

**Degree Program and Examination Regulations for the
Bachelor's Degree Program in Physical Geography and the
Master's Degree Program in Physical Geography: Climate
&
Environmental Sciences at the Faculty of Sciences at
Friedrich-Alexander-Universität
Erlangen-Nürnberg (FAU)
– FPO PhysGeo CES 2023 –
Dated July 31, 2023**

Based on Section 9 (1) in conjunction with Section 80 (1)(1), Section 84 (2)(1), Section 88 (9), Section 90 (1)(2) and Section 96 (3) Bavarian Higher Education Innovation Act dated August 5, 2022 (**BayHIG**), FAU enacts the following degree program and examination regulations:

Contents:

Section 41 Scope	2
Part 1: General provisions	2
Section 42 Bachelor's Degree Program, Type of Degree, Equivalent Degree Programs ..	2
Section 43 Master's Degree Program, Start of Degree Program, Type of Degree, Equivalent Degree Programs, Teaching and Examination Language	2
Section 44 Examinations Committee	2
Section 45 Grades Required to Pass Multiple Choice Examinations.....	3
Section 46 Minimum Number of Participants for Teaching Units.....	3
Part II: Special Provisions.....	3
1. Bachelor's Examination	3
Section 47 Structure of the Bachelor's Degree Program	3
Section 48 Grundlagen- und Orientierungsprüfung (GOP).....	4
Section 49 Electives.....	4
Section 50 Key Qualifications	4
Section 51 Bachelor's Thesis	5
2. Master's examination.....	5
Section 52 Admissions Committee for the Master's Degree Program	5
Section 53 Qualification for a Master's Degree, Certificates and Admission Requirements.....	5
Section 54 Scope and Structure of the Master's Degree Program, Specializations	5
Section 55 Learning Outcomes and Examinations in Electives in the Module Inter- /Transdisciplinary Perspectives.....	6
Section 56 Compulsory Elective Modules	6
Section 57 Specialization Modules (Consolidation Modules)	7
Section 58 Master's Thesis	8
Section 59 Legal Validity, Transitory Provisions.....	8
Appendix 1: Degree program structure of the Bachelor's degree program in Physical Geography	10
Appendix 2: Degree program structure of the Master's degree program Physical Geography: Climate & Environmental Sciences.....	14

Section 41 Scope

The degree program and examination regulations for the Bachelor's degree program in Physical Geography and the Master's degree program in Physical Geography: Climate and Environmental Sciences at the Faculty of Sciences at FAU – FPO PhysGeo CES – supplement the current version of the General Degree Program and Examination Regulations for Bachelor's and Master's Degree Programs at the Faculty of Sciences at FAU, **ABMPO/NatFak**.

Part 1: General provisions

Section 42 Bachelor's Degree Program, Type of Degree, Equivalent Degree Programs

(1) ¹The Bachelor's degree program in Physical Geography consists of modules worth 180 ECTS credits distributed over six semesters. ²This includes the period for working on the Bachelor's thesis.

(2) The degree of Bachelor of Science (BSc) is awarded in accordance with Section 2 (1) (1) **ABMPO/NatFak**.

(3) Bachelor's degrees in Physical Geography are considered degree programs in equivalent subjects within the meaning of Section 28 (1)(2) **ABMPO/NatFak**.

Section 43 Master's Degree Program, Start of Degree Program, Type of Degree, Equivalent Degree Programs, Teaching and Examination Language

(1) ¹The Master's degree program Physical Geography: Climate & Environmental Sciences (MSc) builds on the contents of the Bachelor's degree program in Physical Geography (BSc). ²It consists of modules worth 120 ECTS credits including the Master's thesis, distributed over four semesters.

(2) The Master's degree program may only be started in the winter semester.

(3) The degree of Master of Science (MSc) is awarded in accordance with Section 2 (1)(2) **ABMPO/NatFak**.

(4) Diplom and Master's degrees in Physical Geography are considered equivalent degrees within the meaning of Section 35 (2)(2) **ABMPO/NatFak**.

(5) Section 4 (4) **ABMPO/NatFak** applies with the proviso that the teaching and examination language in the Master's degree program is English and that individual teaching units and examinations may be held in German; otherwise, Section 4 (4) **ABMPO/NatFak** shall remain unaffected.

