

Research on the Path of Digital Construction of Human Resource Management in Colleges and Universities in the Context of Digital Transformation

Xiaoshuang Yin, Hongye Liu, Chuilong Kong

Lyceum of the Philippines University -Manila Campus, Manila, Philippines

Abstract: With the in-depth promotion of digital transformation, the field of higher education also ushers in unprecedented changes. The digital construction of human resource management in colleges and universities can effectively improve the management effectiveness of colleges and universities, and then optimise the allocation of human resources in colleges and universities. In this regard, based on the background of digital transformation, this paper analyses the necessity of the digital construction of human resource management in colleges and universities, describes the direction of the digital change of human resource management in modern colleges and universities, and explores the path of digital construction of human resource management in colleges and universities, in order to provide more reference to the digital transformation of human resource management in colleges and universities.

Keywords: Digital transformation; universities; human resource management.

1. Introduction

The 14th Five-Year Plan policy clearly proposes to focus on key areas such as education and promote the universal application of digital services. In the context of the information age, digital transformation has become an inevitable trend in the development of all industries. Higher education as an important part of social development, its human resource management is also bound to face the challenges and opportunities of digital transformation. With the continuous expansion of the scale of colleges and universities and the improvement of the level of schooling, human resource management is faced with a more complex and changing environment, how to effectively use digital technology to improve the efficiency and quality of human resource management has become an important issue that college and university managers need to pay attention to.

2. Analysis of the Necessity of Digital Construction of Human Resource Management in Universities in The Context of Digital Transformation

2.1. Adapt to the development trend of higher education

With the rapid development of society, the field of higher education is undergoing profound changes. From the traditional mode of knowledge transfer to the mode of focusing on innovation, practical ability and comprehensive quality training, colleges and universities are facing more and more challenges and opportunities, and the digital construction of human resource management has become an inevitable choice for modern colleges and universities to adapt to the development trend. Digital technology provides more efficient and convenient tools and platforms for human resource management in colleges and universities. Through the introduction of human resource management information systems, big data analysis, artificial intelligence and other

advanced technologies, colleges and universities are able to achieve comprehensive and accurate management of staff information, provide strong support for recruitment, training, assessment and other aspects, and also promote the sharing and exchange of information within the college and university to improve the efficiency of management and decision-making. Level. In addition, digital technology helps colleges and universities build a more open and inclusive talent ecology. In the digital era, colleges and universities need to attract and retain more excellent talents to support the long-term development of the school. Through digital construction, colleges and universities can break the geographical and time constraints, broaden the talent recruitment channels, and attract more excellent talents to join them. Digital technology can also provide colleges and universities with diversified training and development opportunities, and help faculty and staff to continuously improve their comprehensive quality and ability level[1].

2.2. Improve the efficiency of human resource management

The digital construction of human resource management in colleges and universities is of great significance for improving management efficiency, the traditional way of human resource management often has incomplete information, cumbersome processes and other types of problems, it is difficult to meet the needs of rapid development of colleges and universities, through the construction of digitalisation, human resource management in colleges and universities can be improved in the following ways to improve management efficiency.

First, digital technology can achieve rapid transmission and sharing of information. Through the human resource management information system, colleges and universities can update the information of staff in real time and realise the rapid transmission and sharing of information. This not only improves management efficiency, but also reduces misunderstandings and conflicts caused by poor information; Second, digital technology can optimise the management

process. By introducing automated and intelligent management tools and technologies, colleges and universities can simplify the human resource management process and reduce manual intervention and errors. For example, through the online recruitment system, colleges and universities can achieve automated processing of resume screening, interview scheduling and other aspects of the process, improving the efficiency and quality of recruitment; Third, digital technology can also provide data analysis and decision-making support. Through big data analysis technology, colleges and universities can conduct in-depth mining and analysis of human resources data to provide strong support for management decisions. For example, through the analysis of faculty performance data, universities can understand the work performance and development potential of faculty members, providing a scientific basis for promotion, rewards and other decisions.

2.3. Optimising resource allocation and decision support

The digital construction of human resource management in colleges and universities plays a key role in optimising resource allocation and providing decision support. Digital construction can help colleges and universities to achieve optimal allocation of resources, through the introduction of digital technology, colleges and universities can grasp the distribution and use of various types of resources in real time, and carry out reasonable allocation and adjustment of resources according to the actual demand. This can not only improve the efficiency of resource utilisation, but also reduce operating costs. In addition, digital technology can provide decision-making support for colleges and universities. Through big data analysis technology, colleges and universities can conduct in-depth mining and analysis of human resources data to discover potential problems and trends. Based on the results of these analyses, colleges and universities can formulate more scientific and reasonable decision-making programmes to provide a strong guarantee for the long-term development of the university[2].

