

"Todor Kableshkov" University of Transport

Faculty: Machinery and Construction Technologies in Transport

Programme: Railway Engineering

Degree: Bachelor

Mode of study: Full time

Duration of study: 4.0 years

No	Code	Course	Total contact hours (Hours of lectures and seminars)	ECTS credits
<i>Compulsory courses</i>				
1	811	Mathematics part I	75	7
2	1207	Chemistry	45	4
3	715	Foreign Language - English, German, French, Russian	90	6
4	702	Economics	60	4
5	1201	Material Science and Technology	105	9
6	812	Mathematics part II	75	7
7	1114	Physics	90	7
8	821	Informatics	90	7
9	1011	Applied Geometry and Engineering Drawing I	45	3
10	906	Theoretical Mechanics part I	60	6
11	813	Mathematics part III	60	6
12	907	Theoretical Mechanics part II	60	6
13	1012	Applied Geometry and Engineering Drawing II	45	3
14	902	Strength of Materials	105	7
15	278	Heat Transfer Equipment	60	5
16	1002	Computer Drawing for Engineers	45	3
17	903	Theory of Mechanisms and Machines	60	5
18	1116	Electrical Engineering and Electronics	90	6
19	1013	Metrology and Measurement Equipment	60	4
20	908	Fluid Mechanics	60	5
21	1008	Machine Elements	105	8
22	1009	Machine Elements - make a project	0	2
23	719	Physical Education and Sports	0	0
24	1341	Electrical Machines, Apparatuses and Drive	60	5
25	1205	Mechanical Engineering Technologies	75	5
26	207	Internal Combustion Engines	105	8
27	690	Hydraulic and Pneumatic Drives and Equipment	60	5
28	1360	Electrical Railway Equipment	75	5
29	208	Internal Combustion Engines - make a project	0	2
30	222	Train Traction	45	4
31	201	Technical Safety and Ecology	60	4
32	279	Reliability of Vehicles	60	5
33	703	Economic History	45	3
34	280	Railway Wagons	105	8
35	190	Rail Transport Technology and Organization	60	6
36	346	Transport Infrastructure	45	5
37	262	Railway Wagons - make a project	0	4
38	245	Locomotives	105	11

39	281	Railway Equipment Testing and Diagnostics	75	10
40	282	Railway Equipment Repair	90	10
41	254	Locomotives - make a project	0	4
<i>Elective courses</i>				
42.1	692	Material Handling Equipment	75	8
42.2	283	Automotive Engineering	75	8
43.1	284	Brake Systems in Railway Vehicles	60	8
43.2	285	Systems for Microclimate Maintenance in Railway Equipment	60	8
<i>Optional courses</i>				
44	141	Railways Technical Operation and Traffic Safety	60	4
45.1	261	Control Systems for Diesel Locomotives	90	6
45.2	1338	Control Systems of Electric Locomotives	90	6
45.3	286	Structure, Systems and Technical Control of Railway Wagons	90	6
46	223	Train Brakes	75	5
47.1	232	Diesel Locomotives Operation	75	5
47.2	1345	Operation of Electric Locomotives	75	5
47.3	236	Railway Wagon Operation	75	5