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Research on the Enabling Effect of Digital Finance Transformation on the New Quality Productivity of Enterprises

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ABSTRACT
In the context of the deep integration of the digital economy and high-quality development, new quality productive forces, as an advanced form of productivity dominated by technological innovation and characterized by high technology, high efficiency, and high quality, have become the key to building the core competitiveness of enterprises. Relying on digital technologies such as big data and artificial intelligence, digital and intelligent financial transformation has reconstructed the financial accounting, management, and decision-making models of enterprises, providing important support for the leap in the new quality productive forces of enterprises. Based on the resource-based view and dynamic capabilities theory, this paper systematically explores the enabling effect of digital and intelligent financial transformation on the new quality productive forces of enterprises. The research first defines the core connotations of both concepts, and then deeply analyzes the internal mechanism of how digital and intelligent financial transformation enables the development of new quality productive forces from the dimensions of optimizing resource allocation, activating innovation elements, and controlling operational risks. On this basis, combined with corporate practices, this paper proposes optimization paths for deepening digital and intelligent financial transformation and continuously cultivating new quality productive forces, with a view to providing theoretical references and practical implications for enterprises to achieve high-quality transformation in the digital era.

KEYWORDS
Digital and intelligent financial transformation; New quality productive forces; Enabling effect; Resource allocation; Technological innovation

1 Introduction

Currently, a new round of scientific and technological revolution and industrial transformation is accelerating. New quality productive forces represent an advanced productivity state in which innovation plays a leading role. They break away from traditional economic growth modes and productivity development paths, feature high technology, high efficiency, and high quality, and align with the new development philosophy [5]. Cultivating new quality productive forces has become the necessary path for enterprises to break through development bottlenecks and achieve high-quality development, while digital and intelligent transformation serves as the key lever to activate new quality productive forces. Among them, finance, as the core hub of enterprise operation and management, runs through the entire process of production, operation, and innovation. Its digital and intelligent financial transformation is not only an important component of the enterprise's digital and intelligent development but also a crucial support for promoting the generation of new quality productive forces. With the proposal in the "15th Five-Year Plan" recommendations to "accelerate high-level scientific and technological self-reliance and self-strengthening, and lead the development of new quality productive forces," enterprise financial work is shifting from a traditional accounting-oriented model to a value-creation and strategy-supporting model [1]. By integrating digital technologies such as big data, artificial intelligence, and blockchain, digital and intelligent financial transformation realizes the automation of financial processes, the refinement of management, and the intelligence of decision-making. It breaks the limitations of traditional financial models and promotes the optimal allocation of enterprise resources, the enhancement of innovation capabilities, and the improvement of operational efficiency. However, at present, some enterprises still face issues in the process of digital and intelligent financial transformation, such as the superficial application of technology, insufficient talent reserves, and loose integration with business, which restrict its enabling effect on new quality productive forces. Existing research mostly focuses on the impact of digital and intelligent financial transformation on enterprise performance and risk management, or the cultivation paths of new quality productive forces, with less systematic exploration of the enabling mechanism and implementation path of digital and intelligent financial transformation on the generation of enterprise new quality productive forces [6]. Based on this, rooted in the background of the digital and intelligent era, and combining relevant theories and practices, this paper deeply analyzes the enabling effect of digital and intelligent financial transformation on the generation of enterprise new quality productive forces and proposes optimization strategies. This fills the existing research gap, provides guidance for enterprises to cultivate new quality productive forces through digital and intelligent financial transformation, and assists enterprises in achieving high-quality development.

2 Relevant Theoretical Basis and Definition of Core Concepts

2.1 Relevant Theoretical Basis

The Resource-Based View (RBV) posits that an enterprise's competitive advantage stems from its heterogeneous

resources. Digital and intelligent financial transformation can help enterprises integrate financial and digital resources to form unique resource advantages, providing support for the generation of new quality productive forces. Dynamic Capabilities Theory points out that an enterprise's ability to respond to environmental changes, integrate resources, and achieve innovation is the key to its sustainable development. Digital and intelligent financial transformation can enhance an enterprise's resource integration capabilities, dynamic adaptation capabilities, and innovation capabilities, aligning with the core needs of cultivating new quality productive forces. Technological Innovation Theory emphasizes that scientific and technological innovation is the core driving force for productivity development. Through technology empowerment, digital and intelligent financial transformation optimizes R&D investment management and promotes the flow of innovation elements, providing financial support for technological innovation, which in turn spawns new quality productive forces [5]. These three theories support each other and jointly constitute the theoretical framework of the enabling effect of digital and intelligent financial transformation on the generation of enterprise new quality productive forces, providing a solid theoretical basis for this research.

