SYLLABUS[1]

1. Information about the program

1.1 Higher education institution	POLITEHNICA UNIVERSITY TIMISOARA
1.2 Faculty[2] / Department[3]	MECHANICAL ENGINEERING/MECHANICAL MACHINES, EQUIPMENT AND TRANSPORTATION
1.3 Chair	—
1.4 Field of study (name/code[4])	Mechanical Engineering/20.70.10.10
1.5 Study cycle	master
1.6 Study program (name/code/qualification)	Quality Management of Technological Processes

2. Information about the discipline

2.1 Name of discipline			*Quality costs*				
2.2 Coordinator (holder) of course activities			Prof. Dumitru Ţ UCU				
2.3 Coordinator (holder) of applied activities [5]			Lecturer Gabriel MĂLAIMARE				
2.4 Year of study[6]	1	**2.5** Semester	2	**2.6** Type of evaluation	Exam	**2.7** Type of discipline	Obligatory

3. Total estimated time (hours / semester of didactic activities)

3.1 No. of hrs. / week	4 , of which:	**3.2** course	2	**3.3** seminar/laboratory/ project/training	1/0/1
3.4 Total no. of hrs. in the education curricula	56 , of which:	**3.5** course	28	**3.6** applied activities	28
3.7 Distribution of time for individual activities related to the discipline					hrs.
Study using a manual, course materials, bibliography and lecture notes					14
Additional documentation in the library, on specialized electronic platforms and on the field					14
Preparation for seminars / laboratories, homeworks, assignments, portfolios, and essays					14
Tutoring					14
Examinations					1
Other activities					
Total hrs. of individual activities					51
3.8 Total hrs. / semester[7]	113				
3.9 No. of credits	8				

4. Prerequisites (where applicable)

4.1 Curriculum	• Algebra and mathematical analysis • Design and optimization of experiment, data processing methods
4.2 Competencies	• Knowledge of principal method and concept from algebra and mathematical, design of experiment and data processing • General use of PC (office packet, statistical processing)

5. Conditions (where applicable)

5.1 of the course	•
5.2 to conduct practical activities	•

6. Specific competencies acquired

[1] The form corresponds to the Syllabus promoted by OMECTS 5703/18.12.2011 (Annex3).
[2] The name of the faculty which manages the educational curriculum to which the discipline belongs.
[3] The name of the department entrusted with the discipline, and to which the course coordinator / holder belongs.
[4] Fill in the code provided in GD no. 493/17.07.2013.
[5] The applied activities refer to: seminar (S) / laboratory (L) / project (P) / practice/training (Pr).
[6] The year of study to which the discipline is provided in the curriculum.
[7] It is obtained by summing up the number of hrs. from 3.4 and 3.7.

Professional competencies[8]	• Knowledge and understanding of principal concept of management, quality management, organizational management • Teaching modern strategies for quality approaching • Learning of methods for applying statistic in evaluating capabilities and performance of the processes
Transversal competencies	• Ability for work independent or/and in team • Ability for being efficacy and efficient • Ability for continuous adapting to new situations • Ability for research and having creative spirit

7. Objectives of the discipline (based on the grid of specific competencies acquired)

7.1 General objective of the discipline	• To teach the students about general concept and methods regarding quality cost optimization for improvement of the organization management and performances
7.2 Specific objectives	• Learning the terminology, methods and concepts specific ritual regarding quality costs establishing, evaluating, improvement, optimization and practical implementation in quality management systems

8. Content

8.1 Course	No. of hours	Teaching methods
Costs and enterprise	4	Presentation logical and deductive, explanation, debate, Interactive exposure, questioning, methods for work in group, study of curricula documents and references, heuristic methods
Costs typology and classification	6	idem
Quality costs – concepts, identification, typology, calculations	8	idem
Program for Quality Costs Reducing (PQCR)	4	idem
PQCR Implementation	4	idem
Practical of optimization	2	idem

[8] The professional competencies and the transversal competencies will be treated according to the Methodology of OMECTS 5703/18.12.2011. The competencies listed in the National Register of Qualifications in Higher Education [Registrul Naţional al Calificărilor din Învăţământul Superior RNCIS] (http://www.rncis.ro/portal/page?_pageid=117,70218&_dad=portal&_schema=PORTAL) will be used for the field of study from 1.4 and the program of study from 1.6 of this form, involving the discipline.

Bibliography[9] 1. Dumitru Tucu – Optimizarea costurilor calitatii, Ed. Eurostampa, 2010 2. Feigenbaum, Armand V. (November–December 1956), "Total Quality Control", Harvard Business Review **34** (6) 3. Crosby, Philip B. (1979), Quality Is Free, New York, New York: McGraw-Hill, ISBN 978-0-07-014512-2 4. Thomas Pyzdek, Paul Keller - The Handbook for Quality Management: Second Edition, McGraw-Hill, 2013

8.2 Applied activities[10]	No. of hours	Teaching methods
S1 Enterprises typology	2	Presentation logical and deductive, explanation, debate, Interactive exposure, questioning, methods for work in group, study of curricula documents and references, heuristic methods
S2 Prevention Costs	2	idem
S3 Appraisal Costs	2	idem
S4 Costs of internal failure	2	idem
S5 Costs of external failure	2	idem
S6. Pareto Diagram	2	idem
S7 Evaluation and improvement proposed measures	2	idem
P1 Analyze and creating a Program for Quality Costs Reducing in an enterprise choose by the student	14	idem

Bibliography[11] 1. Dumitru Tucu – Optimizarea costurilor calitatii, Ed. Eurostampa, 2010 2. Feigenbaum, Armand V. (November–December 1956), "Total Quality Control", Harvard Business Review **34** (6) 3. Crosby, Philip B. (1979), Quality Is Free, New York, New York: McGraw-Hill, ISBN 978-0-07-014512-2 4. Thomas Pyzdek, Paul Keller - The Handbook for Quality Management: Second Edition, McGraw-Hill, 2013

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 is permanently actualized by consulting experts from Dura, Contitech, Linde, Continental, Mewi, IPSO etc.

10. Evaluation

Type of activity	**10.1** Evaluation criteria	**10.2** Evaluation methods	**10.3** Share of the final grade
10.4 Course	10.4.1 Understanding and knowledge accumulation 10.4.2 Abilities for using of methods 10.4.3 Activity during teaching	10.4.1 Writing exams 10.4.2 Testing by practical using of a method 10.4.3 Providing bonification for presence	0,66
10.5 Applied activities	**S:** Abilities for using of the methods	Applicative homework	Partially from 0,34
	L:		
	P: Abilities for using of the methods	Applicative homework	Partially from 0,34

[9] At least one title must belong to the department staff teaching the discipline, and at least 3 titles must refer to national and international works relevant for the discipline, and which can be found in the Politehnica University Library.
[10] The types of applied activities are those specified in footnote 5. If the discipline contains several types of applied activities, then these will be written consecutively in the lines of the table below. The type of activity will be written in a distinct line, as „Seminar:", „Laboratory:", „Project:" and/or „Practice/Training:".
[11] At least one title must belong to the staff teaching the discipline.

	Pr:		0,34
10.6 Minimum performance standard (minimum amount of knowledge necessary to pass the discipline and the way in which this knowledge is verified)			
•			

Date of completion 04.12.2015	**Course coordinator (signature)** ……	**Coordinator of applied activities (signature)** ……
Head of Department (signature) ……	**Date of approval in the Faculty Council**[12]	**Dean (signature)** ……

[12] Avizarea este precedată de discutarea punctului de vedere al board-ului de care aparţine programul de studiu cu privire la fişa disciplinei.