

# Transilvania University of Braşov, Romania

## Study program: Facilities for energy efficient buildings

Faculty: Civil Engineering  
Study period: 2 years  
Academic year structure: 2 semesters (14 weeks per semester)  
Examination sessions (two): winter session (January/February)  
summer session (June/July)

Courses per years (C= course; S = seminar; L = laboratory; P = project)

1<sup>st</sup> Year

No. crt.	Course	Code	1 <sup>st</sup> Semester					2 <sup>nd</sup> Semester				
			C	S	L	P	Cred	C	S	L	P	Cred
01	Ethics and integrity in scientific research	EISR01	4	2			4					
02	The NZEB concept in building services design	CNPI	2	2			4					
03	NZEB integrated sanitary systems	SSIN	2			2	6					
04	Heating systems for passive houses and NZEB	SICPN	2			4	4					
05	Internship 1	SP01				8	6					
06	Building facilities design in BIM system (Building Information Modelling)	MIC						2	2			4
07	Simulation of energy consumption in building design	SCEDC						2	2			4
08	Ventilation/air conditioning systems for passive and NZEB houses	SVCCPN						2			2	6
09	Energy efficient lighting systems	SEICRE						2			2	6
10	Internship 2	SP02									8	6
11	O. Hydrogen as an energy carrier	HVE	2			2	4					
12	O.Superior energy valorification in built environment	VSEMU	2			2	4					
13	O. Centralized energy production in urban environments	SPCEMU						2			2	4
14	O.Modern heating networks in the urban environment	RTMMU						2			2	4

## 2<sup>nd</sup> Year

No. crt.	Course	Code	3 <sup>rd</sup> Semester					4 <sup>th</sup> Semester				
			C	S	L	P	Cred	C	S	L	P	Cred
01	Use of renewable energy sources in buildings	USERC	2		1	1	5					
02	Energy management in buildings (BMS)	MEC	2		1	1	5					
03	Analysis of resources and energy use in buildings	ARUE	2	2			5					
04	Project management for building installation services	MPLIC	2	2			5					
05	Internship 3	SP03				12	10					
06	Practical Activity for the Preparation of Dissertation Thesis	PID									12	12
07	Elaboration of the Dissertation Thesis	ED									16	18