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Building an Inclusive Library: The Role of Library Science in Information Access for All

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ABSTRACT

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Fair and equal access to information is part of human rights and an important foundation for inclusive development. However, in practice, there are still significant gaps in access, especially for vulnerable groups such as people with disabilities, the elderly and remote communities. This research aims to examine how the principle of inclusivity is implemented in library services and examine the strategic role of library science in supporting access to information for all. This research uses a descriptive qualitative approach with data collection techniques in the form of in-depth interviews, observations, and document studies in several public libraries, schools, and universities in Indonesia. The results showed that most libraries have started to implement inclusive principles in physical aspects, such as providing accessibility for the disabled. However, the implementation of inclusive collections and information services is still limited. Librarians play an active role as literacy facilitators and social agents, but limited training and policy support hinder their effectiveness. Structural constraints such as lack of funding and low user participation are also major challenges. The discussion points to the importance of developing a more interdisciplinary library science and libraries as social justice institutions. This research recommends the need for systemic transformation through strengthening the capacity of librarians, participationbased policies, and integrating universal design principles and user needs-based services as a foundation in realizing inclusive and sustainable libraries.

INTRODUCTION

Amidst the rapid advancement of the digital age, the world today is experiencing a tremendous surge in the production, distribution, and consumption of information (Onunka et al., 2023). This phenomenon marks a major shift in social, economic, and educational structures, where information becomes a central element in individual and institutional decision-making (Chen et al., 2024; Ciasullo et al., 2024;



Szukits & Móricz, 2024). Digital transformation has expanded the scope of information resources through the internet, social media, artificial intelligence, and various digital platforms that promise efficiency, openness, and global connectivity (Malik et al., 2022; Tran-Dang & Kim, 2021). However, behind this progress, there is a fundamental problem that has not been resolved, namely unequal access to information. This inequality does not only occur between countries, but also between regions and between social groups within a country. Marginalized groups such as people with disabilities, the elderly, communities in remote areas, and individuals with low levels of information and digital literacy are often left behind in utilizing the potential of available information.

According to the World Bank Digital Development report (2021), around 37% of the global population or more than 2.9 billion people still do not have stable internet access, which is a basic prerequisite for accessing digital information. In Indonesia alone, data from the Badan Pusat Statistik (2023) shows that the digital divide is still quite significant between urban and rural areas, with an unequal information and communication technology development index (IP-ICT). This has a direct impact on limited access to education, health, legal information, and economic opportunities. In addition, structural barriers such as limited technological infrastructure, non-inclusive policies, and lack of digital literacy training exacerbate information exclusion for vulnerable groups (Castaneda et al., 2021). This poses a serious challenge to the principle of information justice as part of human rights. Access to information that is open, relevant and accessible to all is a crucial element in inclusive and sustainable development. (Iniesto et al., 2021; Saini et al., 2023). In the global context, this is reflected in the Sustainable Development Goals (SDGs), particularly goal number 4 (ensuring inclusive and quality education), number 10 (reducing inequalities), and number 16 (building effective, accountable and inclusive institutions) (Ashida, 2023; Chankseliani & McCowan, 2021; Rad et al., 2022). Therefore, the challenge of access to information is not just a technical issue or digitization, but a social justice issue that requires a multidisciplinary approach and systemic intervention, including the strategic role of library and information science.

In facing the challenges of inequality in access to information, libraries occupy a strategic position as public institutions that have a social mandate to provide information fairly and equitably to all levels of society (Owusu-Ansah, 2021). The function of libraries in the contemporary era has undergone a paradigmatic shift: from simply providing a collection of books to becoming a center for lifelong learning, a community collaborative space, and a vehicle for social and cultural empowerment (Lee, 2024; Meesad & Mingkhwan, 2024b, 2024a). As a democratic institution, libraries not only store and manage information, but are also responsible for ensuring that the information can be accessed and utilized by all without discrimination (Hodonu-Wusu, 2025; Kiruki & Mutula, 2021). The concept of "library for all" emphasizes the principle of inclusivity in the architectural design of spaces, collection development, service programming, and policy formulation that is responsive to the needs of diverse user groups, including children, the elderly, the disabled, and minority groups (Nissen & Kann-Rasmussen, 2025).