Section 44 Examinations Committee

¹A joint examinations committee is formed for the Bachelor's degree program in Physical Geography and the Master's degree program in Physical Geography: Climate & Environmental Sciences and the Bachelor's and Master's degrees in Cultural Geography in accordance with Section 9 (1)(4) **ABMPO/NatFak**. ²It consists of five voting members proposed by the Geography department and appointed by the Faculty Council of the Faculty of Sciences. ³The chairperson, their deputy and at least one further member must be full-time lecturers from the Geography department at the

Faculty of Sciences. ⁴The other two members must be either part-time or full-time lecturers or research associates from the Geography department. ⁵The Dean of Studies of the Geography department has an advisory role on the Examinations Committee.

Section 45 Grades Required to Pass Multiple Choice Examinations

Notwithstanding Section 17 (5)(1) **ABMPO/NatFak**, and provided the examiner has not determined otherwise, multiple choice examinations shall be considered to have been passed if

1. The examinee answered at least 60 percent of the examination questions correctly/achieved at least 60 percent of the attainable points, or
2. The examinee answered at least 50 percent of the examination questions correctly/achieved at least 50 percent of the attainable points and the number of correct answers/points obtained is no more than 17 percent below the average number of correct answers/points obtained by all examinees sitting the examination for the first time.

Section 46 Minimum Number of Participants for Teaching Units

¹The seminars and field seminars in the (compulsory) elective modules of the Bachelor's and Master's degree programs are held subject to a sufficient number of students registering to participate; further details about the minimum number of participants are stipulated in the relevant module description. ²If individual teaching units cannot be held due to a lack of participants, a sufficient range of alternatives shall be offered to students.

Part II: Special Provisions

1. Bachelor's Examination

Section 47 Structure of the Bachelor's Degree Program

(1) ¹The Bachelor's examination shall have been passed when the modules allocated to it in **Appendix 1** including the Bachelor's thesis module have been passed (180 ECTS credits). ²Modules have to be taken from the compulsory subjects relating to geography and at least two electives. ³The compulsory subjects together with the key qualifications (Section 50) and the Bachelor's thesis (Section 51) account for 140 ECTS credits, and students must also take at least two electives pursuant to Section 49 accounting for a total of 40 ECTS credits. ⁴Elective 1 must account for at least 20 ECTS credits, further electives must account for at least 10 ECTS credits each. ⁵The distribution across the semesters, the type and duration of the examinations in the modules and the required number of ECTS credits are stipulated in **Appendix 1**.

(2) Taking additional modules or participating in teaching units with a limited number of participants is only possible if capacity allows; students who require these modules as proof of gaining the 180 ECTS credits required for completing their degree are given priority.

(3) ¹Students may decide the order in which they take modules themselves, unless **Appendix 1** stipulates a requirement for a particular semester. ²Freedom of choice is in particular restricted in those instances where participation in the examination for one module is dependent on the student having successfully completed another module.

Section 48 Grundlagen- und Orientierungsprüfung (GOP)

(1) The Grundlagen- und Orientierungsprüfung (GOP) comprises the modules Foundations of physical geography 1 (PG 1), Foundations of physical geography 2 (PG 2), Foundations of cultural geography 1 (PG 3), Foundations of cultural geography 2 (PG 4) and the basic seminar in geography (PG 5) (a total of 25 ECTS credits) and one module from an elective.

(2) The GOP shall have been passed when all modules listed in (1) have been evaluated as “bestanden” (passed) or given a grade of at least “ausreichend” (sufficient).

Section 49 Electives

(1) The following subjects are available as electives within the meaning of Section 47 (1)(3) in the Bachelor's degree program Physical Geography:

1. Biology
2. Chemistry
3. Geosciences
4. Computer Science
5. Mathematics
6. Physics
7. Business and Economics
8. Cultural Geography.

