

Ukrainian State University of Railway Transport

Department of Management, Public Administration and HR Technologies

## RISK MANAGEMENT IN THE LOGISTICS ACTIVITIES OF AN ENTERPRISE

Explanatory Report and Analytical Calculations  
to the Master's Qualification Thesis  
under the educational program "Sustainable Logistics and Supply Chain Management"  
specialty 073 "Management"

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Prepared by the Master's Degree Student  
(second cycle of higher education)  
(the work was performed independently in  
accordance with academic integrity  
principles)  
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## ABSTRACT

This qualification work consists of 11 presentation slides, 60 sheets of explanatory notes in A4 format, contains 8 figures, one table and 75 used literary sources.

Keywords: RISK, RISK MANAGEMENT, LOGISTICS ACTIVITIES, LOGISTICS RISKS, PROFITABILITY, RISK MANAGEMENT.

The object of the study is the risk management process in the logistics activities of the enterprise PrJSC "ArcelorMittal Kryvyi Rih".

The subject of the study is the theoretical, methodological and practical aspects of improving risk management in the logistics activities of the enterprise.

The purpose of the work is to study theoretical provisions and develop practical recommendations for improving risk management in the logistics activities of the enterprise in an unstable external environment.

The paper considers theoretical approaches to determining the essence of risk as an economic category, reveals the content and significance of risk management in the logistics activities of an enterprise, and also provides a classification of logistics risks and factors of their formation.

Using the example of PrJSC "ArcelorMittal Kryvyi Rih", an analysis of the technical and economic indicators of the enterprise's activities, financial results and main balance sheet indicators for 2020–2024 was conducted, the main problems and risks that negatively affect the efficiency of logistics activities and the profitability of the enterprise were identified.

An assessment of the risks of the enterprise's logistics activities was carried out, their impact on financial results was determined, ways to reduce logistics risks and directions for improving the risk management system were proposed in order to increase the sustainability and competitiveness of the enterprise.

The practical significance of the paper lies in the possibility of using the results obtained and the proposed recommendations in the activities of industrial enterprises to increase the efficiency of logistics risk management in conditions of economic and geopolitical instability.

## АНОТАЦІЯ

Дана кваліфікаційна робота складається з 11 слайдів презентації, 60 аркушів пояснювальної записки формату А4, містить 8 рисунків, одну таблицю та 75 використаних літературних джерел.

Ключові слова: РИЗИК, УПРАВЛІННЯ РИЗИКАМИ, ЛОГІСТИЧНА ДІЯЛЬНІСТЬ, ЛОГІСТИЧНІ РИЗИКИ, ПРИБУТКОВІСТЬ, РИЗИК-МЕНЕДЖМЕНТ.

Об'єктом дослідження є процес управління ризиками у логістичній діяльності підприємства ПрАТ «АрселорМіттал Кривий Ріг».

Предметом дослідження є теоретико-методичні та практичні аспекти удосконалення управління ризиками у логістичній діяльності підприємства.

Метою роботи є дослідження теоретичних положень та розроблення практичних рекомендацій щодо вдосконалення управління ризиками у логістичній діяльності підприємства в умовах нестабільного зовнішнього середовища.

У роботі розглянуто теоретичні підходи до визначення сутності ризику як економічної категорії, розкрито зміст і значення управління ризиками у логістичній діяльності підприємства, а також наведено класифікацію логістичних ризиків та чинники їх формування.

На прикладі ПрАТ «АрселорМіттал Кривий Ріг» проведено аналіз техніко-економічних показників діяльності підприємства, фінансових результатів та основних показників балансу за 2020–2024 роки, визначено основні проблеми та ризики, що негативно впливають на ефективність логістичної діяльності та прибутковість підприємства.

Проведено оцінку ризиків логістичної діяльності підприємства, визначено їх вплив на фінансові результати, запропоновано шляхи зниження логістичних ризиків та напрями удосконалення системи управління ризиками з метою підвищення стійкості та конкурентоспроможності підприємства.

Практичне значення роботи полягає у можливості використання отриманих результатів і запропонованих рекомендацій у діяльності промислових підприємств для підвищення ефективності управління логістичними ризиками в умовах економічної та геополітичної нестабільності.

# Ukrainian State University of Railway Transport

**Faculty of Economics**

**Department of Management, Public Administration and HR Technologies**

**Higher Education Level: Master**

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**Specialty: 073 "Management"**

**APPROVED**

Head of Department

Professor, Doctor of Economics



Olena DYKAN

September 09, 2025.