Inclusive libraries play an important role in bridging social, economic and digital divides by providing equitable access to information resources, digital literacy services, skills training and technology facilities (Wang & Si, 2024). Through a community needs-based services approach, libraries can be a catalyst in encouraging

social participation, strengthening cultural identity, and improving information literacy (Kuruppu, 2025). For example, the provision of collections in braille, audio book facilities for the blind, computer access with adaptive technology, and the implementation of multilingual literacy programs reflect the real form of libraries that uphold the value of inclusiveness. Not only that, libraries also contribute to the achievement of the Sustainable Development Goals (SDGs), especially in supporting quality education (SDG 4), reducing inequality (SDG 10), and strengthening inclusive institutions (SDG 16) (Afiyah & Muthoifin, 2024; Lison, 2024). As such, libraries are social infrastructures that have transformative power in expanding access to information, strengthening citizen capacity, and championing information justice (Omekwu et al., 2023; Yap et al., 2024). This role is becoming increasingly relevant in the context of an information society that demands openness, engagement and equality in accessing and using knowledge. Building inclusive libraries is therefore not an option, but a necessity for any country committed to equitable development.

Library science as a multidisciplinary discipline has evolved beyond the traditional functions of collection management and cataloging of materials (Yuan et al., 2025). In the contemporary context, it covers a broad spectrum of studies, ranging from information management, public services, information ethics, information technology, literacy policy, to user studies. These developments reflect adaptive efforts to the dynamics of community needs and social transformation influenced by digitization and information complexity. One of the main focuses in library science today is how to create information systems and services that are inclusive, relevant, and based on social justice values (Poole et al., 2021; Winberry & Bishop, 2021). This requires the integration of librarians' knowledge in various fields: from understanding socio-cultural diversity to mastering inclusive technology and user-centered services design.

As the main actor in the library ecosystem, librarians act as agents of social change who not only carry out administrative functions, but also become information literacy facilitators, digital assistants, and community mobilizers (Horsfall, 2023; Seiter, 2022). They are required to design and implement adaptive and inclusive service strategies, for example through the provision of braille services for people with visual disabilities, multilingual collections for multi-ethnic groups, digital literacy training for the elderly or underprivileged groups, and mobile library services to reach remote areas. In carrying out their role, librarians are also required to uphold the principles of open access, information transparency, and protection of user privacy as part of professional ethics (Katulić et al., 2022; Michalak, 2023). A professional approach in modern library science should always be based on a holistic understanding of user needs, not solely on institutional logic. The principles of inclusivity, participation and empowerment are the foundation of every policy and practice. In this way, libraries are not only information providers, but also social spaces that champion information justice and encourage the active involvement of all members of society in lifelong learning (Durodolu & Oladokun, 2025; Lopez et al., 2023). Thus, in the context of inclusive development and digital transformation, library science and the role of information professionals are key components in realizing sustainable access to information for all.

Although the concept of inclusivity in libraries has been widely discussed in international forums and made a principle in various guidelines of global institutions such as IFLA (International Federation of Library Associations and Institutions), its implementation at the practical level, especially in the local context in Indonesia, still faces various obstacles. Many libraries, whether public, school or university, have not

fully adopted inclusive principles in their service approach, space design, collection development and literacy programs. This is reflected in the lack of disability-friendly facilities, the lack of community-based services that are responsive to social and cultural diversity, and the low integration of inclusive technologies that can bridge the digital divide. In addition, in library policy development, the principle of user participation is often symbolic and not yet part of a systematic planning mechanism. From an academic perspective, studies on inclusivity in libraries in Indonesia are also still limited, especially those that explore in depth how library science can be applied strategically to build a fair, equal and sustainable information service system. Existing studies tend to be descriptive or limited to individual case studies, without exploring the integration between theory, policy and practice on a broader scale. In fact, in the context of a pluralistic society and geography like Indonesia, a contextualized and evidence-based approach is needed to design inclusive library models that are adaptive to local needs. Therefore, a more comprehensive scientific study is needed to fill this gap, as well as to make conceptual and practical contributions to the development of library science as a driver of social transformation through access to information for all.

