Consolidation of the road freight transport industry in the Far Eastern Federal District: In search of strategic priorities for the development of the transport and logistics industry

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Abstract: The study examines consolidation in the road freight transport industry of the Far Eastern Federal District (FEFD) with the aim of identifying strategic priorities for the development of the regional transport and logistics sector. The analysis combines a structured five-stage framework for market assessment with qualitative methods, including case studies of mergers and acquisitions, expert interviews, and media content analysis, to evaluate market boundaries, concentration, consolidation drivers, and their effects. Market concentration is measured using standard indices such as concentration ratios and the Herfindahl–Hirschman Index, showing a fragmented industry without dominant firms, where increased concentration is unlikely to reduce welfare and may instead enhance efficiency through economies of scale and reduced duplication of fixed costs. The study demonstrates that consolidation can lower transport costs, improve asset utilization, and contribute to environmental goals by decreasing the number of trips and associated carbon emissions. The findings highlight three main outcomes of consolidation: strengthening the investment attractiveness of the macro-region, supporting the transition to greener logistics, and increasing fiscal transparency in the road freight segment. Based on this, the research proposes two key strategic priorities for the FEFD: digitalization of logistics processes, including the deployment of intelligent transport systems and electronic document management, and the development of international transport corridors.

Keywords: Far Eastern Federal District, Road freight transport, Transport and logistics industry, Industry consolidation.

1. Introduction

As in many other countries [1] and even more so, due to the vast distances between economic centers, the economic development of the Russian Federation is closely linked to the efficiency of the transport and logistics industry, which plays a critical role in ensuring the stability of domestic and international economic relations. The transportation system provides a high level of mobility and supports the continued growth of urbanization and trade. In the Far Eastern Federal District (FEFD), this sector ranks second in gross value added after the extractive industry and accounted for 9.4% of the gross regional product in 2022, amounting to 915 billion rubles or 11.4 billion dollars. Owing to its coastline and borders with key Asia-Pacific countries, the FEFD has significant potential for integration into global logistics and supply chains. Meanwhile, harsh climatic conditions, great distances, low population density, and infrastructure constraints create substantial challenges for its development.

The transport and logistics industry constitutes a multilevel framework encompassing segments essential for efficient freight and passenger mobility. Road freight transport dominates in Russia, surpassing rail transport by nearly five times, with 6.49 billion tons compared to 1.37 billion tons in 2023. It excels in handling small consignments of goods, specialized, perishable, and hazardous cargoes, linking ports, rail junctions, and final consumers.

Indeed, the majority of Russian road freight transport occurs in the European part of the country over distances of less than 1,000 km. In Siberia and the Far East, where distances of 2,000–5,000 km and more are common, rail transport along the Trans-Siberian Railway still dominates. This is confirmed by railway freight turnover data, which exceeds road freight by a factor of 7: 2.64 trillion tkm versus 0.38 trillion tkm in 2023. This is partly due to lower railway tariffs (often subsidized for certain cargo types such as coal), partly due to historical reasons, and partly because of the nature of the cargo itself (coal, timber, oil, gasoline). However, the backwardness could even become a factor for rapid growth in the industry in the foreseeable future.

Additional arguments supporting the rapid development of the industry include the «eastern vector» in Russian international trade, major infrastructure projects in the FEFD, and the significant capacity shortage of the Eastern Railway Hub, estimated by various sources to range from 70 to 140 million tons. Furthermore, road transport often serves as the sole modality, supporting remote territories and strengthening regional economic resilience.

Recently, FEFD's transport geography includes domestic, interregional, and international corridors, involving China and North Korea, with primary freight flows on federal highways A370 «Ussuri», R297 «Amur», and A360 «Lena», the district's core arteries.

Consequently, road transport fulfills a systemic role in FEFD logistics, harboring substantial growth potential through road infrastructure modernization, logistics digitalization, and advancement of international corridors «Primorye-1» and «Primorye-2». Consolidating road haulage emerges as a strategic instrument for identifying and substantiating development priorities.

