

Exploring the Potential for Social Reading in Public Library Mobile Apps: Co-design with University Students

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ABSTRACT

Although reading has increasingly become a social practice through which people express their tastes and identities, most public library applications remain focused on search, borrowing, and curation functions. This study explored how social reading experiences could be implemented in public library applications through co-design workshops with 18 undergraduate and graduate students in South Korea. Participants preferred recommendations from others and the sharing of reflections during the book-selection and post-reading stages, whereas they prioritized individual immersion while reading and organizing their thoughts. They also favored low-intensity forms of connection, such as reading records, reviews, recommendations, and selective sharing, but perceived features that actively encouraged relationship building, including taste-based matching and book clubs, as burdensome. Based on these findings, this study proposes a preliminary design direction for public library applications that incorporates social reading functions for consulting reviews and recommendations, recording thoughts during reading, organizing reflections, and sharing them selectively. This design direction may support the planning and development of social reading features in public library applications and provide a basis for future research on how public digital library services can accommodate different levels of social connection across the reading journey.

Keywords: Social Reading, Public Library, Mobile Application, Co-design, Reading Journey

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1. Introduction

Reading today serves as a form of intellectual reflection and a cultural practice through which individuals express their tastes and identities (Lee, 2025). The recent rise of “Text Hip” reflects this development. Within this phenomenon, reading is treated as an aesthetic and social form of self-expression, while books and reading experiences are recorded and shared through social media and other digital platforms (Lee, 2025). Reading also takes shape as a social activity centered on sharing personal experiences and interacting with others (Zhang et al., 2021).

Social reading now takes place in digital as well as offline settings (Zhang et al., 2021). Younger adult users share their reading experiences on social media to express their reading tastes and connect with others through books, contributing to online reading cultures such as BookTube, Bookstagram, and BookTok (Reddan, 2022). Platforms such as Goodreads also organize interaction around reading experiences through book recommendations, comments, and reviews (Kuijpers, 2022).

The growing role of digital platforms in social reading presents a new challenge for public library digital services. Public libraries are community-based cultural institutions open to people across age groups and social backgrounds. Their role has expanded to include communication and exchange within local communities as well as traditional information services (Kim & Noh, 2023). Yet many library mobile applications offer only limited support for interaction among users and the sharing of reading experiences. This creates a mismatch between the broader public role of libraries and the interactional practices found in contemporary reading culture. Service design needs to support social interaction alongside access to library materials and information (Ding & Hong, 2024).

Existing studies of digital library applications have mainly identified the need for social interaction features and proposed related design directions (Ding & Hong, 2024). Less attention has been paid to when users seek social connection during the reading process, how much connection they prefer, and how such preferences may be accommodated in digital platforms and public library mobile applications. This study shifts the focus to the timing and degree of social connection across different stages of the reading journey. Through exploratory co-design workshops with undergraduate and graduate student participants in South Korea, the study examines social reading experiences and service requirements in the public library context and derives preliminary, empirically informed design directions for social reading services in public library mobile applications. The following research questions guide the study:

- RQ1. How do users perceive social connection across the reading journey?
- RQ2. How do users evaluate the social reading features of digital reading platforms?
- RQ3. What social reading experiences should public library mobile applications provide?

2. Related Work

Social reading is shaped by the reading process, the design of digital platforms, and the institutional role of libraries. Co-design provides a way to examine these concerns through users' experiences and translate them into library service design.

2.1 Social Reading and the Reading Journey

A broad definition of social reading includes direct interaction with others and the use of socially generated information during the reading process (Zhang et al., 2021). Zhang et al. described the "social reading journey" through four activities: Inspiration and Motivation, Reading, Understanding and Enrich, and Social Interaction. Inspiration and Motivation concerns influences that prompt or encourage reading; Reading refers to engagement with the primary reading material; Understanding and Enrich involves consulting supplementary, often human-generated information without necessarily interacting directly with others; and Social Interaction refers to direct person-to-person communication around reading. The model therefore distinguishes indirect social connection through others' content from direct interaction and allows movement among these activities throughout the reading journey (Zhang et al., 2021).

Educational discussions present a related understanding of social reading. Through a qualitative study with Korean language teachers, Kim (2024) found that teachers understood social reading as communication with others through texts - a practice they connected to personal growth, to discourse that carries into everyday life, and to the formation of a shared reading culture. In both accounts, meaning develops through contact with other people or with information created by them, rather than through an entirely private reading experience.

Studies of reading communities illustrate both the benefits that social reading can generate and the conditions under which those benefits diminish. Grenier et al. (2022) discussed voluntary book clubs within organizations as sites of non-formal learning, where text-based dialogue may foster trust, relationships, collaborative learning, and shared meaning; these benefits depend heavily

on voluntary participation and member autonomy, and organizational control or commercialization may reduce them. A similar tension appears in Oh et al.'s (2021) study of Trevari, a paid membership book club promoted as a horizontal, taste-based community for younger adults: although members could express their tastes and identities through participation, high costs and internal processes of inclusion and exclusion could turn the community into a site of social distinction. Kim and Lee (2023) further showed, through a qualitative study of an intergenerational book club, that reading-based exchanges between young and old participants were mutually beneficial, extending the social value of reading across generations. Across these studies, reading with others may support relationships and broaden interpretation, but its value depends on autonomy, cost, and group dynamics.

In Korea, social reading has also become a concern of library policy. Noh and Kwak (2022) analyzed library policy performance under the Third Comprehensive Library Development Plan and identified communication- and discussion-oriented social reading programs as an area requiring new modes of delivery. At the local level, Sim and Cho (2024) proposed strategic reading policies for a city in Gyeonggi-do, including a citizen-participatory library cultural platform and the creation of a community reading ecosystem. These studies suggest that supporting shared reading experiences is now treated as a public task of libraries rather than only an individual cultural practice.

Taken together, previous research establishes that social connection can enter reading in different forms and at different points, while also showing that its value depends on conditions of participation (Zhang et al., 2021; Grenier et al., 2022; Oh et al., 2021). However, it remains less clear when readers themselves want such connection and how much involvement with others they consider appropriate across the reading process.

2.2 Social Reading on Digital Platforms

Digital platforms give social reading a wide range of forms. Rebora et al. (2021) defined Digital Social Reading (DSR) as a shared reading experience involving digital technologies and media, whether the activity occurs online or offline. The concept includes book reviews, comments attached to passages, fan fiction, informal discussions, and book vlogs. The location and form of interaction depend on platform design. Wattpad allows readers to comment on particular parts of a text, while Goodreads places reviews and ratings in a separate area.

