Service Innovation of University Library in era of big data

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Abstract
With the rapid development in the area of information technology, The needs of scientific research and learning needs of teachers and students in Colleges and universities have changed a lot, and access to information, readers use has also undergone tremendous changes. With the coming of the era “Education informatization ” and “ Big Data ”, people's demand for intelligent information is more urgent, this management and service of university library are put forward new challenge.

Keywords
Big data, University Library, Service innovation.

1. Introduction
With the rapid development of modern information technology and network communication technology, the library and the society is becoming more and more closely linked, the data also increased. The research and application of big data theory and technology will become one of the new business libraries.

At the present stage, the advocate of digital library with digital information resources, information by sharing information and providing knowledge and information entities virtualization, networking, information passing. Therefore, a measure of the ability of information service in digital library, also no longer with collections as evaluation criteria, and more is to the information resources effective access as the basis, which requires the information service of the digital library must be made for market information needs of development of information products and services, and information products and services to accept the market test. The university library should not only combine the traditional library and digital library, paper resources and electronic resources complementary, based on digital resources, but also to achieve knowledge sharing services, pay attention to the big data. Big data call information providers using clustering analysis, correlation analysis techniques such as deep mining personalized needs of users, to provide users with accurate service. Users expect to obtain information more diverse, more convenient access to channels and time to obtain a more timely, the more valuable data.

Access to information in the digital era readers channel from paper-based resources gradually to the transition of electronic resources, so University Library's information service from four part composition: one is the lending service of the traditional library.; the second is based on information technology consulting information consulting services; the third is the on-line information retrieval service; the fourth is public information demand of social hotspot service oriented. The advent of the era of big data in the rich original content of information service, the information service of university libraries are more targeted, it means that university libraries need to use techniques and tools for complex data analysis to the value of big data mining, through data analysis to further improve the level of information services.
2. What is the era of big data

So far, the definition about the concept of "big data" is not a unified and accurate. The academic circles the so-called "big data is that related to the number and size of huge, not through artificial within a short time of data collection, collation, analysis and statistics, it has large amount of data, and many kinds of speed, strong real-time. In May 2011, global famous consulting firm McKinsey first proposed the concept of "big data. As a result, the data pushed to the frontier for the development of the Internet. With the rapid development of Internet, data has become the information age factors essential reference for all walks of life.

3. The problems in University Library under the era of big data

The service quality of the library is generated in the needs of users, management thinking, library information resources, information technology and equipment, and other factors on the basis of the librarians to provide information services for users, and the function of the university library is to provide literature information resources guarantee and service for scientific research and teaching of university teachers and students. But the current university library in China has many problems in the era of big data, includes the following part:

3.1 Librarian quality needs to be improved

Compared with the previous library, construction equipment, circulation and reading services competition, the core of competition between the era of big data library will be has large amount of data, mining large data and the ability of data analysis.

As schools serve the teaching and scientific research information center, but also to make full use of thinking big and big data technology, found to have the potential value of information, for teachers and students to provide efficient and intelligent service of university library. At the same time, the development of university library strategy formulation and implementation also needs a comprehensive support for large data.

For traditional library, as a librarian, the main comprehensive professional quality requirements is collection of document acquisition and cataloguing, physical custody, to provide readers with information services such as. So the colleges and universities library staff of the business department is equipped with a view, and temporary employees accounted for the majority of the library staff, education in this part of the staff and low comprehensive quality, it is difficult to carry out deep reference service; and passive on service idea strikes root in the hearts of the people, managers easily satisfied borrowing and returning service. And under the background of big data, the comprehensive quality of librarians have more high, update requirements, library is not only the window of knowledge, librarian should not only guide the reader to make full use of the resources in the library, for the network information resources, carefully arrange, collect, of information the reader needs to timely analysis and master, so that readers of different needs are met.

3.2 Network books bring impact

With the rapid development of digital information technology, online bookstore, online virtual database and a variety of free and open online library filled with the Internet, making traditional library reader loss phenomenon is becoming more and more serious, which brings pressure and challenge to the development of the traditional university library.