2.2 Definition of Core Concepts

Digital and intelligent financial transformation refers to the transformation process in which enterprises rely on digital technologies such as big data, artificial intelligence, and cloud computing to comprehensively reconstruct traditional processes including financial accounting, budget management, cost control, risk management, and decision support. This realizes the transformation of financial data into resources, automation of financial processes, intelligence of financial decision-making, and maximization of financial value [6]. Its core characteristics are reflected in technological integration, process synergy, value orientation, and decision-making foresight. Distinguished from traditional financial informatization, it places greater emphasis on data-driven approaches and intelligent empowerment.

Enterprise new quality productive forces refer to the advanced productivity state formed by enterprises in the context of the digital economy, driven primarily by scientific and technological innovation and supported by new production factors such as data, technology, and talent. Through the optimal combination of production factors, innovation of production models, and upgrading of industrial forms, it features high technology, high efficiency, and high quality [2]. Its core components include scientific and technological innovation capabilities, factor allocation efficiency, green development capabilities, and sustainable innovation capabilities. Its core indicator is a substantial increase in total factor productivity, and its essence is the concentrated manifestation of advanced productivity [5].

3 The Enabling Mechanism of Digital and Intelligent Financial Transformation on the Generation of Enterprise New Quality Productive Forces

The enabling effect of digital and intelligent financial transformation on the generation of enterprise new quality productive forces unfolds mainly through the logic chain of "technology empowerment-factor activation-efficiency enhancement-innovation drive." This runs through the entire process of generating new quality productive forces and is reflected in the following four aspects.

3.1 Empowering Scientific and Technological Innovation to Solidify the Core Foundation of New Quality Productive Forces

Scientific and technological innovation is the core driving force for the generation of new quality productive forces, and digital and intelligent financial transformation provides solid financial support for scientific and technological innovation by optimizing the management of R&D investment [5]. Under the traditional financial model, the accounting of R&D investment is relatively extensive, and the flow of funds lacks transparency, making it difficult to provide precise financial support for scientific and technological innovation activities. Digital and intelligent financial transformation constructs a project-based and refined R&D expenditure accounting system to track capital investment in stages such as basic research, applied research, and key technology breakthroughs. It also utilizes Activity-Based Costing to deconstruct key nodes in the R&D process, realizing the accurate accumulation of costs in all links [1].

At the same time, leveraging big data analysis, digital and intelligent finance can construct an early evaluation model for R&D benefits covering multiple dimensions, such as the potential for technological breakthroughs, commercialization prospects, and strategic synergy. This provides scientific support for R&D investment decisions and effectively avoids resource waste and blind investment [1]. Furthermore, digital and intelligent finance can optimize the raising and allocation of R&D funds. Through technology capital evaluation and securitization, it broadens innovative financing channels, provides financial guarantees for enterprises to carry out original and disruptive technological innovations, and solidifies the core foundation for the generation of new quality productive forces [1].

3.2 Activating Factor Allocation to Optimize the Conditions for Generating New Quality Productive Forces

The generation of new quality productive forces relies on the efficient allocation of new production factors such as data, technology, and talent. Digital and intelligent financial transformation can break down the barriers of factor allocation and maximize the value of these factors [2]. In terms of data factors, digital and intelligent finance actively explores standards for the confirmation of rights, classification, measurement, and reporting of data resources. It designs

valuation models reflecting data scale, quality, activity, and application scenario value, providing an accounting basis for the market-oriented allocation of data factors [1] and fully exerting the multiplier effect of data factors.

