

# SYLLABUS

## 1. Information about the program

1.1 Higher education institution	Politehnica University Timisoara
1.2 Faculty <sup>1</sup> / Department <sup>2</sup>	Chemical Engineering, Biotechnologies and Environmental Protection / Management
1.3 Field of study (name/code <sup>3</sup> )	Chemical Engineering / 10.30.50
1.4 Study cycle	License
1.5 Study program (name/code/qualification)	Chemical Engineering / 10.30.50.60 / engineer

## 2. Information about the discipline

2.1 Name of discipline/ formative category <sup>4</sup>	Management / DD						
2.2 Coordinator (holder) of course activities	Ș.L.dr. Șerban MICLEA						
2.3 Coordinator (holder) of applied activities <sup>5</sup>	Ș.L.dr. Șerban MICLEA						
2.4 Year of study <sup>6</sup>	III	2.5 Semester	5	2.6 Type of evaluation	D	2.7 Regime of discipline <sup>7</sup>	DI

## 3. Total estimated time – hours / semester: direct teaching activities (fully assisted or partly assisted) and individual training activities (unassisted)<sup>8</sup>

3.1 Number of fully assisted hours / week	2 of which:	3.2 course	1	3.3 seminar / laboratory / project	1/0/0
3.1* Total number of fully assisted hours / semester	28 of which:	3.2* course	14	3.3* seminar / laboratory / project	14/0/0
3.4 Number of hours partially assisted / week	of which:	3.5 training		3.6 hours for diploma project elaboration	
3.4* Total number of hours partially assisted / semester	of which:	3.5* training		3.6* hours for diploma project elaboration	
3.7 Number of hours of unassisted activities / week	1.57 of which:	additional documentary hours in the library, on the specialized electronic platforms and on the field			0.5
		hours of individual study after manual, course support, bibliography and notes			0.5
		training seminars / laboratories, homework and papers, portfolios and essays			0.5
3.7* Number of hours of unassisted activities / semester	22 of which:	additional documentary hours in the library, on the specialized electronic platforms and on the field			8
		hours of individual study after manual, course support, bibliography and notes			7
		training seminars / laboratories, homework and papers, portfolios and essays			7
3.8 Total hours / week <sup>9</sup>	3.57				
3.8* Total hours /semester	50				
3.9 Number of credits	2				

## 4. Prerequisites (where applicable)

4.1 Curriculum	• -
4.2 Competencies	• -

<sup>1</sup> The name of the faculty which manages the educational curriculum to which the discipline belongs

<sup>2</sup> The name of the department entrusted with the discipline, and to which the course coordinator/holder belongs.

<sup>3</sup> The code provided in HG - on the approval of the Nomenclature of fields and specializations / study programs, annually updated.

<sup>4</sup> Discipline falls under the educational curriculum in one of the following formative disciplines: Basic Discipline (DF), Domain Discipline (DD), Specialist Discipline (DS) or Complementary Discipline (DC).

<sup>5</sup> Application activities refer to: seminar (S) / laboratory (L) / project (P) / practice/training (Pr).

<sup>6</sup> Year of studies in which the discipline is provided in the curriculum.

<sup>7</sup> Discipline may have one of the following regimes: imposed discipline (DI) or compulsory discipline (DOb)-for the other fundamental fields of studies offered by UPT, optional discipline (DO) or optional discipline (Df).

<sup>8</sup> The number of hours in the headings 3.1 \*, 3.2 \*, ..., 3.8 \* is obtained by multiplying by 14 (weeks) the number of hours in headings 3.1, 3.2, ..., 3.8. The information in sections 3.1, 3.4 and 3.7 is the verification keys used by ARACIS as: (3.1) + (3.4) ≥ 28 hours / wk. and (3.8) ≤ 40 hours / wk.

<sup>9</sup> The total number of hours / week is obtained by summing up the number of hours in points 3.1, 3.4 and 3.7.

## 5. Conditions (where applicable)

5.1 of the course	<ul style="list-style-type: none"> <li>Lecture hall, laptop, projector, white/blackboard, internet access</li> </ul>
5.2 to conduct practical activities	<ul style="list-style-type: none"> <li>Seminar hall, laptop, projector, white/blackboard, internet access</li> </ul>

## 6. Specific competencies acquired through this discipline

Specific competencies	<ul style="list-style-type: none"> <li></li> </ul>
Professional competencies ascribed to the specific competencies	<ul style="list-style-type: none"> <li>- Analyse production processes for improvement;</li> <li>- Manage chemical testing procedures;</li> <li>- Test materials;</li> <li>- Write technical reports</li> <li>- Performs chemical experiments</li> <li>- Approve engineering design             <ul style="list-style-type: none"> <li>- Assess environmental impact</li> </ul> </li> </ul>
Transversal competencies ascribed to the specific competencies	<ul style="list-style-type: none"> <li>- Conduct quality control;</li> <li>- Apply scientific, technological and engineering knowledge;</li> <li>- Uses equipment, instruments or technological equipment accurately.</li> </ul>

## 7. Objectives of the discipline (based on the grid of specific competencies acquired - pct.6)

7.1 The general objective of the discipline	<ul style="list-style-type: none"> <li>The general objective is to provide knowledge about the principles, techniques and specific models of management to demonstrate the spirit of initiative and action for updating management knowledge.</li> </ul>
7.2 Specific objectives	<ul style="list-style-type: none"> <li>The specific objectives are to acquire skills for effectively implementing methods and techniques of strategic planning, organization, management and business evaluation. Students will learn the concepts, principles, techniques and specific patterns of management, both conceptualization-level and application-level within companies, under real market conditions. Students will realize the economic, technical, technological, social and legal context influencing management and businesses.</li> </ul>