Image- and video-based platforms organize reading culture in different ways. Reddan (2022)

described BookTok as centered on emotional responses, Bookstagram on visual curation, and BookTube on relatively long-form reviews and discussion. In Korea, the rise of “Text Hip” reflects a related cultural pattern. Lee (2025) described Text Hip as a phenomenon in which books and written texts become aesthetic content, while reading serves as a form of social expression and a marker of identity. “SNS” and “social media” appeared prominently in an analysis of keywords from news coverage of Text Hip, indicating the close relationship between this culture and digital sharing practices.

Research on information-centered reading communities further shows that digital reading platforms can support more sustained forms of social connection. Worrall (2019) found that LibraryThing and Goodreads supported information sharing, shared information values, community structure, and the formation and maintenance of social ties. At the same time, the study emphasized a socio-technical balance in which social and technical features are adapted to different users and contexts rather than uniformly imposed.

Visibility on digital platforms can change what readers share and why they share it. Joo (2025) argued that displaying reading on social media as a form of social currency may reduce it to image-centered consumption. Commercial review systems raise another concern because accumulated reviews cannot always be understood as spontaneous opinions from ordinary readers. Hu et al. (2025) found that incentives provided by publishers and marketing agencies influenced Goodreads reviews, with incentivized reviews concentrated among particular users, books, and publishers. Digital platforms can therefore widen access to other readers’ experiences while introducing pressures related to visibility, promotion, and commercial influence.

Digital platforms can therefore widen access to other readers’ experiences and support social ties while also introducing pressures related to visibility, promotion, commercial influence, and continued participation (Worrall, 2019; Reddan, 2022; Joo, 2025; Hu et al., 2025). These studies indicate that platform design shapes not only whether social connection occurs but also the form and demands of that connection. Social features developed within commercial platforms may therefore create different expectations or burdens when considered in a public-service context.

2.3 Studies of Library Mobile Applications

Early work on library mobile services centered on access to information and service convenience. Jung (2011) reviewed theoretical discussions of smartphone-based university library services and

representative cases from Korea and abroad. The proposed service directions covered catalog search, loan management, library information, education, and marketing.

The same service orientation appears in research on school and university library applications. Park and Lee (2021) analyzed school library mobile web services and surveyed students' and teachers' experiences. Their proposed mobile app structure included integrated and advanced search, reading education materials, post-reading activities, library information, e-books, and reservations. Liu et al. (2025) classified user requirements for university library apps by feature and emphasized the stable performance of core services such as catalog search, a clear interface, and ease of use. Their findings further suggested that development priorities should reflect the effect of each feature on user satisfaction.

A more recent line of work has brought social interaction into the design of library applications. Ding and Hong (2024) organized social interaction in digital library mobile applications into three levels—individual-book, community, and communication—and proposed strategies for feature structures and interfaces. Their framework moves library app research from access and usability toward the sharing of reading experiences and interaction among users. Because it was developed through case comparison and theoretical analysis, its main contribution lies in classifying design strategies rather than documenting how a particular user group responds to those features.

Taken together, library app research has established both core requirements for access and usability and possible structures for social interaction (Jung, 2011; Park & Lee, 2021; Liu et al., 2025; Ding & Hong, 2024). Less is known, however, about how users evaluate social features alongside access to library materials and services, or how much interaction, exposure, and participation they consider appropriate for a public library app.

2.4 Co-design in Libraries

Co-design places intended users inside the design process. Sanders and Stappers (2008) defined it as collective creativity shared by professional designers and people without formal design training. Users contribute knowledge drawn from their own experiences, generate ideas, and take part in developing concepts, while researchers and designers help structure and facilitate the process.

In public libraries, this approach changes how user knowledge enters planning and decision-making. Drawing on Helsinki City Library, Yip et al. (2020) described a move from customer-oriented

planning toward the direct participation of citizens in library development. Co-design was presented as a strategy for incorporating citizens' knowledge, experiences, and ideas into policy and decision-making through knowledge sharing and collaborative problem solving. The approach rests on the assumption that every user can make a creative contribution.

A children's library makerspace provides a more specific example of this process. Lee et al. (2024) conducted co-design sessions with children who used 3D printers in the makerspace. The children identified limitations in the space and its services and proposed their own ideas for improvement. Researchers adjusted the amount and form of support according to the children's characteristics and ways of participating. The study stressed the importance of operational strategies that preserve user autonomy and creativity. Across these cases, service ideas emerge from users' knowledge of their own activities, while researchers support the process without determining its outcome in advance.

Co-design therefore provides an appropriate exploratory approach to the questions left open by the preceding research: when users seek social connection during reading, which forms of digital interaction they accept or resist, and how social reading features can be combined with access to library resources and services in a public library app (Sanders & Stappers, 2008; Yip et al., 2020; Lee et al., 2024).

3. Method

3.1 Co-design Workshop

Co-design workshops were conducted with undergraduate and graduate student participants to investigate how social reading experiences could be incorporated into public library mobile applications. The study adopted an exploratory co-design approach. Co-design is a participatory design approach in which intended users work with researchers and designers to interpret problems and develop relevant features and design directions. Following the view that users contribute experiential knowledge and take part in generating ideas, the workshop gave participants an active role in shaping possible service concepts (Sanders & Stappers, 2008).

Two considerations informed the use of co-design. First, preferences concerning social reading may differ among users and become clearer through direct discussion. Group conversations made it possible to capture differences between individuals and moments when participants reconsidered

or developed their views in response to others. Second, introducing social reading features into a public library app required identifying features that users considered useful as well as those they regarded as unnecessary or inappropriate. By trying existing apps, discussing their experiences, and developing feature ideas, participants could make these judgments from their own reading practices rather than relying on assumptions made by researchers.

The workshop moved from personal reading experiences to app evaluation and feature development. It addressed three areas: (1) how much connection participants wanted with others at different points in the reading process and what form that connection should take; (2) how they responded to social reading features in the Seoul Metropolitan Library app and Millic; and (3) which features and service structures could support social reading in a public library mobile application.

