INTRODUCING MICRO-LIBRARIES IN THE ACTIVITIES OF THE NATIONAL LIBRARY OF UZBEKISTAN

THEORETICAL FOUNDATIONS, PRACTICAL EXPERIENCE, AND DEVELOPMENT PROSPECTS



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Ўзбекистон Миллий кутубхонаси халқаро алоқаларни ташкил этиш хизмати раҳбари

Annotation. This article provides an in-depth analysis of the implementation of micro-libraries within the activities of the National Library of Uzbekistan from the perspective of modern library science. Micro-libraries are interpreted as an innovative organizational form that complements the traditional centralized library model and brings information resources closer to users. The study examines the material and technical infrastructure, collection potential, digital services, and practical experience of the National Library of Uzbekistan. Organizational, technological, and methodological aspects of establishing micro-libraries are discussed, and mechanisms for their development in integration with the National Library are substantiated. The findings demonstrate the potential of micro-libraries to expand territorial coverage of library services, ensure equal access to information, and enhance the social effectiveness of libraries. The conclusions are of scientific and practical value for planning innovative library projects and modernizing information and library systems.

Keywords: micro-libraries, library and information services, National Library of Uzbekistan, digital transformation, library innovation, access to information, regional information centers, decentralized library services, information equity, lifelong learning, library modernization, digital resources integration.

Аннотация. Ушбу илмий мақолада Ўзбекистон Миллий кутубхонаси фаолиятида микро-кутубхоналарни жорий этиш масалалари замонавий кутубхоначилик ривожи нуқтаи назаридан кенг қамровда таҳлил қилинади. Микро-кутубхоналар анъанавий марказлашган кутубхона моделини тўлдирувчи ва ахборот ресурсларини фойдаланувчиларга яқинлаштирувчи инновацион ташкилий шакл сифатида талқин этилади. Тадқиқот жараёнида Ўзбекистон Миллий кутубхонасининг моддий-техник базаси, фонд салоҳияти, рақамли хизматлари ҳамда фойдаланувчилар билан ишлаш тажрибаси таҳлил қилинади. Мақолада микро-кутубхоналарни ташкил этишнинг ташкилий, технологик ва методик жиҳатлари очиб берилиб, уларни Миллий кутубхона билан интеграциялашган ҳолда ривожлантириш механизмлари асослаб берилади. Шунингдек, тадқиқот натижалари асосида микро-кутубхоналар орқали ҳудудий ахборот хизматларини кенгайтириш, аҳолининг турли қатламлари учун ахборотга тенг киришни таъминлаш ва кутубхона хизматларининг ижтимоий самарадорлигини ошириш имкониятлари кўрсатиб берилади. Мақола хулосалари кутубхоначилик амалиётида инновацион лойиҳаларни режалаштириш ва ахборот-кутубхона тизимини модернизация қилиш жараёнларида илмий-амалий аҳамиятга эга.

Калит сўзлар: микро-кутубхоналар, кутубхона ва ахборот хизматлари, Ўзбекистон Миллий кутубхонаси, рақамли трансформация, кутубхона инновациялари, ахборотга кириш, ҳудудий ахборот марказлари, марказлашмаган кутубхона хизматлари, ахборот тенглиги, узлуксиз таълим, кутубхоналарни модернизация қилиш, рақамли ресурсларни интеграциялаш.

Аннотация. В статье всесторонне рассматриваются вопросы внедрения микро-библиотек в деятельности Национальной библиотеки Узбекистана с позиции современного библиотековедения. Микро-библиотеки трактуются как инновационная форма организации библиотечного обслуживания, дополняющая традиционную централизованную модель и обеспечивающая приближение информационных ресурсов к пользователю. В ходе исследования анализируются материально-техническая база, фондовый потенциал, цифровые сер-

висы и практический опыт работы Национальной библиотеки Узбекистана. Раскрываются организационные, технологические и методические аспекты создания микро-библиотек, а также обосновываются механизмы их развития в интеграции с Национальной библиотекой. На основе полученных результатов показаны возможности расширения территориального охвата информационно-библиотечных услуг, обеспечения равного доступа к информации и повышения социальной эффективности библиотек. Выводы статьи имеют научно-практическую значимость для реализации инновационных библиотечных проектов.

Ключевые слова: микро-библиотеки, библиотечно-информационные услуги, Национальная библиотека Узбекистана, цифровая трансформация, библиотечные инновации, доступ к информации, региональные информационные центры, децентрализованные библиотечные услуги, информационное равенство, непрерывное образование, модернизация библиотек, интеграция цифровых ресурсов.

