

Add. 3		Course program for the second level (second cycle - postgraduate) of studies			
1.	Course title	Transport and the environment			
2.	Code	1M5SEE03			
3.	Study group(s)	EE			
4.	The organizer of the study program (unit, institute, department)	"Ss. Cyril and Methodius" University in Skopje, Faculty of Mechanical Engineering - Skopje			
5.	Level (first, second, third degree)	Second			
6.	Academic year / semester	V / winter	7.	ECTS credits	6
8.	Professor	Prof.d-r Mile Dimitrovski Doc.d-r Dame Dimitrovski			
9.	Prerequisites for enrolling the course	None			
10.	Course objectives (competences): Analytical approach to combustion in IC engines, modeling IC engines and technologies for reduction of exhaust emissions. Calculation of real cycles, measuring performance and pollution.				
11.	Course content: Learning the real processes in IC engines, forming pollutants in the chamber of the engine, pollutant behavior after combustion, technologies for pollution reduction in vehicles etc.				
12.	Study methods: Interactive lectures, auditory and/or laboratory practice, selfrunning and/or team work on project assignments, selfrunning assignments				
13.	Total hours	6 ECTS x 30 = 180 hours			
14.	Hours allocation per activity:	30+30+30+30+60 = 180 hours			
15.	Lectures/Lab	15.1.	Lectures (15week x 2)	30 hours	
		15.2.	Lab (student work)	30 hours	
16.	Project Work/Assignments	16.1.	Project assignments	30 hours	
		16.2.	Individual assignments	30 hours	
		16.3.	Self-study	60 hours	
17.	Points/Marks:				
	17.1.	Exams			50
	17.2.	Projects			45
	17.3.	Attendance			5
18.	Grading scale	Under 50		5 (five) (F)	
		51 - 60 points		6 (six) (E)	
		61 - 70 points		7 (seven) (D)	
		71 - 80 points		8 (eight) (C)	
		81 - 90 points		9 (nine) (B)	
		91 - 100 points		10 (ten) (A)	
19.	Prerequisites for taking the final exam	Presented projects			
20.	Language of Instruction	Macedonian			
21.	Course evaluation	Student questionnaire			
22.	Textbooks				
	22.1	Instruction materials			

		No.	Author	Title	Publisher	Year
		1.	Mile Dimitrovski, Dame Dimitrovski	ECOGAS software	Internal issue	2010
		2.	Jeremy Colls	Air pollution	ISBN 0203-4762-6	2007
	22.2	Supplemental Instruction Materials				
		No.	Author	Title	Publisher	Year
		1.	Handbook of Air Pollution from Internal Combustion Engines: Pollutant Formation and Control	Eran Sher	Academic Press	1998
		2.	Transport and the environment	R. E. Hester, R. M. Harrison	RS.C advanced chemical science	2006