



Plan de învățământ licență

2022 - 2026



Anul univ. 2022 - 2023

Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Anul de studii: I
Semestrul: I

Nr. crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare	
					C	S	L	P	Activități asistate	Stud. Ind.		
w												
1	UPB.06.D.01.O.001	Technical Mechanics	D	5	2		2		56	69	E	
2	UPB.06.F.01.O.002	Chemistry	F	4	2		2		56	44	E	
3	UPB.06.F.01.O.003	Linear algebra, analytic and differential geometry	F	5	2	2			56	69	E	
4	UPB.06.F.01.O.004	Computer Programming 1 *	F	5	2		2	2	84	41	V	
5	UPB.06.C.01.O.005	Communication *	C	4	2		2		56	44	E	
6	UPB.06.C.01.O.006	English language *	C	4	1		1				V	
Discipline opționale (Op)												
7	UPB.06.C.01.A.007	Foreign Languages 1 - French	C	3	1		1		28	47	V	
8	UPB.06.C.01.A.008	Foreign Languages 1 - Romanian										
Statistici:			ECTS/Ore:	30	12	2	10	2	378	297	Ex.	Ver.
			Număr:		7	1	6	1			4	3
Discipline facultative (F)												
9	UPB.06.C.01.L.001	Sport**	C	2		1			14	36	V	
10	UPB.06.C.01.L.002	Ethics	C	5	2	2			56	69	V	
11	UPB.06.C.01.L.003	Psihologia educației	C	5	2	2			56	69	E	
TOTAL NUMĂR DE ORE		Discipline Obligatorii:			24							
		Discipline Opționale:			2							
		Discipline Facultative:			9							

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,

* courses to be selected by Erasmus Incoming students, as part of the European Project Semester; other courses may be selected upon request

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ



Plan de învățământ licență

2022 - 2026



Anul universitar: 2022 - 2023

Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Anul de studii: I
Semestrul: II

Nr. crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare		
					C	S	L	P	Activități asistate	Stud. Ind.			
Discipline Obligatorii (Ob)													
1	UPB.06.D.02.O.001	Mechanics of Materials 1	D	6	2	2	1		70	80	E		
2	UPB.06.F.02.O.002	Mathematical analysis	F	6	2	2			56	94	E		
3	UPB.06.F.02.O.003	Physics	F	5	2		2		56	69	E		
4	UPB.06.D.02.O.004	Materials Science	D	5	2		2		56	69	E		
5	UPB.06.F.02.O.005	Computer Programming 2 *	F	5	2		2	2	84	41	V		
Discipline opționale (Op)													
6	UPB.06.C.02.A.006	European Culture and Civilization	C	3	2	1			3	3	V		
7	UPB.06.C.02.A.007	European Integration											
Statistici:				ECTS/Ore:	30	12	5	7	2	378	297	Ex.	Ver.
				Număr:		6	3	4	1			4	2
Discipline facultative (F)													
8	UPB.06.C.02.L.001	Sport**	C	2		1			14	36	V		
9	UPB.06.D.02.L.002	Practical stage	D	2	90 hours (3weeks x 6h/day)				0	50	V		
10	UPB.06.C.02.L.003	Foreign Languages 2 - French	C	5	1		1		28	97	V		
11	UPB.06.C.02.L.004	Foreign Languages 2 - English	C	5	1		1		28	97	V		
12	UPB.06.C.02.L.005	Pedagogie 1	C	5	2	2			56	69	E		
13	UPB.06.C.02.L.006	Volunteering 1	C	3	70 hours (14weeksx5h/week)					75	V		
TOTAL NUMĂR DE ORE		Discipline Obligatorii:			23								
		Discipline Opționale:			3								
		Discipline Facultative:			9								

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

* courses to be selected by Erasmus Incoming students, as part of the European Project Semester; other courses may be selected upon request

**Two SPORT semesters will be mandatory for all four years

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ



Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Plan de învățământ licență

2022 - 2026



Anul univeritar: 2023 - 2024

Anul de studii: II

Semestrul: I

Nr. crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare	
					C	S	L	P	Activități asistate	Stud. Ind.		
Discipline Obligatorii (Ob)												
1	UPB.06.F.03.O.001	Technical Drawing	F	6	2	1	2		70	80	V	
2	UPB.06.D.03.O.002	Mechanics of Materials 2	D	7	2	2	2		84	91	E	
3	UPB.06.F.03.O.003	Probability and Statistics	F	5	2	2			56	69	E	
4	UPB.06.D.03.O.004	Computer Aided Design 1	D	6	2		2	2	84	66	E	
5	UPB.06.F.03.O.005	Computer Programming 3 (Databases) *	F	6	2		2	2	84	66	V	
Discipline opționale (Op)												
Statistici:			ECTS/Ore:	30	10	5	8	4	378	297	Ex.	Ver.
			Număr:		5	3	4	2			3	2
Discipline facultative (F)												
6	UPB.06.C.03.L.001	Sport	C	2		1			14	36	V	
7	UPB.06.C.03.L.002	Foreign Languages 3 - French	C	5	2		2		56	69	V	
8	UPB.06.C.03.L.003	Foreign Languages 3 - English	C	5	2		2		56	69	V	
9	UPB.06.C.03.L.004	Pedagogie 2	C	5	2	2			56	69	E	
TOTAL NUMĂR DE ORE		Discipline Obligatorii:			27							
		Discipline Opționale:			0							
		Discipline Facultative:			13							