3.2 Participants and Recruitment

A total of 18 students (17 undergraduates and one graduate student; hereafter P1-P18) at a women's university in Seoul took part in the study: 16 majored in Library and Information Science (LIS), and two majored in Elementary Education and History. Undergraduate and graduate students were recruited to explore the perspectives of younger adult users. Public library use was not an eligibility criterion, allowing both current and potential public library users to participate. Recruitment notices distributed through departmental and university community channels invited students interested in reading, book clubs, or public libraries, and applicants were assigned to seven groups of up to three people based on their availability. Participation was voluntary and unrelated to grades, course credit, or other academic evaluation.

All workshops were conducted in person and lasted an average of 75 minutes. One researcher facilitated each session, supporting the discussion and written activities without directing the substance of the conversation.

3.3 Design Sessions and Data Collection

The workshop unfolded in three consecutive sessions—Reading Journey Map, Application Evaluation, and Feature Ideation—moving from everyday reading experiences to app evaluation and feature development. Table 1 summarizes the purpose, activities, and data collected in each session.

〈Table 1〉 Design Sessions and Data Collection

Session	Purpose	Main Activities	Data Collected
1. Reading Journey Map	Explore preferred levels and forms of social connection across four reading stages (Choosing Books, During Reading, Exploring Ideas, After Reading)	For each stage, participants recorded their usual activities on an individual worksheet (1 min), marked “ME” (alone) or “WITH” (with others) with reasons, and discussed responses in groups (3 min)	Individual worksheets: group discussion records entered into an online form by a designated recorder
2. Application Evaluation	Examine responses to social reading features in a public library app and a commercial reading platform	Task-based use of both apps: interface exploration, book search and book information, cultural programs, and communication features (Seoul Metropolitan Library app ¹⁾): book search, user reviews, highlight sharing, and the Millie Feed (Millie ²⁾)	Individual online survey on reading records and sharing, communication and community features, useful and inconvenient aspects, and comparisons between the two apps
3. Feature Ideation	Develop features and service structures for social reading in a public library app	Participants selected the three most important features from a candidate list, marked unnecessary features, developed one feature into a screen sketch with a written description, and proposed additional ideas	Feature selections, sketches, and written feature descriptions

Session 1 was conducted without reference to any particular digital service so that participants could describe their preferences from everyday reading practices before considering app features. Participants completed the Reading Journey Map shown in Figure 1 during Session 1. Its stages and activity content were developed by the researchers, while generative AI was used only to produce the visual form of the worksheet. The Reading Journey Map was developed using Zhang et al.’s (2021) four activities as a conceptual scaffold. To make the activity easier for participants to follow and to focus attention on social connection, the activities were reorganized into four temporal stages—Choosing Books, During Reading, Exploring Ideas, and After Reading—and presented as a ME/WITH worksheet asking whether participants preferred to engage alone or with others at each stage and why. The map was therefore an adapted workshop tool rather than a direct application of Zhang et al.’s framework. Session 2 compared the Seoul Metropolitan

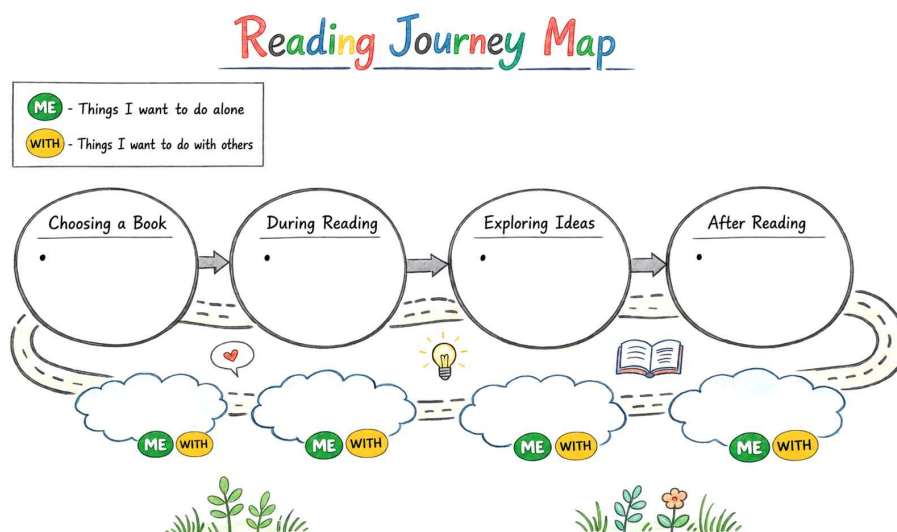
1) Seoul Metropolitan Government (2012). Seoul Metropolitan Library app. App Store.

Available: <https://apps.apple.com/kr/app/서울도서관공식앱/id777428688>

2) kt millie seojae Co., Ltd (2017). Millie. App Store.

Available: <https://apps.apple.com/vn/app/밀리의서재/id1213788923>

Library app, a representative public library application centered on search, loans, and library information, with Millie, which was selected because it is a widely used commercial e-book subscription platform in Korea and offers a broad range of social reading features—reading records, highlights, reviews, and a user feed—making it a suitable reference point for identifying features that might be adapted, rather than transferred directly, to a public library context. Before the workshop, 4 participants had prior experience with the Seoul Metropolitan Library app and 12 with Millie. In Session 3, the candidate feature list included personalized recommendations and curation, reading records, reading progress tracking, other users' reviews and reflections, sharing with friends or other users, book clubs, library integration, advanced search, feed-style browsing, taste-based user matching, and notifications. Participants selected feature priorities and produced individual sketches.



〈Figure 1〉 Reading Journey Map

3.4 Data Analysis

The open-ended responses were analyzed using inductive qualitative content analysis (Krippendorff, 2004). Paper worksheets were transcribed into digital text and combined with responses collected through the online forms. The survey questions were used to organize the dataset, but analytical categories were developed from the responses. Within each question, similar experiences, evaluations, or reasons were grouped and assigned descriptive category labels, which were then

compared and synthesized into higher-order interpretations. For example, responses concerning highlighted passages saved or shared as images were grouped as “visualizing reading experiences through highlights and image sharing” and contributed to the broader interpretation of reading experiences becoming visible and shareable.

The three researchers compared the groupings, category labels, and interpretations and resolved differences through discussion. Low-frequency responses were retained when they qualified dominant patterns or revealed conditional exceptions. When consensus was not reached, the last author reviewed the original responses and made the final decision based on relevance to the research questions and explanatory value rather than frequency alone.