(2) ¹The first learning outcome of the elective modules is to give students the opportunity to explore the theory of at least one specialist field. ²The second learning outcome is methodological, training students in interdisciplinary approaches, extending scientific perspectives and those from the social sciences to other fields of study and gathering experience in interdisciplinary scientific methods. ³Thirdly, the element of choice gives students the opportunity to create their own individual profile in view of their future career. ⁴The remaining learning outcomes of individual electives can be found in the **degree program and examination regulations**. ⁵The elective modules are listed in a module catalog, which is announced in accordance with local practice at the latest one week before the semester begins. ⁶Changes to the module catalog can be made by the Examinations Committee for Geography, to take effect from the following semester.

(3) The type and scope of teaching units and examinations depend on the specific manner in which the respective module is taught and are regulated by the applicable **(degree program and) examination regulations** and/or the module handbook.

(4) ¹The Examinations Committee shall decide on any deviations or accept electives other than those stated in (1) upon the student's request. ²An elective can only be admitted if it is compatible with the learning outcome of the Bachelor's degree program in Physical Geography.

Section 50 Key Qualifications

¹20 ECTS credits for career-oriented key qualifications are distributed across various modules and are taught in the context of subject-related content. ²A further 10 ECTS credits are awarded for an external placement related to a professional field, lasting at least 6 weeks.

Section 51 Bachelor's Thesis

(1) Students are required to have achieved at least 140 ECTS credits in order to be allocated a subject for the Bachelor's thesis.

(2) ¹The Bachelor's thesis module accounts for a total of 15 ECTS credits, with 12 ECTS allocated to the written Bachelor's thesis and 3 ECTS credits to the oral examination. ²Requirements for the Bachelor's thesis module shall be such that it can be completed within 12 weeks. ³Notwithstanding Section 31 (4)(3) **ABMPO/NatFak**, the Examinations Committee can extend the period for the Bachelor's thesis by a maximum of two weeks in exceptional cases.

(3) ¹ As a rule, the Bachelor's thesis shall be completed at the Institute of Geography. ²The chairperson of the Examinations Committee may give approval for the Bachelor's thesis to be completed in departments not involved in the degree program upon request.

(4) University lecturers employed at the Institute of Geography as their main occupation pursuant to Section 53 (4) **BayHIG** or part-time university lecturers (supervisors) shall be entitled to assign Bachelor's theses; the Examinations Committee may grant exceptions.

(5) Notwithstanding Section 31 (7)(1) **ABMPO/NatFak**, the Bachelor's thesis shall generally be evaluated by the supervisor; Section 17 (3)(2) **ABMPO/NatFak** shall remain unaffected.

2. Master's examination

Section 52 Admissions Committee for the Master's Degree Program

(1) ¹The admissions committee pursuant to Section 12 **ABMPO/NatFak** for the Master's degree program in Physical Geography: Climate & Environmental Sciences (MSc) shall comprise one professor as the chairperson, one other professor and one research associate working for the University as their main occupation pursuant to Section 53 (4) **BayHIG**.

Section 53 Qualification for a Master's Degree, Certificates and Admission Requirements

[will be included by way of amendment statute]

Section 54 Scope and Structure of the Master's Degree Program, Specializations

(1) ¹The degree program consists of compulsory modules, elective modules (inter-/transdisciplinary perspectives pursuant to Section 55), compulsory elective modules (pursuant to Section 56), specialization modules (consolidation modules pursuant to Section 57) and the Master's thesis. ²The scope and type of examinations to be taken throughout the degree program, the duration of examinations and the number of ECTS credits are stipulated below and in **Appendix 2**.

(2) To complete the Master's degree, students must pass all the following module examinations including the Master's thesis module, amounting to a total of 120 ECTS credits as stipulated in **Appendix 2**:

1. Compulsory modules worth 40 ECTS credits,
2. Elective modules worth 10 ECTS credits,
3. Compulsory elective modules worth 15 ECTS credits,
2. Modules worth 25 ECTS credits in the specialization modules and
3. 30 ECTS credits from the Master's thesis in the selected specialization.

(3) Modules nos. 1 to 6 in **Appendix 2** are compulsory.

(4) ¹The Master's degree program Physical Geography: Climate & Environmental Sciences is offered with the following specializations:

- Climate Research
- Geoinformatics
- Environmental Analysis.