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ



Plan de învățământ licență

2022 - 2026



Anul universitar: 2023 - 2024

Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Anul de studii: II
Semestrul: II

Nr. crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare	
					C	S	L	P	Activități asistate	Stud. Ind.		
Discipline Obligatorii (Ob)												
1	UPB.06.D.04.O.001	Tolerances Design	D	4	2		2	2	84	16	E	
2	UPB.06.D.04.O.002	Materials Technology	D	5	2		2		56	69	E	
3	UPB.06.C.04.O.003	Economics	C	4	3	1			56	44	E	
4	UPB.06.D.04.O.004	Computer Aided Design 2	D	5	2		2	2	84	41	V	
5	UPB.06.D.04.O.005	Machine elements	D	5	2		1	2	70	55	E	
6	UPB.06.D.04.O.002	Practical Stage	D	4	90 hours (3weeks x 6h/day)				0	100	V	
Discipline opționale (Op)												
7	UPB.06.D.04.A.006	Modelling and simulation	D	3	2		1		42	33	V	
8	UPB.06.D.04.A.007	Mechanical Vibrations										
Statistici:			ECTS/Ore:	30	13	1	8	6	378	297	Ex.	Ver.
			Număr:		6	1	5	3			4	3
Discipline facultative (F)												
9	UPB.06.C.04.L.001	Sport	C	2		1			14	36	V	
10	UPB.06.C.04.L.002	Foreign Languages 4 - French	C	5	2		2				V	
11	UPB.06.C.04.L.003	Foreign Languages 4 - Romanian	C	5	2		2				V	
12	UPB.06.C.04.L.004	Didactica specialitatii	C	5	2	2					E	
13	UPB.06.C.04.L.005	Volunteering 2	C	3	70 hours (14weeks x 5h/w)				0	75	V	
TOTAL NUMĂR DE ORE		Discipline Obligatorii:								25		
		Discipline Opționale:								3		
		Discipline Facultative:								13		

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

* courses to be selected by Erasmus Incoming students, as part of the European Project Semester;
other courses may be selected upon request

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ



Plan de învățământ licență

2022 - 2026



Anul univ. 2024 - 2025

Anul de studii: III

Semestrul: I

Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Nr. crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare	
					C	S	L	P	Activități asistate	Stud. Ind.		
Discipline Obligatorii (Ob)												
1	UPB.06.D.05.O.001	Mechanical Systems Design	D	4	3		2		70	30	E	
2	UPB.06.S.05.O.002	Instrumentation and Measurement	S	4	2		2		56	44	E	
3	UPB.06.S.05.O.003	System and Project Management *	S	6	2			2	56	94	E	
4	UPB.06.S.05.O.004	Manufacturing Processes 1	S	6	2		2		56	94	E	
5	UPB.06.S.05.O.005	Computer Aided Engineering	S	6	3		1	2	84	66	V	
Discipline opționale (Op)												
6	UPB.06.D.05.A.006	Biomechanical Structures	D	4	2		2		56	44	V	
7	UPB.06.D.05.A.007	Finite Element Analysis of Solids										
Statistici:			ECTS/Ore:	30	14	0	9	4	378	297	Ex.	Ver.
			Număr:		6	0	5	2			4	2
Discipline facultative (F)												
8	UPB.06.C.05.L.001	Instruire asistată de calculator	C	2	1	1			28	22	V	
9	UPB.06.C.05.L.002	Practica pedagogică în învățământul preuniversitar obligatoriu (1)	C	3		3			42	33	V	
10	UPB.06.C.05.L.003	Psychology	C	5	2		2		56	69	V	
TOTAL NUMĂR DE ORE		Discipline Obligatorii:									23	
		Discipline Opționale:									4	
		Discipline Facultative:									9	