Analysis was conducted by session: ME/WITH reasons were compared across reading stages, evaluations of the two apps were grouped by recurring views, and Feature Ideation materials were examined by feature selection and similarities in the proposed purpose and use.

Simple descriptive statistics supplemented the qualitative interpretation: ME and WITH selections were counted for each stage of the Reading Journey Map, and Feature Ideation responses were counted by how often each feature was marked as important or unnecessary. These counts were treated only as descriptive tendencies within the participant group, while the main interpretation centered on written responses and workshop materials. Although each session was reviewed separately, earlier findings informed the interpretation of later material, connecting perceptions of social connection across the reading journey (RQ1), evaluations of social reading features on digital platforms (RQ2), and feature proposals for a public library app (RQ3).

After the analysis, the researchers synthesized recurring requirements from participants’ feature selections, written responses, and individual sketches into the illustrative wireframes presented in the Discussion. The final screen structure and visual arrangement were determined by the researchers.

4. Findings

4.1 Perceptions of Social Connection Across the Reading Journey

In the Reading Journey Map, participants discussed whether they preferred to engage alone or with others at each of the four stages and explained their choices. They were relatively open to other people’s recommendations, reflections, and interpretations during Choosing Books and

After Reading, whereas personal immersion and freedom of interpretation carried greater importance in During Reading and Exploring Ideas. The counts in Table 2 are used as descriptive indicators of tendencies within this participant group.

〈Table 2〉 Preferences for Reading Alone or With Others Across the Reading Journey

No.	Stage	ME	WITH
1	Choosing Books	6	12
2	During Reading	16	2
3	Exploring Ideas	15	3
4	After Reading	1	17

At the Choosing Books stage, recommendations from others served as useful references. Choosing alone could keep participants within familiar genres or authors, while choosing with others introduced a wider range of books (P12); for P2, recommendations from acquaintances made finding a satisfying book easier amid the large number available. Recommendations could nevertheless create obligation. P18 worried, “If I choose a book with someone else, I might feel pressured to actually read it.” Participants welcomed recommendations that widened their options but wanted the final decision to remain their own.

Most participants preferred to read alone at the During Reading stage, associating interaction with distraction, interruption, and unwanted influence on first impressions. They wanted to protect the interpretations formed during their first encounter with a text. P4 put it this way: “seeing a sentence completely on your own for the first time is different from reading it with notes that someone has already left. Those comments affect how I understand the writing, so I feel like they can create preconceptions.” P17 noted a different pressure: becoming conscious of how quickly others were reading. A few participants, however, described better concentration when reading alongside a friend; P10 attributed this to the shared atmosphere rather than conversation (P10).

At the Exploring Ideas stage, participants tended to establish their own thoughts before sharing them. Pressure arose when they had to share ideas that were not yet organized or reveal parts they had not understood, which P18 linked to feeling embarrassed when others knew more. Still, other perspectives were welcomed when they broadened thinking: “I liked sharing ideas before my own thoughts were fully settled—while they were still flexible—because it helped me expand them” (P13). P13’s response differed from the more common preference

to organize thoughts before sharing; for this participant, exchange was useful while ideas were still forming.

The desire to connect with others became clearest at the After Reading stage. Once participants had formed their own reflections, they wanted to compare interpretations and reconsider their understanding (P16; P7). Sharing took the form of recommendations, social media posts, and blog entries: P2 described talking about books with friends, searching for reviews when no friends had read the same book, and sharing favorite passages on social media. Opinions that felt intrusive while reading became useful references once the book was finished. Only one participant preferred to engage alone at this stage. P11 explained that, having already engaged with others in the preceding Exploring Ideas stage, they wanted to use After Reading to organize their thoughts independently.

Across this participant group, responses were more open to connection during Choosing Books and After Reading, while immersion and autonomy took priority during During Reading and Exploring Ideas.

4.2 Participants' Evaluation of Social Reading Features on Digital Reading Platforms

During Application Evaluation, participants used the Seoul Metropolitan Library app and Millie and considered how each supported reading experiences and social reading; all participant responses in this section are from Session 2.

For the Seoul Metropolitan Library app, practical access to library materials was its main strength. Participants responded positively to the way search results led to library holdings. At the same time, P3 and P13 found the lack of reading record, sharing, and communication features disappointing. Its connection to social reading came mainly through public information on library events, notices, policies, and reading-related cultural programs. These services usually ended with viewing information or applying for a program; they did not develop into interaction where users exchanged reflections or maintained contact inside the app.

Millie gave participants more ways to engage with activities surrounding reading. P1 contrasted it with the Seoul Metropolitan Library app by pointing to its larger user base and stronger community and personalized recommendation features. Reading records were useful because they preserved continuity between reading and later reflection: P6 described how taking notes or copying passages from a print book required a pen or notebook, which broke concentration, whereas in a reading

app a thought could be recorded immediately on the reading screen and used later when organizing reflections. Feeds and posts made other readers' responses visible and encouraged further reading; P11 felt that the feed created interest, encouraged more reading, and supported social reading through the exchange of thoughts. Participants' positive evaluations centered largely on these visible traces of reading—reviews, highlights, posts, and recommendations gave a view of how others had read a book without requiring direct conversation.

A larger set of features could create pressure as well as interest. Participants felt that feeds, AI Discovery, curation, and additional content might make a public library app complex and tiring if transferred directly from a commercial platform. Essential services could become harder to find. P13 warned, "If a public library app had an interface as complex and flashy as Millie, some users might have trouble finding the basic features they actually need. I do not think those features should be included in a public library app." Commercialization raised further concerns: participants felt that a public library app should not depend on subscriptions or give books greater visibility according to sales (P15).

Within this participant group, responses to social reading features in a public library app were generally positive, but discomfort grew when those features demanded close relationships or continued interaction. Comments on reading records and reviews showed a wish to control both distance and exposure. P15 expected to consult book reviews to some extent when choosing a library book. P13 drew a clearer line: "I do not need features for uploading posts or sharing reviews with other people like Millie, but I would like a simple feature for privately recording the books I have read and leaving short reflections." Consulting reviews and leaving brief reflections were viewed positively, while reactions became more cautious as public exposure and interaction increased. The same concern reappeared in Feature Ideation.

4.3 Structuring Social Reading Experiences for a Public Library App

The feature-prioritization and sketching activities explored how needs identified during Application Evaluation could take shape in a public library app; all participant data in this section are from Session 3. The frequencies reported below are descriptive indicators within this participant group.

