

# International Programme

List of English taught courses offered to the Erasmus+ programme and international exchange students

# Logistics Technologies

Master degree level

Summer 2024



# Logistics Technologies

Course code	Course title	Number of ECTS credits
S_CED_1	Czech Language for Foreigners	6
S_ENG_4	English Language IV	6
S_EIP	English in Practice	6
S_N_BSP	Security and Reliability of Logistics Processes	6
S_N_TCL	Technology of City Logistics	6
S_N_DOL	Transport Logistics	6
S_N_SAS	Warehousing and Storage	6



# Czech Language for Foreigners (Code: S\_CED\_1) | Number of credits: 6

### Course objectives

The course is prepared for foreign students. The aim of the course is reaching of A1 level of their Czech language according to the descriptor of the Common European Framework of Reference for Languages. After the completion of the course, the students will gain the following language skills:

- the students understand basic phrases which are needed for everyday communication and can use these expressions and phrases

- can introduce themselves and other people and ask simple questions concerning well known: places, people and things and react to similar questions

- they can read simple texts (notices, signs, etc.)

- they can write a simple text in Czech language (holiday postcard, fill in a simple form, etc.)

- they are introduced with culture and everyday life in the Czech Republic
- they are able to perceive the intercultural differences between their native country and the Czech Republic

- 1. Who is who? Verbs: to be, to have. 2. How are you?
- 3. People, things, relations nouns. 4. How much is it? Money.
- 5. Where am I? 6. The Czech Republic, Budweis.
- 7. At school, at the school canteen -prepositions, conjunctions.
- 8. Time, days, months. 9. My family.
- 10. Signs. 11. Food and drink.
- 12. Travel. 13. Services, shopping.



# English Language IV (Code: S\_ENG\_4) | Number of credits: 6

#### **Course Objectives**

The course objective is to deepen student's language knowledge to the level B2- of the Common European Framework of Reference for Languages. After the successful completion of the course, students are able to: understand extended speech and follow even complex arguments, understand articles dealing with contemporary problems, present a detailed descriptions on a wide range of subjects and interact with a degree of fluency and spontaneity, write clear, detailed texts on a wide range of subjects.

- 1. Work-life balance
- 2. Gender difference
- 3. The world of work
- 4. Meetings
- 5. Formal letters
- 6. Shopping and making a complaint
- 7. Films
- 8. Famous people
- 9. News
- 10. Superstitions
- 11. Murder mysteries, 12. Television, 13. How to write an article



# English in Practice (Code: S\_EIP) | Number of credits: 6

#### **Course Objectives**

The objective of the course is to deepen students' knowledge, enrich vocabulary and practise using English in reallife situations concerning work and study in a foreign country, the ability to give a presentation in English, improve listening, reading, speaking and writing skills. After successful completion of the course, the students are able to understand lectures, debates and participate in discussions on general topics/topics of their interest. Students understand TV and radio news, programmes and newspaper/online articles on topical issues and are able to present their views and discuss. Upon successful completion of the course, students are able to prepare and give presentation on a selected topic, communicate effectively and appropriately in real life situation, to use English effectively for study purpose across the curriculum, to develop and integrate the use of the four language skills (Reading, Listening, Speaking and Writing) and to be able to use them in any situation concerning travelling, work and study in a foreign country.

### Topics

1. Providing and obtaining personal information in social situations (work, study, travelling, participation in social events); small talk. Present simple vs present continuous

2. Housing. Living in a country or in a town. Big towns in the Czech Republic. Prepositions – time, place, movement.

3. Travelling; means of transport, problems you may encounter while travelling, accommodation. Infrastructure in the Czech Republic in comparison with the student's native country. Verbs and adjectives with prepositions.

4. System of Education (in the Czech Republic vs the student's native country – primary, secondary, tertiary education. Grading. Comparisons.

5. Social life, culture, literature (student's life, cultural events). Idioms.

6. Nature and environment. Environmental protection. Modals – obligation, probability. Modals in the past.

7. Health and illnesses. Human body and illnesses, health system and insurance in the Czech Republic. At the doctor's.8. Holidays and celebrations (the CR vs student's native country). Shopping. Past simple, past continuous. 9. Food.Traditional meals. Eating habits, trends, healthy food. Restaurants. First conditional.