Introduction

In the contemporary information society, knowledge and information resources have become fundamental drivers of socio-economic and cultural development. The transition to a knowledge-based economy, the rapid growth of digital technologies, and the increasing complexity of user information needs have significantly transformed the role of libraries. Modern libraries are no longer perceived solely as repositories of printed materials; instead, they function as dynamic information, educational, and communication centers that facilitate access to diverse knowledge sources and promote social inclusion.

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One of the key challenges facing library systems today is ensuring equal and convenient access to information for all population groups, regardless of their geographic location, social status, or level of digital literacy. Centralized library models, while effective in preserving large collections and maintaining specialized services, often face limitations in terms of territorial accessibility and responsiveness to local community needs. This situation necessitates the development of flexible and decentralized service models capable of extending library services beyond traditional buildings.

In this context, the concept of micro-libraries has emerged as a promising direction in modern library science. Micro-libraries represent small-scale, flexible, and user-oriented service units that can be located in educational institutions, cultural centers, public spaces, healthcare facilities, and remote settlements. They function as extensions of larger library systems and operate in close integration with central libraries through digital networks and unified information infrastructures.

For the National Library of Uzbekistan, which serves as the leading information and bibliographic center of the country, the implementation of micro-libraries is not only a technological innovation but also a strategic step toward modernizing the national information and library system. The development of such a network contributes to expanding regional coverage, enhancing social equity in access to information, and strengthening the role of libraries in supporting education, research, and cultural development.

The aim of this article is to analyze the theoretical foundations, practical prerequisites, and development prospects of micro-libraries within the activities of the National Library of Uzbekistan. The research objectives include:

- examining the conceptual essence of micro-libraries in modern library science;
- assessing the current state and potential of the National Library of Uzbekistan as a base for micro-library implementation;
- identifying organizational and technological mechanisms for creating micro-libraries;
- evaluating their social and practical effectiveness.

1. Theoretical foundations of the micro-library concept

The evolution of library service models. The history of library development reflects a gradual transition from centralized storage-oriented institutions to user-centered service organizations. In traditional models, the primary focus was on collection preservation and on-site access. However, the emergence of digital technologies, network communication, and mobile devices has fundamentally changed user expectations. Modern users demand rapid, flexible, and location-independent access to information resources.

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This transformation has led to the development of distributed service models, including digital libraries, virtual reference services, mobile libraries, and community-based information centers. Micro-

libraries represent a logical continuation of this evolution, combining physical presence with digital connectivity. They embody the principle of «bringing the library to the user» rather than requiring users to travel to central institutions.

Definition and characteristics of micro-libraries. A micro-library can be defined as a small-scale structural unit of a library system that provides access to selected physical and digital resources, information services, and educational support in a localized environment. Unlike traditional branches, micro-libraries are characterized by:

compact size and flexible spatial organization;

a limited but carefully curated collection tailored to local needs;

strong reliance on digital resources and remote access technologies;

integration into a unified information system of a parent library;

multifunctionality, combining reading, learning, and community engagement functions.

Their main mission is to ensure fast, convenient, and inclusive access to information, particularly for populations with limited mobility or those living in remote areas.

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Micro-libraries in international library practice

International experience demonstrates that micro-library models are widely used to address social, educational, and spatial challenges. In many countries, libraries establish small service points in schools, hospitals, shopping centers, transportation hubs, and rural communities. These micro-units often function as hybrid spaces where users can access digital catalogs, borrow books, attend workshops, and receive information literacy training.

Such practices illustrate the shift from a building-centered to a service-centered paradigm in librarianship. Micro-libraries contribute to lifelong learning, community development, and digital inclusion, aligning with global trends in sustainable development and knowledge accessibility.

Micro-libraries as an element of digital transformation. Digital transformation is a core factor enabling the effective functioning of micro-libraries. Cloud technologies, integrated library systems, electronic catalogs, and digital repositories allow small service points to provide access to vast information resources without physically storing large collections. Remote authentication, electronic document delivery, and virtual consultation services extend the capabilities of micro-libraries beyond their physical limitations.

Thus, micro-libraries should be viewed not as isolated mini-libraries but as nodes within a distributed information network. Their effectiveness depends on technological interoperability, standardized service procedures, and strong coordination with central library institutions.

2. Current state of the National Library of Uzbekistan as a basis for micro-library implementation

Institutional Role and Strategic Position. The National Library of Uzbekistan functions as the leading information, bibliographic, and methodological center of the country's library system. Its activities extend beyond traditional library services, encompassing research support, preservation of national documentary heritage, coordination of regional libraries, and development of digital information infrastructure. In the context of national educational and cultural policy, the library plays a strategic role in shaping a unified information space and promoting equal access to knowledge.

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This institutional position creates favorable conditions for the development of a micro-library network. As a central coordinating body, the National Library possesses the authority, expertise, and technological capacity necessary to standardize service models, ensure methodological guidance, and maintain quality control across distributed service points.