Unnecessary selections were concentrated in features involving more direct or continuing participation. Taste-based user matching received the most unnecessary selections (7 of 18), followed by book club features, notifications, and advanced search (6 each) and social media-style feed

browsing (5). Yet no participant marked reading records, book recommendations, or sharing reading experiences as unnecessary. Participants distinguished these features by the involvement they required: consulting and exchanging reading experiences through reviews, reflections, and shared records required no continued commitment, whereas direct contact with unfamiliar users, regular meetings, and repeated responses to notifications did.

Priority selections showed a complementary pattern. Reading records ranked highest (12 of 18), and participants' sketches often linked private records to optional sharing. Notes, highlights, and reflections could first remain personal and later be shared by deliberate choice: P12 proposed turning memorable sentences into shareable images, and P15 imagined a reading file that friends could view together. These proposals framed sharing as making selected records available within a chosen scope rather than publishing every reflection openly.

Reviews, reflections, and recommendations (6 selections each) were discussed mainly in relation to Choosing Books. They gave readers an early sense of a book's atmosphere and eased the choice of what to read next; participants described them primarily as aids to book choice rather than as ways to initiate conversation with unfamiliar users. Participants wanted recommendations grounded in their own reading histories and tastes rather than popularity alone, and the sketches placed this material on book pages and feed-style screens that users browsed at will. Together with the fact that five participants marked feed browsing as unnecessary, these responses distinguish voluntary browsing of others' records from their objection was to social media-style feeds that demand posting and continuous engagement

Participants also expected these social elements to sit inside ordinary library use rather than beside it. Reading progress tracking (8) and public library integration (7) reflected a wish for choosing, borrowing, reading, and recording to continue within one app: a book discovered through a review or recommendation should lead directly to holdings, loan status, and e-book access — basic search tied to access, rather than more elaborate search options. P15 imagined records attached to borrowed books accumulating into an archive and a community, making the app a space where library use and the exchange of reading experiences reinforced each other.

Even where sketches included direct contact between users, it was tightly bounded. P17 placed a matching button on a book page offering one-to-one or group chat only after users had exchanged reflections, and specified anonymity, no offline meetings, and interaction centered on After Reading. Across these proposals, social features were more often configured around selective access to others' reading records and user-controlled sharing than around sustained interaction.

5. Discussion

Supporting social reading in a public library app requires attention to when and how users want to connect with others, and how features drawn from commercial platforms can be adapted to a public library context.

5.1 Adjusting Social Connection Across the Reading Journey

Social connection played different roles across the reading journey: participants welcomed other people's tastes and interpretations when choosing books and after reading, while immersion and control over their own interpretations took priority during reading and early exploration of ideas.

The social reading journey proposed by Zhang et al. (2021) similarly places social information and interaction at several points in the reading process. Rather than testing or validating this framework, the present study considers how the timing and intensity of social connection vary across the reading journey. Social reading can therefore be understood as an interaction pattern that changes over the course of reading, not as a fixed group activity or a single act of conversation.

This has direct implications for how Kim's (2024) account of social reading as communication through texts might be realized in a public library app: such communication need not occur at the same intensity throughout reading. For the public library context examined here, the findings suggest giving users room to move between connection and distance and to decide when other perspectives enter their reading experience.

5.2 Between Publicness and Commerciality: Conditions for Reconfiguring Social Reading Features

Participants' evaluations reflected a contrast between the public-service and commercial contexts: the public library app connected users to materials and established services but offered few ways to record or extend reading experiences, while the commercial platform's rich features came with a complex interface, commercial orientation, exposure of personal tastes, and an expectation of continued participation.

Hoang's (2020) analysis of reading-related applications shows that such platforms now encompass a far wider range of activities than e-book access alone. The workshop data, however, suggest

that feature quantity by itself offers a poor measure of improvement for public library apps: commercial services provide useful references, but features that display user activity widely or repeatedly request responses may require adaptation rather than direct transfer to a public service setting.

These expectations reflect the everyday reading environments of the participants. University students already use commercial e-book subscription services (Shin & Shin, 2023), which makes expectations for records, recommendations, and access to other readers' reflections understandable, while public library digital services continue to face issues of e-book access and service quality (Shin et al., 2024). Social reading adds another dimension to these concerns: a public library app may support access to materials together with the recording, consultation, and sharing of reading experiences.

Participants did not view the public library app as a replacement for a commercial platform. They wanted accessibility, free use, and integration with library materials to remain central, with records, reviews, recommendations, and selective sharing adapted into less demanding forms. From these responses, prolonged engagement and broad visibility of user activity appear to be potentially lower priorities for the type of public library app considered in this study, rather than universally inappropriate design choices. Preserving access to library resources while allowing users to control their level of exposure and participation may be more consistent with the preferences expressed by participants.

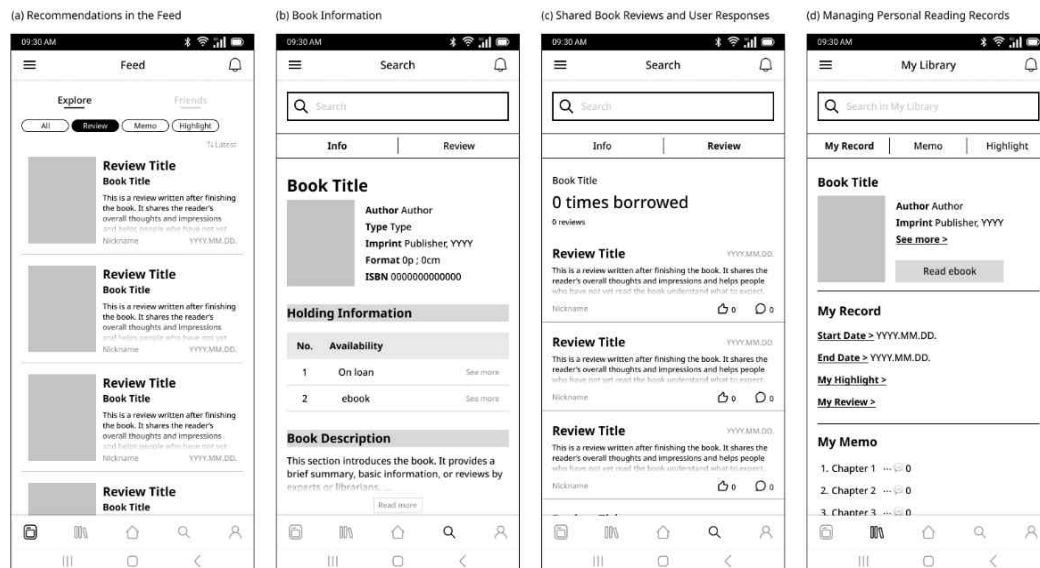
5.3 Taste-Based, Low-Pressure Social Reading

The proposed design direction connects reading records, reviews and recommendations, library integration, and selective sharing within one use flow. In this interpretation, social reading need not be confined to book clubs or community spaces; it can emerge through low-pressure contact between a reader's own experience and the experiences of others.

