# Research on the development of enterprise accounting information system in the era of Dazhi mobile cloud

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**Abstract:** the continuous progress and development of science and technology has led to the emergence and development of advanced technologies such as big data, cloud computing and artificial intelligence, and promoted the arrival of the era of big intelligence moving to the cloud. In the era of smart mobile cloud, accounting information system has become the inevitable trend of the development of enterprise financial management. Based on this, this paper analyzes the promotion of Dazhi mobile cloud to enterprise accounting information system, and actively explores the specific construction path of enterprise accounting information system in the era of Dazhi mobile cloud in China.

Key words: Dazhi moving cloud; Enterprise accounting information system; Blockchain technology; Search engine technology

# **Introduction:**

smart mobile cloud is a general term for advanced technologies such as big data, artificial intelligence, mobile Internet and cloud computing. Using Dazhi mobile cloud technology to analyze and process data has an important impact on finance, taxation, economy and other aspects. In April, 2020, the China Development and Reform Commission and the central office of cyberspace issued the notice on the implementation plan of promoting the "Cloud Application of digital intelligence" and cultivating new economic development, and put forward the requirements of "cultivating digital ecology" and "building digital enterprises". For the development of enterprise financial accounting, the development of Dazhi mobile cloud technology and its application in financial management are both opportunities and challenges. In this regard, we also need to carry out in-depth analysis and Research on the construction of the accounting information system of opportunity smart mobile cloud technology.

# 1. The promotion of Dazhi moving cloud to enterprise accounting information system

1. Provide strong support for enterprise finance and taxation system

Accounting information system is the core of enterprise internal management information system. The arrival of the era of smart cloud migration and its wide application in the enterprise accounting information system can not only improve the efficiency of the accounting system, strengthen organizational management, but also promote the continuous improvement of the enterprise financial and tax management system, promote the intelligent and information development of enterprise financial and tax management, so as to inject new blood into the development of enterprises. In addition, the application of smart mobile cloud in the enterprise accounting information system can effectively monitor the accounting work office process, realize the intelligent supervision of accounting work, and improve the timeliness and accuracy of enterprise decision-making.

In the traditional business model, the communication and connection between the accounting department and other departments are mostly through oral expression, which is prone to the problem of inadequate information transmission or buck passing. The construction of accounting information system based on Dazhi mobile cloud can ensure the clarity of division of labor and the transparency of information notification, and establish a good platform for enterprises to upload and issue information and departments to communicate, thus greatly improving office efficiency.

2.Realize enterprise accounting sharing service

Accounting sharing service is an information-based and professional accounting management mode for enterprises based on the "smart mobile cloud" technology, based on the conventional business and financial processes, with the purpose of standardizing the accounting workflow, improving the internal organizational structure, improving the accounting efficiency and creating the actual value of operation, and following the law of market development. In the process of enterprise operation, accounting sharing service can exist as an independent department, serving the formulation of enterprise strategic objectives and the realization of value pursuit, so as to continuously optimize the enterprise accounting office process and help enterprises build a more scientific and reasonable performance evaluation index system. In addition, the construction of shared financial and accounting services can also effectively help enterprises innovate business strategies. This service can efficiently store and manage all kinds of accounting data information of enterprises. With the application of Dazhi mobile cloud technology, the accounting department can use big data to analyze, summarize and calculate all kinds of accounting data, so as to provide a reliable reference for enterprise decision-making, which not only optimizes the enterprise management process, but also improves the implementation efficiency of enterprise upload and release.

3. Promote the integration of industry and finance of enterprises

At present, some enterprises in China have not yet realized the necessity of the integration of industry and finance, and there are still problems of departments acting independently and independent of each other, resulting in the incompatibility of business data and accounting data. The construction of enterprise accounting information system based on "smart mobile cloud" technology can effectively promote the integration of enterprise accounting and business, establish a business integration team, realize the close cooperation between

business departments and accounting departments, and improve the communication efficiency of departments. Cost control is an important part of enterprise operation management. The responsibility of the accounting department is to do a good job in cost prediction and control, cooperate with the operation Department to formulate a full range of budget plans, assist the operation Department in carrying out various work, and promote the development of the enterprise.

# 2. Construction of enterprise accounting information system in Dazhi cloud Era

#### 2.1 Architecture

1.Perception layer

The perception layer of enterprise accounting information system based on Dazhi mobile cloud technology applies b/s mobile input devices, radio frequency identification devices and image scanning devices, which can effectively perceive various financial data, image data, audio and video generated in the daily operation and management activities of enterprises. In addition, the perception layer can automatically convert and pre clean various forms of data in the accounting information system, so as to maximize the application value of the original financial data. The perception layer can collect relevant data in time at the time node when the business occurs, so as to realize the real-time monitoring of financial work. Once an abnormal situation occurs, it can be responded in time, so as to effectively avoid financial risks.

## 2.Data layer

The data layer of accounting information system based on Dazhi mobile cloud technology can obtain data in real time from the perception layer, measure, classify and migrate the data, and finally store the perception layer data in the database. In the database, data can be automatically stored and placed intelligently according to its specific classification. The system will automatically store the hot and sensitive data of the enterprise in the priority position, so that the accounting personnel can efficiently query and call the data, thus greatly improving the efficiency of data processing.

