

I am sure that this period of development of logistics and the economy in general will be taught in universities as a new "economic miracle during the war in Ukraine."

There are many problems and many solutions. The main thing is to talk about the problems and understand that they need to be solved. If we remain silent, there will never be any positive dynamics for our country. There are things you can turn a blind eye to during the war. But when it comes to good, economic development and jobs, we cannot remain silent. We need to shout to start acting and regulate the laws that hinder our development in difficult times for the people.

References

1. Як змінилась логістика в Україні за місяць війни. URL: <https://logist.fm/publications/yak-zminilas-logistika-v-ukrayini-za-misyac-viyni>. (дата звернення: 21.05.2023).
2. Логістика та міжнародна торгівля в Україні в умовах війни. URL: <https://eba.com.ua/logistyka-ta-mizhnarodna-torgivlya-v-ukrayini-v-umovah-vijny/>. (дата звернення: 21.05.2023).

СЕКЦІЯ

ТРАНСПОРТНА ЛОГІСТИКА - ВИКЛИК СУЧАСНОСТІ.

LOGISTICS COMPANY MANAGEMENT FEATURES UNDER WARTIME CONDITIONS

Boldovska A. Y., student,

WIT Warsaw school of Information Technology

under the auspices of the Polish Academy of Sciences (PAN)

Warsaw, Poland

The topic of companies in military conditions is of utmost importance for our audience, which includes military personnel, policymakers, and scholars. Understanding the unique challenges and requirements of logistics operations in military contexts is crucial for effective planning, resource allocation, and operational readiness.

The three main peculiarities of operating companies in military conditions are: flexibility and adaptability, security and risk management, and communication and coordination.

Exploring the importance of flexibility and adaptability in logistics operations. Military engagements often involve rapidly changing environments, unpredictable circumstances, and shifting priorities. These require a robust logistical infrastructure that can swiftly redeploy resources, adapt supply chains, and respond to dynamic operational requirements. Some of them will be mentioned below so let's explore how these characteristics play a significant role:

1. **Rapidly Changing Environments:** Logistics Companies must be flexible and adaptable to meet the changing needs and demands of the military forces they support. This includes adjusting plans, reallocating resources, and modifying supply chain processes to ensure timely and effective support.

2. **Shifting Priorities:** Logistics Companies must have the capability to reprioritize their activities and reallocate resources accordingly. This flexibility allows them to align their operations with the evolving needs of the military forces, ensuring that critical supplies and equipment are available when and where they are needed the most.

3. **Resource Redeployment:** Flexibility and adaptability in logistics operations involve the ability to redeploy resources efficiently. This may include reallocating transportation assets, redistributing inventory, or adjusting staffing levels to support changing operational requirements. By optimizing the utilization of available resources, logistics companies can enhance responsiveness and agility in meeting the logistical needs of military operations.

4. **Adjusting Supply Chain Processes:** Military conditions often require adjustments to supply chain processes to accommodate unique challenges and constraints. Adapting supply chain processes allows logistics companies to overcome logistical hurdles and maintain uninterrupted support to military forces.

5. Technological Solutions: Advanced technologies, such as real-time tracking systems, data analytics, and digital platforms, enable companies to make informed decisions and adapt to changing conditions.

Advanced technologies play a crucial role in enabling logistics companies to make informed decisions and adapt to changing conditions. Advanced tracking systems allow logistics companies to monitor the movement of personnel, equipment, and supplies in real-time.

Cloud-based platforms provide scalable and secure storage for large volumes of data, facilitating collaboration, information sharing, and access to real-time data across different locations.

Artificial Intelligence (AI) technology can automate routine tasks, optimize routes, forecast demand, and improve predictive maintenance. For example, AI-powered algorithms can analyze historical data to identify the most efficient routes, considering factors such as traffic conditions, weather, and delivery priorities.

By these advanced technologies, logistics companies can enhance their decision-making capabilities, improve operational efficiency, and quickly adapt to changing conditions.

The critical aspect of security and risk management: operating logistics companies in military conditions introduces unique challenges regarding the safety and security of personnel, equipment, and supplies. The need for stringent security measures, such as secure transportation routes, access control procedures, surveillance technologies, and personnel training in security protocols is very important.

Logistics companies conduct thorough threat assessments and risk analyses to identify potential security threats and vulnerabilities. This involves evaluating the operational environment, assessing risks associated with transportation routes, storage facilities, and personnel, and considering factors such as terrorism, theft, sabotage, or hostile actions. Understanding the specific security risks helps in developing appropriate security measures.

Establishing secure transportation routes is essential to mitigate security risks during the movement of personnel, equipment, and supplies. Logistics facilities,

including warehouses, depots, and distribution centers, require robust access control mechanisms and perimeter security measures. This involves implementing strict entry and exit protocols, using identification systems, employing surveillance technologies, and deploying security personnel to monitor and protect the premises.