Recommendations and curation have become established areas of online service in Korean public libraries (Lee et al., 2022), and library curation may influence user satisfaction, trust, and the relationship between libraries and their users (Kwak & Noh, 2020). Recommendation services thus shape both access to books and the user's relationship with the library. The design direction developed here places reviews and recommendations within a route that connects taste-based discovery with library holdings and access: "book discovery → consulting reviews and recommendations → checking library materials → borrowing or accessing a book → recording during

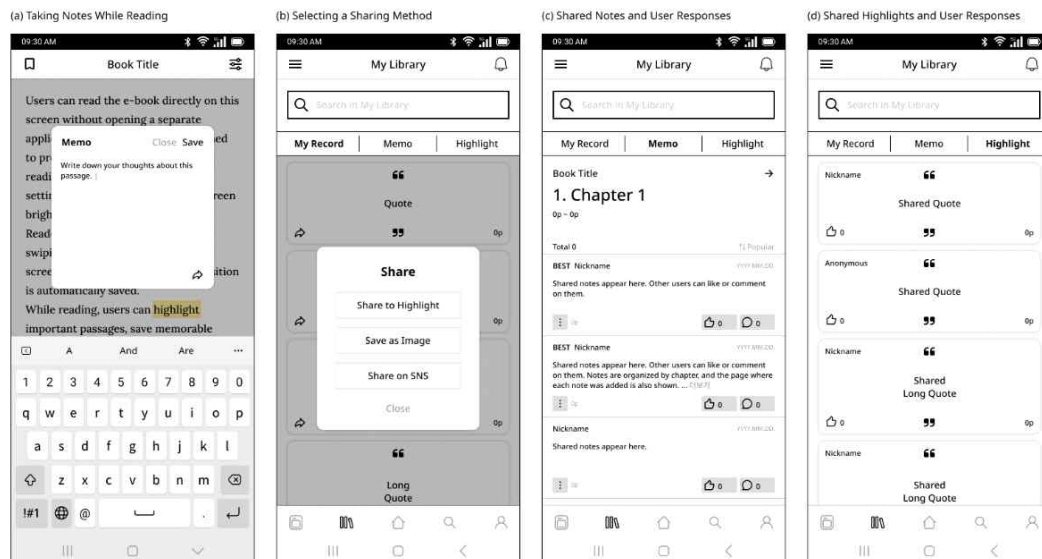
reading → organizing reflections → selective sharing.” Figures 2 and 3 are illustrative wireframes developed by the researchers based on the needs and sketches identified through the workshops, showing how these features could work together.

Figure 2 shows how a book discovered through another reader’s experience becomes connected to library use and personal records. Users browse reviews, notes, and highlights shared by others in the main feed; a selected book page presents bibliographic information together with library holdings, e-book availability, and other users’ reviews; and borrowed books move to My Library, where personal records are managed alongside the e-book itself. Social information is integrated with library use and the accumulation of personal reading records.



〈Figure 2〉 Researcher-Generated Illustrative Wireframes Linking Library Use and Reading Records

Figure 3 shows how a personal record may become social when the user chooses to share it. Notes and highlights written during reading remain private by default and may be shared through the feed, as an image, or on an external social media service, where other users can respond through likes and comments. Users decide which material to share and through which channel. The “Save as Image” option reflects P12’s proposal to turn memorable passages into shareable images, while the shared note and highlight screens adapt P15’s idea of a shared reading file by making selected records visible to others and open to responses.



〈Figure 3〉 Researcher-Generated Illustrative Wireframes Linking Reading Records and Selective Sharing

The term “taste-based, low-pressure social reading” is used here to describe this pattern: “taste-based” refers to finding books through preferred genres, reading histories, and other readers’ reviews and recommendations; “low-pressure” refers to consulting other people’s reading experiences and sharing one’s own selectively, without continuous relationship building or public activity. This pattern also resonates with Schirra et al.’s (2014) account of being “together alone,” in which users could feel connected to a wider audience while consuming media alone and sometimes participated by reading others’ reactions rather than posting their own.

Taken together, the discussion shifts the question from whether social features are needed to how the timing and intensity of connection can be adjusted across the reading journey. In the public library context, responses to these features also depended on demands for relationship building, continued participation, and public exposure, while access and user control remained important. The study therefore extends earlier digital library research that identified the need for social interaction (Ding & Hong, 2024) by offering preliminary, empirically informed design directions that do not assume a uniform or sustained level of social participation.

6. Conclusion

Through co-design workshops with undergraduate and graduate students, this study explored how social reading is understood and how it might take shape in public library mobile applications. The desired intensity and form of social connection varied across the reading journey: participants welcomed others' recommendations and interpretations when selecting books and after finishing them, while protecting immersion and interpretive freedom during reading itself. Social reading may therefore involve different levels of connection at different points in the reading process.

Participants did not reject social reading itself in either app; their concerns centered on features that demanded close relationships, continued participation, or broad exposure of personal activity. In the public library context examined here, access to library resources remained central, while social features were more acceptable when participants could control the extent of their participation and exposure.

This study presents one example of how taste-based, low-pressure social reading, which connects book discovery and library access with personal reading records and selective sharing within one use flow, could be translated into an interface. A public library app can thereby extend beyond search and borrowing services to become a public reading platform where users record their own experiences and encounter those of others at a level they choose.

The participant group was limited to students at a single women's university, with 16 of 18 participants majoring in Library and Information Science. In addition, recruitment targeted students already interested in reading and libraries, which may have contributed to relatively favorable responses toward reading records, recommendations, and social reading features. Future research should therefore include more diverse public library users, particularly those with lower reading engagement or less interest in libraries. Building the wireframes and service flow into a working prototype and conducting usability evaluations would provide more specific evidence about how these features might function over time in public library apps.