This study aims to develop new applicable proposals addressing issues related to the development of an integrated and sustainable transport and logistics strategy for the FEFD within the road transport segment.

2. Literature Review

In recent years, the transport and logistics industry has demonstrated a growing trend toward consolidation aimed at improving resource efficiency through increasing returns to scale and enabling large-scale infrastructure projects that can serve as drivers of regional economic growth. Research on consolidation in the industry is very important to provide an appraisal of the level of concentration of participants in a specific segment of the economy, identify key trends, and shed light on strategic opportunities for private companies and public agencies. Industry consolidation refers to the process of merging and reducing the number of firms competing in a specific area, which often occurs through mergers and acquisitions.

In Russian scientific literature, analytical studies and statistical data by Transport and Logistics Vector of the Far East: Digest [2] present detailed assessments and forecasts of the socio-economic development of the FEFD and emphasize the systemic role of transport and logistics infrastructure in conditions of spatial remoteness and infrastructure constraints.

The collection of scientific papers, Transport and Logistics: Innovate Development in the Conditions of Globalization of Technological and Economic Relations: Collection of Scientific Papers [3], concludes that consolidation contributes to cost reduction, more efficient use of transport assets, and the formation of more sustainable market structures. The materials can be used to explain the relevance of and analyze both foreign and domestic experiences of consolidation, as well as to describe contemporary problems.

Industry analytical reports, in particular Trends in Automotive Transportation in the Russian Federation in 2023: Analytical Report [4], supplement scientific research with relevant empirical data. They view consolidation as a key factor in improving freight transportation efficiency, reducing costs, and optimizing the use of vehicles. There is a high degree of consolidation in the less-than-truckload segment, where the three leading companies control more than half of the market, indicating structural changes in the industry and the growing role of large operators.

Foreign empirical studies confirm the universal nature of consolidation processes in the transport and logistics industry. In the article «The transition from freight consolidation to logistics: the case of Hong Kong» by Cheung et al. [5], using Hong Kong as an example, shows the transformation of traditional freight consolidation companies into multifunctional logistics operators offering warehousing, inventory management, and supply chain services. This reflects the global trend away from highly specialized transportation toward integrated logistics solutions.

In the paper «An optimization framework for efficient and sustainable logistics operations via transportation mode optimization and shipment consolidation» [6], consolidation is viewed as a tool for reducing costs and environmental impact in global supply chains. The authors analyze various types of transportation – Full Container Load (FCL), Less Than Container Load (LCL), air – and emphasize the role of timely delivery in reducing storage costs and preventing production disruptions, as well as the contribution of consolidation to reducing carbon emissions.

A separate area of research is represented by the work of Fontaine et al. [7], which focuses on smart and sustainable urban logistics. The authors show that consolidation among logistics service providers, combined with two-tier delivery systems and resource sharing, can deliver both economic and environmental benefits.

Overall, the literature review indicates the high scientific and practical significance of consolidation processes in the transport and logistics industry, while the specifics of their implementation in remote and sparsely populated regions, such as the FEFD, remain understudied and require further research.

3. Methodological Framework and General Review

The methodological framework for analyzing road freight consolidation in the FEFD encompasses five consistent stages. The following five-step process was used to achieve the research objectives.

1. Delineation of industry boundaries (on the basis of SSNIP-test [8] values of cross elasticities or substantive considerations) by identifying participating companies, key segments (B2B, B2C), and geographic scope (regional, national, international).
2. Assessment of market structure and concentration, particularly using the Herfindahl-Hirschman Index (HHI) and concentration ratios (CR3, CR5, CR10), which represent the market share of the top 3, 5, and 10 players.
3. Identification of consolidation drivers and effects, including increasing returns to scale and other economic factors, technological shifts, regulatory barriers, consumer preferences, and competitive pressure.
4. Forecasting consolidation scenarios includes slow (low entry barriers), rapid (high competition/profit pressure), or stagnation (regulatory blocks).
5. Evaluation of business implications, such as profit gains and bargaining power for large firms, acquisition risks for mid-sized players, and entry barriers for newcomers.

