

## **A Comparative Analysis of Digital Economy, Sharing Economy and Platform Economic Theory**

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*Abstract: Digital economy, sharing economy and platform economy are the new economic forms in the era of mobile Internet, which is of great significance to realize the rapid economic growth and successful transformation in the new normal state of China's economy. This article mainly analyzes the connotation, characteristics, and operating mechanism of the three new economic forms. According to the theoretical comparison and analysis of the above three aspects, it is concluded that the three new economic forms are different from each other. The digital economy focuses on dataization. The sharing economy focuses on the sharing of idle resources and the platform economy uses the platform as the core to create value. I hope this article provides theoretical support for the development of the three new economic forms.*

*Keywords: digital economy, sharing economy, platform economy, comparative analysis.*

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### **1. INTRODUCTION**

In the context of global informatization entering full penetration, cross-border integration, accelerating innovation, and leading a new stage of development, information technologies represented by mobile internet, third-party payment, big data, and cloud computing have promoted digital economy and sharing. The emergence of a new economy has profoundly changed the traditional industries. With increasingly fierce competition in the industry and rapid changes in the competitive landscape, the new economy is becoming a powerful kinetic energy for innovative economic growth, and it has continuously accumulated experience for global economic recovery and social progress. With the support of policies, China's economy will usher in new opportunities for development in the future. This paper focuses on the three most representative new economies, and conducts in-depth theoretical analysis on the three aspects of connotation, characteristics, and operational mechanisms.

### **2. THE CONNOTATION OF THE NEW ECONOMIC PATTERN**

The digital economy is based on digital knowledge and information as the key production factors, with digital technology innovation as the core driving force, modern information networks as the important carrier, and deep integration of digital technologies with the real economy to continuously increase the level of digitalization and intelligence in traditional

industries. Accelerate the Reconstruction of New Economic Forms of Economic Development and Government Governance Models. The China Information and Communications Research Institute has clearly defined in the "White Paper on China's Digital Economy (2017)": The digital economy is a higher-level economic stage following the agricultural economy and the industrial economy. [1]

The concept of the sharing economy was first proposed by Robin Chase, who believes that the sharing economy is the best ability to integrate individuals and companies, and gives organizations and individuals the flexibility to adapt quickly and creatively to change and make society. The potential was released, mainly consisting of three basic elements: overcapacity (idle resources), shared platforms, and everyone involved. [2] The domestic scholars believe that the sharing economy is a process of deintermediation and re-intermediation. The idle resources of the supply side use the third-party platform such as the Internet to temporarily transfer the right to use, realize the socialization of production factors, and improve the inventory of assets. It also creates value for the demand side by increasing the efficiency of the use of existing assets and promotes the sustainable development of the social economy. [3]

The definition of the platform economy begins with the theory of bilateral markets studied by foreign scholars. The bilateral market can influence the transaction volume by increasing the cost of the market side and simultaneously reducing the charges on the other side. [4] However, domestic research mostly starts from the perspective of the Internet economy. Investigate and define the platform economy. It is proposed that the platform economy is based on network information technology, with the platform as the core to provide services to all parties, integrate multi-subject resources and maintain multilateral relations. In order to create value-added value, a new type of economy that maximizes the benefits of multi-subjects. [5]

In summary, at the current stage, all three new economies must rely on Internet technologies. They are all aimed at improving the efficiency and quality of economic and social development. The difference is that digital economy is based on digitalization as the key factor, the sharing economy is the reuse of idle resources. While the platform economy provides services centered on the platform.

### **3. THE CHARACTERISTICS OF THE NEW ECONOMIC PATTERN**

The digital economy has the main features of platformization, dataization, and universalization. A: Platformization. Relying on the new infrastructure of the "cloud network end", the Internet platform has created a brand-new business environment, information transparency has greatly reduced the communication costs between suppliers and consumers, and has supported the formation of large-scale collaboration. B: Dataization .The flow and sharing of data drives business processes across corporate boundaries and weave new ecological networks and value networks. C: Popularization. Under the digital economy, Pratt & Whitney Technology, inclusive finance, and inclusive trade have been realized. The technical threshold has been greatly reduced, a new credit scoring model based on internet credits has been established, and the trade order will be more fair and just. D: Decentralization. The number of economic activity

participant's directly facing enterprises has grown in large scale, and the spatial distribution has expanded on a large scale. It is mainly manifested in two aspects: the decentralization of production and the decentralization of consumption.

The sharing economy has outstanding characteristics such as public participation, friendliness, and resource allocation. A: rapid flow and efficient configuration of resource elements. The sharing economy integrates a large number of scattered and diverse resources through the network, exerts its maximum utility, and meets the ever-increasing diversified needs. B: Sociality and environmental friendly. The sharing economy can be used as a way to achieve sustainable development of the environment and society. [5] Many scholars believe that sharing reality is a form of anti-consumption [6] and environmentally-conscious behavior [7]. C: New changes in ownership relationships. The sharing economy mainly adopts the separation of ownership and use rights, adopting part of the right to use products such as lease-buying, rent-a-sale, and other methods to maximize the efficiency of resource utilization. D: The best user experience. The sharing economy can meet consumers' individual needs in a fast, convenient, low-cost, and diversified manner. User evaluation can be timely, open, and transparent. It will directly influence the choices of other consumers. This will promote the platform and supply. Party strives to improve services.