3. The Direction of Digital Change in Human Resource Management in Universities in The Context of Digital Transformation

3.1. Intelligence and automation of management technology

Intelligence and automation technology will become an important trend in the future of human resource management in colleges and universities, and the intelligent upgrading of human resource management information systems is one of the key technological changes, and through the introduction of advanced technologies such as artificial intelligence and big data, human resource management information systems can achieve a higher level of automation and intelligence. For example, the use of AI algorithms for tasks such as resume screening and interview evaluation can significantly improve recruitment efficiency, and data analysis can predict employee turnover rates, performance performance, etc., providing decision-making support for managers. In addition, with the development of IoT technology, human resource management in universities will achieve more intelligent equipment management and environmental monitoring. For

example, through intelligent access control systems, intelligent lighting systems and other equipment, real-time monitoring and management of all areas of the campus can be achieved to improve safety and comfort[3].

3.2. Integration and expansion of educational resources

In the context of digital transformation, modern human resource management in colleges and universities has begun to focus on the integration and expansion of educational resources. On the one hand, the integration of online and offline educational resources will become an important trend in the future of college education. The organic combination of online and offline education is achieved through the construction of online education platforms and online courses. This not only expands students' knowledge and vision, but also improves the flexibility and accessibility of education; on the other hand, the sharing of high-quality educational resources at home and abroad is also an important direction for future college education. Through international cooperation and exchange programmes and the introduction of foreign high-quality courses, the sharing and complementation of domestic and foreign educational resources can be achieved. This can not only improve the quality and level of education in colleges and universities, but also enhance students' international vision and competitiveness. In addition, the integration of interdisciplinary educational resources is also the future of college education will also begin to tend to the integration of interdisciplinary educational resources, by breaking down the disciplinary barriers to promote exchanges and cooperation between different disciplines, etc., to achieve the integration and use of interdisciplinary educational resources, which can broaden the field of knowledge of the students and their way of thinking, but also to cultivate high-quality talents with the spirit of innovation and practical ability.

3.3. Planning and Training of Teacher Resources

In the wave of digital transformation, the planning and training of teacher resources in colleges and universities is particularly critical. In order to adapt to the profound impact of the digital era on the field of education, colleges and universities have re-examined and strengthened the strategic planning and training development of teacher resources. In this regard, colleges and universities ensure the introduction of excellent teachers with digital literacy and innovation ability by formulating scientific and forward-looking teacher recruitment and selection plans. At the same time, the digital training of teachers should be strengthened to continuously improve their ability to apply educational technology, so that they can better adapt to the needs of digital teaching. In addition, colleges and universities also need to focus on the construction and management of teacher teams, through optimising team structure and strengthening teamwork, to improve the overall quality of education and innovation ability, and to ensure the optimal allocation and efficient use of teacher resources.

3.4. Innovation and application of organisational models

Empowered by digital technology, the organisational model of HRM in universities has been innovated.

First of all, flat management is one of the important trends

in human resource management in colleges and universities in the context of digital transformation. By reducing management levels and strengthening cross-departmental collaboration, the organisation can achieve rapid response and efficient decision-making. This not only improves the flexibility and adaptability of the organisation, but also enhances the employees' sense of participation and belonging; secondly, project management system is also one of the important directions of HRM in universities in the future. Through the introduction of project management methods and tools, human resource management is integrated into the scope of project management for management and control, which not only improves the professionalism and systematicity of human resource management, but also ensures the effective use of human resources and efficient output; thirdly, the flexible team system is also one of the important trends in the future of human resource management in colleges and universities. Through the formation of teams with flexibility and diversity, and the strengthening of collaboration and communication among team members, the efficient operation and innovative development of teams can be achieved. This will not only improve team cohesion and creativity, but also enhance the adaptability and competitiveness of the organisation.

4. Path of Digital Construction of Human Resource Management in Universities in The Context of Digital Transformation

4.1. Determine construction objectives and build a digital management platform

In the context of the era of digital transformation, colleges and universities, as the cradle of talent training and the highland of scientific research and innovation, their human resource management is also bound to face the urgent needs of digital construction, digital transformation not only brings new opportunities for human resource management in colleges and universities, but also brings unprecedented challenges.

On the one hand, colleges and universities must clarify the objectives of human resource management platform construction. At the beginning of the digital construction, a clear goal is crucial. For human resource management in colleges and universities, the goal of digital construction should be closely focused on improving management efficiency, optimising resource allocation, and enhancing decision-making support. First of all, it is clear that the digital construction should serve the core task of human resource management in colleges and universities, and through digital means, managers can collect, process and analyse human resource information more efficiently, and realize the automation and intelligence of human resource management; second, the digital construction should be committed to optimizing the allocation of resources. As a complex organisational system, colleges and universities need to reasonably deploy various resources to meet the needs of teaching, research and other needs. Through the digital management platform, managers can have a clearer understanding of the distribution and use of resources, and achieve the optimal allocation and efficient use of resources; finally, to enhance the decision-making support capacity. In the digital era, data has become an important basis for

decision-making. Through big data analysis and mining technology, we can extract valuable information from massive human resources data to provide scientific and accurate decision support for university management[4].