For the qualitative analysis, case studies of mergers and acquisitions (M&A), semi-structured interviews with the heads of trucking companies in the FEFD, and content analysis of media materials on consolidation trends were used.

As an example of mergers and acquisitions illustrating strategic consolidation, we can cite the expansion of FESCO (2023-2024), including integration into the structure of Rosatom (November 2023), providing access to investments and infrastructure projects such as the Northern Sea Route and low-carbon logistics. It also involves the acquisition of Logbox (March 2024), an intermodal operator (Freight Village Ru group), with 15,000 fitting platforms, expanded presence in Kazakhstan and Belarus, and increased container capacity.

Industry consolidation analysis is a multifaceted process that includes assessing market structure, analyzing driving forces, forecasting scenarios, and evaluating implications for companies. This analysis empowers investors and companies to make informed strategic decisions, respond promptly to market changes, minimize risks, and capitalize on growth opportunities. The use of reliable data sources is essential for accurate conclusions and valuable development strategies. Therefore, a well-executed

analysis can generate satisfactory results within the study's context.

Let us conduct an analysis of the FEFD, the macro-region studied by us in the context of road freight transportation. The FEFD comprises 11 federal subjects of the Russian Federation and covers an area of more than 6.95 million km², accounting for about 41% of the country's territory; however, it is home to only 5.4% of Russia's population. This disproportion shapes the region's development specifics, characterized by a rich resource base (accounting for 98% of the country's diamonds, 90% of boron raw materials, 80% of tin, exactly half of all gold, 14% of tungsten, and over 40% of fish and seafood), alongside low population density and increased infrastructure demands [9].

The geographical location of the FEFD is also unique: the district has access to both the Pacific and Arctic Oceans and borders key Asia-Pacific countries, including China, Japan, the Republic of Korea, and the United States, which determines its important transit-logistics and foreign economic role. At the same time, more than 70% of the gross regional product is generated in just four federal subjects: the Yakutia Republic, Sakhalin, Khabarovsk, and Primorsky Regions. This indicates a high degree of industrial concentration and more developed infrastructure, specifically in these areas.

The concept of transport support for this region is critically important for sustaining the international trade of the Russian Federation. For example, in 2022, more than 10% of Russia's total foreign economic cargo volume passed through border checkpoints in the Far East, with approximately 90% of that being export goods [10].

The development of the transport and logistics industry in the FEFD faces significant spatial and climatic constraints. Despite major projects, including the modernization of the Eastern Railway Hub, which encompasses the Trans-Siberian and Baikal-Amur railways, the development of the international transport corridors «Primorye-1» and «Primorye-2», and the construction of new port terminals, the FEFD still encounters a shortage of port capacity, modern warehouse complexes, and distribution centers. This issue is especially critical in the main logistics hubs, Vladivostok and Khabarovsk, where bottlenecks in logistics chains occur.

The insufficiency of transport infrastructure in the Far East can be indirectly identified through the analysis of interregional trade, typically studied using gravity models. The quality of transport infrastructure, which affects transportation costs, correlates with the elasticity of trade concerning distance. The higher this elasticity, the greater the distance constrains trade. This conclusion is based on a meta-analysis of 159 studies examining global trade patterns [11]; the median elasticity was −0.89. Russian studies generally show higher values, around −1.15 [12]. Moreover, when focusing on regions in Siberia and the Far East, the situation worsens. The distance elasticity of trade for Irkutsk Region is −1.35, and for Primorsky Region is −1.48 [13].

On one hand, this means a significant isolation of the Far Eastern regions from the industrial centers of the European part of Russia, leading to smaller trade, higher prices, and a global decline in social welfare. On the other hand, it opens wide prospects for development if transport challenges are overcome. Moreover, in the context of a growing economy (let us note that growth rates in the Far East in recent years have been higher than the national average) and severe capacity constraints on the Eastern Railway Hub, road transport freight may take a leading role.

