

Analysis of Financial Data Issues in Real Estate Enterprises During the Era of Big Data

Yujie Xie *

Hefei Urban Construction Development, Hefei, Anhui, China

**Corresponding Author.*

Abstract: In the era of big data, financial data management has become an indispensable part of modern enterprise management for real estate enterprises, characterized by diverse sources, formats, quality, and security. By providing precise data analysis, it helps companies grasp the financial context and leads them towards more scientific and efficient management paths. In the future, as technology continues to advance, big data will play a greater role in the financial field, driving enterprises to achieve continuous innovation and development. To excel in the financial management of real estate enterprises in the big data era, it is essential to cultivate advanced data analysis talents, adopt new analytical tools, enhance the application of results, and fully leverage the advantages of big data.

Keywords: Big Data; Real Estate Enterprises; Financial Data; Challenges and Opportunities; Reflections

1. Introduction

In the era of big data, As a critical basis for enterprise management and decision-making, the quality of financial data management and application directly affects the competitiveness and development potential of enterprises^[1]. However, current real estate enterprises encounter numerous issues with financial data, such as diversity in data sources, formats, and quality, as well as problems regarding data security^[2]. These not only increase the complexity of data processing but also affect the accuracy and efficiency of decision-making. Therefore, strengthening financial data management and enhancing data analysis capabilities have become critical issues that need urgent resolution for real estate enterprises.

New Characteristics of Financial Data in Real

Estate Enterprises

In the era of big data, real estate companies accumulate vast amounts of financial data in various stages such as project development, sales, and operations. Big data technology enables more comprehensive and timely collection of this financial data. Firstly, compared to traditional financial management that is limited in terms of data acquisition timeliness and scope, the application of big data technology allows companies to monitor their financial status in real-time, respond rapidly to market changes, and facilitates better management of company expenses. Secondly, big data analytics tools can extract valuable information from massive datasets, helping businesses predict market trends, optimize resource allocation, and through detailed and strict budget planning, achieve the goal of controlling costs and ensuring funds are allocated to the most critical projects. Additionally, big data also plays a crucial role in risk management. By deeply analyzing historical data, real estate enterprises can better identify potential risk points, take preventive measures, enhance financial accounting, thereby reducing losses^[3].

2. Main Problems Faced by Financial Data in the Era of Big Data

2.1 There is Diversity in Data Sources

In the context of big data, the construction of financial systems in real estate enterprises faces the challenge of diverse data sources^[4]. These data may come from different databases, file formats, and business systems, such as sales, costs, investments, etc. This makes data integration difficult and requires advanced technologies and methods for processing. Meanwhile, diverse data also provide enterprises with rich information resources, helping to gain a more comprehensive

understanding of the market and customer situations, optimizing financial decisions. Therefore, real estate enterprises should actively address this challenge, strengthen data integration and management, and enhance financial management levels^[5].

2.2 There is Diversity in Data Formats

In today's data-driven era, enterprises face massive tasks of data management and analysis. However, the lack of uniformity in data formats has become a prominent pain point. Due to independent operations of departments or systems within enterprises, adopting various data standards and formats directly leads to difficulties in data integration and increases the complexity of data processing. Non-standardized data formats exacerbate the phenomenon of information silos, limiting the depth and breadth of data analysis, thereby affecting the quality and efficiency of decision-making. Therefore, promoting standardization of data formats and achieving interconnectivity of data are crucial for enhancing enterprises' data management capabilities and decision-making levels^[6].

2.3 There is Diversity in Data Quality

In the data-driven era, the quality management of financial data is particularly important. Due to the diversity of data sources, data quality varies greatly, posing considerable challenges to enterprise decision-making. High-quality data can provide accurate information support for enterprises, aiding management in making wise decisions; whereas low-quality data may lead to incorrect judgments and even bring unquantifiable losses. Therefore, strengthening the quality management of financial data and ensuring its accuracy and reliability are key to enhancing core competitiveness^[7]. Only by continuously optimizing data processing procedures and improving data quality can enterprises remain invincible in fierce market competition.

2.4 There is Diversity in Data Security

In the era of big data, data security risks cannot be ignored. In the digital wave, hackers lurk in the sea of networks, constantly looking for gaps in the data. Once defenses are relaxed, personal privacy and corporate secrets could be leaked without reservation^[8]. To counteract this, it is necessary to strengthen protective

measures, starting from both technical and managerial dimensions, to ensure the security and integrity of data. At the same time, the timeliness of data updates is equally important. Untimely data updates cannot accurately reflect the current state and trends of businesses, leading decision-makers to make precise judgments based on outdated information. This not only affects the quality of decision-making but may also lead to missed opportunities and accumulated risks.