²Students select the specialization they wish to take by registering for the relevant examination module. ³A change of specialization is possible on request at a later date.

(5) Taking additional modules or participating in teaching units with a limited number of participants is only possible if capacity allows; students who require these modules as proof of gaining the 120 ECTS credits required for completing their degree are given priority.

Section 55 Learning Outcomes and Examinations in Electives in the Module Inter-/Transdisciplinary Perspectives

(1) ¹The overriding learning outcomes of the electives of the module Inter-/Transdisciplinary Perspectives that can be chosen pursuant to Section 54 (1) and (2)(2), are firstly to allow students to gain more advanced knowledge in an area that complements the Master's degree program in terms of content. ²The second learning outcome is methodological, training students in interdisciplinary approaches, extending scientific and technical perspectives to other fields of study and gathering experience in interdisciplinary scientific and technical methods. ³Thirdly, the element of choice gives students the opportunity to create their own particular profile in view of their future career. ⁴The remaining learning outcomes of individual electives can be found in the **degree program and examination regulations**.

(2) In the Inter-/Transdisciplinary Perspectives module, students can choose from modules worth a total of 10 ECTS credits from all the modules offered for Master's degree programs at the Faculty of Sciences and the Faculty of Engineering at FAU.

(3) The type and scope of teaching units and course and examination achievements in the modules accounting for 2.5, 5, or 7.5 ECTS credits respectively depend on the specific manner in which the respective module is taught and are regulated by the applicable **degree program and examination regulations** and/or the module handbook.

Section 56 Compulsory Elective Modules

(1) ¹In the compulsory elective modules, students acquire skills for applying research-oriented methods and for developing strategies to solve problems related to physical geography and acquire the ability to carry out academic work independently. ²The learning outcome has a research focus, with students learning subject-specific methods of research and exploring their subject in more depth. ³The element of choice allows students to tailor their profile in view of their career plans.

(2) ¹The compulsory elective modules pursuant to Section 54 (1), and Section 54 (2)(3) are listed in module catalogs that are updated each semester. ²The available compulsory elective modules shall be announced according to local practice one week before the beginning of the semester at the latest. ³The modules may not be part of the selected specialization modules. ⁴One of the compulsory elective modules is ungraded and can be replaced by an external placement lasting at least six weeks.

(3) ¹The type and scope of the examination and the way in which the grade is determined for modules depend on the specific manner in which the respective module is taught; see module handbook for details. ²Possible examination achievements are set out in Section 6 (3) and (4) **ABMPO/NatFak**:

1. Tutorial achievement (report (30–45 pages) or exercises (approx. 5 pages)),
2. Research report (20-50 pages),
3. Seminar achievement (SA, 45 min, presentation and written assignment, approx. 20-30 pages).

Section 57 Specialization Modules (Consolidation Modules)

(1) ¹In the specialization modules, students acquire skills for applying the latest research-oriented methods and for developing strategies to solve problems related to physical geography and acquire the ability to carry out academic work independently. ²The learning outcome has a research focus, with students learning specialized subject-specific methods of research and exploring their subject in more depth. ³The element of choice allows students to tailor their profile in view of their career plans. ⁴The selected specializations are included on the degree certificate.

(2) ¹The specialization modules (also referred to as consolidation modules) pursuant to Section 54 (1) and Section 54 (2)(4) are listed in a module catalog that is announced in accordance with local practice at the latest one week before the semester begins. ²Each module is categorized and options for incorporating it into the specializations pursuant to paragraph 3 announced when the catalog is published. ³Changes to the module catalog can be made by the Examinations Committee for the Geography department, to take effect from the following semester.

(3) Section 56 (3) shall apply accordingly.

