve-credit post-Bachelor's certificate (PBC). The initiative develops students' competencies to design, implement, manage, and sustain community-based digital service projects. In so doing, it enriches the program's capability to educate the next generation of LIS leaders.

The project takes root in Drexel's mission. Anthony J. Drexel founded the institution in 1891 to be "a university with a difference," particularly in its community outreach (Papadakis, 2001). This vision animated the 1892 founding of the Library Science program which the Department of Information Science continues. In line with the recommendations of the National Task Force on Civic Learning and Democratic Engagement (2012), Drexel seeks to engage civically more than any other United States university, not only in faculty, employee, and student voluntarism but also in neighborhood investment (Fry, 2010).

Project partners

In just this time-honored spirit of civic engagement, "Integrating Community-Based Librarianship into LIS Education" brings together university and local nonprofits. We forged relationships with these partners based on IMLS's stipulation that successful partnerships "require understanding the landscape of available partners, getting to know them, choosing wisely, and being deliberate in how we will engage together" (Hill, Streams, et al., 2015, p. 9). They include the Lindy Center for Civic Engagement, the Dornsife Center for Neighborhood Partnerships, and the Free Library of Philadelphia.

First, the Lindy Center fosters a culture of experiential learning through civic engagement and civic responsibility more broadly. It provides programs and resources for Drexel students, staff, and faculty to expand their civic identities and foreground social justice through mutually beneficial community partnerships. Second, like the Lindy Center committed to economic and social justice, and like the Lindy Center a locus for student, faculty, and staff engagement, the Dornsife Center for Neighborhood Partnerships combines Drexel's knowledge resources with the expertise of community partners to empower and educate. It supports the health, wellness, and stability of the community through educational and recreational services.

Third, the Free Library of Philadelphia (FLP) both embraces and implements community-centered librarianship. The library's mission concentrates on advancing literacy, guiding learning, and inspiring intellectual curiosity (Free Library of Philadelphia, 2018, 2020). Its 54 branches provide welcoming and inclusive safe spaces for community engagement. In fiscal year 2019, for example, the Free Library enjoyed nearly five million in-person visits and 6,361,657 website visits from its more than 814,077 cardholders. Community members borrowed 5,266,383 items and its staff members fielded 3.52 million reference questions. It is a wellspring for PBC Fellows recruitment.

The Fellows

"Integrating Community-Based Librarianship into LIS Education" supports 12 Fellows (six in 2020–2021 and six in 2021–2022) committed to impactful community engagement and learning. Foregrounding diversity, equity, and inclusion and helping to redress the longstanding whiteness of LIS, the project features robust representation from underrepresented groups. The first cohort includes four paraprofessionals working in the Free Library of Philadelphia system, one paraprofessional from another local public library system, and one local child educator. The cohort included three self-identified African Americans, one African American and Native American, one Central/South American, Caribbean/West Indian, and Puerto Rican, and one white.

To ensure equitable opportunity, Fellows receive full tuition support for the certificate. Further, the certificate credits are transferable to Drexel's ALA-accredited Master of Science in Information. This offers Fellows a path further to hone their skills and advance their careers.

The curriculum

The Fellows' PBC work turns on one design thinking course, one data science course, and a capstone.[2] Each aligns with IMLS's priority of embedding future librarians in community organizations (Hill, Proffitt, et al., 2015). In their activities and assessments, moreover, these courses capitalize on the lessons learned of other LIS programs in their service learning and community-centric initiatives, even as they embrace new approaches to course configuration (side-by-side and community hybrid), course content (design thinking and data science), and potential partners (local businesses and non-profits as well as the Lindy Center, the Dornsife Center, and the Free Library).

First, in side-by-side courses, students and community members share perspectives, knowledge, and experiences in the classroom (Lindy Center for Civic Engagement, 2018, n.d.). This model premises respectful dialogue, collaboration, and experiential learning; it facilitates the co-creation of strategies to address social problems involving access, equality, equity, diversity, and social justice. The side-by-side approach dovetails with design thinking, which encourages creative, innovative, adaptable, transferable, flexible, collaborative, empathetic, transparent, and strategic problem solving (Bell, 2008; Clarke, 2018, 2020).

