

No	Intended Learning Outcome	Subject Specific Criteria 08																											
		Knowledge and				Engineering Analysis				Investigations				Engineering Design				Engineering Practice				Social Competences							
		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28
1	Internalize scientific values, norms and ethics with responsible performance of work in the field of forestry expertise and the tropical forest environment	*	*																										
2	Have knowledge, in-depth understanding and particular specialization in the field of forestry and tropical forest environments			*																									
3	Able to identify, analyze and develop solutions to actual issues and problems in the forestry and tropical forest environment				*																								
4	Able to apply logical, critical, systematic and innovative thinking in preparing research and work schemes in the field of forestry and the tropical forest environment					*	*	*	*	*																			
5	Able to position scientific concepts and descriptions resulting from ideas into a research map developed through an inter- or multidisciplinary approach, and can disseminate and communicate them through various media and forums to a wider audience										*	*	*	*	*														
6	Able to lead, collaborate in a team and be responsible for achieving group work results as well as evaluating and supervising the completion of work under his/her responsibility																									*	*	*	*
7	Able to develop theories, models, techniques and methods that can be applied in the field of forestry and tropical forest environments															*	*	*	*	*	*								
8	Able to analyze and evaluate system performance, then make decisions and implement them with more innovative methods																					*	*						
9	Able to recognize and assess the ecological, social and economic implications of the application and implementation of initiatives, approaches, methods and programs in the forestry sector and tropical forest environment																							*	*				

**Knowledge and Understanding**

- SSC1 have profound knowledge and understanding of their technical including engineering specialisation and the further scientific context;
  - SSC2 have developed differentiated knowledge and critical awareness of the latest findings in their discipline;
  - SSC3 have differentiated and advanced knowledge of the legal provisions relevant for their professional field;
  - SSC4 have advanced knowledge of quality standards and quality processes as well as their management.
- Engineering Analysis**
- SSC5 are qualified to formulate and solve problems arising in new and developing fields of the area of their specialisation;
  - SSC6 are able to use their knowledge and understanding to design scientific including engineering models, systems, strategies, and processes;
  - SSC7 are able to design and apply different methods – such as mathematical analysis, computer-aided model design, practical (laboratory) experiments or plans;
  - SSC8 are able to recognise the relevance of the ecologic and economic framework conditions relating to social and health and safety issues;
  - SSC9 are qualified to plan, conduct, and evaluate field and laboratory experiments.
- Investigations**
- SSC10 are qualified to apply suitable methods to pursue investigations or detailed research as to technical-scientific issues in accordance with the status of their knowledge and understanding;
  - SSC11 are able to identify, locate, and procure required information;
  - SSC12 can define and conduct investigations using the means of analysing, modelling, and experimenting;
  - SSC13 are qualified to assess data critically and to draw conclusions,
  - SSC14 are able to investigate the application of new emerging technologies in their scientific discipline.
- Engineering Design**
- SSC15 are qualified to solve problems which are incompletely defined or unusual and show conflicting targets or competing specifications;
  - SSC16 are able to analyse and assess system performance;
  - SSC17 are able to use their knowledge and understanding to develop solutions for unusual problems together with the integration of other disciplines;
  - SSC18 can apply their scientific ability to judge when working with complex, technically impure, and incomplete information;
  - SSC19 are qualified to apply innovative methods to problem solving processes.
- Engineering Practice**
- SSC20 can combine theory and practice to achieve quality of structures, processes, and results;
  - SSC21 can deal with complex facts and combine knowledge from different fields;
  - SSC22 can develop and implement deductive and inductive methods;
  - SSC23 have developed a comprehensive understanding of applicable theories, models, techniques, and methods and their limitations;
  - SSC24 recognise the social, economic, and ecological implications of practical engineering and can assess them
- Social Competences**
- SSC25 fulfil the requirements on graduates of Bachelor's degree programmes with a view to
  - SSC26 key qualifications on the higher level of Master's degree programmes;
  - SSC27 can work effectively as leaders of teams comprising different disciplines and levels;
  - SSC28 can work and communicate in national and international contexts.

**Knowledge and Understanding**

- SSC1 have profound knowledge and understanding of their technical including engineering specialisation and the further scientific context;
  - SSC2 have developed differentiated knowledge and critical awareness of the latest findings in their discipline;
  - SSC3 have differentiated and advanced knowledge of the legal provisions relevant for their professional field;
  - SSC4 have advanced knowledge of quality standards and quality processes as well as their management.
- Engineering Analysis**
- SSC5 are qualified to formulate and solve problems arising in new and developing fields of the area of their specialisation;
  - SSC6 are able to use their knowledge and understanding to design scientific including engineering models, systems, strategies, and processes;
  - SSC7 are able to design and apply different methods – such as mathematical analysis, computer-aided model design, practical (laboratory) experiments or plans;
  - SSC8 are able to recognise the relevance of the ecologic and economic framework conditions relating to social and health and safety issues;
  - SSC9 are qualified to plan, conduct, and evaluate field and laboratory experiments.
- Investigations**
- SSC10 are qualified to apply suitable methods to pursue investigations or detailed research as to technical-scientific issues in accordance with the status of their knowledge and understanding;
  - SSC11 are able to identify, locate, and procure required information;
  - SSC12 can define and conduct investigations using the means of analysing, modelling, and experimenting;
  - SSC13 are qualified to assess data critically and to draw conclusions,
  - SSC14 are able to investigate the application of new emerging technologies in their scientific discipline.

Engineering Design

SSC15	are qualified to solve problems which are incompletely defined or unusual and show conflicting targets or competing specifications;
SSC16	are able to analyse and assess system performance;
SSC17	are able to use their knowledge and understanding to develop solutions for unusual problems together with the integration of other disciplines;
SSC18	can apply their scientific ability to judge when working with complex, technically impure, and incomplete information;
SSC19	are qualified to apply innovative methods to problem solving processes.

Engineering Practice

SSC20	can combine theory and practice to achieve quality of structures, processes, and results;
SSC21	can deal with complex facts and combine knowledge from different fields;
SSC22	can develop and implement deductive and inductive methods;
SSC23	have developed a comprehensive understanding of applicable theories, models, techniques, and methods and their limitations;
SSC24	recognise the social, economic, and ecological implications of practical engineering and can assess them

Social Competences

SSC25	fulfil the requirements on graduates of Bachelor's degree programmes with a view to
SSC26	key qualifications on the higher level of Master's degree programmes;
SSC27	can work effectively as leaders of teams comprising different disciplines and levels;
SSC28	can work and communicate in national and international contexts.
	acquisition, personnel management, controlling etc,
SSC26	adequately competent in the area of communication, e.g. presentations or moderation