

Digital Economy Promotes Main Channel of New Land-Sea Corridor in Western China

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Abstract: The development of digital technology is constantly changing, and the digital economy has empowered all walks of life and brought great economic benefits, leading the high-quality development of China's economy. This paper takes the main canal area of the western land and sea new corridor as the research object, introduces the current status quo and goals of the development of the digital economy in the region, and puts forward targeted issues of the development of the digital economy in combination with the economic and social situation of the main canal area of the western land and sea new corridor. It focuses on the problems of regional integration of digital economy development, insufficient and unbalanced digital economy development, and the existence of many shortcomings in the construction of the main canal of the western land and sea new corridor, elaborates on the negative impact of these problems on the western land and sea new corridor, and puts forward corresponding policy recommendations.

Keywords: New Western Land-Sea Axis; Digital Economy

1. Introductory

In 2021, the scale of China's digital economy will be nearly 46 trillion, accounting for nearly 40% of annual GDP, in which the accelerated development of digital industrialisation and industrial digitisation will support the high-quality development of China's economy. The digital economy is an indispensable point of economic growth and an inevitable choice for building a modernised economic system^[1]. From the perspective of high-quality development of regional economy, some scholars believe that the development of digital economy can accelerate the flow of regional factors^[2], narrow the regional development gap^[3], promote the integration of primary, secondary and tertiary industries^[4], and finally realize the coordinated development of the region.

At the same time, studies on canal construction and trade corridor effects have been widely emphasised, based on the classical study of the relationship between spatial distance and trade, which shows that transportation cost is still a key factor hindering trade^{[5][6][7][8]}. As one of the strategies of China's regional coordinated development, the new western land and sea corridor takes on the important task of China's modernised land and sea intermodal transport, which is a trade and logistics corridor to smooth China's western region, an important carrier for China's quality opening up to the outside world^[9], and an important corridor to realise China's western region's embracing the sea^[10].

2. The status and goals of the development of the digital economy in the provinces and cities along the main corridor of the new western land and sea corridor.

The provinces and municipalities along the main corridor (Chongqing, Sichuan, Guangxi and Guizhou) are lagging behind in the level of digital economy development nationwide, mainly because they are in the less developed regions in the west, and have been historically affected by geographic factors, border instability, and unbalanced development policy factors. At present, the information infrastructure construction of Chongqing and Sichuan is in the leading position among the four regions in the main channel, while Guangxi and Guizhou are in the developing stage, showing the situation of echelon development in general and the situation of characteristic development in individual.

Collating the four provinces and cities of the "14th Five-Year Plan" and 2035 Vision Outline found that in the new infrastructure construction goals, Chongqing to become a national leading benchmark city, Sichuan to become a national supercomputing center, Guangxi to become a docking ASEAN arithmetic base, Guizhou to become a demonstration base of the southern data center. In the goal of digital economic development, the main features of the four provinces and cities target are that the digital economy drives the real economy, develops into a digital development pilot area or industrial park with certain influence in the country and even in Southeast Asia, builds an efficient and perfect digital government system, popularizes digital products in the field of people's livelihood, and builds a number of demonstrative smart cities.

3. Digital Economy to Promote the Construction of the Main Corridor of the New Land-Sea Corridor in Western China

3.1 Inadequate and Uneven Development of Digital Economy in Provinces and Municipalities Along the Main Corridor of the New Western Land-Sea Corridor

The overall level of digital economic development in the four provinces and municipalities along the main channel is not high and the scale is not large, and the order is that Sichuan and Chongqing are listed in the first echelon, Guizhou is listed in the third echelon, and Guangxi is listed in the fourth echelon, so it can be seen that there is an imbalance in the development of the digital economy among the four provinces and municipalities. From the perspective of industrial organization, enterprises are the carrier of the development of digital economy, realizing the high-quality development of the real economy through the digital transformation of industry, and playing the role of improving production efficiency and reducing production costs. A similar echelon phenomenon exists between the four provinces and municipalities in terms of enterprise size and the number of enterprises, with Sichuan and Chongqing having a larger number of large enterprises than Guizhou and Guangxi. Based on the above analysis, there is an uneven development of the digital economy within the four provinces and cities, which creates a digital divide in the main channel areas and hinders the further development of China's digital economy.

3.2 Low level of regional integration of digital economy development in provinces and cities along the main corridor of the new western land and sea corridor

Data elements are configured through the market and generate value in the process of social production, which can not only derive the big data industry, but also integrate the regional industrial chain ecology^[11]. In the era of digital economy, the flow of traditional resource elements between the four provinces and cities is still hindered by problems such as inconvenient transportation and poor information, which impede the formation of regional integration. The low level of integration of digital economy development in the four provinces and cities leads to the low innovation capacity of the overall digital economy and the lack of power for future development. In the four provinces and cities of the main channel of the new western land and sea corridor, Sichuan and Chongqing are at the forefront of the development of the digital economy, but the level of the industrial structure of Sichuan and Chongqing is relatively low, the development of the real economy is relatively lagging behind, and the regional financial system is not perfect enough, so it does not play the role of the regional radiation drive. Guangxi and Guizhou digital economic development potential, but the development of the real economy is lagging behind, the lack of digital economic development self-sufficiency, short industry chain, weak market forces and other factors, resulting in Guangxi and Guizhou missed the opportunity to complement the advantages of industry, capital and talent with Chongqing and Sichuan. For these reasons, the development of the digital economy in the four provinces and cities did not form a synergy, regional linkage, regional integration.