## **ASSIGNMENT FOR THE MASTER'S QUALIFICATION WORK Mykyta YUKHNEVYCH**

- 1 Topic «Risk management in the logistics activities of an enterprise»  
supervisor Uliana Storozhylova, PhD in Economics, Associate Professor  
approved by the Order of the Faculty of Economics dated February 07, 2025 No. 58/25
- 2 The deadline for submission of completed work by a higher education applicant is December 12, 2025
- 3 Initial data, Explanatory notes, and reports on the production and economic activities of the enterprise for 2020–2024; enterprise reporting for 2020–2024; regulatory, legislative, and scientific literature on risk management in logistics and supply chain activities.
- 4 Content of the calculation and explanatory note (list of issues to be developed)  
Theoretical approaches to determining the nature of risk and risk management in the logistics activities of an enterprise. Classification of logistics risks and methodological approaches to their assessment. Analysis of organizational and economic activities and logistics system of PrJSC "ArcelorMittal Kryvyi Rih".  
Analysis of technical, economic and financial indicators of the enterprise in an unstable external environment. Assessment of risks of logistics activities and determination of their impact on the efficiency of logistics processes and profitability of the enterprise. Development of measures to reduce logistics risks. Formation of directions for improving the risk management system. Substantiation of the feasibility of implementing the proposed management decisions.
- 5 List of graphic material  
1 Theoretical and methodological approaches to determining the essence of risk in the economic activities of an enterprise – six slides. 2 Analysis of production and economic activities of PrJSC "ArcelorMittal Kryvyi Rih" – two slides. 3 Improving

risk management in the logistics activities of PrJSC "ArcelorMittal Kryvyi Rih" – three slides.

#### 6 Individual Section Consultants

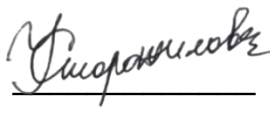
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7 Assignment Date September 09, 2025

### CALENDAR PLAN

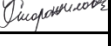
| Stage name                                                                                                                 | Deadline for the implementation of the stages of work | Note |
|----------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------|------|
| 1 Theoretical and methodological approaches to determining the essence of risk in the economic activities of an enterprise | 10.10.2025                                            |      |
| 2 Analysis of production and economic activities of PrJSC "ArcelorMittal Kryvyi Rih"                                       | 05.11.2025                                            |      |
| 3 Improving risk management in the logistics activities of PrJSC "ArcelorMittal Kryvyi Rih"                                | 08.12.2025                                            |      |
| Graphic part                                                                                                               | 10.12.2025                                            |      |

**Higher education applicant**  **Mykyta YUKHNEVYCH**

**Head**  **Uliana STOROZHYLOVA**

## Content

|                                                                                                                            |    |
|----------------------------------------------------------------------------------------------------------------------------|----|
| Introduction                                                                                                               | 6  |
| 1 Theoretical and methodological approaches to determining the essence of risk in the economic activities of an enterprise | 8  |
| 1.1 Methodological approaches to defining the economic category of “risk” and their reflection in scientific sources       | 8  |
| 1.2 The essence of risk management in the logistics activities of an enterprise                                            | 12 |
| 1.3 Classification and factors of risk formation in the logistics activities of an enterprise                              | 16 |
| Conclusion to Chapter 1                                                                                                    | 24 |
| 2 Analysis of the production and economic activities of PrJSC "ArcelorMittal Kryvyi Rih"                                   | 25 |
| 2.1 Analysis of the main technical and economic indicators of the enterprise's activities                                  | 25 |
| 2.2 Analysis of financial results and key balance sheet indicators of the enterprise                                       | 29 |
| 2.3 Development of measures to reduce the company's business risks                                                         | 33 |
| Conclusion to Chapter 2                                                                                                    | 37 |
| 3 Improving risk management in the logistics activities of PrJSC "ArcelorMittal Kryvyi Rih"                                | 38 |
| 3.1 Risk assessment of the logistics activities of the enterprise                                                          | 38 |
| 3.2 Ways to reduce risks in the logistics activities of PrJSC "ArcelorMittal Kryvyi Rih"                                   | 43 |
| 3.3 Assessment of the impact of risk on the profitability of the logistics activities of the enterprise                    | 44 |
| 3.4 Improving the risk management system of the enterprise's logistics activities                                          | 46 |
| Conclusions to the third chapter                                                                                           | 48 |
| Conclusion                                                                                                                 | 50 |
| References                                                                                                                 | 52 |

|                   |                   |              |                                                                                     |      |                                                              |  |         |       |        |
|-------------------|-------------------|--------------|-------------------------------------------------------------------------------------|------|--------------------------------------------------------------|--|---------|-------|--------|
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| Approved by       | Dykan O.V.        |              |  |      |                                                              |  |         |       |        |

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