

# The Innovation of Corporate Social Responsibility under the Background of Digital Intelligence: from Social Responsibility to Social Value—Take China's Tencent Corporate as the Example

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Manuscript received June 23, 2023; revised August 2, 2023; September 11, 2023; published February 2, 2024.

**Abstract**—Digital intelligence technology has placed enterprises in more diversified network relationships. Compared with the past, enterprises are faced with more complex social relations when practicing social responsibility, which will also bring more far-reaching impacts to themselves and the environment. Traditional research on corporate social responsibility can't adapt to the new characteristics of current corporate social responsibility practice. This paper takes the Chinese enterprise Tencent as the research object, analyzes the factors that drive Tencent's social responsibility innovation from three aspects: responsibility philosophy innovation, responsibility mode innovation and integration capability innovation, and establishes the responsibility innovation framework that drives enterprises from social responsibility to social value. Finally, this paper gives four suggestions on how to implement corporate social responsibility innovation under the background of digital intelligence: integration of strategy and social responsibility philosophy, multi-stakeholder co-creation, attention to emotional connection management with stakeholders and integration capability innovation.

**Keywords**—corporate social responsibility, corporate social value, digital intelligence, Tencent corporate

## I. INTRODUCTION

Innovative digital technologies are fundamentally changing the way companies create value. By technological innovation, enterprises can break through organizational boundary barriers and constantly explore unknown social needs. Under the background of digital intelligence, enterprises are often in a closely connected enterprise ecosystem. The single linkage mode of the past has expanded into a three-dimensional network connection structure (Xin and Zhang, 2018), and enterprises have established a closer connection relationship with multiple stakeholders. Traditional theories of corporate social responsibility focus on the practical research of a single enterprise or enterprises with industrial chain relations, which can no longer adapt to the multiple and complex cooperative and interactive relations of current enterprises. Digital intelligent technology brings innovation beyond the previous management mode and value concept to the daily management of enterprise business. Enterprises can broaden the exploration field based on the previous practical experience of digital resources and management to meet the social needs and create social value. Therefore, under the ground of digital intelligence, it is urgent for enterprises to think about the possibility of social responsibility innovation.

This paper studies how to implement corporate social responsibility innovation under the background of digital intelligence. Taking Tencent corporate as the object of this research, relevant analysis is carried out in combination with Tencent's social responsibility reports and other information over the years. Combining relevant theories and Tencent's innovation examples, the innovation characteristics of Tencent's corporate social responsibility under the ground of digital intelligence are obtained, and then the framework of Tencent's accountability innovation is summarized, so as to provide relevant suggestions for other enterprises' corporate social responsibility innovation under the background of digital intelligence.

## II. LITERATURE REVIEW

### A. Related Research from Corporate Social Responsibility to Strategic Corporate Social Responsibility

#### 1) Research on strategic corporate social responsibility

The concept of strategic corporate social responsibility originated from corporate social responsibility, which was formed on the basic of study regarding the relationship between enterprises and management. Corporate social responsibility was first proposed by Sheldon in 1924. Later, different scholars studied the connotation of corporate responsibility, mainly focusing on whether enterprises fulfill their social responsibility. Davi (1960), for example, argued that enterprises must take more social responsibilities for their actions, while Friedman (1970) argued that the sole responsibility of enterprises is to maximize profits for shareholders. The continuous development of business scale has led researchers to realize the necessity of undertaking corporate social responsibility, so researchers have turned to the study of the dimensions of corporate social responsibility. At this stage, there are many representative theoretical studies, such as the concentric circle theory, the four-level responsibility theory and the three-baseline social responsibility theory.

Throughout the research process of corporate social responsibility, relevant research mainly presents four development stages: monomer, supply chain, cluster and platform. The characteristics and context paradigm of corporate social responsibility corresponding to these four stages are point corporate social responsibility, chain corporate social responsibility, cluster corporate social

responsibility and network corporate social responsibility (Xin *et al.*, 2022). Point corporate social responsibility includes the previously mentioned research on the connotation and dimension of corporate social responsibility, which focuses on the division of responsibility faced by a single enterprise. The supply chain and cluster social responsibility studies focus on the responsibility relationship of stakeholders in the process of enterprise production and management, but it is not suitable for the close association and collaboration with more diversified stakeholders brought by information technology in the Internet context. In the age of digital intelligence, the fulfillment of social responsibility practice by enterprises is more about the deep evolution of enterprise resources, and the synchronous creation of enterprise commercial value and social value.