On the other hand, build a digital management platform. Building a digital management platform is an important means to achieve the goal of digital construction. This platform should have the following functions: first, recruitment, training, performance management and other basic business processes. Through the platform, managers can achieve automation and intelligence of business processes and improve management efficiency; second, data analysis and mining functions. Through the analysis of human resources data, managers can gain a deeper understanding of employee performance, development needs, etc., thus providing strong support for human resources decision-making; Third, openness and scalability. With the continuous development of digital technology and the changing needs of human resource management in universities, the platform needs to be able to continuously adapt to new technology and business needs and maintain continuous innovation and competitiveness.

4.2. Establishment of a data governance system and a data-sharing mechanism

In the context of digital transformation, human resource management in universities is undergoing unprecedented changes. Digitalisation not only provides a broad platform and rich management tools for HRM in colleges and universities, but also puts forward higher requirements for data management and sharing.

First, build a perfect data governance system. The data governance system is the basis for guaranteeing the quality of human resource management data in colleges and universities and improving the efficiency of data utilisation. In this regard, managers need to pay attention to the following points when building a data governance system. First, clarify the data governance objectives. Ensuring the accuracy, completeness and security of data can effectively improve the efficiency of data use and support human resource management decision-making; secondly, formulate a data management system: establishing a data management system and clarifying the standardised process of data collection, storage, processing, analysis and use can ensure the normality and consistency of data governance; finally, set up a data management body. The data management body is mainly responsible for the organisation, coordination and supervision of data governance to ensure the effective implementation of data governance.

Second, establish an efficient data sharing mechanism. Data sharing is a key link in improving the digitalisation of human resource management in universities. When establishing a data sharing mechanism, managers, firstly, need to formulate a data sharing policy. Clarifying the principles, scope and methods of data sharing can ensure the security and compliance of data sharing. Colleges and universities encourage data sharing between departments, which can effectively break the information silos and improve the efficiency of data utilisation; secondly, the establishment of a data sharing platform. The construction of a unified data sharing platform can provide more convenient data sharing services for various departments, and various departments can obtain the data they need in real time through the data sharing platform, so as to achieve the rapid transmission and sharing

of data; thirdly, to strengthen data security. In the process of data sharing, technicians need to use data encryption, access control and other technical means to strengthen data security, to ensure that the data are not illegally acquired, tampered with or leaked, and to ensure the security of data sharing.

4.3. Enhance the training and introduction of personnel with digital skills

In the context of the era of digital transformation, human resource management in colleges and universities is facing great challenges and opportunities. Among them, strengthening the training and introduction of talents with digital skills is the key link to promote the digital construction of human resource management in colleges and universities. In this regard, this paper will elaborate on the path of digital talent training and introduction from the following three aspects.

First, pay attention to internal talent training. Colleges and universities need to strengthen the digital skills training of existing employees to improve their ability and efficiency in the digital environment. In this regard, colleges and universities can organise regular training, seminars and online courses to enable employees to gradually master the latest digital technologies and tools, and then improve the digital literacy of the overall team.

Second, actively introduce external talents. During the recruitment process, universities should focus on candidates with digital skills and attract them to join the HR management team. These talents usually have rich digital experience and technical background, and can bring new perspectives and solutions to the team to promote the rapid development of HRM digital construction.

Third, build a diversified talent team. Colleges and universities should build a diversified talent team, which can meet the digital needs of different fields, and diversified

talents have professional knowledge and skills in their respective fields, and can work together to promote the in-depth development of the digital construction of human resource management[5].

5. Conclusion

In summary, under the background of digital transformation, the exploration and practice of digital construction path of human resource management in colleges and universities is of great significance for improving management efficiency and optimising resource allocation. Through continuous research and practice, we expect to build a more perfect and efficient digital human resource management system and promote universities to achieve higher quality development in the digital era.

References

- [1] Li Hongdan. Challenges, Opportunities and Optimisation Paths of Enterprise Digital Transformation and Human Resource Management [J]. *China Collective Economy*, 2024, (12): 97-100.
- [2] Bai Yanming. Research on the application of digital technology in the construction of university smart campus [J]. *Software*, 2024, 45 (01): 25-27.
- [3] Zhang Shufang. Exploration on the reform and development of human resource management under the wave of digitalisation [J]. *Educational Science Forum*, 2023, (36): 19-22.
- [4] Gao Shuai. Problems and solutions of digital human resource management personnel training [J]. *Economist*, 2023, (12): 286+289.
- [5] Wei Pingni, Jiang Lianmei. Exploration of digital innovation path of human resource management in Guangxi private colleges and universities [J]. *China Market*, 2023, (29): 191-194.