With the rapid development commercial database of CNKI, VIP, Wanfang, supernova launched, the type and quantity of digital resources in libraries of colleges and universities has increased dramatically. Thus to library digital resources construction has brought many problems, such as the growing data repeat construction phenomenon, funds of the construction of digital resources in University Library inadequate investment, lack of digital resource allocation characteristics, the
homogenization of serious, professionals in the construction of digital resources is shortage, digital resources construction standards and service and other aspects of the problem more prominent.

4. Big data era of university library service innovation measures should be taken

4.1 To improve the comprehensive quality of librarians, enhance the service concept

For university library to the service level of library innovation, first of all, we should improve their own quality of librarians, improve their professional standards and professional spirit, to create a lifelong learning atmosphere for the librarian. For example, can be taken to strengthen job training and on-the-job learning, interlibrary exchanges, seminars and network learning in a variety of ways to encourage librarians to improve their professional level. At the same time, the librarians should combine theory with practice, so that the scientific research theory and practical work together, not only improve the scientific research ability of librarians, but also improve the level of the work of librarians, and thus promote the development of University Library career. In the daily service should pay attention to the humanistic care, advocate the smile service, the establishment of a harmonious and harmonious relationship between teachers and students, so that readers are willing to enter the library.

4.2 The sharing of resources and give full play to the overall advantages of the library alliance in Colleges and Universities

The collection resources of university library should be closely related to the school running practice, the combination of disciplines and professional construction, to provide services for the school's teaching and research, the acquisition of resources and the construction of digital resources should be used as the goal.

Therefore, the collection of literature resources should not only be targeted, integrity and continuity, but also reflect the characteristics of the school discipline. At the same time, we should strengthen the construction and sharing of the same kind of University Library in the construction of resources, and add more digital resources to build a shared range, such as the planning, selection and standard of special database, the construction of characteristic database can be combined to make up the deficiency of the library resources of university library.

4.3 To maximize utilization of literature resources limited the value of purchasing funds

Book purchase is one of an important part of the work of university library, collection construction quality and quantity by the level of book editing, editing level is directly related to the library for teaching and scientific research and provide service level. Today, published literature on chaos and literature price is rising year by year, and library funding constraints to be interviewed by the library staff brought great challenges. Under the environment of big data, the demand of the readers were effective analysis possible, borrowing system data in the library's search history, readers recommended through the purchase system recommendation record, data for analysis and data mining, can accurate reader orientation tend to the needs of the, so as to provide valuable resources.

4.4 Make full use of the Internet and mobile client to achieve service innovation

Now mobile phones have become college students commonly used communication and information browsing tools, the era of big data information service of university libraries can use SMS reminder service, achieve borrow books remind, book preview reminders, to make an appointment to remind a variety of information push service, the hands of the real-time information sent to the reader. Can also use of micro channel public platform to promote and push the library services and resources, improve the speed of information transmission, and the optimization of the information presentation, to enhance the customer service experience.
Can also be based on the reader's Internet port browsing content, search history and other data collection and analysis, mining and discovery of the interests and needs of readers, so as to carry out dynamic information recommendation service. Namely when the reader in the search platform to search a common keywords, through the dynamic page prompts users more keywords and other information that may be of interest to users, but also through the user's browsing habits, regularly recommend relevant information resources to the user. For example according to the access to the user's preference and new, to the user recommend relevant information resources thematic and discover new information consistent with the needs of the users of real-time notification push.

5. Conclusion

Big data is the inevitable result of scientific and technological progress, can be more time saving, labor saving and accurate information content, through the statistics, analysis and processing of the data, for the University Library procurement books, the preparation of directories, consulting and guidance, retrieval service points out the direction.

It brings challenges and opportunities to the library. Although there is a big gap between the existing human resources and large data environment of university libraries, libraries need to understand the big data correctly, promote the application of large data, innovate management thinking to cultivate large data talents, develop and introduce large data technology to master user needs, dig the effective data, and according to user needs to carry out personalized push service, can let users actually feel the efficient service of the library.

Reference