With the development of more complex and diversified stakeholders, the research on business and social responsibility separately can no longer meet the requirements of corporate social responsibility practice. The research gradually puts the integration of social responsibility into the scope of corporate strategy, which leads to the research on the concept of strategic corporate social responsibility. Current research on strategic corporate social responsibility mainly focuses on the definition, measurement dimension and influence effect., but there is no unified concept definition of strategic corporate social responsibility. Burke and Logsdon (1996) first introduced the concept of “strategic corporate social responsibility”, arguing that only those social responsibilities that have significant business benefits for the company are strategic corporate social responsibility. Nowadays, scholars continue to deepen the connotation of strategic corporate social responsibility under different business scenarios, and the research of strategic corporate social responsibility has gradually increased the autonomy and innovation of practice. For example, Porter and Kramer (2006), from the viewpoint of symbiosis between enterprises and society, differentiated corporate social responsibility into reactive corporate social responsibility and strategic corporate social responsibility according to the different types of social problems faced by enterprises and the differences in the way enterprises respond to them. Husted and Allen (2007), based on previous studies, believed that strategic corporate social responsibility reflects on the relationship between enterprises and society in a richer way. The process of gradually clear and independent concept is accompanied by the process of the separation of structural dimension research from the traditional corporate social responsibility structure. To sum up, scholars extracted the characteristics of strategic corporate social responsibility from the research on the concept, structure and impact of corporate social responsibility, and then gradually established an independent research framework and practical verification of strategic corporate social responsibility.

#### *2) Corporate social responsibility and strategic corporate social responsibility*

The deepening process of corporate social responsibility research has been accompanied by intense discussion on the meaning and practical scope of corporate social responsibility, behind which is the research on the relationship between corporate social responsibility and corporate business performance. On the one hand, the

corporate social responsibility is separated from the enterprise's internal business activities, which makes corporate social responsibility free from the enterprise's business strategy, thus intensifying the contradiction between corporate social responsibility and their own business development. On the other hand, how to identify and meet the diverse needs of more multiple stakeholders at different levels has prompted enterprises to consider corporate social responsibility from the perspective of internal strategy. The study of corporate social responsibility from the strategic perspective also provides a new research perspective on the relationship between corporate social responsibility and business profitability, which leads to the concept of strategic corporate social responsibility.

Compared with traditional social responsibility, strategic corporate social responsibility emphasizes the incorporation of corporate social responsibility at the strategic level and the long-term development interests of enterprises when making operational decisions. Strategic social responsibility requires enterprises to go beyond participating in social contribution activities in the past and put more emphasis on the management of stakeholder relationships to obtain value. The practices also emphasize enterprises should create products and services that are more closely connected with the society, so as to create more favorable opportunities for the development of enterprises.

#### *B. Related Research from Corporate Social Responsibility to Corporate Social Innovation*

##### *1) Relevant research on enterprise social innovation*

The research on corporate social innovation began in the field of social innovation, and went beyond the scope of corporate social responsibility to emphasize social innovation activities with enterprises as the main body of innovation. The idea of social innovation originated from Drucker, who believed that enterprises should be introduced as new organizations in the field of social innovation in addition to government departments and non-profit organizations (Tao and Gao, 2019). Kanter (1999) first proposed the concept of “corporate social innovation”, believing that corporate social innovation means that enterprises treat the solution of social problems as learning process. At present, researches on the concept of corporate social innovation mainly focus on behavioral theory, process theory and mode theory. The behavioral theory considers corporate social responsibility as a new behavior that enterprises take the initiative to create more value for themselves, while the process theory considers corporate social responsibility as a specific innovation process in which market forces represented by enterprises enter into the social innovation framework to solve social problems. According to the mode theory, corporate social innovation is a new way to create social value and commercial value at the same time and then reconstruct the value growth path (Gao, 2021). At present, researches on the concept of corporate social innovation are still in the stage of continuous refinement. Although scholars have adopted focuses on the concept of corporate social innovation in different priorities, they all include the idea of promoting business value and social value together to solve social problems with the paradigm of innovation.