In terms of human capital, digital and intelligent finance constructs a strategic investment-oriented human capital measurement system and explores value assessment methods based on competency models, performance contributions, and future potential. Through value quantification and information disclosure, it guides enterprises to increase investment in talent and cultivate interdisciplinary innovative talents [1], providing talent support for the generation of new quality productive forces. In terms of technology factors, digital and intelligent finance establishes a differentiated valuation model based on Technology Readiness Levels (TRL) to comprehensively reflect the value increment and risk changes of intangible assets such as patents and proprietary technologies. This promotes the efficient flow of technology factors [1] and optimizes the factor conditions for generating new quality productive forces.

3.3 Enhancing Operational Efficiency to Strengthen the Development Momentum of New Quality Productive Forces

High efficiency is an important characteristic of new quality productive forces. Through process optimization and technology empowerment, digital and intelligent financial transformation significantly enhances enterprise operational efficiency, injecting momentum into the development of new quality productive forces [2]. Traditional financial processes are cumbersome and involve extensive manual intervention, which is prone to errors and inefficiency, thereby restricting the flow and utilization of enterprise resources. Through technologies such as artificial intelligence and Robotic Process Automation (RPA), digital and intelligent finance realizes the automation of basic processes including financial accounting, expense reimbursement, and bookkeeping. This reduces labor costs and improves financial processing efficiency [6], liberating financial personnel from tedious basic work and shifting their focus toward value analysis and decision support. Meanwhile, by building a full-process financial control system, digital and intelligent finance achieves real-time monitoring and dynamic management of all links in enterprise production and operations. This allows for the timely discovery of shortcomings and problems in operations, optimization of resource allocation, and enhancement of total factor productivity [3]. Additionally, digital and intelligent finance deepens the integration of business and finance (business-finance integration) and builds a strategic financial decision-making platform. It provides in-depth analysis reports on future industrial layouts and comparisons of innovation paths, promoting scientific enterprise decision-making, enhancing operational efficiency, and strengthening the development momentum of new quality productive forces [1].

3.4 Controlling Innovation Risks to Ensure the Steady Generation of New Quality Productive Forces

The process of cultivating new quality productive forces is accompanied by multiple risks, such as uncertainty in technological routes and accelerated market iteration. Digital and intelligent financial transformation provides a guarantee for the steady generation of new quality productive forces by building a dynamic risk control system [1]. Utilizing technologies such as big data and artificial intelligence, digital and intelligent finance establishes a risk identification and quantitative modeling system covering the entire "R&D - transformation - industrialization" life cycle. It quantifies the technological feasibility and market adaptability of R&D projects and identifies risks in advance through early warnings from key indicators [1].

Concurrently, by setting multi-level risk thresholds, digital and intelligent finance constructs a risk dashboard to achieve real-time visual monitoring of risks and trigger hierarchical response processes [1]. Furthermore, through provisioning special innovation risk reserves and setting aside strategic flexible funds, digital and intelligent finance builds a multi-tier risk buffer mechanism to smooth financial fluctuations and ensure the continuous advancement of innovation activities [1], escorting the steady generation of new quality productive forces.

4 Optimization Paths for the Enabling Effect of Digital and Intelligent Financial Transformation on the Generation of Enterprise New Quality Productive Forces

Combined with the previous analysis of the enabling mechanism, and addressing the existing problems in the current digital and intelligent financial transformation of enterprises, this section proposes optimization paths for the enabling effect of digital and intelligent financial transformation on the generation of enterprise new quality productive forces from four aspects: technology application, talent cultivation, business-finance integration, and risk management and control, in order to promote enterprises in achieving high-quality development.

First, deepen the integrated application of digital technologies and build an intelligent financial system. Enterprises should increase investment in digital technologies such as artificial intelligence and blockchain, build an integrated intelligent financial platform, realize the deep integration of financial and business data, and break down information barriers [6]. The focus should be on optimizing modules such as R&D investment accounting, data asset measurement, and technology capital evaluation, to enhance the level of financial intelligence and provide technical support for scientific and technological innovation and factor allocation [1]. At the same time, drawing on advanced industry practices, enterprises should promote the reconstruction of financial processes to realize a shift in financial decision-making from "post-event traceability" to "pre-event early warning and in-event control." Second, cultivate interdisciplinary financial