4. Results

Let us begin by discussing market boundaries. Although geographic market boundaries in official data usually coincide with national borders, and product market boundaries are based on similarities in production technologies, Bain [14] suggests that geographic and product boundaries are not always reasonable. Moreover, in cases of ambiguity, he recommended sacrificing part of the data to preserve its purity. To be fair, some other authors, such as Mann et al. [15], suggested not focusing on this problem and using market boundaries from official data for their research. Nonetheless, certain complex situations are apparent:

4.1. Market Localization

Market concentration is often reported relative to the country as a whole or, for large countries, a macro-region, whereas markets for some products are highly localized due to high transportation costs. For example, the concentration index for concrete production in the USA is only 8%, indicating a highly competitive industry. However, the actual volume of this product is limited to the local market of a specific city. In such localized markets, we find typical oligopolistic suppliers. Several papers suggest adjusting published concentration measures for closed local markets [16, 17]. Others advise introducing dummy variables into models for product markets where transportation over long distances is rare.

Another method to account for market localization and spatial structure overall is the use of various spatial autocorrelation indices, particularly Moran's index [18], where positive values indicate that spatially close points share similarities in the analyzed characteristic, and negative values indicate negative spatial autocorrelation.

In the context of the road freight market, however, this is less relevant. Data are specifically collected for the FEFD, and although the competitive fringe, mostly registered as individual entrepreneurs, often operates within separate regions, increasing competition there by setting lower prices due to their tax treatment, larger companies tend to operate across many or all regions of the federal district.

4.2. Inter-Sectoral Competition

Industry definitions are also somewhat imprecise. In this regard, it is necessary to consider inter-sectoral competition, i.e., competition between two products used in different industries. Consequently, high concentration levels in the aluminum and copper industries likely underestimate competition since aluminum and copper compete in many applications, for example, in the market for electrical transmission lines. In general, the presence of substitute goods should significantly adjust the concentration index values. Nevertheless, most researchers ignore this issue, despite its relevance in nearly all studies on market organization.

In our context, significant competition arises mainly between two sectors – road and rail transport. The maritime, river, and air transport sectors either serve different routes or differ substantially in prices and cargo types. The presence of inter-sectoral competition benefits society by increasing social welfare.

4.3. Producers' Behavior

The last feature is no longer related to geographic and industry boundaries but to strategic interaction. Concentration indicators tell us nothing about the actual market behavior of companies in various industries. Industries may have the same number of firms and identical concentration ratios. However, one may be characterized by strong price competition and technological progress, as evidenced by improved products and modern production technology. Conversely, firms in another industry may be technologically backward but set prices by engaging in secret agreements. From a societal perspective, the «competitive» behavior of the first industry is undoubtedly better than the «monopolistic» behavior of the other, even though they have the same concentration ratios.

At the same time, active strategic interaction among companies occurs when their number is small, that is, in highly concentrated industries. In industries with medium and low concentration, which, as will be shown below, include road transport, strategic interaction, including cooperative behavior, is unlikely. Let us now move on to this issue.

4.4. Concentration

Currently, road freight transport holds an important but not dominant position in the transport logistics of the FEFD, lagging behind maritime and rail transport. The total revenue of the industry in

2024 amounted to 457.6 billion rubles, which, at the current exchange rate, is approximately 5.7 billion dollars.

As of April 10, 2025, according to the Basis database, there were 817 active companies registered across all FEFD regions under OKVED codes 49.41.1 and 49.41.2, including LLCs and joint-stock companies, as well as 5,125 individual entrepreneurs. Companies are categorized into «large business», «medium business», and «small business». None of the companies plays a dominant role. The largest one occupies less than 8.5% of the market, as shown in Table 1.