10. Jobs and occupation. Labour market in the Czech Republic. Work conditions. Second conditional.



Security and Reliability of Logistics Processes (Code: S\_N\_BSP) | Number of credits: 6

## Course Objectives

The student will gain expertise in the field of security and reliability of logistics chains, with an emphasis on the risks of material and information flows. The graduate is able to define and assess the security and reliability of logistics chains and to assess the importance of human factor for the reliability and security of logistics chains. It controls the theoretical fundamentals of security and crisis management in the context of security and reliability of logistics chains and can analyze information on crisis situations and the possibilities of dealing with these situations. After completing the course the student can analyze individual elements that could disrupt the security and reliability of logistic processes. It is able to determine the impacts of the risks that affect the processes.

- 1. Introduction to safety and reliability, definition of quality, reliability and safety.
- 2. Quality, ISO and standards. 3. Tools to improve quality.
- 4. Quality documentation and ISO 9001
- 5. Operational reliability of machines and equipment.
- 6. Faults of machines and equipment
- 7. Technology of maintenance and repair of machines.
- 8. Increasing the reliability of systems.
- 9. Technical diagnostics
- 10. Probabilistic and static reliability indicators.
- 11. Security management.
- 12. Security of information systems. 13. Crisis management



# Technology of City Logistics (Code: S\_N\_TCL) | Number of credits: 6

### Course objectives

The aim of the course is to acquaint students with the nature and solution of logistics problems of cities in different concepts of partial solutions to complex approach. They become familiar with the classic concept of city logistics solutions as flows of goods and other materials to the centers of large cities, widespread concept involving all relevant components of transport in the whole agglomeration, the issue of freight and public transport, including its integration as an important part of city logistics and related logistics and environmental aspect. Graduates will be able to identify strengths and weaknesses in transport in towns and cities, can solve the task scheduling and optimization of transport and traffic flows in cities. They will be able to define and describe the properties of both passenger and freight transport, environment and transport technology, able to define the basic parameters of a comprehensive solution of this particular issue.

- 1. The issues of City Logistics.
- 2. Road transport of the world cities.
- 3. Transport as a system.
- 4. System approach to urban transport.
- 5. Definition of transport services.
- 6. Modeling the operation in the transport sector.
- 7. Forecasting and modeling the transport needs.
- 8. Creating the transport process using the PTV VISION.
- 9. Logistics of supplying the city by freight transport.
- 10. Technology of operating the city by freight transport.



- 11. Data collection and analysis of permeability.
- 12. Analysis and modeling the population movements.
- 13. Analysis of connectivity and appropriateness of cartography methods.



# Transport Logistics (Code: S\_N\_DOL) | Number of credits: 6

### Course objectives

The aim of the course is to acquaint students with problems of transport logistics and its relationship to marketing, to apprise them with the different modes of transport, a combination of different modes of transport and other transport options. After successful completion of the course, students can describe basic concepts and approaches used in logistics, describe problems associated with transport costs, performance measure in the transportation, international aspects of transport, the main activities in the field of transportation for shippers and carriers, classify traffic management and identify key technologies and the importance of information.

- 1. Introduction to transport logistics
- 2. Legislation in transport, European Transport policy, Transport policy in Czech Republic
- 3. Characteristics of carriers and transport services
- 4. Transport infrastructure in the Czech Republic
- 5. Transport infrastructure in Europe
- 6. The provider of transportation services
- 7. Intermodal transport systems
- 8. Management of Transport, decision-making of the mode of transport
- 9. Road transsport technologies
- 10. Railway transport technologies
- 11. Air transport and water transport technologies
- 12. Logistics centers and their connection to transport systems
- 13. Transport Logistics and Environment



# Warehousing and Storage (Code: S\_N\_SAS) | Number of credits: 6

### Course objectives

The aim of the course is to acquaint students with the issues of warehouses and warehouse logistics. The course is focused on the functions and position of warehouses in logistics chains. Students will get acquainted with individual types of warehouses, warehouse equipment, as well as technologies that are used in warehouses. The graduate of the course will be able to design basic requirements for warehouses, design and calculate individual parameters of the warehouse (minimum required area of the warehouse, minimum required number of handling equipment in the warehouse). The graduate of the course will also be able to design a suitable type of packaging and means of transport (will gain practical skills in creating handling units), will be familiar with the issue of automatic identification in warehouses (working with barcodes, working with reading devices, working with RFID tags). The graduate will get acquainted with the basic tasks and activities in the warehouse information system.

- 1. Introduction to storage
- 2. Handling technology in warehouses cyclically working handling means
- 3. Handling technology in warehouses periodically and continuously working means of handling
- 4. Packaging and packaging technology
- 5. Packaging tests and packaging marking
- 6. Means of transport in warehouses
- 7. Warehouses and storage
- 8. Storage equipment
- 9. Storage systems 10. System design of warehouse management
- 11. Automatic identification bar code technology
- 12. Automatic identification radio frequency technology 13. Logistics technologies in warehouses