## *2) Corporate social responsibility and corporate social innovation*

Enterprises fulfill their traditional social responsibility by passively fulfilling their legal obligations and they do not have the willingness to actively solve problems themselves. As the smallest unit of economic organization, enterprises are more sensitive to the changing market environment. Bringing enterprises into the scope of social innovation greatly enriches the possible solutions to social problems.

Compared with traditional innovation theories, corporate social innovation emphasizes the embedding of social responsibility orientation in corporate innovation activities and the use of innovation to solve corporate and social problems. The concept of corporate social innovation comes from the reflection on the practical effect of corporate social responsibility. Compared with traditional corporate social responsibility, corporate social innovation integrates innovative ideas into business modes, and explores new ways to achieve a high degree of integration between corporate social responsibility and business interests. Corporate social responsibility emphasizes more on responding to external pressure, and companies dedicate to promoting more external stakeholders involved (Fan *et al.*, 2021). Corporate social innovation reflects that enterprises are more actively promoting the comprehensive participation of internal and external stakeholders from a strategic height, emphasizing on solving social problems while gaining sustainable competitive advantages.

### *C. Related Research from Corporate Social Responsibility to Corporate Social Value*

#### *1) Corporate social value related research*

Corporate social value and corporate social responsibility are closely linked, and the development process of corporate social value research is also the process of continuous promotion of corporate social responsibility research. At present, there are few literatures on the study of corporate social value. With the deepening of the research on enterprises and corporate social responsibility, the concept of corporate social value is gradually clear. Therefore, the development of corporate social value research is inseparable from the research progress of enterprise. Many scholars have given the definition of corporate social value in their own research background. On the whole, the definition of corporate social value mainly focuses on the degree of enterprise's contribution to society and its satisfaction of social needs through its own activities (Huang and Zhang, 2008). With the analysis on the components of corporate social value, relevant studies have concluded that the main body of corporate value is social demand, and the boundary of responsibility of corporate social value is identified through the satisfaction of different needs of relevant stakeholders. The research has gradually shifted the focus from the wealth created by enterprises for society in the economic terms to the immaterial creation of social needs by enterprises playing their own role. Mai *et al.*, (2011) argued that the realization of social value of enterprises is reflected through the material and immaterial corporate social responsibilities they are willing to undertake.

Although the research has gradually enriched the content of enterprise social value creation from creating wealth for

society to meeting social needs, the core of the current research is the passive acceptance of responsibility by firms. The research around the connotation of maintaining the overall interests of enterprises through creative activities has blurred the boundary between corporate social value and corporate social responsibility. The concept distinction between the two has not been reflected in many studies. This research tendency is reflected in the research on corporate social value assessment system.

## *2) Corporate social responsibility and corporate social value*

Enterprises in today's society are no longer simply exporting resources or capabilities to other enterprises or individuals, but are expected to continue to generate spontaneous driving effect as times progress and needs change. The study of the relationship between enterprises and society under the ground of corporate social responsibility can no longer meet the sustainable development needs of enterprises, nor can it sustainably promote the symbiosis development between enterprises and society. In the current social context, corporate social value is no longer about meeting the needs of different stakeholders, but more about driving enterprises to invest in social operation and innovation practices through their own strategic adjustments. The social value of the enterprise is reflected in the company's own strategic adjustment, which in turn drives the company's overall commitment to social innovation. Corporate social value is embodied in the improvement of different levels of interests from its own long-term strategy, which requires enterprises to identify key issues, rely on their core capabilities, solve social needs and promote corporate reform and innovation, and then achieve a high degree of integration and enhancement of corporate value and social value (Chen and Ha, 2021).