3. Reflections on Managing Financial Data for Real Estate Enterprises in the Era of Big Data

3.1 The Cultivation of Senior Data Analysis Talents.

In the era of big data, every aspect of business operations accumulates a vast amount of financial data. Big data technology enables more comprehensive and timely collection of this financial information. Compared to traditional financial management where data acquisition was limited in timeliness and scope, the application of big data technology allows businesses to monitor their financial status in real-time and respond swiftly to market changes. Moreover, big data analytics tools can extract valuable insights from massive datasets, aiding businesses in predicting market trends and optimizing resource allocation. Additionally, big data plays a crucial role in risk management. By deeply analyzing historical data, companies can better identify potential risk points, take preventive measures, and thus reduce losses. While the age of big data brings convenience to businesses, it also sets higher standards for financial professionals. In the era of big data, the shortage of advanced data analysis talent is a significant challenge for real estate enterprises. Senior data analysts not only need profound statistical knowledge but also an in-depth understanding of real estate business operations and the ability to transform complex data into intuitive business insights. Therefore, enterprises should invest in training and recruiting data analysis talent to enhance their analytical capabilities; at the same time, they must actively train existing financial staff for transformation and improvement to adapt to financial management work in the context of big data. Firstly, financial personnel need to

possess data processing abilities, mastering basic skills in data analysis and mining to handle and analyze large volumes of financial data. Secondly, they need to have the ability to apply information technology, being familiar with and able to use relevant IT tools and platforms for efficient financial management. Thirdly, equipped with critical thinking, high-quality financial personnel should be capable of independent analysis and judgment of data with the support of big data^[9].

3.2 Updating Analysis Tools

In the era of big data, the advancement of analysis tools directly relates to the efficiency and accuracy of enterprise decision-making. Outdated tools often process data slowly, unable to perform in-depth complex data analysis, nor support real-time data processing, failing to meet the demands of the big data era, making it difficult for enterprises to respond rapidly to market changes. Therefore, enterprises should on one hand adopt advanced data analysis software and technologies to improve the efficiency and accuracy of data processing and analysis while strengthening data visualization to provide intuitive and easy-to-understand charts and reports, further reducing the burden on decision-makers interpreting data and improving the efficiency and quality of decision-making; on the other hand, they should broaden their analytical perspectives and enrich the interpretation of data. Various analysis tools and methods can be used, such as ratio analysis, trend analysis, cash flow analysis, etc., to construct a more three-dimensional financial analysis system, capturing hidden business truths and future opportunities behind the data.

3.3 Crucial to Enhance the Application of Results

In the field of financial analysis, the application of results is key to measuring their value. In reality, there is still a situation where although analysis reports are plentiful, they often fail to effectively transform into decision support for businesses, leading not only to a waste of initial analytical efforts but also hindering strategic adjustments and market responses by enterprises. Therefore, enterprises need to strengthen the operability and specificity of analytical results, convert theoretical advantages into practical

momentum, and ensure that each report can become a powerful lever for driving enterprise development. Only by doing so can financial data analysis truly play its central role in business management, guiding companies to navigate through challenges and sail towards success^[10].

4. Summary

In the era of big data, real estate enterprises should fully recognize the importance and urgency of financial data management, and take effective measures to strengthen data integration, improve data quality, ensure data security, and guarantee timely data updates. At the same time, continuously improve financial analysis capabilities, cultivate senior analytical talents, update analytical tools, and reinforce the application of results. Only in this way can real estate enterprises remain invincible in the fierce market competition and achieve sustainable development.

References

- [1] Zongyi He. Empirical analysis of ecological and financial risks of real estate enterprises based on the data of 12 enterprises from 2016 to 2020.2022 International Conference on Agriculture, Forestry and Economic Management (AFEM 2022).152-159.
- [2] Ying Fang. Data Analysis on the Correlation between Financial Status and Stock Price of Real Estate Enterprises Based On SPSS Software. 2nd International Conference on Education Technology, Economic Management and Social Sciences (ETEMSS 2021).18-25.
- [3] Yasong Zhang. Analysis of Financial Risk Avoidance in the Film and TV Industry Based on Big Data.The 2nd International Conference on Business and Policy Studies (CONF-BPS 2023)301-305
- [4] Yanjun Ma, Rui Lu, Yu Zhang. Research on the Application of Deep Learning-based Differential Privacy Protection Models in Financial Big Data. 2nd International Conference on Financial Innovation, FinTech and Information Technology (FFIT 2023). 121-129
- [5] Kailin Li. The Role of Big Data in Identifying Modern Financial Fraud: A Case Study of Zoneco Group. The 2nd

- International Conference on Business and Policy Studies (CONF-BPS 2023).28-34
- [6] Odacioglu Eyyub Can. Big textual data research for operations management: topic modelling with grounde. International Journal of Operations & Production Management. Volume 44, Issue 8. 2024. PP 1420-1445
- [7] Jinhyo Joseph Yun. Open Innovation Signals: Exploring the Financial Data with Patents. Science, Technology and Society. Volume 29, Issue 2. 2024. PP 199-223
- [8] Lu Jane Wenzhen Social trust in subnational regions and foreign subsidiary performance: Evidence from foreign investments in China Journal of International Business Studies. Volume 49, Issue 6. 2018. PP 761-773
- [9] Hao Yisha. The development countermeasure of coal enterprise financial informatization under big data environment. Coal Economic Research. 2022. 12. PP 49-53
- [10] Wenting Zhang. The application of cloud accounting in enterprise financial decision making in the era of big data. Applied Mathematics and Nonlinear Sciences. Volume 9, Issue 1. 2024. PP 1-9.