METHODOLOGY

This research uses a descriptive qualitative approach that aims to understand in depth how the principle of inclusiveness is applied in the organization of library services and how library science plays a role in expanding access to information for all levels of society. This approach is considered most relevant because it allows researchers to explore the experiences, views and practices carried out by librarians and library users in a real context, especially related to the provision of services that are friendly to marginalized groups such as people with disabilities, the elderly, and people from remote areas. The research subjects consisted of librarians, library managers and users from diverse social backgrounds, who were purposively selected based on their involvement in inclusive library services. The research locations covered several types of libraries in Indonesia, including public libraries, school libraries, and university libraries that have initiated inclusive practices in their services.

Data were collected through semi-structured in-depth interviews with librarians and users, observation of facilities and service activities, and review of policy documents and library activity reports. This technique was chosen to obtain holistic data on the actual conditions, challenges, and inclusion strategies implemented. The data obtained was analyzed using a thematic analysis approach, with steps including data reduction, categorization, interpretation of meaning, and conclusion drawing. Data validity was maintained through source and method triangulation techniques, as well as confirmation with key informants. This study also adhered to the principles of research ethics, where each participant was given an explanation of the purpose and benefits of the research, as well as the right to maintain identity confidentiality and stop participation at any time. With this approach, it is hoped that the research results will provide a comprehensive picture of the strategic role of library science in realizing inclusive and equitable access to information in Indonesia.

RESULTS AND DISCUSSION

Implementation of Inclusivity Principles in Library Services

The results show that most of the study libraries have started to adopt the principle of inclusiveness in physical and infrastructural aspects. For example, of the

seven libraries observed, six of them have provided ram access for wheelchair users, four have provided special toilets for people with disabilities, and five have arranged reading rooms that are more open and friendly to the elderly and disabled groups. However, these inclusion efforts have not been fully equitable, especially in terms of the provision of collections and information services. Only two of the seven libraries have braille book collections, while audiobooks are only available in one library, and multilingual literature is still very limited and not strategically programmed. In addition, most libraries do not have written policies governing the provision of inclusion-based services.

This finding shows a significant gap between normative policy and practical implementation in the field. When compared to the IFLA Guidelines on Library Services for Persons with Disabilities (2011), many important aspects have not been met, such as the provision of assistive technology, staff training in disability services, and disability-friendly online catalog systems. IFLA emphasizes that inclusive libraries are not only about physical facilities, but also include service systems, collection curation, and active participation of disabled users in program design. In this context, libraries in Indonesia still show fragmentary patterns of inclusiveness and rely more on individual librarian initiatives rather than structured institutional policies.

This underscores the importance of applying universal design in public library management, which is the principle of designing services and facilities that can be accessed, understood and used by everyone without the need for additional adaptations. This concept not only creates physical accessibility, but also integrates social and cultural approaches that respect the diversity of users. Therefore, to build a truly inclusive library, there needs to be a commitment from policy makers to develop regulations, allocate budgets, and build the capacity of librarians on an ongoing basis so that the principle of inclusion does not stop at the symbolic level, but becomes an integral part of library governance.

The Role of Librarians as Agents of Inclusivity

The results show that librarians play a central role in encouraging the implementation of inclusive library services, especially through digital literacy initiatives and community-based activities. From interviews with 12 librarians in different types of libraries, most stated that they actively initiated basic technology training programs for the elderly and digitally vulnerable groups, and organized information literacy discussions for students from low socioeconomic backgrounds. However, despite the high level of personal enthusiasm and motivation, most librarians have not received formal training on inclusive services or needs-based approaches for marginalized users. Only 3 out of 12 librarians had participated in training on disability-friendly services or social inclusion in the library environment. This limitation is compounded by the absence of strong institutional support, both in terms of internal policies and budget allocations for staff competency development.

This finding indicates a gap between the potential of individual librarians and the systemic support that should be provided by library institutions. In the theoretical framework, the role of contemporary librarians is no longer limited to managing collections, but rather as social facilitators and knowledge mediators who bridge information and specific user needs through a humanist and empathy-based approach. Librarians are required to have cross-cultural communication skills, mastery of inclusive technology, and sensitivity to issues of equal access. Therefore, strengthening

the capacity of human resources (HR) is a key element in building inclusive libraries in a sustainable manner. Investment in librarian training, preparation of inclusivity-based professional competency standards, and integration of inclusive curriculum in library science education are strategic steps that must be taken by the government and higher education institutions. Without strengthening the role of librarians as the main actors in the information service system, library inclusiveness will be difficult to develop from mere jargon to transformational practice.