### III. ANALYSIS FRAMEWORK OF SOCIAL RESPONSIBILITY INNOVATION-BASED ON THE PRACTICE OF TENCENT CORPORATE

Founded in 1998, Tencent focuses its business on the Internet industry and is committed to improving the quality of life of people around the world with innovative products and services. Tencent has evolved through the growing maturity of China's Internet information technology. In different stages of development, it has made many adjustments to its strategy in response to changes in internal and external development environment, and has also continued to carry out social responsibility practices. Tencent has achieved the innovative development of building corporate public welfare brands from scratch to sustainably driving social value creation. Since its inception, Tencent has always been thinking about corporate social responsibility, closely linking corporate development with society, gradually improving its corporate social responsibility management mechanism and establishing a comprehensive corporate social responsibility reporting system. Therefore, this paper selects Tencent as the research object of corporate social responsibility innovation under the background of digital intelligence, combined with relevant examples of Tencent's innovative practice of social responsibility to study the main driving innovation factors of

enterprises' change from social responsibility to social value creation.

*A. Innovation of Responsibility Philosophy: Sustainable Social Value Innovation Strategy*

The thinking of Tencent's social responsibility practice exists at the birth of the enterprise. The corporate social responsibility practice has closely accompanied the development of its business until now. The two influence each other and eventually integrate to jointly drive the company's deep-seated development. Tencent has undergone four strategic adjustments since its development, benefiting not only from its keen awareness of changes in the external environment, but also from its insight into the future of its internal business operations. The company's ability to make timely and dynamic adjustments has led to a sustainable competitive advantage and a high market position. The same sensitivity is also reflected in the changes of corporate social responsibility practice strategies. Tencent's concept of practical responsibility is always related to business operation. Tencent practices corporate social responsibility in business development, and finally realizes the innovation and development of its public welfare brand, social responsibility management structure and innovation responsibility practice management system from scratch. It has also enabled corporate social responsibility to move from following to finally integrating into corporate strategy.

Tencent formally put forward the strategy of "sustainable social value innovation" in 2021, forming the enterprise development concept with user value, technological innovation and social responsibility as the core, and upholding its vision of technology for good. Tencent has made four strategic adjustments, from the product QQ as the starting point to provide better product services, to WeChat as the representative of personalized customer service, which has led to the rapid development of Tencent's business and gradually gained favorable market support. The development of digital technology has expanded the scope of enterprises to connect users and given enterprises the possibility of innovation breakthrough and open cooperation. Tencent has chosen to adjust its strategy to embrace a broader industrial Internet ecology and explore broader development field for its own business. The fourth strategic adjustment of Tencent is different from the previous business focus adjustment and organizational structure change, which emphasizes the concept innovation leading enterprise development. This strategic innovation promotes enterprises to think about the problem of social value creation while developing their own commercial value and to explore the possibility of realization at any time.

Tencent has gradually shifted its strategic focus from users, industry to society, which is not only a necessary choice for the company to achieve such achievements and explore a new development path, but also an inevitable tendency for the company to think about the profound use of resources. Tencent has formally adjusted its corporate strategy to "sustainable social value innovation", which is to integrate the social value into its corporate strategy. Under the strategy of "sustainable social value innovation", Tencent set up a dedicated Sustainable Social Value Business Unit in 2021. On the one hand, it promotes innovation investment based on

previous corporate public welfare practices, and gives play to its advantages in a more open and mobile resource platform to promote the realization of deeper values. On the other hand, Tencent continuously promotes of internal and external cooperation matters based on the original social responsibility practice resources, and explores potential demands to achieve sustainable social value creation. Tencent has transcended its original position of prioritizing commercial value and innovated the concept of promoting commercial value and social value simultaneously in fulfilling its responsibilities. This allows companies to explore potential social issues with their partners in the development of business, breaking down the organizational restrictions of internal and external communication, which drives a richer pool of participants to participate in sustainable social value creation and a closer and more effective integration of internal and external resources.

