Analysis of Smart Library Construction Based on Big Data Platform Framework

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Abstract. Smart library is one of the main representatives of the development of modern society, so in the process of construction, big data technology is needed to provide technical support for the construction of smart library, which is conducive to optimizing and improving the construction process of smart library. This paper firstly analyzes the basic concepts of big data platform and smart library in detail, and takes this as the starting point of the research, combined with the role of big data platform smart library construction, summarizes the current situation and optimization strategy of smart library construction.

Keywords. Big Data; Smart Library; Reading Demand; Structural System

1. Introduction

The big data platform framework contains important professional technical principles and operating modes. Therefore, through the use of big data technology, staff can not only efficiently organize the data and information on the platform, but also use the big data platform architecture as technical support to build wisdom. The application of big data technology in the smart library not only effectively solves the local technical problems, but also effectively solves the problem of insufficient construction of the overall structure, and makes long-term planning for the construction of each link of the smart library.

2. Big data platform

The rapid development of modern digital information technology is mainly due to the basic support of the big data platform. Because the logical relationship of big data processing technology is relatively complex, it can achieve the goals of diversification of technical means and application environment. Therefore, this technology is widely used in the research field. A relatively unified concept has not yet

been formed. Therefore, in the analysis of smart library construction, we should fully combine the big data platform structure, define the technology as a database based on massive new resources, and fully combine the basic requirements of actual construction projects, use digital technology for systematic analysis, so as to provide different The development and progress of the industry provide technical guarantees. In the application and operation of modern big data technology, the unstructured data characteristics of big data are mainly used as the basic conditions for intelligent, digital and refined technological innovation and application, thus providing new energy for the development of the digital industry [1] .

3. The role of big data platform smart library construction

3.1. Meet the basic needs of the library

In the construction process of big data platform smart library, its ultimate goal is to provide students with more scientific and reasonable library services. Therefore, in the link of library infrastructure construction, how to meet the basic needs of students has become a key content in library construction. Firstly, wisdom library on the construction and daily management links, can make full use of big data technology system of management of student's personal data, such as: students like books, writer, reading habits, etc., in view of the above information and data after detailed analysis, can make a push system has obvious difference of books, in order to meet the needs of different types of students reading.

Secondly, big data operation technology can also screen students, effectively and conveniently help students filter out the books and reading materials they are not interested in, so as to select the articles and content they need or are interested in more quickly. Second, in the whole process of library construction, big data technology can not only further meet students' basic reading needs for books, but also minimize the time for students to choose books, so that students can reasonably plan their own time.

3.2. Improve the platform structure

In the implementation process of big data technology operation structure system, it can provide technical support for the infrastructure construction of the command library. On the one hand, in the actual construction of the smart library structure, the application structure system of big data technology is not a simple overlay of technology application and functions, but also needs to include the cooperation between different operation technologies. In the structural system construction of big data technology, the smart library has gradually formed a systematic and efficient data integration project, and the library is running in the direction of platform. By big data, on the other hand, technology research and operation, the internal structure of the operation logic way can help staff get inspired the basis of more comprehensive, as a basic condition constantly optimize the construction scheme, finally build meet many aspects, such as students, teachers and schools to the operating requirement of query and used books and literature. This mode is not only the basis of intelligent intelligent library, but also a platform structure conforming to the basic logical thinking mode, which is directly related to the sustainable development and progress of the school [2].

3.3. Improve management efficiency

With the introduction and use of big data technology, the efficiency of smart library infrastructure

construction has been effectively improved.

First of all, the wisdom of the construction of the library each construction link, big data technology can effectively change the traditional ways of working, to ensure that the staff through online platform docking work conditions in detail, such as: task dock audit, consulting the collection process, management content correction, modification scheme, fundamentally improve the efficiency and quality of the intelligence library infrastructure level.

Furthermore, there is a close connection between big data operation technology and traditional computer technology, artificial intelligence technology and Internet of Things technology. Therefore, when technical personnel actually operate big data technology and operating system, they also need to actively adapt to the operation types of various technologies. In the whole management and operation process, the staff need to gradually improve the basic office capacity of informatization and digitalization, fundamentally accelerate the pace of the construction of the smart library, and fulfill the requirements of the construction of the smart library in advance [3].