talents and strengthen the talent support role. Enterprises should establish an interdisciplinary talent cultivation system of "finance + digital + innovation," strengthen digital technology training for existing financial personnel, and enhance their capabilities in data processing, intelligent analysis, and strategic decision-making [6]. Concurrently, introduce professionals in fields such as digital technology and scientific and technological innovation, optimize the structure of the financial team, and promote the transformation of financial personnel from an accounting orientation to a value-creation and innovation-support orientation [1]. Furthermore, establish and improve talent incentive mechanisms, linking innovation performance with compensation to stimulate the innovative vitality of talents. Third, promote the deep integration of business and finance to strengthen strategic support capabilities. Enterprises should break down departmental barriers between finance and business, and promote the embedding of financial work into the entire process of scientific and technological innovation, production and operation, and market expansion [6], realizing the resonance of finance and business. Utilize the digital and intelligent financial platform to integrate business and financial data, providing precise financial support for enterprise innovation decisions and industrial upgrading [7]. Meanwhile, construct a multi-dimensional value reporting system to systematically disclose the incremental contributions of scientific and technological innovation in aspects such as green and low-carbon development and industrial chain synergy, comprehensively reflecting the value creation of new quality productive forces [1]. Fourth, improve the risk management and control system to ensure the implementation of the enabling effect. Enterprises should rely on the digital and intelligent financial platform to build a dynamic risk control system covering the entire life cycle of innovation, and optimize mechanisms for risk identification, quantification, early warning, and response [1]. Refine risk assessment indicators, strengthen the management and control of R&D risks, market risks, and technological risks, and establish a panoramic risk reporting system to provide risk references for decision-making [1]. Concurrently, reasonably provision innovation risk reserves, optimize resource allocation, and balance innovation investment with risk management and control, ensuring that the enabling effect of digital and intelligent financial transformation on new quality productive forces yields tangible results.

5 Conclusion and Outlook

Based on the Resource-Based View, Dynamic Capabilities Theory, and Technological Innovation Theory, this paper systematically analyzes the enabling mechanism of digital and intelligent financial transformation on the generation of enterprise new quality productive forces. The research finds that digital and intelligent financial transformation comprehensively supports the generation of enterprise new quality productive forces by empowering scientific and technological innovation, activating factor allocation, enhancing operational efficiency, and controlling innovation risks. It is an important path for enterprises to cultivate new quality productive forces and achieve high-quality development. Currently, digital and intelligent financial transformation still faces problems such as the superficial application of technology, talent shortages, and insufficient business-finance integration. It is necessary to enhance the enabling effect through measures such as deepening technological integration, cultivating interdisciplinary talents, promoting business-finance integration, and improving the risk management and control system.

Looking ahead, driven by the continuous evolution of digital technologies and new quality productive forces, digital and intelligent financial transformation will become increasingly intelligent, collaborative, and green. Future research can employ specific case studies to empirically test this enabling effect and refine practical transformation paths, while also exploring its synergy with green productivity and future industries to enrich the relevant theoretical framework.

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References

[1] Chen Haoliang, Jin Yunyun. Construction of Enterprise Digital Financial Innovation System from the Perspective of New Quality Productive Forces [J]. Communication of Finance and Accounting, 2025, (18): 17-21+46.

[2] Li Rui, He Lifen. Practical Path of Accounting Digital Transformation Led by New Quality Productive Forces [J]. Commercial Observation, 2025, 11(24): 47-49+59.

[3] Zhuang Jia. Research on the Construction and Implementation Path of Financial Shared Service System Driven by New Quality Productive Forces [J]. China Collective Economy, 2025, (22): 169-172.

[4] Wu Zhongxin, Liu Yu, Qiu Shidi. Scientific and Technological Innovation and Financial Management: Driving the Development of New Quality Productive Forces [J]. Finance and Accounting Monthly, 2025, 46(14): 3-8.

[5] Zhang Delei. Discussion on the Path of Transformation and Upgrading of Financial Management in Group Enterprises in the Context of Digitalization and Intelligence [J]. Finance and Accounting for International Commerce, 2024, (04): 89-92.

[6] Yuan Ting. Exploration on the Path of Digital Transformation of Enterprise Financial Accounting Empowered by New Quality Productive Forces [J]. Modern Marketing, 2025, (36): 1-3.

[7] Lin Lili. Digital and Intelligent Financial Transformation Assists the High-Quality Development of Enterprises [J]. Marketing of Time-Honored Brands, 2025, (05): 128-130.