

Innovative Discussion on Enterprise Business Administration and Human Resources Management Model in The Era of Big Data

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Abstract: This article discusses the innovative path of enterprise business administration and human resources management model in the era of big data. By analyzing the limitations of the traditional management model and combining the application of big data technology, the impact of management model innovation on the core competitiveness of enterprises is put forward. This article focuses on the synergy of business administration and human resources management. The extensive application of data sharing and analysis improves the operational efficiency and adaptability of enterprises, and optimizes the allocation and performance management of human resources. The big data-driven management model can effectively enhance the competitive advantage of enterprises in the rapidly changing market and provide important support for the strategic development of enterprises.

Keywords: Big data; Business administration; Human resources management; Management model innovation; Enterprise competitiveness.

1. Introduction

The rapid rise of big data technology has profoundly changed the management model of enterprises. Through data-driven decision-making, enterprises can optimize operational efficiency more accurately and quickly adapt to market changes. In the field of human resources management, the application of big data has improved the accuracy of employee management, performance evaluation and other links, helping enterprises to explore and stimulate the potential of employees. The traditional human resources management model is less efficient in data collection and analysis, while the introduction of big data technology enables enterprises to formulate talent management strategies more scientifically. Big data not only improves the efficiency of business administration, but also recruitment, training and performance. It has promoted innovation in terms of efficiency management and provided strong support for enterprises in the modern competitive environment.

2. The Innovation Path of Enterprise Human Resources Management Model in The Era of Big Data

2.1. The Current Situation of Human Resources Management in The Context of Big Data

There are many problems with the traditional human resources management model, which are mainly reflected in the lack of data management and the subjectivity of decision-making. In the process of personnel selection, enterprises usually rely on the experience and intuition of managers, and lack systematic data support, resulting in low accuracy and matching of talent introduction. In the link of training and development, tradition the model often focuses on large-scale and unified training, ignores individual differences, and is difficult to meet the diversified growth needs of employees.

In terms of performance management, the assessment content of the traditional model is relatively single and relies more on qualitative evaluation. The actual contribution of employees cannot be fully quantified through data, resulting in insufficient accuracy of performance evaluation, and the incentive mechanism is difficult to play an effective role.

2.2. Big Data-Driven Human Resources Management Innovation

2.2.1. Recruitment and selection

Driven by big data, the recruitment and selection process of enterprises has become more scientific and accurate. Big data technology enables enterprises to create more comprehensive talent portraits by analyzing a large amount of candidate data. With the help of big data analysis, enterprises can deeply explore the potential, skills, professional experience and other key information of candidates, and efficiently match these data with job requirements. This process can not only improve the efficiency of talent introduction, but also improve the matching of talents and positions, and ensure that the recruited personnel are in line with the long-term development strategy of the enterprise. By introducing a data-driven recruitment model, enterprises reduce the impact of subjective judgment, make the selection process more objective and fairer, and ensure the scientificity and accuracy of the selection.

2.2.2. Performance management

The application of big data in performance management has greatly improved the accuracy and objectivity of evaluation. The traditional performance management method usually relies on qualitative indicators and the subjective judgment of managers, and large numbers. According to technology, employees' work performance can be monitored in quantitative analysis and real time to provide a more accurate basis for performance evaluation. Enterprises can track employees' multi-dimensional quantitative indicators such as work completion, task efficiency and innovation ability through data analysis tools, so as to have a more

comprehensive understanding of the real performance of employees. Through this data-based performance management model, enterprises can not only improve the transparency of performance appraisal, but also adjust incentives in real time and provide personalized feedback and improvement suggestions according to the actual performance of employees, thus helping employees improve their work efficiency and sense of accomplishment.

2.2.3. Training and development

Big data technology also brings new opportunities for the training and development of enterprise employees. Enterprises can formulate more personalized training plans by analyzing employees' career development path, skill needs and training effects. Traditional training methods often have the characteristics of blindness and unification, which is difficult to meet the diversified needs of employees. Big data technology, on the other hand, can help enterprises accurately identify the skill gaps of employees, formulate targeted training courses, and ensure that every employee can be promoted in the development direction that suits them. Enterprises can also continuously track the training effect of employees through data analysis and adjust the training content in time, so as to maximize the potential of employees and reserve high-quality talents for the long-term development of enterprises.