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ



Plan de învățământ licență

2022 - 2026



Anul univ. 2024 - 2025

Anul de studii: III

Semestrul: II

Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Nr. Crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare		
					C	S	L	P	Activități asistate	Stud. Ind.			
Discipline Obligatorii (Ob)													
1	UPB.06.S.06.O.001	Production and Operation Management	S	4	2		1	2	70	30	E		
2	UPB.06.D.06.O.002	Machine Tools	D	4	2		1	1	56	44	E		
3	UPB.06.S.06.O.003	Robotics	S	4	2		2		56	44	E		
4	UPB.06.S.06.O.004	Manufacturing Processes 2	S	2	2		1		42	8	E		
5	UPB.06.S.06.O.005	Manufacturing Processes 2 - Project	S	2				2	28	22	V		
6	UPB.06.S.06.O.006	Engineering Economics	S	4	2		1		42	58	V		
7	UPB.06.S.06.O.007	Practică	S	6	270 (10 weeks x 6h/day)						V		
Discipline opționale (Op)													
8	UPB.06.S.06.A.008	Supply Chain Management	S	2	2			2	56	4	E		
9	UPB.06.S.06.A.009	Concurrent engineering											
10	UPB.06.D.06.A.010	Industrial Management	D	2	2			2	56	4	E		
11	UPB.06.D.06.A.011	Quality Engineering											
Statistici:				ECTS/Ore:	30	14	0	6	9	378	297	Ex.	Ver.
				Număr:		7	0	5	5			6	3
Discipline facultative (F)													
12	UPB.06.C.06.L.001	Mangementul clasei de elevi	C	3	1	1			28	47	E		
13	UPB.06.C.06.L.002	Practica pedagogică in invatamantul preuniversitar obligatoriu (2)	C	2		3			42	8	V		
14	UPB.06.C.06.L.003	Examen absolvire, Nivel I	C	5					0	125	E		
15	UPB.06.C.06.L.004	Volunteering 3 (14weeksx5h/week=70h)	C	3	70 hours (14weeks x 5h/w)				0	75	V		
TOTAL NUMĂR DE ORE		Discipline Obligatorii:	21										
		Discipline Opționale:	8										
		Discipline Facultative:	5										

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ



Plan de învățământ licență

2022 - 2026



Anul univ. 2025 - 2026

Domeniul:
Programul de studii:

Industrial Engineering
Industrial Engineering

Anul de studii: IV
Semestrul: I

Nr. crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare		
					C	S	L	P	Activități asistate	Stud. Ind.			
Discipline Obligatorii (Ob)													
1	UPB.06.D.07.O.001	Computer Aided Manufacturing	D	6	3		2	2	98	52	E		
2	UPB.06.S.07.O.002	Industrial Logistics	S	7	3		1	2	84	91	E		
3	UPB.06.S.07.O.003	Product Design and Development	S	5	2		2		56	69	E		
4	UPB.06.S.07.O.004	Product Design and Development - Project	S	2				2	28	22	V		
5	UPB.06.S.07.O.005	Integrated Production Systems	S	7	3		1	2	84	91	E		
Discipline opționale (Op)													
6	UPB.06.S.07.A.006	Leadership Lab	S	3	1		1		28	47	V		
7	UPB.06.S.07.A.007	Internship Lab											
Statistici:				ECTS/Ore:	30	12	0	7	8	378	297	Ex.	Ver.
				Număr:		5	0	5	4			4	2
Discipline facultative (F)													
8	UPB.06.C.07.L.001	Intercultural cooperation	C	5	2	2			56	69	V		
9	UPB.06.C.07.L.002	Pneumatic Solutions for Energy Efficiency and Sustainability in Industry 4.0	S	3	2		3		70	5	V		
10	UPB.06.C.07.L.003	Augmented and Virtual Reality for Engineering	S	3	2		3		70	5	V		
TOTAL NUMĂR DE ORE		Discipline Obligatorii:			25								
		Discipline Opționale:			2								
		Discipline Facultative:			14								

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

Aviz Serviciu Calitate,
Petrișor-Laurențiu ȚUCĂ



Plan de învățământ licență

2022 - 2026



Anul universitar: 2025 - 2026

Anul de studii: IV

Semestrul: II

Domeniul:

Industrial Engineering

Programul de studii:

Industrial Engineering

Nr. Crt.	Codul disciplinei	Denumirea disciplinei	Tip disciplină	Nr. ECTS	Ore/săptămână				Total ore		Forma de evaluare		
					C	S	L	P	Activități asistate	Stud. Ind.			
Discipline Obligatorii (Ob)													
1	UPB.06.S.08.O.001	Entrepreneurship and Innovation *	S	6	4			2	84	66	V		
2	UPB.06.S.08.O.002	Technology Strategy	S	7	3			3	84	91	V		
3	UPB.06.D.08.O.003	Quality Assurance	D	7	3		2	2	98	77	V		
4	UPB.06.S.08.O.004	Graduate project	S	4				4	56	44	V		
5	UPB.06.S.08.O.005	Practical stage for Graduate Project/Interdisciplinary project European Project Semester	S	6	60 hours (2 weekst *30h/w)						V		
Discipline opționale (Op)													
Statistici:				ECTS/Ore:	30	10	0	2	11	322	278	Ex.	Verif.
				Număr:		3	0	1	4			0	5
Discipline facultative (F)													
6	UPB.06.C.08.L.001	Organizational Management	C	5	2	2			56	69	V		
7	UPB.06.C.08.L.002	Volunteering 4 (14weeksx5h/week=70h)	C	3	70 hours (14weeks x 5h/w)						V		

Promovarea examenului de diplomă		10	
TOTAL NUMĂR DE ORE	Discipline Obligatorii:		23
	Discipline Opționale:		0
	Discipline Facultative:		4

Rector,
Mihnea Cosmin COSTOIU

Decan,
Cristian DOICIN

Director departament,
Prenume NUME

Aviz Serviciu Calitate
Petrișor-Laurențiu ȚUCĂ