

Research on the Digital Transformation of Human Resources in Chinese Enterprises in the Era of the Digital Economy

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Abstract: In order to gain a deep understanding of the current situation and future development trends of Chinese enterprises in the digital transformation of human resources, it is essential to investigate Chinese enterprises' digital transformation of human resources and conduct extensive data analysis. This will provide valuable insights into the practical challenges and potential opportunities faced by Chinese enterprises in their journey towards digital transformation of human resources. The aim is for the data and findings from this research to offer support and guidance for the digital transformation of human resources within Chinese enterprises, ultimately facilitating rapid development, as well as fostering talent structure transformation and upgrading.

1. Introduction

In today's business environment, digital transformation is no longer a choice but an inevitable trend faced by all industries. Enterprises are rapidly promoting the deep integration of digitalization and enterprise development at an unprecedented speed and depth [1]. Simultaneously, the digitization of human resources is being driven by data and system building, extending the reach of human resources management to every aspect of the enterprise and actively participating in the goals and decisions of the organization [2]. In the latter half of 2023, generative artificial intelligence technology will permeate all sectors like a breath of fresh air, bringing new possibilities to the human resources industry [3]. This groundbreaking AI technology not only opens up new opportunities for enterprises to establish a more intelligent, personalized, and efficient talent management system but also provides innovative ideas for utilizing technology in talent acquisition and screening, compensation and performance management, employee experience enhancement, as well as human resource analysis within the realm of human resource management.

2. The Current Status of Digital Transformation in Human Resources within Chinese Enterprises during the Digital Economy Era

2.1 The Entire Industry Has Entered a New Era of Extensive Digital Advancement

In recent years, due to the combined promotion of national policies, social environment, and other factors, the entire industry has entered a new phase of comprehensive digital development [4]. According to the survey, 44% of enterprises have already made some progress in their transformation efforts and are no longer solely in the conceptual and planning stages. However, it was also found that 13.2% of enterprises are not driven by digital transformation thinking and only upgrade their systems. Further analysis of the data reveals that 59% of state-owned enterprises have achieved results in digital transformation, as compared to 52% for foreign enterprises and 46% for private enterprises. Evidently, state-owned enterprises are exhibiting a more urgent trend in advancing digital reform, with most actively responding to changes and embarking on the path of HR digital transformation. When exploring the relationship between firm size and progress in transformation efforts, it was discovered that 60.7% of firms with over 10,000 employees had achieved transformation results; this figure dropped to 50.7% for firms with 1,000-10,000 employees; significantly lower at just 26.4% for SMEs with less than 1,000 employees. Clearly, large and super-large enterprises possess characteristics such as massive information data sets, complex business formats, and substantial employee numbers which are driving them towards rapidly promoting human resources' digital transformations.

2.2 Current Status of Enterprises' Focus on Digital Transformation in Human Resources

When examining corporate attitudes towards HR digital transformation, two distinct trends are observed. Firstly, nearly half of organizations (47.8%) not only prioritize HR digital transformation but have also already implemented it. However, the more noteworthy situation lies at the other end, with 12.7% of enterprises beginning to decrease their focus on digital transformation. Upon further investigation into the potential reasons for this phenomenon, it is found that as many as 41% of enterprises lacking a digital mindset and only upgrading their systems experience a decline in emphasis on HR digital transformation. These companies may have realized fewer benefits than expected from a system overhaul and have started to question the true value of digital transformation. In fact, if changes are not made in management or organizational culture alongside technology improvements, it can be considered mere construction of a digital system rather than genuine digital transformation. Carrying out digital construction with the previous management model will result in old wine in new bottles and ultimately lead to failed transformation efforts.

2.3 The Role of Businesses in the Digital Transformation of Human Resources

When it comes to the work that companies are undertaking for digital transformation, it is evident that approximately half of them have initiated preparations for digital thinking, concept training, and have completed the overall transformation blueprint. There is a growing realization among enterprises that digitalization encompasses not only technological changes but also a cognitive and thinking revolution. In order to effectively promote HR digital transformation, enterprises should prioritize the development of a top-level digital mindset. This will significantly impact an enterprise's ability to transform, how they go about the transformation process, and ultimately determine the success or failure of the transformation [5].