Table 1.
Total Revenue and Market Share of the 10 Largest Companies.
In the Road Freight Transport Market in the FEFD

Company	Total Revenue, Mln dollars	Market Share
1. LLC «Buryatia Coal Company»	478.7	8.37%
2. LLC «AlmazDorTrans»	310.8	5.43%
3. LLC «SakhaSpecTrans»	213.6	3.73%
4. LLC «DDSK»	201.3	3.52%
5. LLC «TK Global»	174.0	3.04%
6. JSC «EnergoTransSnab»	172.6	3.02%
7. LLC «Black Aurum»	147.3	2.58%
8. LLC «RPBK»	142.5	2.49%
9. LLC «Era Logistic»	141.6	2.48%
10. LLC «BlagLesProm»	140.4	2.46%
Total	**2122.7**	**37.12%**

Source: https://basis.myseldon.com/ru/landing, https://www.nalog.gov.ru/rn77/

For a more detailed and accurate assessment of concentration, special indices have been developed, typically taking into account two key aspects: the number of firms in the market, n, and their market share y_i [19]. The simplest measure is the concentration ratio CR_k, which equals the combined market share of the largest K companies operating in the market (most often the top three, four, or ten):

$$CR_k = \sum_{i=1}^{k} y_i .$$

Unlike a simple count of firms, this indicator distinguishes between the case of 10 equal companies ($CR_3 = 0.3$, $CR_4 = 0.4$) and the case of a dominant firm holding more than 80% of the market surrounded by 9 small competing firms (where $CR_4 > CR_3 > 0.84$). At the same time, the concentration ratio does not account for the heterogeneity of the core set of firms included in the index. For example, the concentration ratio for four equally sized companies occupying the entire market yields $CR_4 = 1$. However, it is evident that market concentration in such a market is lower than in the previous example with a single dominant firm, where the concentration ratio takes a lower value.

To account for such effects, another, probably the most popular indicator, is used – the Herfindahl-Hirschman Index (or H-index), calculated as the sum of the squares of the market shares of all firms operating in the market.

$$\text{H-index} = \sum_{i=1}^{n} (y_i)^2 .$$

Since market shares y_i have historically been expressed as percentages, the Herfindahl-Hirschman Index can range from zero to ten thousand. The advantage of the H-index is that it accounts not only for the total market share of companies but also for their differences in size. Moreover, it includes all producers in the market, not just the largest few, which, however, complicates the numerical assessment of the index when there is a dominant core and a competitive fringe. As a result, in practice, it is often estimated approximately.

Concentration measures are frequently used in practice, especially in government regulation,

including decisions regarding mergers and acquisitions [20], depending on perceptions of competition or monopolization in an industry.

Many studies provide arguments supporting the choice of a particular measure. For example, Cowling and Waterson [21] showed that the HHI emerges from the Cournot model with heterogeneous firms as a characteristic linking industry profitability, obtained endogenously, with exogenous cost differences. The paper of Saving [22] demonstrates that the concentration ratio arises similarly but under alternative behavioral assumptions.

Stigler [23] argued in favor of using the Herfindahl-Hirschman Index, pointing out that it facilitates the detection of collusion fraud. It should be understood, however, that these arguments hold «ceteris paribus», and concentration itself influences behavior, including that of third parties, so these arguments are not fully strict. Thus, the resulting theory does not dictate a priori choice of the best concentration measure.

Despite the high positive correlation among different concentration measures, choosing one or another can affect the final result [24, 25]. Using several different concentration measures may provide a clearer, more detailed picture of market dynamics. There are also formulas improving the H-index based on properties of alternative characteristics [26, 27].

Let's assess the concentration in the road freight transport market of the Far East. From Table 1, we see that the 10 largest companies occupy 37.12% of the market, meaning $CR_{10} = 37.12\%$. Let us also calculate the commonly used metrics CR_3 and CR_4:

$CR_3 = 8.37\% + 5.43\% + 3.73\% = 17.53\%$,

$CR_4 = 8.37\% + 5.43\% + 3.73\% + 3.52\% = 21.05\%$.

It is impossible to precisely calculate the Herfindahl-Hirschman Index with the available data; however, we can estimate its upper bound. From Table 1, the 10th largest company, «BlagLesProm», holds 2.46% of the market. This implies that all other companies are smaller. Since the remaining companies collectively occupy:

$100\% - 37.12\% = 62.88\%$,

the minimum number of such companies, by rounding, is:

$62.88\% / 2.46\% \approx 26$.