*B. Innovation of Responsibility Mode: Promote the Practice of Responsibility through Co-creation*

Tencent's corporate social responsibility mode innovation continues to deepen along with its corporate social responsibility practices, and ultimately gives its own answer on how companies can deeply mobilize their own resources to create more sustainable social value in the era of digital intelligence. Tencent initially participated in the public welfare activities of relevant departments with an overall corporate image, and then built public welfare interfaces in its products. With the help of the huge number of users of QQ and WeChat products, Tencent brought the concept of public welfare into daily life, providing users with a lower threshold to participate in public welfare, and contributing to the social atmosphere of public welfare for all. Tencent has shifted the focus of its corporate responsibility to rational public welfare after its own public welfare efforts have achieved greater social impact, and innovatively proposed a co-creation approach to drive sustainable value creation for society. By incorporating more diverse roles into Tencent's accountability practices and promoting deeper emotional interactions, Tencent is driving sustainable innovation in its accountability mode through co-creation.

Tencent's co-creation mode innovation emphasizes a more diverse ecosystem of role participation. Tencent has enriched the roles of traditional social responsibility actors, shifting from the traditional chain mode of value creation led by enterprises to a network mode of value co-creation involving multiple actors. Tencent emphasizes the integration of more diversified role interaction factors in the practice of accountability, which drives various forces to effectively play their roles and jointly promote sustainable value creation. Tencent focuses on breaking the hindrance between internal and external. In 2019, the company set up the "Tencent Charity and Social Responsibility Award" to encourage employees to provide unique perspectives on relevant social issues. The Tencent charity platform goes beyond its previous role of connecting charity projects. It providing a way for both donors and recipients to express their ideas for improving and innovating charity projects. Tencent also invites donors to participate in monitoring public welfare projects, enriching creative sources of fulfillment and participation in practice. In addition, Tencent has also broken

the limitation of traditional charitable enterprises to practice public welfare, cooperating with OPPO to convert product sales into children’s public welfare project funding, and building low-carbon rooms together with Jinjiang Hotel. Tencent has incorporated caring enterprises, public welfare organizations and the public into its mode of social responsibility practice, so that participants can invest in the social responsibility practice in a lighter and more sustainable way, and create value results that can be enjoyed by multiple parties through joint interactive input.

Tencent’s co-creation mode innovation leads to a closer emotional connection. Tencent strengthens the emotional connection among participants and between participants and the project, and promotes participants’ continuous attention to the practice projects with deep emotional investment. Tencent’s co-creation approach has prompted Tencent to focus on the emotional trust of participants behind public service events, and to build public welfare scenarios that are more likely to trigger emotional connection. In 2021, Tencent completed the upgrading of its corporate public welfare platform in terms of donation matching mechanism, product system, corporate linkage and public welfare infrastructure. It not only timely responded to the project progress needs concerned by donors, but also displayed the progress of project payments in real time on its own philanthropy platform with the help of supply chain technology, and made timely responses and adjustments to other issues raised by donors. Tencent has also placed more emphasis on the emotional connection between public service projects and participants, encouraging the creation of richer public service scenarios in daily life, such as the use of daily digital office tools to showcase public service projects and the “Little Red Flower Concert” to mobilize people’s emotional resonance with social issues in the form of music. Users are more likely to participate in the value creation of public welfare projects when they perceive public welfare practices in more daily scenarios, which can extend the possibility of sustainable value creation scenarios.

*C. Innovation of Integration Capability: Collaborative Integration of Users, Industries and Society*

Tencent’s existing responsibility practice has mature integration ability, which can apply enterprise resources to more diversified scenarios, break down barriers to the flow of resources in different dimensions, and then realize the comprehensive adaptation of corporate digital resources and technological advantages to the user, industry, and social three different application scenarios. On the one hand, Tencent’s integration capability innovation can promote deeper exploration of related issues with the help of technology sustainability. On the other hand, the enterprise can study the underlying causes behind social problems.

Tencent’s ability to integrate and innovate with its responsibilities avoids the limitations of the traditional implementation mode on project execution, and allows for sustainable innovation and deeper problem solving in public service projects. Tencent is concerned about the inconvenience of using WeChat products for the elderly and has developed the care mode to solve the problems of the elderly such as difficulty in reading and eye protection. On the basis of this, the company used its R&D strengths to

research solutions to social problems such as fall protection alarms for the elderly and enriching the spiritual life of the elderly. From simply solving the problem of elderly people's reading difficulties in its own products to further exploring the possible path to health and security for the elderly, Tencent can gradually explore innovation from the surface problems to potential social problems. With the help of its responsibility integration and innovation ability, Tencent has successfully realized the orderly collaborative development of related resources and created the possibility of sustainable in-depth thinking.