Overall, this study offers preliminary, empirically informed design directions for public library social reading services. By adjusting the level of connection across the reading journey while maintaining access to library resources and user control, public library mobile apps can support individual reading while creating opportunities to encounter and selectively share reading experiences with others.

References

- 곽우정, 노영희 (2020). 도서관 큐레이션 서비스를 통한 이용자-도서관 관계형성에 대한 연구. *한국비블리아학회지*, 31(1), 137-162. <http://dx.doi.org/10.14699/kbiblia.2020.31.1.137>
- 김윤정, 노영희 (2023). 도서관의 소통적 특성을 기반으로 한 공공도서관의 역할정립에 관한 연구. *한국비블리아학회지*, 34(1), 97-120. <http://dx.doi.org/10.14699/kbiblia.2023.34.1.097>
- 김은혜 (2024). 독서 교육을 위한 사회적 독서의 개념 연구: 국어 교사의 인식을 중심으로. *국어교육학연구*, 59(1), 71-96. <https://dx.doi.org/10.20880/kler.2024.59.1.71>
- 김지영, 이지연 (2023). 노인과 청년이 함께하는 독서모임의 세대교류 및 사회적 독서 경험 연구. *정보관리학회지*, 40(1), 23-50. <https://doi.org/10.3743/KOSIM.2023.40.1.023>
- 노영희, 곽우정 (2022). 개인의 가능성을 발견하는 도서관 역할 정립을 위한 우리나라 도서관 정책 및 성과 분석 연구. *한국문헌정보학회지*, 56(4), 285-307. <https://doi.org/10.4275/KSLIS.2022.56.4.285>
- 당형신, 홍창기 (2024). 디지털 도서관 앱의 소셜 인터랙션 서비스 디자인 연구. *커뮤니케이션디자인학연구*, 88, 273-285. <https://doi.org/10.25111/jcd.2024.88.19>
- 박소라, 이미화 (2021). 사용자 경험을 기반으로 한 학교도서관 모바일 앱 서비스 개발에 관한 연구. *한국비블리아학회지*, 32(2), 49-67. <http://dx.doi.org/10.14699/kbiblia.2021.32.2.049>
- 신정아, 강윤경, 김동혁 (2024). 디지털 환경에서 전자책 서비스 품질 분석에 관한 연구: 경기도사이버도서관을 중심으로. *한국도서관·정보학회지*, 55(4), 339-362. <http://dx.doi.org/10.16981/kliss.55.4.202412.339>
- 신혜원, 신동희 (2023). 대학생의 전자책 구독 서비스 이용 실태 및 사용성 평가. *정보관리학회지*, 40(3), 245-271. <http://dx.doi.org/10.3743/KOSIM.2023.40.3.245>
- 심효정, 조상은 (2024). 지역사회 독서문화 활성화를 위한 전략적 독서정책 방향 연구: 경기도 G시를 중심으로. *한국문헌정보학회지*, 58(4), 199-226. <https://doi.org/10.4275/KSLIS.2024.58.4.199>
- 오지현, 차영화, 김서현, 박해란, 최셋별 (2021). 수평적 취향공동체를 통한 새로운 구별짓기: 독서모임 커뮤니티 <트레바리>의 사례를 중심으로. *문화와 사회*, 29(2), 183-243. <https://doi.org/10.17328/kjcs.2021.29.2.005>
- 이경진, 조민, 이소빈 (2024). Co-designing the library makerspace with children: a case study of Seoul Children's Library with a focus on 3D printing. *한국문헌정보학회지*, 58(1), 151-179. <https://doi.org/10.4275/KSLIS.2024.58.1.151>
- 이수상, 이태석, 주소현 (2022). 국내 공공도서관 온라인 북큐레이션 서비스의 내용분석. *한국도서관·정보학회지*, 53(4), 189-209. <http://dx.doi.org/10.16981/kliss.53.4.202212.189>
- 이인화 (2025). 텍스트협의 복잡성에 대한 이해와 문학교육적 함의. *문학교육학*, 88, 301-332.

- <https://doi.org/10.37192/KLER.88.9>
- 정종기 (2011). 스마트폰 애플리케이션을 활용한 국내외 대학도서관의 모바일 서비스에 관한 연구. *한국비블리아학회지*, 22(1), 171-191.
- 주민재 (2025). 텍스트랩 현상 분석을 통한 모바일 네이티브의 콘텐츠 소비 양상 탐구. *한국문예비평연구*, 85, 139-172. <https://doi.org/10.35832/kmlc..85.202503.139>
- 황금숙 (2020). 스마트 환경에서의 독서문화 진흥 방안에 관한 연구: ‘독서’ 관련 어플리케이션 분석을 중심으로. *한국도서관·정보학회지*, 51(1), 145-177.
<http://dx.doi.org/10.16981/kliiss.51.202003.145>
- Grenier, R. S., Callahan, J. L., Kaepfel, K., & Elliott, C. (2022). Advancing book clubs as non-formal learning to facilitate critical public pedagogy in organizations. *Management Learning*, 53(3), 483-501. <https://doi.org/10.1177/13505076211029823>
- Hu, Y., Diesner, J., Underwood, T., LeBlanc, Z., Layne-Worthey, G., & Downie, J. S. (2025). Who decides what is read on Goodreads? Uncovering sponsorship and its implications for scholarly research. *Big Data & Society*, 12(3), 1-17.
<https://doi.org/10.1177/20539517251359229>
- Krippendorff, K. (2004). *Content Analysis: An Introduction to Its Methodology* (2nd ed.). Thousand Oaks, CA: Sage Publications.
- Kuijpers, M. M. (2022). Bodily involvement in readers’ online book reviews: applying Text World Theory to examine absorption in unprompted reader response. *Journal of Literary Semantics*, 51(2), 111-129. <https://doi.org/10.1515/jls-2022-2055>
- Liu, S., Weng, L., Qin, J., & Sun, S. (2025). User needs analysis of university library APP based on Kano model. *2025 International Conference on Artificial Intelligence and Product Design (AIPD 2025)*, 242-247. <https://doi.org/10.1145/3765416.3765456>
- Rebora, S., Boot, P., Pianzola, F., Gasser, B., Herrmann, J. B., Kraxenberger, M., Kuijpers, M. M., Lauer, G., Lendvai, P., Messerli, T. C., & Sorrentino, P. (2021). Digital humanities and digital social reading. *Digital Scholarship in the Humanities*, 36(Supplement 2), ii230-ii250. <https://doi.org/10.1093/llc/fqab020>
- Reddan, B. (2022). Social reading cultures on BookTube, Bookstagram, and BookTok. *Synergy*, 20(1).
- Sanders, E.B.-N. & Stappers, P. J. (2008). Co-creation and the new landscapes of design. *Co-Design*, 4(1), 5-18. <https://doi.org/10.1080/15710880701875068>
- Schirra, S., Sun, H., & Bentley, F. (2014). Together alone: motivations for live-tweeting a television series. *Conference on Human Factors in Computing Systems - Proceedings*.