Structural and Cultural Constraints in Inclusive Library Development

This research revealed a number of significant structural and cultural barriers to the development of truly inclusive libraries. One of the main barriers found is limited funding, which has a direct impact on the provision of accessible facilities, procurement of special collections, and capacity building of librarians. From interviews with library managers in five different institutions, all of them acknowledged that budget allocations for inclusive services are often low-priority or even unavailable specifically. In addition, the lack of attention from policy makers at both the institutional and local government levels has resulted in a lack of regulations that support inclusivity as an integral part of the information service system. Equally important, there are still cultural barriers in the form of stereotypes and stigma against vulnerable user groups, such as people with disabilities or indigenous peoples, who are considered "not part of the main users" of libraries. Such views reinforce social exclusion, which is contrary to the spirit of democratization of information.

Another important constraint is the lack of user participation in service planning and design. In most cases, library services are still designed in a top-down manner, without a consultative process with the target inclusion groups. This results in many programs being ceremonial or irrelevant to the real needs of the community. From a critical librarianship perspective, this approach reflects systemic exclusionary practices that contradict the principles of social justice and the role of libraries as public institutions that should serve all people without discrimination. A critical approach to libraries emphasizes that power structures, dominant language, and majority values are often unconsciously carried over into service design, thus reinforcing the marginalization of certain groups. Therefore, a paradigm shift towards a participation-based service model or user-centered design is needed, where users, especially from vulnerable groups, are actively involved in the process of identifying needs, designing programs, and evaluating services. That way, the library will not only be a physically welcoming place, but also a space that truly welcomes diversity and encourages community empowerment.

Strategic Potential of Library Science in Promoting Inclusive Transformation

The findings of this study show that library science has strategic potential as a conceptual and practical foundation in building libraries that are inclusive, equitable, and adaptive to the needs of diverse communities. Several informants from academia and librarian practitioners emphasized that library education curricula are now starting to include issues of inclusion, digital literacy, and user-based approaches in service planning. In addition, research in the field of library science has begun to highlight the role of libraries in social development, including how these institutions contribute to the empowerment of vulnerable groups and the reduction of information gaps. Multistakeholder collaboration is also a potential strength, with libraries partnering with

NGOs, educational institutions, local governments and local communities to develop socially and culturally responsive programs.

The discussion of these findings confirms that to promote inclusive transformation in a sustainable way, library science needs to develop in a more interdisciplinary manner, not only relying on the tradition of information management. Integration with social sciences, disability studies, information technology, and public policy is needed to produce inclusive and evidence-based library policies. The concept of library as a community anchor becomes increasingly relevant in this context, where libraries are not just information repositories, but community nodes that connect knowledge, culture, technology, and social solidarity. Moreover, the library can also be positioned as a social justice institution, an institution that actively fights for equality, inclusion and community empowerment through barrier-free access to information. To realize this vision, library science must equip prospective librarians with critical competence, social empathy, and cross-sector collaborative skills. Thus, libraries are not only witnesses to the changing times, but also active agents in realizing a more inclusive and equitable society.

CONCLUSION

Based on the results of this study, it can be concluded that efforts to build inclusive libraries in Indonesia have shown positive initial initiatives, especially in the provision of physical facilities that are friendly to disabled groups and the implementation of community-based digital literacy programs. However, the implementation of inclusivity principles as a whole still faces various structural and cultural challenges, including limited funding, low policy priority, and minimal user participation in service design. The role of librarians as agents of change has proven important in bridging the information access gap, although there is still a need to strengthen professional capacity through training and ongoing institutional support. This research also highlights the importance of developing a more interdisciplinary library science, by integrating social, technological and public policy perspectives to build libraries as institutions that not only provide information, but also fight for social justice. Therefore, the inclusive transformation of libraries requires multi-stakeholder commitment, concrete policy support, and user-centered service design, so that libraries can truly become public spaces that open access to information for all in a fair and sustainable manner.

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