Tencent’s own innovation in integration capabilities not only reflects the possibility of continuous in-depth research and innovation on a single research theme, but also the ability to explore deeper causes and various solution paths from the problem. Tencent is concerned about the problem of teenagers being addicted to the Internet, and has established an anti-addiction system with data tracking, face recognition and real-name verification to monitor and manage minors' game logins. In 2020, Tencent designed a universal anti-addiction system development tool jointly with the 3D content creation platform. Based on the data support of Tencent’s own guardian platform, Tencent helps small and medium-sized game enterprises use anti-addiction tools to build a good game industry environment and ecology. In addition, Tencent has applied its own digital technology capabilities to family communication programs, connecting education experts, children and parents to discuss the topics of growth companionship and parent-child communication, promoting the construction of benign communication within the family, so as to solve the root cause of children's addiction to games. Tencent will tap into the potential supervision and prevention needs of the whole game industry through the innovation of integration ability, and continue to focus on the factors influencing the youth growth environment at the social level.

*D. Social Responsibility Innovation Framework: from Social Responsibility to Social Value*

Tencent’s own social responsibility practices are more innovative than traditional ones in terms of responsibility philosophy, responsibility mode, and integration capabilities. Tencent’s innovation closely connects internal and external stakeholders, weakening the limiting action of organizational boundaries and promoting joint efforts from multiple sources to solve social problems, driving enterprises to think about their own transformation from fulfilling social responsibility to sustainable creation of social value. The enterprise finally has established a new framework for social responsibility practices in the era of digital intelligence.

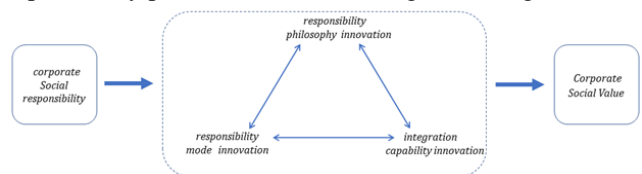


Fig. 1. Social responsibility innovation framework: From social responsibility to social value.

In the framework of social responsibility innovation, the three innovation factors do not exist in isolation, but complement each other to drive corporate social

responsibility innovation. The philosophy of responsibility innovation clearly includes the creation of social value into the enterprise's own development planning, unifies the value concept of internal business management and external partner cooperation, and drives the enterprise to create sustainable social value innovation. The innovative integration of sustainable social value creation into the business value concept drives more diversified forces to innovate and practice the integration of the two, and accumulates cross-department, cross-project and cross-organizational cooperation experience with social needs as the core. The innovation of responsibility mode is to produce more diversified sources of innovation, to promote the effective implementation of the corporate responsibility philosophy, and to enhance the ability of corporate responsibility integration. The multiple co-creation of the responsibility mode greatly increases the emotional connection between each other, and promotes the integration of deeper resources cooperation capabilities. The innovation of corporate social responsibility integration ability drives the smooth connection between all aspects of social responsibility practice and innovation. Tencent integrates innovative ideas and provides continuous support for multi-party communication, technical support and information disclosure in the actual implementation, which drives the corporate social responsibility practice to achieve sustainable social value creation.

#### IV. SUGGESTIONS

- 1) Enterprises should take the initiative to consider integrating the concept of social responsibility into corporate strategies. Enterprises should treat their own business composition and social responsibility practice from the perspective of integration. Incorporating the concept of corporate social responsibility into corporate strategy is conducive to effective business collaboration and more innovative mobilization of corporate resources, thus helping enterprises to maintain attention to social needs in their business operations and ultimately promoting the realization of business and social values.
- 2) Enterprises should consider incorporating multiple stakeholders into practice mode of fulfilling responsibilities. Under the ground of digital intelligence, the practice of corporate social responsibility pays more attention to the active role of participants in innovation, and thus forms more diversified perspectives on the social value innovation. To innovate the performance mode, enterprises should carry out the performance practice with a more open mind, pay attention to the diverse stakeholders to play their own advantages to participate in different aspects of the responsibility practice and jointly promote sustainable value creation.
- 3) Enterprises should focus on stakeholder emotional connection management under the background of digital intelligence. Enterprises should pay attention to the closer emotional connection and implicit emotional needs of stakeholders. The practice of corporate social responsibility should not be limited to the blind pursuit of numerical expansion, but should focus on the creation of scenario-based value that affects daily life. Enterprises should be aware of the hidden spiritual needs

behind related social problems, so that their own social responsibility practices have the ability to integrate reality and sustainable development.