4. Proposals for the digital economy to promote the construction of the main channel of the new land and sea corridor in western China

4.1 Main corridor areas seize industrial digital development for regional integration

Industrial digitization means that the industrial chain in the main channel area of the western land and sea new channel is more efficient, more comprehensive and better quality, and the upgraded industrial chain can better utilize the waterway intermodal transport

advantages of the main channel of the western land and sea new channel, and open up the two-way empowerment of poor upstream and downstream collaboration of the industrial chain in the main channel area is an inevitable blockage for the high-quality development of China's economy and for the domestic cycle. However, industrial digitization faces many difficulties, the main difficulty is that it is difficult to rely only on the economic strength of a province or city to support the cost of digital transformation, and it is difficult to rely only on the ability of a number of enterprises or units on their own to provide sufficient intellectual support. Therefore, the regional integration of the main channel area to develop the digital economy is the way to promote industrial digitization. Realize the specific means of regional integration is to build a digital platform, regional integration platform support alone is not enough, the local government as the main body has the responsibility to introduce regional safeguard laws and regulations to regulate the data rights trading, adhere to the principle of open sharing of data for mutual benefit and win-win situation, to circumvent the problem of overlapping construction of the industry of the local government.

4.2 Provinces and municipalities along the main corridors are characterized by the development of the digital economy, and the economic strength of the main corridors has been strengthened in all aspects.

As an important logistics hub, Chongqing is the cargo distribution center of China's Yangtze River water transportation and Southwest China land transportation, Chongqing should give full play to its own location advantages and maintain its strong economic advantages, increase digital infrastructure investment to improve the level of intelligence of the main channel logistics hub, and increase the investment in digital technological innovation research and development to strengthen the main channel's innovative strength. Chongqing and most of the areas of Sichuan composed of the Chengdu-Chongqing city cluster is the economic growth pole in the western region, is leading the development and opening up of the western part of the national city cluster, has formed a certain scale of industrial clusters. Guizhou is an inland area without rivers or seas, and is located in a mountainous region that makes transportation on the road inconvenient. The focus of Guizhou's development is to continue to invest in digital transportation infrastructure, build a digital transportation road network in the province to make logistics smooth, and open more high-standard railroads connecting important node cities inside and outside the province to make Guizhou accessible to the sea and rivers, and play the role of dredging the main channel.Guangxi is the only coastal province in the western region. In view of the advantage of the only access to the sea in the west, Guangxi should focus its digital reforms on upgrading Beibu Gulf Port, plan the spatial layout of the park in Beibu Gulf Port in an integrated manner, improve the level of informationization of port logistics, and enhance the level of intellectualization of port-related industries.

5. Conclusion

The main channel of the new western land and sea corridor plays a leading role in development, optimizing the industrial layout of the main corridor and innovating the logistics organization mode can not be separated from the support of the digital economy. Give full play to the advantages of the provinces and cities along the main channel, grow the digital industry and promote industrial digitization, and enhance the economic strength of the new western land and sea corridor. The digital economy promotes the regional integration of the main channel of the new western land and sea corridor, reduces the income gap and urban-rural gap within the main channel area, and realizes the coordinated development of the regional economy of the main channel area.

References

- [1] Han CZ, Zhang BY. Mechanisms and paths of digital economy for economic double-cycle development[J]. Qinghai Social Science, 2020(6): 41-46.
- [2] Zhao F, Li WT. Digital Economy Enabling High-Quality Economic Development-Based on the Dual Perspectives of Market and Government[J]. Journal of Shanxi University (Philosophy and Social Science Edition), 2022, 45(05): 41-50.
- [3] He D, Zhao XZ, Qi Q. A study on the measurement, spatial and temporal pattern and regional differences of China's digital economy development level[J]. Industrial Technology and Economics, 2023, 42(03): 54-62.
- [4] Xiang Y, Lu Q, Li ZX. Digital economy development empowers common wealth: impact effect and mechanism[J]. Securities Market Herald, 2022(05):2-13.

- [5] Hummels D. Transportation costs and international trade in the second era of globalization [J]. The Journal of Economic Perspectives, 2007, 21 (4): 237-238.
- [6] Aviat A, Coeurdacier N. The geography of trade in goods and asset holdings [J]. Journal of International Economics, 2007, 71 (1): 22-51.
- [7] H Kanson L. Markets and networks in international trade: on the role of distances in globalization [J]. Management International Review, 2012, 52 (6): 761-789.
- [8] Disdier AC, Head K. The puzzling persistence of the distance effect on bilateral trade [J]. The Review of Economics and Statistics, 2008, 90 (1): 37-48.
- [9] Yang XZ, Zheng YN. A preliminary study on the construction of new international land and sea trade corridors under the framework of "Belt and Road" [J]. Research on Nanyang Issues, 2019(1): 11-21.
- [10] Cong XN. Economic impacts of the new western land and sea corridor and its regional collaboration mechanism[J]. China Soft Science, 2021, No. 362(02):65-78.
- [11] Yu DH, Li YH. Industrial organization innovation in the era of digital economy:taking the digital technology-driven industry chain cluster ecosystem as an example[J]. Reform, 2021(7): 24-43.