**Study program:** Industrial Engineering – Mechanical Engineering

Course title: Final Paper

ECTS credits: 8
Prerequisites:

For choosing the topic: 6<sup>th</sup> semester enrolled

For preparation of the Final Paper: at least 2 months, maximum 6 months

For defense: all exams passed

### Aims of the final exam:

The student applies acquired knowledge and uses appropriate methods and tools for independent preparation of the Final Paper in the field of industrial engineering – mechanical engineering.

## **Learning outcomes:**

The student is qualified to use methods and tools for independent preparation of the Final Paper in the field of industrial engineering – mechanical engineering.

# **Syllabus:**

When a candidate fulfills the necessary conditions, the mentor (taking into account the candidate's opinion and suggestions) defines the topic of the Final Paper. The mentor must indicate to the candidate other scientific fields the topic of the Final Paper is related to.

The candidate may ask for advice other professors who work in the field covered by the Final Paper. This may be a professor from the Study group or an expert in a defined scientific and professional field. The mentor proposes at least 3 members for the Committee for review, evaluation and defense of the Final Paper. The committee consists of: the head of the study group (as the chairperson), the mentor and a professor from a study group in a field closely related to the field covered by the Final Paper.

Final Paper should contain real/actual solutions and answers to important questions considered within the topic.

The candidate is obliged to analyze the data from the literature and his work in solving actual problems, use professional methods and make expert conclusions. The student organizes chapters with the aim of achieving the best possible connection between them.

The Final Paper should contain: the content, introduction, the body of the paper, and finally the conclusion, a list of used literature and supplements (if applicable). The introduction defines the goal and task of the work, and the conclusion should include the most important results that the candidate came to.

For the defense of the Final Paper, the student should prepare a presentation in PowerPoint or another suitable program (if approved by the mentor) and oral presentation.

## Literature:

Literature is selected by the candidate, independently and in agreement with the mentor.

Literature should be an optimal choice for the relevant field.

# **Teaching methods:**

Use of scientific and professional literature;

Use of scientific and professional methods and tools;

Application of modern information technologies;

Experimental work, professional work and other forms of practical knowledge acquisition;

Consultations with the mentor and experts from the defined area.

### **Grading system** (maximum 100 points)

grading scale from 5 to 10: below 51 points grade 5, grade 6 from 51- 60 points, grade 7 from 61-70 points, grade 8 from 71-80 points, grade 9 from 81-90 points, grade 10 from 91- 100 points.

Pre-exam obligations:	Points:	Final exam:	<b>Points:</b>
Final exam	40	Presentation and oral	60
		defense	