3. Coordinated Development of Business Administration and Human Resources Management

3.1. Business Administration and Complementarity of Human Resources Management

In the big data environment, business administration and human resources management show strong complementarity. Business administration mainly focuses on the overall operation, market strategy and resource allocation of enterprises, while human resources management focuses on the optimal allocation of talents, performance management and the implementation of incentive mechanisms. With the support of big data technology, enterprises can realize the seamless docking of the two and promote the comprehensive improvement of management efficiency.

Big data technology provides enterprises with a comprehensive and dynamic management perspective, which not only helps enterprises grasp market changes and operations, but also records employees' work performance and behavior data in detail. For example, when an enterprise finds a surge in market demand in a region through big data analysis, the business administration department can adjust its market strategy accordingly and rapidly expand the supply of products in the region. At the same time, the business administration department will pass on this change in demand to the human resources management department, which can immediately carry out the recruitment of relevant positions and quickly allocate suitable sales personnel or technical support personnel to the region to meet the growing demand of the market.

Data sharing has become a key link in the coordinated development of the two. For example, when market data shows that a new product has excellent sales performance in a certain region, the business administration department can decide to increase the sales force in the region based on sales

data and market feedback. The human resources management department can select the most potential sales staff by analyzing the past performance data and adaptability of employees, and provide them with special training for the product to ensure that the newly assigned employees can quickly enter the role and support business expansion. Turn over If there is a decline in a business, the industrial and commercial administration department can also notify the human resources department in time to adjust the allocation of relevant personnel, reduce business redundancy, and improve overall efficiency.

Employee performance data in human resources management can also provide decision-making support for business administration. For example, by analyzing the work performance of front-line employees, enterprises can find out which employees have particularly outstanding performance in a certain business field. The business administration department adjusts the allocation of resources accordingly, assigns employees with excellent performance to important projects or key positions, and further improves the efficiency of business operations. At the same time, the feedback of performance data can also help the business administration department understand the bottlenecks in business processes and formulate optimization strategies accordingly.

3.2. The impact of Management Model Innovation on Enterprise Competitiveness

The big data-driven management model has greatly improved the core competitiveness of enterprises. Through data analysis, enterprises can make more accurate judgments on the basis of the market environment and internal management situation, optimize the decision-making process, and improve the overall operational ability of the enterprise. For example, through real-time market data analysis, enterprises can predict changes in consumer demand in advance, so as to adjust the product supply chain and production plan to avoid inventory backlogs or shortages. This precise data-driven decision-making not only improves the operational efficiency of enterprises, but also enhances their response speed in the rapidly changing market environment.

Collaborative development of business administration and human resources management With the support of the big data platform, the exhibition has further improved the resource allocation ability and strategic execution of enterprises. Take a manufacturing enterprise as an example, which monitors market demand fluctuations and production efficiency in real time through big data technology. When market demand increases, the business administration department can quickly adjust the production plan and increase the operating time of the production line. At the same time, the human resources management department uses employee data analysis to quickly identify employees with relevant skills, allocate them to work on additional production lines, and adjust scheduling and incentives according to employees' working hours and performance. This efficient cross-departmental collaboration enables enterprises to quickly respond to changes in market demand and take the lead in competition.

At the same time, the management model driven by big data enhances the flexibility and adaptability of enterprises. Through a unified data platform, enterprises can quickly adjust their strategies when facing external challenges. For example, a multinational retail enterprise in an emerging

market found through big data analysis that consumer preferences in a certain region have changed, and consumers are more inclined to shop online than offline. The industrial and commercial administration department quickly adjusted its strategy, increased the promotion budget of online platforms in the region, and strengthened warehousing and logistics capabilities. According to the new strategic needs, the human resources department arranges employees to receive relevant online sales skills training and allocates employees to work in the newly established online department. Through this rapid adjustment, the enterprise not only maintained its market share, but also achieved growth against the trend in the fierce competition.

4. The Innovation Path of Enterprise Business Administration in the Era of Big Data

In today's digital wave, big data has become one of the core driving forces for enterprise development, profoundly influencing all aspects of enterprise business administration. To stand out in the fierce market competition, enterprises must actively explore the innovation paths of business administration that adapt to the era of big data.

