DISCIPLINE RECORD
Academic year 2026/2027

1. Information about the program

University	Constanta Maritime University
Faculty	Navigation and Maritime Transport
Department	Management in Transport
Domain of study	Engineering and Management
Academic level	Master
Study programme/ qualification	Business Administration in Transport

2. Information about discipline

Course title	Business Intelligence				
Lecture tenured		Assoc. Prof. Simona DINU PhD			
Application tenured		Assoc. Prof. Simona DINU PhD			
Year of study	VI	Semester	I	Type of examination	E
Conditions of discipline	Course category: DF – Fundamental subjects, DS – Specialization subjects, DC – Complementary subjects				DS
	Course type: DOB – compulsory subjects; DOP – elective subjects; DFA – optional subjects				DOP

3. The total time estimated

I a) Number of hours per week	4	Course	2	Seminar	2	Laboratory		Project	
I b) Total hours per semester from the curriculum	56	Course	28	Seminar	28	Laboratory		Project	

II Time distribution for the semester:	ore
II a) Study after manual, course support, bibliography and notes	24
II b) Additional documentation in library, specialized electronic platforms	12
II c) Training seminars / labs, homework, essays, portfolios and essays	8
III Tutorial	2
IV Examinations	2
V Other activities:	

Total hours of individual study II (a+b+c)	44
Total hours per semester (Ib+II+III+IV+V)	104
Number of credits	4

4. Prerequisites (if necessary)

Curriculum	• Not necessary
Expected learning outcomes	• Ability to apply knowledge and methods specific to the field of specialization

5. Conditions (if necessary)

Progress of the course		• Classroom with Video projector • Online course: virtual campus cmu-edu.eu
Progress of application	Seminar	• Classroom with Video projector • Online course: virtual campus cmu-edu.eu
	Laboratory	
	Project	

6. Objectives of discipline (based on the grid of specific skills acquired – no7)

The overall objective of discipline	• Acquire basic knowledge and concepts regarding information technologies, specific business strategies, methodologies and different analysis tools used to identify, discover and process business data in order to obtain valuable information.

The specific objectives of discipline	• Development of skills to identify relevant information, make managerial decisions, approach and solve problems specific to business administration in the field of transport • Development of technical skills for the use of systems, current IT tools specific to business administration in the field of transport • Learning the tools, methods and techniques of extraction, analysis of data specific to business administration in the field of transport

7. Expected learning outcomes:

No.	Knowledge	Skills	Responsibility and autonomy
1	The student is aware of trends and innovations in the transport sector.	The student conducts qualitative and quantitative market research.	The graduate leads initiatives to improve the quality of transport services.
2	The student masters ICT solutions applicable to business problems.	The student advises on strategic business decisions based on data analysis.	The graduate assumes responsibility for implementing ICT innovations.

8. Competences covered by the discipline, according to the diploma supplement

Professional competences	• Provides advice on efficiency improvements • Focuses on innovation in current practices
Transversal competences	• Seek innovation in current practices • Propose ICT solutions to business problems

9.Contents

Course	Nr. hours	Teaching methods	Obs.
• Chapter 1 **Basic principles and elements of Business Intelligence**	4	Conversation Demonstration Interactive presentation	
• Chapter 2 **How business intelligence leads to sustainable and profitable growth**	4	Conversation Demonstration Interactive presentation	
• Chapter 3 **Use of Business intelligence systems by organizations**	4	Conversation Demonstration Interactive presentation	
• Chapter 4 **Use of data warehousing**	4	Conversation Demonstration Interactive presentation	
• Chapter 5 **Business intelligence processes**	4	Conversation Demonstration Interactive presentation	
• Chapter 6 **Data Mining tools, methods, and techniques**	4	Conversation Demonstration Interactive presentation	
• Chapter 7 **Data Analysis**	4	Conversation Demonstration Interactive presentation	
Bibliography			

1. Dinu, S. *Business Intelligence - Architectures, Technologies and Implementations,* Ed. Nautica, 2024
2. Szymczyk, K., El Emary, I.M.M., "Advanced Trends in ICT for Innovative Business Management", Ed. CRC Press, 2023.

3. Aspin, A. "Pro Power BI Desktop Self-Service Analytics and Data Visualization for the Power User-Third Edition", Ed. Apress, 2020.
4. Loshin, D. "Business Intelligence – The Savvy Manager's Guide", Ed. Elsevier, 2013.

Selective bibliography

1. Dinu, S. *Business Intelligence - Architectures, Technologies and Implementations*, Ed. Nautica, 2024
Course notes available on the platform campus.cmu-edu.eu

Application (Seminar / laboratory / project)	Nr. hours	Teaching methods	Obs.
• Providing decision making process support	4	Analyze Examples	
• Streamlining internal processes and workflow	4	Analyze Examples	
• Increasing market spent efficiency	4	Analyze Examples	
• Reducing IT dependency	4	Analyze Examples	
• Connecting data and processes	4	Analyze Examples	
• Building customer satisfaction	4	Analyze Examples	
• Business intelligence strategies examples	4	Examples	

Bibliography

1. Dinu, S. *Business Intelligence - Architectures, Technologies and Implementations,* Ed. Nautica, 2024
2. Szymczyk, K., El Emary, I.M.M., "Advanced Trends in ICT for Innovative Business Management", Ed. CRC Press, 2023.
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4. Loshin, D. "Business Intelligence – The Savvy Manager's Guide", Ed. Elsevier, 2013.

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1.Dinu, S. *Business Intelligence - Architectures, Technologies and Implementations,* Ed. Nautica, 2024
Seminar notes available on the platform campus.cmu-edu.eu

Additional Notes
- Students may take photographs or make audio-video recordings in classrooms where teaching activities are conducted **only with the consent of the instructor** and **under the conditions established by the instructor**.
- Upon entering the classroom, students are kindly requested to **switch their mobile phones to silent mode** and **refrain from using them during classes**.
- All materials received by students, either directly or through postings on the platform *campus.cmu-edu.eu*, are subject to **national and international copyright legislation**. These materials may be used by students **solely for educational purposes**. Any other use or posting on publicly accessible websites without the consent of the copyright holder may be punished in accordance with **Law no. 8/1996 on copyright and related rights** and the **Berne Convention**.

10. **The corroboration of contents of discipline with expectations epistemic community representatives, professional associations and representative employers in the corresponding program**

- To develop the content and choose teaching/learning methods, the subject teachers consulted the content of similar subjects taught at universities in the country and abroad.

11. **Examination**

Type of activity	Examination Criteria	Methods of examination	Percentage of final grade
Course	knowledge of the notions and theoretical and practical aspects presented in the course	written exam	70%
Seminar	working themes and scenarios	ongoing assessment	30%
Laboratory			
Project			
Grading Requirements			

Minimum score required: **50 points: grade 5**

Additional Notes

- If a student participates in **conferences** (student, local, national, or international) or **competitions** (national or international) related to the subject of this course, they may receive **additional points** or **equivalence for certain assignments, papers, and/or attendance**, depending on the results obtained.
- During written examinations, students are **not allowed to use mobile phones or any other electronic devices, except for simple scientific calculators**.

Minimum performance standards

Obtaining a score of 50 points for written exam

Date of completion	Signature of lecture tenured	Signature of application tenured
24.09.2025	Assoc. Prof. Simona DINU PhD	Assoc. Prof. Simona DINU PhD

Date of approval in the department	Signature of Director of Department
26.09.2025	Lecturer Ana Cornelia OLTEANU PhD

Date of approval in the faculty council	Signature of Dean
29.09.2025	Associated Professor Nicoleta ACOMI EngD