(4) The specializations have the following subject-specific learning outcomes:

1. ¹In the Climate Research specialization module, students acquire methodological skills for dealing with, analyzing and interpreting climate data using field research, laboratory analyses, programming and numerical modeling. ²The module focuses on the variability and changes in the Earth's climate – both recent and paleoclimatic – from a modern systemic perspective with a focus on understanding the processes involved.
2. ¹In the Geoinformatics specialization module, students acquire in-depth methodological skills in geographic information systems, various data processing and data analysis methods, the set up and connection of geo-databases and the creation of scripts and programming within a GIS. ²The focus is on the features and characteristics of various recording systems and of complex evaluation processes and algorithms in Earth observation.
3. ¹In the Environmental Analysis specialization module, students acquire specialist methodological skills for collecting, evaluating and interpreting environmental data in the fields of soil science, landscape dynamics, vegetation ecology,

biogeography and dendroecology using field research, laboratory analysis, statistical methods and geoinformation systems. ²The focus is on the processes and interactions in the various compartments of terrestrial ecosystems.

Section 58 Master's Thesis

(1) ¹30 ECTS credits shall be awarded for the Master's thesis. ²The results of the written work (25 ECTS credits) shall be presented in a presentation (5 ECTS credits).

(2) Students are required to have achieved at least 60 ECTS credits in order to be allocated a subject for the Master's thesis.

(3) ¹The Master's thesis is intended to show that the student is capable of dealing with a problem from the field of the Master's degree program in Physical Geography: Climate & Environmental Sciences independently and according to scientific methods within a set period, presenting the results in accordance with the standards of the field and using the correct language, and putting them in relation to current specialist literature. ²The Master's thesis must focus on the selected specializations and be research-oriented. ³The work on the Master's thesis is preceded by one semester of subject specialization and project planning that prepare the student on the subject of the thesis (Project planning and preparation module).

(4) A written assignment suitable for use in the State Examination in teaching (Lehramt) pursuant to Section 29 of the examination regulations for teaching degree programs I (Lehramtsprüfungsordnung I – **LPO I**) can be submitted as a Master's thesis if the topic is explored in more depth from an academic point of view.

(5) The Master's thesis in the Master's degree program Physical Geography: Climate & Environmental Sciences shall be written in English.

(6) University lecturers employed at the Geography department as their main occupation pursuant to Section 53 (4) **BayHIG** or part-time university lecturers (supervisors) shall be entitled to assign Master's theses; the Examinations Committee may grant exceptions.

(7) Notwithstanding Section 38 (4)(2) **ABMPO/NatFak**, the Examinations Committee can extend the period for the Master's thesis by a maximum of three months in exceptional cases.

(8) ¹Notwithstanding Section 38 (6)(5) **ABMPO/NatFak**, two hard copies of the Master's thesis and two machine-readable, electronic copies (PDF document on CD-ROM) shall be submitted to the Examinations Office. ²The supervisor shall be given one of the (stamped) hard copies. ³The design of the title page shall follow the template provided by the Examinations Committee responsible. ⁴The Master's thesis shall include a declaration by the student confirming that the thesis is an original work and that no other sources or materials than the ones listed were used.

Section 59 Legal Validity, Transitory Provisions

(1) ¹These degree program and examination regulations shall come into effect on August 1, 2023. ²They shall apply to students starting a degree program from the winter semester 2023/2024 onwards. Notwithstanding sentence 2, admission to the Master's degree program shall continue to be governed by the provisions stipulated in the degree

program and examination regulations for the Bachelor's degree program in Physical Geography and the Master's degree program in Physical Geography: Climate & Environmental Sciences at the Faculty of Sciences at Friedrich-Alexander-Universität Erlangen-Nürnberg (FAU) – FPO PhysGeo CES – dated August 27, 2020, last amended by statute dated October 11, 2022 in the currently valid version with the proviso that with respect to the application deadline for students wishing to start studying as of summer semester 2024, the provisions in paragraph 2 of the **Appendix to the General Degree Program and Examination Regulations for Bachelor's and Master's Degree Programs at the Faculty of Sciences at Friedrich-Alexander-Universität Erlangen-Nürnberg (FAU), ABMPO/NatFak** shall apply.

(2) ¹At the same time, the degree program and examination regulations for the Bachelor's degree program in Physical Geography and the Master's degree program in Climate & Environmental Sciences as well as the Bachelor's and Master's degree programs in Cultural Geography at the Faculty of Sciences at Friedrich-Alexander-Universität Erlangen-Nürnberg (FAU) from August 27, 2020, last amended by statute of 11 October, 2022 shall cease to be in force as of September 30, 2027, subject to the provisions in paragraph (1)(2) and the provisions below. ²Students already studying under the previously valid version of the degree program and examination regulations according to sentence 1 shall complete their studies under those degree program and examination regulations. ³Examinations in accordance with the degree program and examination regulations in sentence 1 will be offered for the last time in summer semester 2027 for the Bachelor's degree program and in winter semester 2025/2026 for the Master's degree program.