4.1. Reshaping Management Thinking with Data as the Core

Traditional enterprise management thinking was mostly based on experience and intuition, while in the era of big data, enterprise managers are required to establish a data-driven thinking mode. Enterprises should attach importance to the accumulation and mining of data assets and regard data as a strategic resource. By analyzing data to gain insights into market trends, consumer needs and the inherent laws of enterprise operations. For example, by using big data to analyze consumers' remarks on social media, purchase history and browsing preferences, enterprises can predict market demands in advance, accurately position products or services, and then optimize production and sales strategies to avoid the waste of resources caused by blind decision-making.

4.2. Innovating Marketing Strategies with the Help of Big Data

Big data provides unprecedented precision and personalization capabilities for enterprise marketing. Enterprises can build detailed user portraits by analyzing massive amounts of consumer data and gain an in-depth understanding of consumers' interests, consumption habits and purchasing power. Based on these insights, enterprises can carry out precision marketing activities, such as personalized advertising push and customized product recommendations. Meanwhile, by using big data analysis, the effectiveness of marketing activities can be monitored in real time, and strategies can be adjusted in a timely manner to improve the return on marketing investment and enhance brand influence and customer loyalty.

4.3. Optimizing the Efficiency of Supply Chain Management

In terms of supply chain management, big data also plays a transformative role. Enterprises can integrate data information of suppliers, production links, logistics distribution and sales terminals to realize the visual and collaborative management of the supply chain. Through in-

depth analysis of supply chain data, enterprises can accurately predict the demand for raw materials, optimize inventory levels, reasonably arrange production plans, and respond to emergencies in the logistics process in a timely manner. This not only helps to reduce supply chain costs and improve operational efficiency but also enhances the overall flexibility and risk resistance ability of the supply chain, ensuring that enterprises maintain stable supply and delivery capabilities in the complex and changeable market environment.

4.4. Promoting the Digital Transformation of Human Resource Management

Human resource management also needs to keep pace with the times and achieve innovative development with the help of big data. Enterprises can use big data technology to analyze employees' performance data, training records, career development tracks and other information, provide personalized training and development plans for employees, and realize the precise cultivation and rational allocation of talents. In addition, by analyzing recruitment channel data and candidate information, enterprises can screen out talents who meet job requirements more efficiently, improving the quality and efficiency of recruitment. Meanwhile, big data can also be used for employee satisfaction and engagement surveys to help enterprises discover problems in management in a timely manner and make improvements, creating a good corporate culture and working atmosphere.

4.5. Strengthening Data Security and Risk Management

As enterprises' dependence on big data continues to deepen, data security and risk management have become important topics in business administration. Enterprises need to strengthen the construction of data security protection systems, adopt encryption technologies, access controls, data backups and other measures to ensure the integrity, confidentiality and availability of data. Meanwhile, a sound data risk assessment mechanism should be established to identify and analyze various risks that may be faced in the application process of big data, such as data leakage, algorithm bias, compliance risks, etc., and formulate corresponding response strategies to reduce the probability and impact of risks.

In conclusion, the era of big data has brought both great opportunities and challenges to enterprise business administration. Enterprises must actively embrace big data technology and explore innovation paths from multiple dimensions such as management thinking, marketing, supply chain management, human resource management and data security so as to achieve sustainable development in the digital wave and win the initiative in future market competition.

5. Conclusion

In summary, the advent of the big data era has put forward new requirements for the management model of enterprises, and the traditional intuitive management method has gradually been replaced by data-driven refined management. Through the application of big data technology, enterprises can not only make more accurate judgments on market strategies, but also quickly respond to the changing needs of the market through effective resource allocation and talent management. Against this background, the collaborative

optimization of business administration and human resources management has become the key to improving the core competitiveness of enterprises. In the future, enterprises should further explore the potential of big data technology, constantly improve management processes and decision-making mechanisms, and ensure that they continue to maintain their advantages in the fierce market competition. Through innovative management models, enterprises will be able to respond more flexibly to changes in the external environment and achieve long-term strategic goals and sustainable development.

References

- [1] Chen Xiaolan. Innovative research on the human resources management model of enterprises in the era of big data [J]. Modern Marketing (Part 2), 2024(3):154-156
- [2] Liu Xiaochao. Innovative research on enterprise human resources management model under the background of big data [J]. Modern Business, 2024(5):137-140
- [3] Cheng Yu. Research on the innovative development of human resources management model in the digital economy era [J]. Market Weekly, 2024,37(5):187-190
- [4] Yuan Fuguo. Innovation of enterprise human resources management model in the era of big data [J]. Economic Outlook around the Bohai Sea, 2023(4):102-104