Design Thinking for Digital Community Service is a side-by-side three-credit-hour course. Pairing PBC students with Philadelphia-area library or information organization workers, the course both provides an in-depth, problem-based introduction to community information needs assessment and analysis and introduces foundational principles and practices of design thinking in the context of information services. Each individual or group identifies a digital information-based problem or service need and ultimately co-develops a plan for creating a digital information service to address it. Students split their time between hybrid on-campus/online classroom instruction and onsite work where the community-based digital information programs are developed.

Second, community hybrid courses also span classroom and community; they mandate a structured extracurricular investment that substitutes for course credit hours (Lindy Center for Civic Engagement, 2018). Like design thinking, data science is ever more relevant to LIS and folds into the community hybrid model (Greenberg et al., 2017; Marchionini, 2016; Ortiz-Repiso, Greenberg, & Calzada-Prado, 2018; Poole, 2021a). Resting upon computational thinking, the data science approach encourages students to understand the roles of big data and big data technology, the data lifecycle, and the use of various tools to solve problems (Song & Zhu, 2016, 2017).

Data Analytics for Community-Based Data and Service is a three-credit-hour community hybrid course. Rooted in the data lifecycle model, it centers on groups of students partnering with local nonprofits to assess the latter's data needs, to design methods to address these needs, and to develop sustainable data infrastructure. Through scholarly readings, in-class discussions, and community partner site visits, students explore urban civic engagement, democratic participation, and community change. They learn municipal data analytics, decision making, and information use, representation, and visualization.

Rounding out the certificate, a capstone (120 hours over 10 weeks) comprises a faculty-supervised, problem-based CBL project that advances professional practice. Such community projects prepare students for engaged citizenship (McCook, 2000c). In line with McGuinness and Shankar (2019), the capstone centers on reflective practice. As a culminating experience, the capstone enables the further refinement and application of data science, design thinking, and CBL skills and the further nurturing of community relationships developed in the two previous courses.

Students tailor their work to their own learning and professional goals. In service of workplace preparation, they integrate community-based learning with domain knowledge, written and oral communication, organization, problem solving, and research synthesis skills. Their capstone work also promotes professional awareness, socialization, and networking—in short, professional self-efficacy (McGuinness & Shankar, 2019).

"Integrating Community-Based Librarianship into LIS Education" breaks new ground in LIS education. It is influenced by but goes beyond previous efforts in service and community-oriented experiential learning alike. It will produce a skilled cohort of community-centered librarians as well as a transferable pedagogical model. Hence our work will enable other LIS programs nationally to augment and, ideally, to implement community engagement and experiential learning.

Conclusion

Upon launching the High John project, Bundy and Wasserman (1967) hoped to recruit and train aspiring librarians dedicated to confronting longstanding, fundamental social problems. "These individuals are too few in our present ranks," they lamented (p. 131). More than a half century later, their *cri de coeur* resonates still.

Future research might address five questions. First, while faculty and students have reflected upon the merits of both approaches, securing more community-member input and feedback remains crucial. How might such feedback be solicited and then integrated into program development and refinement? Second, how might assessment measures be constructed, formalized, and perhaps even standardized, and by whom? Extant literature suggests that the success of service learning and community-based learning is highly contextual, if not downright anecdotal; what arguments for the generalizability of models may be advanced? What metrics are needed to persuade key stakeholders such as administrators? Third, what further similarities and differences may be identified between service learning and community-based learning? Fourth, how might community-based learning reinforce and extend community informatics work (Williams & Durrance, 2017)? Fifth, CBL, like service learning, may prove more difficult to implement in online learning programs, not least because of the challenge of developing community across time and distance (Bossaller, 2016). Even in distance service learning, however, Bossaller (2016) found that her students felt more connected to their communities because of their work; they evinced "empathetic maturation" (p. 49). Nonetheless, given the seismic changes wrought by COVID-19, how might CBL need reconfiguration, even if participants reside in the same geographic area?

Appraising the shift in LIS work from collection-centric to user-centric, a 2018 IMLS report emphasized the need for students to develop community competencies such as cultural awareness and sensitivity (Sands et al., 2018). The necessary skillset, the report reasoned, could be developed only through community competencies, that is, through hands-on, experiential learning. The "Community-Based Librarianship" project both hews to and propagates this vision. Its work, in sum, strives to achieve Roy's (2001) ideal of "librarianship as citizenship" (p. 214).

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Notes

1. This was the case in higher education more broadly. Although many faculty members favored community engagement, few seemed willing or able to build robust programs (Butin, 2007).
2. To promote intellectual and social cross-pollination, both courses are offered as electives for current MSI students.

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