4. PRESENT SITUATION OF LIBRARY CONSTRUCTION

4.1. Slow construction

Although some schools have always paid attention to the construction of smart library, they have not been able to implement it in practice, resulting in a very slow process of smart library infrastructure construction. The main reasons for in-depth exploration are as follows:

A. Some colleges and universities still use traditional management thinking to build smart libraries in daily library management links, unable to pay attention to the use of construction technology and technical research. Therefore, the main difference between the smart library and the traditional library management mode is that the smart library effectively combines a variety of modern operation technologies. However, this situation leads to the serious hindrance to the infrastructure construction of the smart library once the professional support is lacking, and it cannot achieve the due development.

B. After the introduction of modern equipment and professional technology, most colleges and universities are unable to introduce matching technical personnel, so in order to solve the above problems and deficiencies, most colleges and universities will choose to carry out professional technical training, but technical training takes a certain time to achieve certain results, so in essence, In order to fundamentally increase the efficiency of smart library infrastructure construction, schools should not only solve the problems of professional technology, but also effectively solve the problem of talent introduction.

4.2. Out of touch with actual requirements

At present, some schools excessively pursue the intelligence of smart library, thus ignoring the real requirements of students.

Development first, practical wisdom library, some school focus all of their research focus on technical issues, not from the actual demand for books of students, so just have advanced science and technology cannot let students adapt to the basis of the intelligence library operation and the management pattern, is not conducive to the cultivation of the students reading books. Second, although some smart libraries integrate advanced management techniques, students cannot quickly

understand and master smart technologies in actual use, so they need more time to get familiar with the whole operation process and methods, and cannot complete quick search in a real sense [4].

4.3. The platform structure is not scientific

Wisdom library in the process of establishing not only needs to contain a variety of professional knowledge, also need to use this as basic condition to build the structure of platform, but some schools only focus on professional and technical research, rarely can integrated platform for supervision and so on into consideration, this situation lead to some schools only simple technical study, cannot focus on inclusiveness between each application technology, In the long run, the scientific and technological means which are not practical and scientific in the smart library have seriously hindered the students' sense of experience in reading books. In addition, some practical to carry out the intelligence library platform structure design, can't pay attention to the important roles of safety, because of the intelligence library contains a number of professional network technology, network risk question so once, will directly endanger the normal operation of the platform structure, serious and even cause wisdom library data loss.

5. Big data platform architecture smart library construction strategy

5.1. Using big data

In order to better match students' actual demand for books, the school smart library should focus on the following aspects of construction content.

First, in terms of the application technology research of the smart library, schools should not only pursue the advanced nature of technology, but also always meet the actual requirements of students for books. For example, since the big data structure system contains powerful technical analysis and application functions, the school can make full use of the big data analysis function to effectively integrate the differences of different types of students in reading books, accurately push the books that students pay attention to, and thus cultivate students' good interest in reading.

Second, the use of big data analysis and management technology, wisdom school library can running parameters test, on the basic conditions determine whether technical services has practical implications in detail, the test results can effectively reflect the needs of college students of different types, is advantageous to the staff to further improve and optimize the wisdom of the library service level.

5.2. Accelerating the development process

In order to effectively accelerate the construction process of smart library, it is necessary to carry out technical construction through different channels and measures [5].

Firstly, because the wisdom library and traditional library has essentially difference, so the actual construction of school library, should focus on technology research and use of the computer technology, artificial intelligence technology and the Internet technology matures, the wise library construction ways, schools can give full play to the role of big data technology for information integration, Effectively systematize the various types of professional technical parameters, find out the compatible channels of various technical systems, give full play to the advantages and characteristics of various technologies, and fundamentally promote the orderly construction of the smart library.

Secondly, in order to further speed up the wisdom library construction steps and processes,

schools not only need to strictly control system of technology import, need on the management of related personnel for this school can organize regular technical training of library construction and management, big data library skills training, etc., to continuously improve staff use big data technology ability level, In order to facilitate the staff to integrate resources. In addition, the school can also introduce technical talents, always around the big data integration function to innovate the construction of smart library channels, fundamentally improve the work efficiency and quality level.

6. Conclusion

It can be seen that in the construction of the smart library based on the big data platform architecture, the construction of humanized functions has become the main goal of the construction of the smart library, so as to realize the mutual combination of digitalization, information technology and humanistic feelings. For the construction of smart library, complex information and data resources have become one of its obvious characteristics, so it is necessary to actively introduce the Internet of Things technology, information and communication technology and big data processing technology, which is also an important means to meet people's growing demand for resources, humanistic care and scientific research and innovation requirements.

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