- 4) Enterprises should promote the creation of social value through their own integration ability. The resources accumulated by long-term operation and innovation have become the core of enterprises' competitive advantage, but whether enterprises can play a role in the practice of responsibility needs the integration ability of enterprises to continue to innovate. Companies exploring new social issues need to be able to integrate resources into current social responsibility practices quickly and effectively so as to promote the sustainable creation of social value.

#### CONFLICT OF INTEREST

The author declares no conflict of interest.

#### AUTHOR CONTRIBUTIONS

Both authors contributed in each stage of the preparation of this manuscript. Xiuli Wei and Yunting Qu were both responsible for the conceptualization, conducted the research, and the final manuscript; all authors had approved the final version.

#### ACKNOWLEDGMENT

The authors wish to thank the North China University of Technology for supporting this research.

#### REFERENCES

- Bao, G., & Song, Q. 2022. Impact mechanism and promotion path of corporate social responsibility performance on private network platforms. *Journalism Lover*, (01): 12–16.
- Bao, X., Zhang, S., & Lin, L. 2022. Study on the practice path of strategic corporate social responsibility from the perspective of stakeholders. *Learning and Exploration*, (10): 129–137.
- Chen, Q. 2022. The First venture strategic corporate social responsibility and sustainable development. *Enterprise Management*, (03):121–123.
- Chen, X., & Ha, J. 2021. Research on the relationship between corporate social responsibility contribution, technological innovation input and Enterprise value Creation. *Prediction*, 40(3): 32–38.
- Deng, Z. 2018. Corporate Social responsibility in the era of big data. *Social Science Front*, (10): 91–96.
- Ding, Y., & Jin, Y. 2020. Corporate social responsibility and innovation based on the perspective of value creation process. *Gansu Social Sciences*, (03): 200–207.
- Dong, S., & Liu, H. 2018. Corporate social responsibility research knowledge map-bibliometric analysis based on CSSCI source journals (2007-2016). *Journal of Xi'an University of Finance and Economics*, 31(05): 54–60.
- Duan, R., & Li, H. 2020. Research on the influence of B oriented on social innovation of digital entrepreneurship. *China Science and Technology Forum*, (08): 98–109.
- Fan, J., Bian, T., & Zhang, Y. 2021. Review and prospect of customer online participation in enterprise social innovation research. *Science and Technology Management Research*, 41(23): 20–28.
- Fu, Q., & Ran, Y. 2018. Corporate social value and financial management Trends from the perspective of public welfare. *Finance and Accounting Communication: Middle*, (10): 85–88.
- Gao, T. 2021. Corporate social innovation: Concept, measurement method and situation outlook. *Finance and Accounting Monthly*, (23): 119–127.