Thus, the maximum possible H-index is achieved if, in addition to the 10 specified companies, there are 26 companies each with approximately a market share of

$62.88\% / 26 = 2.41\%$.

Let us calculate the Herfindahl-Hirschman Index for this case:

H-index $= 8.37^2 + 5/43^2 + \ldots + 2.46^2 + 26^*2.41^2 = 320$.

In most developed countries, markets are considered low-concentration if the following conditions are satisfied:

$CR_3 < 45\%$, $CR_4 < 60\%$, $CR_{10} < 70\%$, H-index < 1000.

Such markets are generally unregulated; mergers and acquisitions are permitted, provided all parties agree and no special circumstances arise. This is precisely the situation in the road freight transport market of the FEFD – the indicator values are significantly below these thresholds, the market is fragmented, and some increase in market concentration, including through consolidation, does not threaten efficiency loss. It is even possible that social welfare will increase as firms consolidate. Let's discuss this in more detail.

4.5. Consolidation's Drivers and Effects

It is widely believed that an increase in market concentration is harmful to society. Nevertheless, even though restricting competition indeed leads to higher prices, reduced quantities, and increased deadweight losses, the issue of the harm caused by entry barriers is not so straightforward. An excessive number of firms, while having its advantages, also results in duplication of fixed costs and, consequently, significant welfare losses. Moreover, the extensive literature on this topic generally holds the view that in an unregulated economy, an excessive number of firms arises in equilibrium.

In particular, Mankiw and Whinston [28] derived general (though quite difficult to verify) conditions under which the number of firms in the market should be reduced relative to the equilibrium level. In a paper by Filatov et al. [29], these results were generalized to the case of heterogeneous firms, and some additional aspects of increased market concentration were analyzed, including the possible change in firms' strategies as their number decreases. The work of Bisceglia et al. [30] showed the same results but related to the incompleteness and asymmetry of information about costs. With low entry barriers, all companies, especially efficient ones, anticipate mass entry of rivals, including those with high costs, and price reductions, which cause them to reduce output. Consequently, the market share of efficient firms decreases significantly, leading to a decline in social welfare and, in some cases, even losses in consumer surplus.

But in general, the fundamental reason leading to an excessive number of firms in a free-entry market equilibrium is the «business-stealing effect», whose intuition is that each new entrant on the market «steals» some share of demand from competitors, forcing them to reduce output. Formally, this means that the derivative of a separate firm's output with respect to the number of firms is negative.

The second argument in favor of firm consolidation is economies of scale, which manifest as companies lowering their average costs as they expand and adopt more efficient technologies. It should be noted that these are two distinct, unrelated arguments. The business-stealing effect occurs even in situations of decreasing returns to scale, such as with quadratic production cost functions.

Empirical data support these theoretical hypotheses. The four decades of investigation into the competition and productivity of the U.S. freight transportation [31] have shown a strong positive correlation between HHI and total factor productivity for the truck sector. European statistics are also consistent with these findings. An analysis of European countries' experiences in consolidating freight from multiple suppliers for small shipments indicates that the economic effect of consolidation results in transportation cost reductions of 30-50%. Similar results are observed in the shipping industry. It is shown [32] that both HHI and CR are negatively associated with freight rates, implying that shipping alliances may help reduce prices.

Such an approach may be especially relevant for the FEFD, where logistics costs exceed the Russian average by 20-40%. A promising direction is the application of time-volume consolidation models and the creation of joint logistics platforms that allow small and medium-sized businesses to combine freight for both domestic and export shipments.

The positive effects of consolidation are not purely economic. It serves as an effective tool for improving the environmental situation. Experience shows that combining freight flows can reduce carbon emissions by 20–35% due to better vehicle utilization and fewer trips [33]. For the Russian Far East, characterized by vast distances and heavy transport loads, the impact of consolidation may be somewhat lower but still ensures emission reductions of 15–25%.

There are also successful examples of strategic mergers and acquisitions that have led to increased efficiency for companies and the industry as a whole. One such case is the expansion of FESCO Corporation's logistics division in 2023-2024, including joining the Rosatom group in November 2023 and completing the deal with Logbox in March 2024.