Effective risk management strategy:

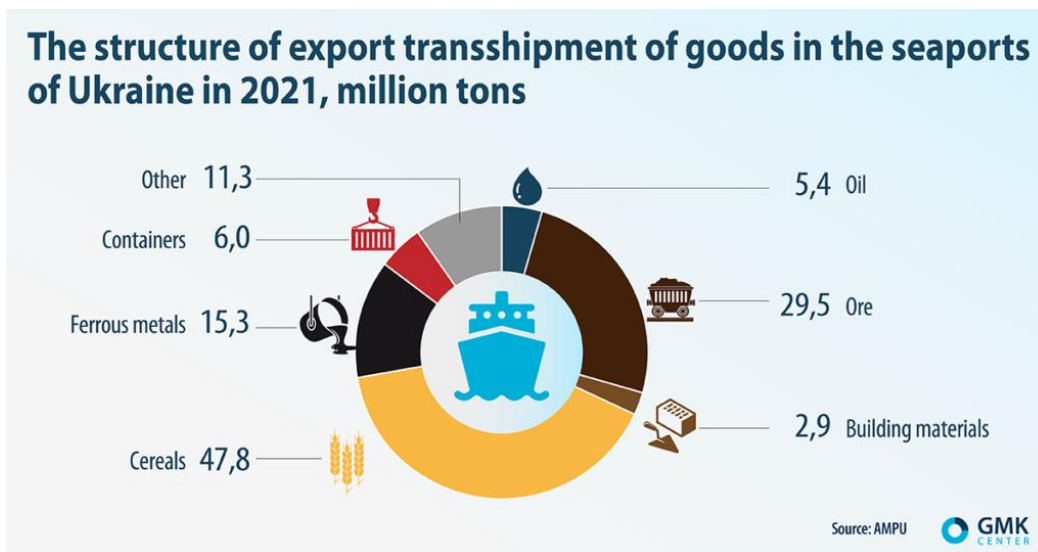
1. Risk Identification and Assessment
2. Contingency Planning
3. Supply Chain Redundancy
4. Collaboration and Communication
5. Monitoring and Tracking Systems.

Effective communication and coordination are fundamental in military logistics operations due to their complexity and the involvement of various entities. In Ukraine, specific platforms may be utilized to facilitate communication and coordination in logistics management. These platforms could include :

1. Secure Messaging Systems
2. Collaborative Software
3. Geospatial Information Systems (GIS)
4. Tracking and Tracing Systems
5. Command and Control Systems

To illustrate all above mentioned platforms, let's consider the situation in Ukraine's seaports, "Mariupol," "Berdyansk," "Skadovsk," and "Kherson," which are currently closed due to their location in the temporarily occupied territory. Had in April an almost fourfold increase in cargo transshipment compared to February, reaching 850,000 tons but their capacities are small (they can provide exports or imports of no more than 10% of the peacetime turnover). Although Ukraine's railway system serves as a crucial logistical lifeline, it cannot immediately compensate for the complete loss of cargo transshipment through the seaports. Ukrainian seaports play a significant role in the export of various commodities. On average, according to the GMK Center, 77.1% of exports pass through Ukrainian seaports, including notable shares such as 95.6% for grain, 94.7% for ferrous metals, and 90.2% for vegetable oil. Notably, in

2021, seaports facilitated the export of 49.8 million tons of grain (a 2% increase), 29.5 million tons of ore (a 13.8% decrease), and 15.3 million tons of ferrous metals (a 1.8% increase).



Operating logistics companies in military conditions requires flexibility, security measures, effective communication, and coordination. Each of these aspects is crucial in ensuring the success and effectiveness of military operations, including in the specific context of Ukraine. By embracing flexibility, prioritizing security measures, and leveraging appropriate communication and coordination platforms, logistics companies can navigate transportation challenges and contribute to the overall operational readiness of armed forces.

In conclusion, understanding the peculiarities of operating logistics companies in military conditions, including the specific challenges Ukraine faced implementation of the recommended strategies can help overcome transportation difficulties and enhance operational efficiency.

References

1. Cambridge Dictionary, 2017. [Accessed 15 Sept 2017].
2. Contemporary challenges in military logistics: Marta Pawelczyk, War Studies University, Management and Command Faculty, [Accessed 20 September 2018]

3. Szymaski M., 2007. Aspects of preparation, activity and supply of Polish military contingents, Scientific Notes. Logistics and Transport / International University of Logistics and Transport in Wroclaw.
4. Wikipedia, 2017. Logistics. [Accessed 22 June 2017]. Wartime logistics: problems of Ukrainian exports remain unresolved: Yuriy Grigorenko, [Accessed 20 May 2022]

THE LATEST TECHNOLOGY FOR CONVENIENT PARKING IN CITIES USING ARTIFICIAL INTELLIGENCE.

Fedorova V.V. student

Voronova Ye., Associate Professor

Kharkiv National Automobile and Highway University

Increasing urban population lead to increased traffic management on the roads, particularly in the provision of parking spaces. The transport system is large and requires rigorous control and timely modernization and expansion. Organizing control of such a complex system is very difficult without the use of modern technology, intelligent systems. The problem of finding parking spaces arises, and a lot of time is spent on parking. The relevance of this topic is due to the need to determine the number of available parking spaces and provide real-time information to users. [1]

A technical system that collects and preprocesses low-level information, identifies patterns and characteristics, and presents a summarized report and visualizations to humans is called an Intelligent Monitoring System. Intelligent parking occupancy monitoring involves detecting and tracking the movement of vehicles through a car park. There are different types of sensors available to collect information about traffic: video detectors, microwave radars, infrared sensors, ultrasonic sensors, passive acoustic sensors, loop induction sensors. Improving the convenience of using automotive transportation involves a wide range of tasks that can be addressed using intelligent monitoring methods, including:

- Vehicle navigation