Appendix 1: Degree program structure of the Bachelor's degree program in Physical Geography

Module name	Teaching unit	SWS (semester hours)				Total ECTS credits	Distribution of workload per semester in ECTS credits ¹⁾						Type and scope of the examination ²⁾	Grade factor
		L	T	P	S		1. sem.	2. sem.	3. sem.	4. sem.	5. sem.	6. sem.		
PG 1: Foundations of physical geography 1	Introductory lecture Physical Geography 1	2				5	4						Written examination (45 min)	1
	Tutorial/exercise		1				1							
PG 2: Foundations of physical geography 2	Introductory lecture Physical Geography 2	2				5		4					Written examination (45 min)	1
	Tutorial/exercise		1					1						
PG 3: Foundations of cultural geography I	Introductory lecture Cultural geography 1	2				5	4						Written examination (45 min)	1
	Tutorial/exercise		1				1							
PG 4: Foundations of cultural geography 2	Introductory lecture Cultural geography 2	2				5		4					Written examination (45 min)	1
	Tutorial/exercise		1					1						
PG 5: Introduction to geography³⁾	Basic seminar Geography				3	5	5						TA	1
PG 6: GIS and Geovisualization³⁾	Lecture: Cartography and spatial information	2				7.5	2.5						TA, 0% and pTA, 0%	0
	Seminar: Introduction to GIS				2			5						
PG 7: Introduction to statistics³⁾	Lecture: Methodology and statistics	2				7.5		2.5					TA, 0% and pTA, 0%	0
	Seminar: Multivariate statistics and geostatistics				2				5					
PG 8: Field methods in geography	Field placement			3		5		5					Report (5–10 pages)	0
PG 9: Regional geography I	Minor field seminar/field trips (5 days total)				2.9	5		2.5	2.5				Lab book (10–15 pages)	0
PG 10: Advanced physical geography 1	Lecture Advanced physical geography	2				5			2.5				Written examination (90 min), 0 %, or ⁴⁾ two written examinations (45 min each), 0 %	0

Module name	Teaching unit	SWS (semester hours)				Total ECTS credits	Distribution of workload per semester in ECTS credits ¹⁾						Type and scope of the examination ²⁾	Grade factor
		L	T	P	S		1. sem.	2. sem.	3. sem.	4. sem.	5. sem.	6. sem.		
	Lecture Advanced physical geography	2								2.5				
PG 11: Advanced physical geography 2	Lecture Advanced physical geography	2				5					2.5		Written examination (90 min), 0 %, or ⁴⁾ two written examinations (45 min each), 0 %	0
	Lecture Advanced physical geography	2										2.5		
PG 12: Interdisciplinary geography	Regional/ special lecture	2				5				2.5			Written examination (90 min), 0 %, or ⁴⁾ two written examinations (45 min each), 0 % or ⁶⁾ written examination (45 min), 0%, and lab book (10–15 pages)	0
	Regional/ special lecture or research colloquium ⁵⁾	(2)			(2)						2.5			
PG 13: Regional geography II	Advanced seminar for major field seminar				2	10				4			SA or ⁶⁾ TA	1
	Major field seminar (minimum of 8 days)				4.6						6			
PG 14: Special physical geography	Advanced seminar Physical geography				2	5			5				SA	1
PG 15: Research methods of physical geography I	Advanced seminar Special methods in physical geography				2	10				5			TA, 50% and pTA, 50% ⁶⁾	1
	Advanced seminar Special methods in physical geography				2						5			
PG 16: Research methods in physical geography 2	Lecture Remote sensing	2				7.5			2.5				E-examination pursuant to Section 21 ABMPO/NatFak (45 min), 100%, and TA (0 %)	1
	Advanced seminar Special methods in				2				5					