The transfer of a controlling stake in FESCO under the management of the state corporation Rosatom expanded access to investments and infrastructure projects such as the Northern Sea Route and carbon-free logistics. The acquisition of the intermodal operator (the Freight Village Ru group) increased the container fleet by 17% (to 120,000 units) and the fleet of flatbed platforms (to 15,000 units). Additionally, the average fleet age decreased by 10% (to 15.5 years), two container ships were acquired for coastal routes in the FEFD, and a partnership was established with JSC Kama.

5. Discussion

Besides everything mentioned above, additional potential for road freight industry efficiency gains lies in adopting digital solutions. The use of artificial intelligence and automated management systems allows route optimization, accelerates cargo handling, and reduces the need for transport vehicles. The

application of blockchain technologies enhances the transparency and reliability of shipments, especially in the perishable goods segment, strengthening the FEFD's position within international logistics chains [34].

For the FEFD, given its geographic remoteness and increasing demand for fast delivery, optimizing logistics processes in e-commerce is crucial. E-commerce is a rapidly expanding sector, with volumes in the FEFD rising 3.32 times from 129.6 billion to 430.1 billion rubles between 2018 and 2024, with an average annual growth of 22% ($\sqrt[6]{3.32} = 1.22$). Moreover, this growth has accelerated over the last two years. Since strict time constraints provide a competitive advantage to road transport, such as over rail transport, e-commerce can serve as a significant driver supporting the growth of the road freight industry.

According to the theoretical and methodological approaches to strategizing developed by Academician RAS V.L. Kvint and N.I. Sasaev, it is necessary to create a comprehensive system of strategic priorities that includes digitalization of logistics processes, development of multimodal transport corridors, and the formation of the necessary infrastructure for international transit.

A strategic priority reflects the values and interests of the object of strategic management, supported by competitive advantages. According to the methodology developed by V.L. Kvint, forming strategic priorities should be based on a comprehensive analysis of economic indicators and government decisions, considering their interrelations. An important role in this process is played by the innovation aspect, which serves as the foundation for overcoming structural constraints in development.

Within the transport and logistics sector, this approach involves integrating technological innovations with institutional changes to achieve a synergistic effect.

6. Conclusion

The study demonstrated that improving the efficiency of the road freight transport industry in the Far Eastern Federal District (FEFD) can be linked to consolidation through mergers and acquisitions, as well as the creation of centralized platforms that effectively match customers with small carriers. Given the absence of dominant players engaging in cooperative behavior, the increase in concentration within the industry should not significantly harm social welfare. On the contrary, the expected reduction in fixed costs and economies of scale contribute to its growth.

It has also been confirmed that the consolidation of the industry serves as a key tool to achieve three strategic goals: enhancing the investment appeal of the macro-region, greening logistics, and increasing fiscal transparency.

Consolidation of the transport and logistics sector contributes to reducing the number of trips and, consequently, lowering carbon emissions, which positions the Far Eastern Federal District (FEFD) as a leader in environmentally friendly logistics amid tightening environmental standards. Improving taxation transparency in the logistics sector facilitates fiscal administration and creates a more predictable regulatory environment for operators.

Furthermore, based on the analysis, two critical strategic priorities have been identified.

Priority 1: Digitalization of logistics involves implementing intelligent transport systems, coordination platforms, and artificial intelligence technologies to optimize routes, saving 15–20% on fuel and reducing delivery times by 10–15%. It also promotes electronic document management and harmonizes customs regulations with border partners, enhancing efficiency and compliance.

Priority 2: Development of international transport corridors. Attracting investments into the international transport corridors «Primorye-1» and «Primorye-2», connecting the northeastern provinces of China with FEFD ports, is projected to provide significant Russian GDP growth and an increase in tax revenues, thanks to financing from off-budget sources and private investors.

Transparency:

The authors confirm that the manuscript is an honest, accurate, and transparent account of the study; that no vital features of the study have been omitted; and that any discrepancies from the study as planned have been explained. This study followed all ethical practices during writing.

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