## 8. Content <sup>10</sup>

8.1 Course	Number of hours	Teaching methods <sup>11</sup>
1. Basic Management Concepts (The evolution of modern management: Classical approach, Behavioral approach, Quantitative approach; Enterprise and managerial functions; Managerial roles)	4	Lecture with PPT and / or video presentation, debates, explanations, examples of good practice, based on the electronic materials provided at the beginning of the course.
2. Planning (Planning functions; Strategic planning; MOST Analysis; SWOT Analysis; VRIO Model; SMART Objectives; Time management)	2	
3. Organizing (Organizing functions; Job descriptions; Compartments making; Organizational charts)	4	
4. Leading (Leading functions; General personality traits of effective	2	

<sup>10</sup> It details all the didactic activities foreseen in the curriculum (lectures and seminar themes, the list of laboratory works, the content of the stages of project preparation, the theme of each practice stage). The titles of the laboratory work carried out on the stands shall be accompanied by the notation "(\*)".

<sup>11</sup> Presentation of the teaching methods will include the use of new technologies (e-mail, personalized web page, electronic resources etc.).

leaders; Personality traits of effective leaders; The situational theory)		
5. Training (Training functions; The principles of communications; The WIN - WIN Model; Instructor vs. Coach vs. Mentor)	2	

#### Bibliography <sup>12</sup>

1. Șerban Miclea (2021), Management and Marketing – curs online: <https://cv.upt.ro/course/view.php?id=5144>
2. Malin Brannback, Alan Carsrud (2015), Fundamentals for Becoming a Successful Entrepreneur: From Business Idea to Launch and Management, Pearson Education
3. Henry Mintzberg (2011), Managing, Berrett-Koehler Publishers
4. Alexander Osterwalde, Yves Pigneur (2010), Business Model Generation: A Handbook for Visionaries, Game Changers, and Challengers (The Strategyzer series), Wiley Publishing,
5. Anghel Tăroată, Matei Tămășilă, Florențiu Staicu, Vasile Rușeț, Ilie Tăucean (2010), Management. Marketing, Ed. Politehnica

#### 8.2 Applied activities <sup>13</sup>

	Number of hours	Teaching methods
1. The SWOT Analysis (Case study – micro and macro business environment)	2	Lecture, case studies, examples and debates regarding good practices, applications and online assignments, based on the electronic materials provided.
2. Decision making conditions (Certainty, Uncertainty and Risk)	4	
3. Planning and programming business activities (Critical Path Method)	2	
4. Organizational structure analysis and relationship models	2	
5. Business Model Planning (Business Model Canvas)	4	

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#### 9. Corroboration of the content of the discipline with the expectations of the main representatives of the epistemic community, professional associations and employers in the field afferent to the program

- The content of the discipline is aligned with the problems and phenomena faced by companies (private or public) in Romania and the European Union, considering the requirements of employers and professional standards that graduates must meet to integrate into the labor market. Also, the discipline is provided in the curriculum of several universities in Romania and the European Union.

#### 10. Evaluation

<sup>12</sup> At least one title must belong to the discipline team and at least one title should refer to a reference work for discipline, national and international circulation, existing in the UPT library.

<sup>13</sup> Types of application activities are those specified in footnote 5. If the discipline contains several types of applicative activities then they are sequentially in the lines of the table below. The type of activity will be in a distinct line as: "Seminar:", "Laboratory:", "Project:" and / or "Practice/training".

<sup>14</sup> At least one title must belong to the discipline team.

Type of activity	10.1 Evaluation criteria <sup>15</sup>	10.2 Evaluation methods	10.3 Share of the final grade
10.4 Course	Theoretical topics (short, medium and extended) and applications.	Written exam	50%
10.5 Applied activities	<b>S:</b> Development of a business model and a market study, and/or tests, applications, and active participation in seminars.	Presentation of the business model and market study, and/or written assignments, solving applications and answers.	50%
	<b>L:</b>		
	<b>P<sup>16</sup>:</b>		
	<b>Pr:</b>		
<b>10.6</b> Minimum performance standard (minimum amount of knowledge necessary to pass the discipline and the way in which this knowledge is verified <sup>17</sup> )			
<ul style="list-style-type: none"> <li>The minimum grade to pass the course is 5 (five) and can be obtained if students assimilated the necessary information required to understand and apply basic management theoretical and practical aspects, and is conditioned by obtaining a minimum grade of 5 (five) for the development of the business model.</li> </ul>			

**Date of completion**

**Course coordinator  
(signature)**

Ş.L.dr. Şerban MICLEA

**Coordinator of applied activities  
(signature)**

Ş.L.dr. Şerban MICLEA

**Head of Department  
(signature)**

**Date of approval in the Faculty Council <sup>18</sup>**

**Dean  
(signature)**

Ş.L.dr.ing. Mircea Laurenţiu DAN

<sup>15</sup> Syllabus must contain the procedure for assessing the discipline, specifying the criteria, methods and forms of assessment, as well as specifying the weightings assigned to them in the final grade. The evaluation criteria shall be formulated separately for each activity foreseen in the curriculum (course, seminar, laboratory, project). They will also refer to the forms of verification (homework, papers, etc.)

<sup>16</sup> In the case where the project is not a distinct discipline, this section also specifies how the outcome of the project evaluation makes the admission of the student conditional on the final assessment within the discipline.

<sup>17</sup> It will not explain how the promotion mark is awarded.

<sup>18</sup> The endorsement is preceded by the discussion of the board's view of the study program on the discipline record.