<https://doi.org/10.1145/2556288.2557070>

- Worrall, A. (2019). “Connections above and beyond”: information, translation, and community boundaries in LibraryThing and Goodreads. *Journal of the Association for Information Science and Technology*, 70, 742-753. <https://doi.org/10.1002/asi.24153>
- Yip, J. C., Lee, K. J., & Lee, J. H. (2020). Design partnerships for participatory librarianship: a conceptual model for understanding librarians co designing with digital youth. *Journal of the Association for Information Science and Technology*, 71(10), 1242-1256. <https://doi.org/10.1002/asi.24320>
- Zhang, H., McKay, D., & Buchanan, G. (2021). I’ve got all my readers with me: a model of reading as a social activity. *Proceedings of ACM Conference on Human Information Interaction and Retrieval (CHIIR ’21)*, 185-195. <https://doi.org/10.1145/3406522.3446022>

• 국문 참고자료의 영어 표기

(English translation / romanization of references originally written in Korean)

- Ding, Hengxin & Hong, Chang-kee (2024). A study on the design of social interaction services in mobile applications of digital libraries. *Journal of Communication Design*, 88, 273-285. <https://doi.org/10.25111/jcd.2024.88.19>
- Hoang, Gum-Sook (2020). A study on the promotion of reading culture according to analysis of the application on the ‘reading’. *Journal of Korean Library and Information Science Society*, 51(1), 145-177. <http://dx.doi.org/10.16981/kliiss.51.202003.145>
- Joo, Min-Jae (2025). Exploring mobile native content consumption patterns through text heap phenomenon analysis. *Journal of Korean Literary Criticism*, 85, 139-172. <https://doi.org/10.35832/kmlc..85.202503.139>
- Jung, Jong-Kee (2011). A study on mobile services based on smartphone application in academic libraries. *Journal of the Korean Biblia Society for Library and Information Science*, 22(1), 171-191.
- Kim, Eunhye (2024). Examining the concept of social reading for education: focusing on teachers’ perceptions. *Korean Language Education Research*, 59(1), 71-96. <https://dx.doi.org/10.20880/kler.2024.59.1.71>
- Kim, Jiyoung & Lee, Jee Yeon (2023). A study on the experiences of young and old participating in an intergenerational book club and social reading. *Journal of the Korean Society for Information Management*, 40(1), 23-50. <https://doi.org/10.3743/KOSIM.2023.40.1.023>

- Kim, YoonJeong & Noh, Younghee (2023). A study on defining the role of public libraries based on their communicative characteristics. *Journal of the Korean Biblia Society for Library and Information Science*, 34(1), 97-120. <http://dx.doi.org/10.14699/kbiblia.2023.34.1.097>
- Kwak, Woojung & Noh, Younghee (2020). A study on user-library relationship with the library curation service. *Journal of the Korean Biblia Society for Library and Information Science*, 31(1), 137-162. <http://dx.doi.org/10.14699/kbiblia.2020.31.1.137>
- Lee, In-Wha (2025). Understanding the complexity of text hip and its implications for literary education. *Korean Literature Education Research*, 88, 301-332.
<https://doi.org/10.37192/KLER.88.9>
- Lee, Kung-Jin, Cho, Min, & Lee, So-Bin (2024). Co-designing the library makerspace with children: a case study of Seoul Children’s Library with a focus on 3D printing. *Journal of the Korean Society for Library and Information Science*, 58(1), 151-179.
<https://doi.org/10.4275/KSLIS.2024.58.1.151>
- Lee, Soo-Sang, Lee, Taeseok, & Joo, So-Hyun (2022). Content analysis of online book curation services in Korean public libraries. *Journal of Korean Library and Information Science Society*, 53(4), 189-209. <http://dx.doi.org/10.16981/kliiss.53.4.202212.189>
- Noh, Younghee & Kwak, Woojung (2022). A study on the analysis of Korea’s library policy and performance to establish libraries’ role in discovering individuals’ potential. *Journal of the Korean Society for Library and Information Science*, 56(4), 285-307.
<https://doi.org/10.4275/KSLIS.2022.56.4.285>
- Oh, Ji Hyun, Cha, Younghwa, Kim, Seo-hyeon, Park, Haeran, & Choi, SetByol (2021). A new distinction through horizontal taste communities bases on book club community “Trevari”. *Korean Journal of Cultural Sociology*, 29(2), 183-243.
<https://doi.org/10.17328/kjcs.2021.29.2.005>
- Park, Sora & Lee, Mihwa (2021). A study on the development of school library mobile app service based on user experience. *Journal of the Korean Biblia Society for Library and Information Science*, 32(2), 49-67. <http://dx.doi.org/10.14699/kbiblia.2021.32.2.049>
- Shin, Hye-Won & Shin, Dong-Hee (2023). A study of assessment for college students’ usage patterns and usability testing of e-book subscription services. *Journal of the Korean Society for Information Management*, 40(3), 245-271.
<http://dx.doi.org/10.3743/KOSIM.2023.40.3.245>
- Shin, JeongA, Kang, YunKyung, & Kim, DongHyuk (2024). A study on the analysis of e-book service quality in the digital environment: focusing on Gyeonggido Cyber Library. *Journal*

of Korean Library and Information Science Society, 55(4), 339-362.

<http://dx.doi.org/10.16981/kliss.55.4.202412.339>

Sim, Hyo Jung & Cho, Sang Eun (2024). A study on the strategic reading policy direction to revitalize community reading culture: focusing on G City, Gyeonggi-do. *Journal of the Korean Society for Library and Information Science*, 58(4), 199-226.

<https://doi.org/10.4275/KSLIS.2024.58.4.199>