## 3.application layer

The application layer can collect all kinds of cloud applications, so as to provide users with information access channels, which is convenient for accountants to carry out various specific business operations. In the era of smart mobile cloud, the enterprise accounting information system can also use blockchain technology to divide it into accounting query, accounting, decision support and other subsystems. The introduction of blockchain technology can better meet the actual needs of the accounting department for accounting, fund management and other work. In addition, in the application layer of the accounting information system, models of accounting, operation and strategic decision-making can also be introduced to realize the timeliness and efficiency of various work, so as to effectively reduce the operating costs of enterprises and improve the operating efficiency.

# 4.User layer

The user layer is the entrance for users to access the accounting information system, mainly relying on search engine technology to provide information retrieval services for users. In the process of applying the accounting information system, users can log in through mobile app or web browser according to their own needs. The user layer can not only provide users with accounting data query services, but also realize the effective connection with financial departments and tax authorities through the user interface, and effectively integrate enterprise accounting data, fiscal and tax policies and financial policies, so as to realize the real-time sharing of financial information and avoid the problems of not uploading and releasing in time and not in place.

# 5.Real time monitoring layer

The real-time monitoring layer of the accounting information system based on Dazhi mobile cloud can monitor and manage the whole system in an all-round way, including access rights management, security management, service project management, etc. After the corresponding software program is introduced into the system, the real-time early warning device can be installed in the system, so as to detect the operation of the equipment more scientifically, detect and intercept malicious access behavior in time, and realize the real-time supervision and protection of the system. In addition, the real-time monitoring layer can also record and analyze the server response time in real time to understand users' satisfaction with the system, so as to optimize the service content and improve the service quality.

# 6.Supporting layer

The service layer of accounting information system mainly includes infrastructure layer and platform layer, which can provide technical support for system operation. Among them, the infrastructure layer can virtualize the system data resources and hardware resources through service encapsulation technology and virtualization technology, so as to realize the automation and intelligence of accounting business processing process and improve the efficiency of enterprise resource management. The platform layer can provide enterprises with software development, management and maintenance, online upgrade and other services. When applying accounting information system, enterprises should develop personalized financial software according to their actual needs. Even when the national fiscal and tax policies and accounting standards change, relevant software or services can be upgraded online according to the change trend.

### 2.2 Key technologies

## 1.Blockchain Technology

The application of blockchain technology in enterprise accounting information system is a basic technology based on the principle of cryptography to record and analyze the flow of enterprise funds in real time, so as to form a distributed database. In the enterprise accounting information system, the blockchain can establish distributed account books through the combined application with smart contracts, so as to

record various capital activities of enterprises in real time, capture transaction information and store it in specific blocks. The blockchain of enterprise accounting information system includes many nodes. If the system records a transaction, its data will automatically match with other nodes. If the match is successful, the relevant transaction data will be automatically stored in the distributed account book. If the matching fails due to information errors such as financial data errors and false reimbursement vouchers, the transaction data will be included in the account book. It can be seen that the application of blockchain technology in accounting information system can not only save labor costs for enterprises, but also ensure the accuracy of input data. In addition, the application of specific encryption technology can encrypt the distributed account book, and then form the accounting copy and specific key. When the user sends an access request to the system, the system will automatically issue the key and copy to the user. Individual users have no right to modify the existing content, which can effectively ensure the integrity of information and reduce the risk of financial information being stolen and abused.

## 2. Search engine technology

The conventional information search engine mainly has the following two problems: first, the information retrieval results are mainly documents, which are difficult to understand and require readers to have a certain accounting knowledge background; Second, it is difficult for the searched structured data such as image data, research data and supply chain data to be effectively integrated. The application of "smart mobile cloud" technology can effectively integrate the unstructured information in the system, and deeply explore and analyze the utilization value of information. In addition, the system can quickly search the relevant information in the system with the help of visual information and similarity information, so as to improve the accuracy of information retrieval; Moreover, the retrieval results can also be presented in more intuitive forms such as pictures and videos, thus reducing the difficulty for users to understand.

#### 3. Access control technology

For enterprises, the data information stored in the accounting information system has a high value of use. Many service providers have experienced information leakage and data loss in the process of operation, such as Amazon, Google, etc. In the era of smart mobile cloud, enterprises and service providers are in a cooperative relationship. In order to enhance mutual trust, it is necessary to generate keys through a third-party organization to realize the real-time exchange of data and management, so as to realize the effective control of system orientation. When the user sends an access request to the system, the third-party organization can automatically determine whether its attribute geometry is valid to meet the user's data access needs. The third party organization is responsible for providing users with the required attribute set and the matching key. Users can access the encrypted file after receiving the key.

## 3. Conclusion

The enterprise accounting information system based on Dazhi mobile cloud technology is the product of the joint effect of the development of science and technology and the transformation of accounting work. The application of the system can effectively improve the efficiency of enterprise accounting work and promote the modernization of enterprise management mode. In short, the application of enterprise accounting information system should become the inevitable trend of the transformation and upgrading of accounting work in the era of smart cloud. Although there are still some limitations in the application of the system at this stage, with the continuous development of science and technology and the continuous improvement of the system, the system is bound to be more widely used, and it is bound to create more economic benefits for enterprises.

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