- Gao, T., Huang, Y., & Sun, S. 2021. Corporate social innovation: Concept analysis, evolution law and analysis framework. *Business Economics Research*, (21):114–118.
- Gao, T., Tao, Q., Zhou, P., & Sun, S. 2021. Corporate social innovation and corporate value: the mediating effect of knowledge output. *Science and Technology Management Research*, 41(15): 11–19.
- Huang, T., & Zhang, A. 2008. Connotation and management system of enterprise value. *Journal of Wuhan University of Technology (Information and Management Engineering Edition)*, (03): 453–456.
- Ji, G., & Wang, W. 2022. Strategic Corporate Social Responsibility: Research progress and future research direction in recent 25 years. *Journal of Nanchang Institute of Technology*, 41(04): 88–95.
- Jiang, Y., & Pan, C. 2016. The boundary, evaluation and value realization of strategic corporate social responsibility. *Journal of Nanjing Audit University*, 13(05): 37–44.
- Lai, H., & Meng, Z. 2020. Research on the integration and innovation transformation of enterprise traditional innovation and social innovation under the background of major public health events. *Science and Technology Progress and Countermeasures*, 37(14): 14–20.
- Li, H. 2014. Social responsibility: The purport of “Good governance” of modern enterprises. *Jiangnan Forum*, (03): 68–74.
- Lin, J., & Huang, Y. 2018. From corporate social responsibility to social innovation: development and ethical issues. *Ethics Research*, (06): 92–97.
- Liu, J., & Sheng, M. 2019. Strategic social responsibility, relational resources and firm competitive advantage. *Finance and Accounting Monthly*, (04): 59–63.
- Mai, S., Wang, K., & Kuang, H. 2011. Research on Enterprise social value evaluation. *Science Research Management*, 32(06): 100–107.
- Tao, Q., & Gao, T. 2019. Social innovation: Origin, research context and theoretical framework. *Foreign Economics and Management*, 41(06): 85–104.
- Tang, G., & Xu, Z. 2004. Porter’s theory of strategic corporate philanthropy and its Enlightenment. *Southern Economics*, (08): 46–49.
- Wang, S., Hu, S., & Qian, Xi. 2011. Strategic corporate social responsibility research frontier analysis and future prospects. *Foreign Economics and Management*, 33(11): 57–64.
- Wei, T. 2012. Research on enterprise social value management. *Contemporary Economic Management*, 34(10): 34–39.
- Xie, H. 2013. Corporate social responsibility research review. *Academic Circles*, (S1): 146–148.
- Xin, J., Tu, Y., & Zhang, X. 2022. Research on the construction of platform corporate social responsibility symbiotic system. *Management Review*, 34(11): 218–232.
- Xin, J., & Zhang, L. 2018. Concept change and interactive evolution of corporate ecosystem social responsibility under the background of big data. *Journal of Guangdong University of Finance and Economics*, 33(05): 20–28.
- Xing, X., Tang, X., Wang, J., & Zhang, Z. 2021. Digital platform accountability and shared value creation: A case study of poverty alleviation based on ByteDance. *Management World*, 37(12): 152–176.
- Xu, C., & Chen, J. 2005. Evaluation of strategic corporate social responsibility. *Shanghai Enterprise*, (05): 21–23.
- Yang, Z. 2018. Platform Corporate social responsibility: Boundary, governance and evaluation. *The Economist*, (05): 79–88.
- Yang, Z., & Chen, J. 2020. Innovation and governance of corporate social responsibility in the age of digital intelligence. *Journal of Shanghai University of Finance and Economics*, 22(06): 33–51.
- Yang, Z., & Chen, J. 2021. Algorithmic governance in the age of digital intelligence-Re-examination based on corporate social responsibility governance. *Comparison of Economic and Social Systems*, (02): 12–21.
- Yang, Z., Chen, J., & Yin, X. 2021. The Innovation of Social Responsibility Governance under the Dual Attribute of Platform Enterprises: A New perspective of understanding digital platform. *Research of Finance and Trade*, 32(12): 1-12+64.
- Yang, Z., Yin, X., & Chen, J. 2020. Innovation of platform corporate social responsibility governance against the background of COVID-19. *Journal of Management*, 17(10): 1423–1432.
- Yao, K., & Li, X. 2022. Social innovation realization path of entrepreneurial enterprises based on institutional theory. *Management Science*, 35(03): 58–72.
- Yu, F., Du, H., & Cao, J. 2021. Research on poverty-alleviation innovation path of digital technology-enabled enterprises. *China Science and Technology Forum*, (09): 126–133.
- Zhang, S. 2014. Research progress of strategic corporate social responsibility in China. *Business Time*, (15): 108–109.
- Zhao, C. 2022. Research on the impact of digital transformation on corporate social responsibility. *Contemporary Economic Science*, 44(02): 109–116.
- Zhu, Y., & Chen, X. 2021. Research on the improvement of corporate social responsibility governance ability. *Finance and Accounting Monthly*, (22): 101–107.

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