# LOGISTICS DEVELOPMENT UNDER "THE BELT AND ROAD INITIATIVE"

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**Summary.** With the promotion of "The Belt and Road Initiative", the scale of logistics has been further expanded. However, at the same time, logistics between China and Belarus still faces some problems, such as high logistics and transportation costs, lack of reverse logistics, etc. This paper focuses on how to effectively deal with the risks of logistics industry under "The Belt and Road Initiative" and build the "21st Century Maritime Silk Road" together.

In September 2022, the Presidents of China and Belarus met and decided to upgrade the bilateral relationship to an all-weather comprehensive strategic partnership. The two sides will deepen cooperation in building "The Belt and Road Initiative". With the development of "The Belt and Road Initiative", Chinese consumers and Chinese enterprises continue to open up to the outside world and cooperate with Belarusian countries to achieve common development of talents and resources, common prosperity. In the impact of the global COVID-19 virus, the global economy has been slow to develop, and "The Belt and Road Initiative" has broadened the idea of development by linking the countries along the route, which has led to a deeper integration of talents, markets and resources, which is more suitable for the current economic situation and will help the world economy to recover and develop as soon as possible.

At the same time, the level of development of logistics industry is an important factor affecting the development of economic trade along "The Belt and Road Initiative". Good logistics infrastructure and high-quality logistics services can effectively improve the efficiency of the flow of goods between countries, reduce the cost of international trade and promote the development of international trade, while inefficient logistics services will bring time and cost waste to enterprises and countries, directly affecting the competitiveness of enterprises and countries. Therefore, it is important to study the logistics industry in China and Belarus under "The Belt and Road Initiative". This paper focuses on how to effectively deal with the risks of the logistics industry under "The Belt and Road Initiative" and proposes five new ideas to promote "This paper focuses on how to effectively address the risks of the logistics industry under "The Belt and Road Initiative", and proposes five new ideas to promote the new development of the logistics economy under "The Belt and Road Initiative".

# 1. The establishment of infrastructure.

Infrastructure and energy projects are the main materials transportation, cannot be separated from the construction of infrastructure, although the initial economic effect is difficult to present, but is the basis for other economic activities. For example, the "CHINARAILWAYExpress", a cross-border logistics based on infrastructure construction, meets the needs of the international situation and makes the development of "The Belt and Road Initiative" smoother and more stable.

2. Speed up the establishment of a comprehensive transportation system.

Transport is the key link of logistics, if there is no transport channel, transport efficiency is low, all directly or indirectly affect the development of logistics industry, such as the low efficiency of transport. So, we should improve the infrastructure of logistics transportation channels, form a transportation network of sea, land and air, link domestic and foreign countries more closely together, shorten the transportation time and improve the efficiency of transportation. For Minsk, focus on the combination of railroads, highways, airlines, etc. to form a system, shorten the time for changeover, establish transit stations, and radiate in all directions.

# 3. Build overseas warehouses.

As the cross-border e-commerce logistics in the development process there are high transpor-

tation costs, long transportation cycle, horizontal and vertical level of the lack of problems, will seriously limit the further development of cross-border e-commerce logistics. The solution to the problem is to set up warehouses in China and Belarus, which can significantly reduce the logistics cost, help shorten the transportation and distribution cycle, and avoid the exchange rate, political and other risks.

4. The construction of cross-border logistics information platform.

Cross-border logistics involves a large number of subjects, each subject's style of action, attitude, information technology is different, cross-border logistics there is poor communication, information delay. Therefore, the establishment of an international circulation of logistics information platform is very necessary, the use of current advanced technology, the realization of information flow, at anytime and anywhere to be able to track the logistics information of goods, in order to maximize the maintenance of healthy development of logistics.

5. Cultivate professional talents

The shortage of international logistics professionals and the lack of logistics personnel today is one of the factors that restrict the development of the logistics industry. Especially in today's high-tech development, more comprehensive and professional personnel are needed to develop modern logistics industry, better promote the upgrading of logistics industry and improve the competitiveness of international logistics industry in Belarus. First of all, the introduction of international talented people, focusing on the interface between domestic and foreign. Secondly, to strengthen the training of logistics personnel in universities and train the special talents needed by logistics companies. Finally, strengthen the exchange and cooperation with international logistics enterprises, and send personnel to international enterprises for study and further training.

#### References

- 1. Zhang Hongsheng. Cross-border e-commerce and bilateral trade costs: An empirical study based on cross-border e-commerce policies[J]. Economic Research. 2021. № 56. P. 141–157.
- 2. Xu Ran. Study on the optimization of cross-border e-commerce logistics system for agricultural products in the context of "The Belt and Road Initiative" [J]. Journal of Economic Research.  $-2022. N_{\odot} 9. P. 61-62,69.$

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# MONOCULAR 3D RECONSTRUCTION ON LOW-COST EQUIPMENT IN REAL TIME

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**Summary.** In recent years, 3D reconstruction has been widely used in various fields. However, high-quality data acquisition equipment is expensive in these application fields. This paper proposes a 3D reconstruction solution on the basis of low-cost equipment, which uses low-cost monocular camera to collect a series of images of real-world scenarios, thereby reconstructing the real-world scenarios (3D model of the scenes) in real time.

At present, in the fields of Google, Baidu, Yandex's high-precision map construction [1] and reconstruction of ancient buildings, the 3D reconstruction is the core part. High-precision map construction that based on 3D reconstruction technology can improve the accuracy of autonomous driving, and 3D reconstruction of ancient buildings plays a significant role in cultural protection. However, there are many limitations in these applications, 3D reconstruction techniques in these applications always use high-quality, expensive data acquisition equipment such as lidar, radar locators, multi-eyes cameras, etc. For ordinary consumers and low-cost consumer-level products, such applications are too bulky to be deployed on consumer-level products for consumers to experience the technological portability.