2.4 Leader in Driving the Digital Transformation of Human Resources

According to the data, 37.2% of enterprises choose the DHR/HRIS team as the primary driver of HR digital transformation, indicating that many enterprises rely on HR information system professional teams to lead digital transformation. Additionally, it is noteworthy that nearly 27.8% of enterprises have CHO/HRVP leading the transformation process. This suggests that enterprises are increasingly recognizing the importance of HR executives' vision and insight into the overall situation of the enterprise in achieving comprehensive transformation [6]. As the saying goes, "only by standing high can we see far," emphasizing the critical role played by HR executives in providing direction and motivation during digital transformation processes. Furthermore, when CHO/HRVP was involved in leading the transformation, a significant 61% of organizations made substantial progress - a notably higher percentage than for DHR/HRIS dominated businesses (49%). This data further illustrates that HR executives not only contribute to strategic planning but also have a decisive impact on enterprise transformation success through their involvement in actual digital transformation processes.

2.5 Challenges in the Process of Digital Transformation of Human Resources

According to the survey, the primary challenge facing enterprises in HR digital transformation is that "the awareness of actively embracing digital transformation is not strong enough," accounting for 40.7%, and "the concept of digital transformation is vague," accounting for 39%. This indicates that many enterprises still lack a sufficient understanding of the concept and importance of digital transformation, as well as determination and action to promote this change. Additionally, 33% of enterprises stated that there is a lack of relevant talent promotion. Therefore, enterprises need to establish a comprehensive digital training system to encourage employees to enhance their knowledge and skills in digital technology.

3. Digital Development Trends of Human Resources in Chinese Enterprises in the Digital Economy Era

3.1 General Trend: Enterprises Are Currently Undergoing the Process of Digitally Transforming Their Human Resources

In the process of formulating an HR digital strategy, it has been observed that foreign consulting companies hold a dominant position in the introduction of HR digital strategies. However, domestic consulting companies are gradually gaining favor among enterprises. Despite the relatively small proportion of consulting firms specializing in human resources, their presence indicates a continued demand for highly specialized services. Regarding the implementation of HR digital systems, data reveals that 43.9% of enterprises opt for foreign HR systems. This suggests that enterprises may prioritize the maturity and global support offered by international systems. On the other hand, 38.9% of enterprises choose domestic HR systems, indicating a preference for solutions that can better accommodate local needs and provide more personalized services. Furthermore, a quarter of surveyed companies have plans to replace their existing HR master system in order to enhance the efficiency and effectiveness of their HR management processes.

The data indicates that 23.9% of enterprises have embraced the SaaS model, while 19.4% of enterprises have not yet adopted it but are open to this model, and 31.7% of enterprises firmly reject the SaaS model. Compared to previous years, there is a steady increase in the percentage of enterprises willing to accept the SaaS model, suggesting a gradual shift in the market from traditional on-premises deployments to more flexible and sustainable SaaS models. In the future,

with increasing market uncertainty, cost-effective SaaS models will be further favored by enterprises. In terms of enterprise type, 36.3% of state-owned enterprises are unable to accept the SaaS model, possibly due to their operational mode and high data security requirements. In contrast, foreign enterprises show relatively higher acceptance of the SaaS model, with only 24% rejecting it. Foreign companies generally lean towards adopting an international business model, and the flexibility and global accessibility of SaaS align with this inclination.

3.2 AI Has Arrived: Addressing the Management of Human Resource Diversification in Business

The data indicates that companies are most likely to implement large-scale model applications in three key areas: human resource analysis, employee services, and recruitment. This choice reflects the significant potential of AI in optimizing highly standardized and cyclical tasks. The use of AI in the field of human resources is increasingly important for several reasons. Firstly, in human resource analysis, AI can process and analyze large volumes of data to provide insights for talent management and strategic decision-making. Secondly, in terms of employee services, AI can facilitate rapid and consistent responses, thereby improving service quality and efficiency. Lastly, during the recruitment process, AI is capable of automating resume screening and initial evaluation, thus expediting the recruitment process while enhancing candidate matching precision.

When considering the impact of AI technology on the future of HR, 83% of enterprises believe that AI holds the greatest value as a digital assistant for HR managers, enhancing their work effectiveness. This indicates that most companies are turning to AI to help HR transition from traditional transactional tasks to more strategic and creative responsibilities. Additionally, 70.9% of companies recognize the need for HR managers to upgrade their capabilities and qualities in response to the growing prevalence of the "digital workforce". This necessitates the development of new skills such as fostering team collaboration in a digital environment, maintaining employee engagement, and utilizing data-driven insights for strategic decision-making. In terms of AI's potential for replacement, 45.6% of companies anticipate AI taking over certain traditional HR administrative functions. Furthermore, 28.3% of respondents foresee fundamental changes in roles and functions within HR departments due to AI advancements, indicating that AI technology will indeed reshape the future landscape of the HR industry.