Collection potential and information resources. One of the key prerequisites for micro-library implementation is the availability of a rich and diverse information base. The National Library of Uzbekistan holds a universal collection that includes printed books, periodicals, manuscripts, audiovisual materials, electronic publications, and digital databases. The diversity of subject areas allows the formation of specialized micro-collections adapted to the needs of different user groups, such as students, researchers, children, and professionals.

The presence of electronic catalogs and digitized resources significantly expands the service potential of micro-libraries. Instead of duplicating large physical collections, micro-libraries can provide access to the central repository through digital channels. This model ensures both cost efficiency and up-to-date content availability, as materials can be accessed remotely without transportation or storage constraints.

Material and technical infrastructure. The material and technical base of the National Library includes modern reading halls, computer workstations, server equipment, and digital communication systems. The existence of an integrated library information system enables centralized management of bibliographic records, user databases, and circulation processes. These technological resources form the backbone of a distributed micro-library network.

Micro-libraries connected to this infrastructure can operate as remote service nodes, using centralized servers for catalog access, authentication, and digital resource delivery. The parent institution thus ensures system stability, data security, and technical maintenance, reducing the operational burden on individual micro-libraries.

Digital services and user interaction. In recent years, the National Library of Uzbekistan has expanded its range of digital services, including online catalogs, electronic document delivery, remote user registration, and virtual reference services. These tools demonstrate the institution's readiness to operate in a hybrid physical–digital environment.

Such experience is directly applicable to micro-libraries. Since many services are already available in online formats, micro-libraries can function as access points where users receive assistance in navigating digital resources, improving information literacy, and utilizing electronic services. Thus, the micro-library becomes not only a distribution point for materials but also a mediator between users and digital knowledge environments.

Organizational and human resource capacity. The professional expertise of library staff is a crucial factor in successful innovation. The National Library's experience in project management, user services, and methodological work enables it to develop training programs and service standards for micro-library personnel. Centralized training ensures uniform quality of services and adherence to professional ethics and technological procedures.

Consequently, the current state of the National Library of Uzbekistan demonstrates a high level of readiness for implementing micro-libraries. Its resource base, digital environment, and organizational structure provide a solid foundation for expanding services through decentralized formats.

3. Organizational and technological aspects of micro-library implementation

Principles of organizational structure. The organization of micro-libraries should be based on the principles of integration, flexibility, and user orientation. Each micro-library functions as a structural unit of the National Library system rather than an independent institution. This ensures methodological unity, centralized cataloging, and coordinated collection development.

Flexibility is reflected in the ability to adapt micro-libraries to various environments: educational institutions, community centers, public spaces, or remote settlements. Their structure may vary depending on local conditions, but all units remain connected to the central information infrastructure.

Collection formation and resource selection. Unlike large libraries, micro-libraries operate with limited physical space. Therefore, collection development should follow a selective and user-oriented approach. Thematic micro-collections may focus on education, professional development, children's literature, or local history.

Digital resources play a dominant role. Access to electronic books, databases, and digital archives compensates for the limited size of physical holdings. Regular monitoring of user needs allows continuous updating of micro-collections, ensuring their relevance.

Technological equipment. The technological configuration of a micro-library typically includes:

computer workstations with internet access;

terminals connected to the central electronic catalog;

devices for scanning and printing;

multimedia equipment for educational activities;

secure communication channels for data exchange.

Cloud technologies and centralized servers allow micro-libraries to operate without maintaining complex local IT infrastructure. Remote technical support from the National Library ensures system reliability.

Integration into a unified information system. A fundamental requirement for micro-library effectiveness is integration into a unified library information system. This integration enables shared catalogs, unified user registration, and interlibrary loan services. Users of micro-libraries gain access to the same resources and services as visitors of the central library, ensuring equality of information opportunities.

Standardized software solutions, metadata ▸

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formats, and service protocols guarantee interoperability. This network model transforms micro-libraries into distributed access points of a single national information ecosystem.

Service Models and User Support. Micro-libraries provide a combination of traditional and innovative services:

- lending of selected printed materials;
- access to digital collections and databases;
- information and bibliographic consultations;
- educational workshops and training sessions;
- support for distance learning and research.

Staff members act as information mediators, assisting users in navigating digital environments and developing information literacy skills. This educational role enhances the social significance of micro-libraries.

4. Social and practical effectiveness of micro-libraries

Expanding territorial access to information. One of the most significant advantages of micro-libraries is their ability to overcome spatial barriers that traditionally limit access to information resources. In many regions, especially in remote or less densely populated areas, the physical distance from major library centers reduces the frequency of library use and limits participation in educational and cultural activities. Micro-libraries, located in community-based spaces such as schools, cultural centers, or local administrative buildings, function as decentralized access points that bring information services closer to everyday life.