Platform economy has key features such as value-added, external, and openness. A: Bilateral or multilateral markets. Platform economy through the bilateral market effects and the clustering effect of the platform, forming a platform for the division of work in accordance with the positioning, so that all parties involved benefit, to maximize the platform value, customer value and service value. B: Value-added. Platform-based companies need to be able to provide consumers and businesses with revenue-generating services. For example, on the one hand, Baidu provides search services for the majority of users. Through gathering traffic, it provides businesses with more accurate advertising and improves advertising effectiveness. C: Externalities. Platform-based companies provide services to buyers and sellers, facilitate transactions, and the number of any party will affect the changes in the number of other parties, fully demonstrate its network external characteristics, the more sellers and buyers, the more valuable the platform. D: Openness. The greatest feature of the platform economy is the attraction of various resources. The openness of the platform achieves a win-win situation for all parties, thereby enhancing the focus and platform value of the platform.

Through the analysis of the three economic characteristics, we can see that the features of the three economies are different, the digital economy is more biased towards data management, the sharing economy is the separation of property rights, and the platform economy is concerned with providing the service foundation for the development of the economic model.

#### **4. THE OPERATING MECHANISM OF THE NEW ECONOMIC FORM**

Digital economy operating mechanism. A: Business model from B2C to C2B. Digital economy companies provide relatively standardized modules for consumer combinations, attract consumers to participate in the design and production links, and use platform + front-end and

other methods to meet the individualized needs and enhance organizational capabilities. B: Organizational model from the factory form to the cloud system. In the digital age, "cloud system", namely "large platform plus small front-end", has become a more common organizational form. The world's highest market value retailer, Alibaba, has no stock. Facebook, the world's hottest media owner, does not have a content producer, and the world's largest taxi company, Uber, has no taxi, and the world's largest provider of accommodation, Airbnb, has no real estate. C: Employment mode from the eight-hour work system to free arrangements. In the digital age, the employment model has changed into a free connection, and more and more individuals have become knowledge workers. Everyone is an expert in a certain field. At the same time, new forms of SOHO-style work and flexible work that integrate work, life, and learning will become more common.

Sharing economy operating mechanism. A: Dynamic pricing. The emergence of an alternative business organization for a sharing economic platform provides the possibility for service providers to make relatively free and flexible pricing. B: Free time. The service/product provider can decide on its own time for the service, without having to be restricted by the business organization system. What the sharing economy brings is the release of the energy and quantity of idle workers on the supply side. C: Bidirectional constraints. Whether it is Didi or Airbnb has broken the traditional user's evaluation mechanism for service providers, establishing a mutual evaluation system of users and service providers. It is precisely because the sharing economy platform opens the front-end supply to provide more non-standardized and creative services. The platform built a two-way selection mechanism for buyers and sellers. Therefore, the workers are no longer merely "low three and four" employees, but are equal goods and service providers to consumers. This, in turn, has motivated laborers to provide more abundant and unique services.

Platform economic operating mechanism. A: Online and offline integration. There are frequent interactions between multiple parties on the platform, and there is more competition among enterprises and innovations emerge in an endless stream. For example, e-commerce platform Taobao.com, the brand operator can help the operator to open a shop on Taobao to complete the transaction with the consumer. The IT service provider integrates the online and offline information system, and the logistics service provider is responsible for the transportation and distribution of goods. Pay back through Alipay. In the future, the platform economy will extend to more areas and accelerate the penetration of traditional economies. The combination of online and offline integration will become a must-have platform for the Internet economy. Platforms, consumers, and service providers together form a meshed collaboration. B: Collaborative management of supply chain. The platform industry has broken down the general relationship of industrial development, relying on various factors such as the industrial value chain, enterprise chain, supply and demand chain, space chain, and resources, capital, labor, and environmental capacity. Promote cross-regional and cross-border integration and optimize the allocation of diversified market resources, thus forming a "horizontal integration" production model.

Based on the comparative analysis of the operating mechanism, the common point of the three economic forms is that they pay more attention to individualized demands and their working hours are relatively free. The digital economy focuses on the transformation of the organizational model, from the factory form to the cloud system, to achieve zero output and zero inventory; the sharing economy adopts dynamic pricing, and flexible pricing based on supply and demand changes; the platform economy is mainly integrated on the offline line to achieve collaborative management of the supply chain.

## 5. CONCLUSION

Judging from the current state of development, the digital economy, the sharing economy and the platform economy as new economic forms have overturned the traditional economic model. Through comparative analysis of connotations, characteristics, and operating mechanisms, this article can draw the following conclusion: The three new economic forms are not the same in the above three aspects, but they all rely on the progress of Internet technology, relying on the support of platforms and resources to develop rapidly. Every economic form has changed people's way of life. Each participant can influence each other, coordinate governance, and cooperate with each other, thus providing possibilities for creating greater value. People's individual needs are increasingly strong, and personalized marketing, flexible production, and socialized supply chain are continuously deduced. Three economic forms increase personalized marketing methods. Consumers participate in various forms of customization in different forms. Among them, the digital economy is more focused on digitization, achieving Hewlett-Packard's science and technology, finance, and global trade, and gaining greater profits at lower cost; while the sharing economy consists of the rapid flow and efficient allocation of resource elements and the transformation of ownership relationships; In the field of platform economy, based on the externalities of the bilateral market, it has attracted the participation of various resources, thereby increasing the value of the platform. This article has achieved some results through theoretical comparison and analysis, but subjectively and objectively, the research is still insufficient. In the future, it is possible to conduct deeper and broader theoretical and empirical studies on the three economies.

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