3.3 Data Analysis: The Crucial Action for Measuring the Effectiveness of Human Resource Management

40.6% of organizations are currently utilizing professional business intelligence (BI) tools for HR analytics, while 38.9% of enterprises are leveraging data reporting capabilities within their HR systems for analysis. These findings indicate that a majority of enterprises have recognized the significance of human resource analysis to some extent and have taken steps to address it. However, there is still a notable 20.5% of companies that have reported not conducting any form of HR analysis. In this digital era, it is imperative for human resource managers to transition from traditional business management to data management in order to effectively provide strategic decision support for organizational leaders as soon as possible.

From the perspective of human resource analysis, the majority of enterprises primarily rely on daily statistical reports to conduct basic analysis of common indicators. However, in complex enterprise operations, a single indicator often fails to capture the entire scope of the problem. Enterprises need to employ a set of related indicators to reflect underlying trends through thematic analysis and even determine the practical significance of these trends by comparing internal and external benchmarking data. This approach allows for more objective decision-making. It was

found that 56.3% of enterprises have conducted thematic analysis, while 41.7% have carried out benchmarking analysis. This indicates that a significant number of enterprises are not only relying on surface-level indicators but are also gaining real insights from data in order to accurately identify problems and develop corresponding decision plans.

3.4 Technology Empowerment: Accelerating the Path to HRSSC

Shared Service Centers (SSCs) are currently undergoing a significant transformation. According to recent data, 57.1% of enterprises are positioning HRSSC as a testing ground for digital transformation, indicating a strong emphasis on the integration of technology within human resource services. Furthermore, 51.6% of organizations now prioritize the development of an exceptional employee experience within SSCs, marking a notable increase from last year's figure of 33%. This shift in focus suggests that companies are increasingly leveraging SSCs to enhance the day-to-day experiences of their employees, rather than solely addressing traditional personnel matters. It is our belief that the digital transformation taking place within HRSSCs should not be viewed as self-destructive but rather as an opportunity to create and implement new business models. As technology continues to advance, routine tasks can be automated, thereby freeing up valuable time for human resource professionals to refocus on providing personalized services and support for employees. Ultimately, this approach aims to improve overall work experiences and provide greater opportunities for professional development.

From the analysis of team size, it was found that 41.8% of enterprises control their SSC team size within 10 people. Upon comparing the enterprise size of the respondents, it was determined that the average person-to-service ratio of the HRSSC team in the enterprise is 600:1. Furthermore, as the team size increases, so does the ratio of people to service. The data shows that for teams with more than 100,000 people, this ratio can even reach 1000-1500:1. It is evident that advancements in AI technology have replaced many traditional functions of SSC, such as standardized process problem handling. More importantly, AI can also assist SSC teams in understanding the specific needs of each employee and providing personalized content and services accordingly. The combination of AI and HRSSC not only enhances service efficiency but also gives rise to more experienced and valuable service modules. This approach can cater to a wider group of employees while delivering services in a more thoughtful and efficient manner.

There are two distinct trends in how companies plan for the future priorities of HR Shared Services Centers (HRSSC). Firstly, 56.5% of enterprises will focus on optimizing the core systems of HRSSC, while 43.5% intend to drive digital innovation in HR using advanced technologies such as AI. This reflects a growing emphasis on leveraging technology to enhance team service efficiency and optimize the employee experience. Additionally, 33.7% of enterprises are seeking external support through professional training or collaboration with consulting agencies to transform and upgrade the organizational structure, service content, and operating model of their SSCs by utilizing the knowledge and experience of external experts. It is important to emphasize that while systems play a crucial role, constructing an effective HRSSC is not simply a matter of selecting IT solutions or purchasing individual tools. To truly elevate the operation and management level of Chinese enterprises' SSCs, it is essential to combine clear strategic positioning and development direction in order to promote innovation in human resource operation and management modes that align with long-term enterprise development goals.

4. Conclusions

Currently, numerous Chinese enterprises have made significant strides in the implementation of digital transformation within their human resources departments. The widespread adoption of

digital technology allows these enterprises to handle human resource data more efficiently and achieve automation and intelligence throughout the process. Simultaneously, the data-driven decision-making model provides unparalleled insights and a competitive advantage for the enterprise. Furthermore, there is a growing focus on AI in HR intelligent products and scenario applications. As key participants in digital transformation, HR practitioners bear the weighty responsibility and expectations of driving overall enterprise change, facing pressures and challenges that are more formidable than ever before. However, this also bestows unprecedented strategic value upon HR departments. To meet this challenge, Chinese digital HR practitioners must embrace an exploratory spirit, strive for greater accomplishments on the path of digital transformation, and ultimately advance the process of human resources' digital transformation within Chinese enterprises.

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