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By reducing the need for long-distance travel, micro-libraries contribute to more equitable territorial distribution of library services. This decentralization aligns with modern principles of inclusive information policy and supports the idea that access to knowledge should not depend on geographic location.

Reducing information inequality. Information inequality remains a critical challenge in the digital era. Differences in income, education level, digital skills, and infrastructure availability create unequal opportunities for accessing information and participating in knowledge-based activities. Micro-libraries help mitigate these disparities by providing free or low-cost access to digital technologies, internet resources, and professional assistance.

In this context, micro-libraries act as instruments of social inclusion. They support vulnerable population groups, including students from low-income families, elderly users, and individuals with limited digital literacy. By offering guided access to information resources and educational programs, micro-libraries promote equal participation in cultural and educational life.

Promotion of reading culture and lifelong learning. Micro-libraries play an important role in strengthening reading culture and supporting lifelong learning. Their presence in everyday social environments increases the visibility of books and educational resources, encouraging spontaneous engagement with reading. Thematic micro-collections, tailored to local interests, make literature more relevant and attractive.

Moreover, micro-libraries often function as venues for lectures, workshops, and training sessions. Such activities foster continuous education beyond formal schooling and create opportunities for professional development, personal growth, and community interaction. In this way, micro-libraries contribute to the formation of an active, informed, and culturally engaged society.

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Strengthening the social role of libraries. The transition from passive resource storage to active community engagement is a defining feature of modern librarianship. Micro-libraries embody this shift by serving as multifunctional social spaces where information, education, and communication intersect. They host discussions, cultural events, and collaborative learning activities, strengthening social cohesion and civic participation.

Through these functions, micro-libraries enhance the public perception of libraries as dynamic and socially relevant institutions. Their integration into daily community life reinforces the idea that libraries are essential elements of social infrastructure.

Economic and organizational efficiency. From an economic perspective, micro-libraries represent a cost-effective model of service expansion. Establishing small, technologically connected units requires fewer resources than constructing large branch libraries. Shared digital infrastructure, centralized cataloging, and remote technical support reduce operational costs.

At the same time, the distributed model allows flexible scaling of services according to demand. This efficiency makes micro-libraries a sustainable solution for extending library coverage under limited financial conditions.

Development prospects and strategic directions

Integration into national information

policy. The further development of micro-libraries should be considered within the broader framework of national information and educational policy. As instruments of knowledge dissemination, micro-libraries can support government initiatives aimed at digital transformation, education reform, and cultural development. Strategic planning should include the formal recognition of micro-libraries as components of the national information infrastructure, ensuring stable funding, regulatory support, and methodological coordination.

Technological innovation and digital expansion. Technological progress will continue to shape the evolution of micro-libraries. The introduction of cloud platforms, mobile applications, artificial intelligence tools for information retrieval, and digital learning platforms can significantly enhance service quality. Future micro-libraries may function as hybrid digital hubs, providing not only access to library resources but also to e-government services, online education platforms, and community information systems. This integration will strengthen their role as multifunctional knowledge centers.

Professional development and methodological support. The effectiveness of micro-libraries depends largely on the competencies of their staff. Continuous professional training in digital technologies, user communication, and information literacy instruction is essential. The National Library of Uzbekistan can act as a methodological center, developing training modules, guidelines, and best practice standards. Such coordination ensures uniform service quality and promotes innovation across the entire network.

Partnership and community engagement. Sustainable development of micro-libraries requires cooperation with educational institutions, local authorities, cultural organizations, and non-governmental actors. Partnerships facilitate resource sharing, joint events, and integration into local development initiatives. Community involvement also increases user trust and participation, transforming micro-libraries into truly community-oriented institutions.

Long-term vision. In the long term, micro-libraries may become an integral part of a distributed national knowledge network, linking central repositories with local communities. Their evolution reflects a broader shift toward flexible, technology-driven, and socially responsive library systems.

Conclusion

The conducted analysis demonstrates that the implementation of micro-libraries within the activities of the National Library of Uzbekistan represents a promising direction for modern library development. Micro-libraries complement the traditional centralized model by extending services to local communities, reducing information inequality, and supporting education and social inclusion.

The resource potential, digital infrastructure, and organizational capacity of the National Library of Uzbekistan create favorable conditions for the formation of a micro-library network integrated into a unified information system. Organizational flexibility, technological connectivity, and user-oriented service models ensure the sustainability and effectiveness of this approach.

Micro-libraries serve not only as access points to information resources but also as social and educational centers that strengthen reading culture, promote lifelong learning, and enhance the public role of libraries. Their development aligns with global trends in digital transformation and knowledge accessibility.

Thus, micro-libraries can be considered a strategic instrument for modernizing the national information and library system, expanding territorial coverage, and implementing innovative projects that respond to the evolving needs of society.

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