

Master's degree program in Mechanical and Device Engineering

as of 2020/2021 academic year

CURRICULUM

ECTS subject code **T ME SN₂**

- **T** – type of course: **B** for BEng, **M** for MEng;
- **ME** - „Mechanical and Device Engineering“;
- **SN₂** - for subsequent number of the subject;

Lectures (L), tutorials (Tut), labs (Lab), Self-Study (SS);

Exam (E), continuous assessment (CA), semester project (SP), semester assignment (course work) (SA).

№	Subject	Semester load						Assessment				ECTS code	ECTS credits
		L	Tut	Lab	Aud. Total	SS	Total	E	CA	SP	SA		

SEMESTER I

1	Application of Computer Technologies in the Design of Mechanical Engineering Products	30	0	30	60	90	150	1			1	MME01	5
2	Metrology Assurance in Mechanical Engineering	30	0	30	60	90	150	1			1	MME02	5
3	Computer Analysis and Simulation in Mechanical Engineering	30	0	30	60	60	120	1				MME03	4
4	Reliability of Industrial Systems	30	0	30	60	60	120	1				MME04	4
5	Innovative Materials and Technologies in Mechanical Engineering	30	0	15	45	75	120		1		1	MME05	4
6	Engineering Research	30	0	15	45	45	90		1			MME06	3
7	Technical Legislation and Law	30	15	0	45	45	90		1			MME07	3
8	Course Project (subjects № 3, № 4 or № 6)	0	0	0	0	60	60			1		MME08	2
Total		210	15	150	375	525	900	4	3	1	3		30

№	Subject	Semester load						Assessment				ECTS code	ECTS credits
		L	Tut	Lab	Aud. Total	SS	Total	E	CA	SP	SA		

SEMESTER II

9	Optional subject (List - 1)	30	0	15	45	45	90	1				MME09	3
10	Optional subject (List - 2)	30	0	15	45	45	90	1			1	MME10	3
11	Optional subject (List - 3)	30	0	15	45	45	90		1	1		MME11	3
12	Optional subject (List - 4)	30	0	15	45	45	90		1		1	MME12	3
13	Optional subject (List - 5)	30	0	15	45	45	90	1		1		MME13	3
14	Diploma project					450	450	Diploma project defense				MME14	15
Total		150	0	75	225	675	900	3	2	2	2		30

Notes:

The list of optional subjects are annually updated and approved by the Faculty Council of Mechanical Engineering Faculty.

Subjects MME09.1, MME10.1, MME11.1, MME12.1 and MME13.1 form Master Program - “Intelligent Systems in Mechanical Engineering”

Subjects MME09.2, MME10.2, MME11.2, MME12.2 and MME13.2 form Master Program - “Digitalization in Mechanical and Device Engineering”

LIST OF OPTIONAL SUBJECTS

List - 1 MME09 (ECTS Credits - 3)		Code
1	Intelligent Measurement Systems	MME09.1
2	Reverse Engineering and Modernization of Automation Equipment	MME09.2

List - 2 MME10 (ECTS Credits - 3)		Code
1	Computer Integrated Manufacturing Systems	MME10.1
2	Stack-up Analysis and Functional Dimensioning	MME10.2

List - 3 MME11 (ECTS Credits - 3)		Code
1	Materials Handling Robots and Manipulators	MME11.1
2	Computer Aided Modeling and Analysis of Mechanical Systems	MME11.2

List - 4 MME12 (ECTS Credits - 3)		Code
1	Programming in CAD Environment and Automation in Geometric Modeling	MME12.1
2	Computer Aided Quality and Metrology Control	MME12.2

List - 5 MME13 (ECTS Credits - 3)		Code
1	Intelligent Drive Systems	MME13.1
2	Computer Aided Design of Machine Modules and Aggregates	MME13.2

LIST OF FACULTATIVE SUBJECTS

№	Subject	Semester load						Assessment				ECTS code	ECTS credits
		L	Tut	Lab	Aud. Total	SS	Total	E	C A	SP	S A		

SEMESTER I

1	Optimization of Mechanical Constructions	30	0	30	60	60	120		1			FaMME 01	4
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SEMESTER II

2	Project Design and Analysis of Logistic Systems	30	0	30	60	60	120		1			FaMME 02	4
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