Module name	Teaching unit	SWS (semester hours)				Total ECTS credits	Distribution of workload per semester in ECTS credits ¹⁾						Type and scope of the examination ²⁾	Grade factor
		L	T	P	S		1. sem.	2. sem.	3. sem.	4. sem.	5. sem.	6. sem.		
	physical geography													
PG 17: Applied physical geography³⁾	Project-oriented advanced seminar Physical geography				2	5				5			SA	1
PG 18: Elective module in geography Analysis of society and the environment	Advanced seminar or method seminar or project-oriented advanced seminar or map interpretation				2	10					5		SA, 50% and TA, 50 %	1
	Advanced seminar or method seminar or project-oriented advanced seminar or map interpretation				2						5			
PG 19: Qualification and professional practice³⁾	Seminar Professional field geography				2	12.5						2.5	Placement report (3–5 pages)	0
	External placement			6 weeks								10		
Elective modules pursuant to Section 49⁷⁾	See Section 49 (3)					40	12.5	5	7.5	10	5		See Section 49 (3)	1
PBA: Bachelor's thesis PG	Bachelor's thesis PG					15						12	Bachelor's thesis (approx. 50 pages) and defense (oral examination, 15 min) (100 % + 0 %)	2
	Oral examination											3		
Total SWS and ECTS credits:		26 (24)	4	3	32.5 (34.5)	180	30	30	30	29	31	30		
						46								

TA = tutorial achievement pursuant to Section 6 (4)(1) **ABMPO/NatFak**

SA = seminar achievement pursuant to Section 6 (4)(1), Section (5) **ABMPO/NatFak**

¹⁾ The distribution shown is a recommendation.

- ²⁾ Unless stated otherwise, these are graded course achievements.
- ³⁾ Key qualification pursuant to Section 33 **ABMPO/NatFak** are taught in the stipulated modules.
- ⁴⁾ Students may choose to obtain the examination achievement either by taking a 90 minute written examination or two partial examinations of 45 minutes each in the individual subject areas.
- ⁵⁾ The research colloquium offers various presentations about current research at the Institute of Geography at FAU, presentations by external researchers and the Franconian Geographical Society (FGG) and participation in the practical forum of the DVAG (German Association of Applied Geography). By participating in the colloquium, students gain additional insights into selected examples from the fields of research and work in the social and natural sciences. Participation is documented in a colloquium booklet.
- ⁶⁾ The type and scope of the examination depend on the specific manner in which the teaching unit chosen by the student is taught, see module handbook for details.
- ⁷⁾ see Section 47 (1)(4). Students must study at least two of the elective subjects pursuant to Section 48 (1), obtaining a total of at least 40 ECTS credits. Students must study one elective subject worth at least 20 ECTS credits. Students must choose further elective subjects worth at least 10 ECTS credits each.

Appendix 2: Degree program structure of the Master's degree program Physical Geography: Climate & Environmental Sciences

	No.	Module	Teaching unit	SWS (semester hours)				Total ECTS credits	Workload per semester in ECTS credits ¹⁾				Type and scope of the examination ²⁾	Grade factor
				L	T	P	S		1. sem.	2. sem.	3. sem.	4th sem.		
Compulsory modules	1	Scientific working I	Scientific writing and communication				2	5	5				TA (exercises)	0
	2	Scientific working II	Introduction to climate & environmental sciences				2	5	5				Written examination, 45 min.	1
	3	Advanced physical geography I	Graduate seminar Physical geography I				2	5	5				SA (written paper, 20–30 pages, with oral presentation, 45 min)	1
	4	Advanced physical geography II	Graduate seminar Physical geography II				2	5		5			SA (written paper, 20-30 pages, with oral presentation, 45 min)	1
	5	RTC: Research training course	Research training course				4	15		10	5		Research report, 20–50 pages, with oral presentation, 30 min. (70 % + 30 %)	1
	6	Field course	Field course				2	5		5			pTA	1
Total compulsory modules							14	40	15	20	5	0		
Elective modules	Inter-/transdisciplinary perspectives		see Section 55					10	5		5		See Section 55 (3)	0
	Total Inter-/transdisciplinary perspectives							10	5	0	5	0		
Elective modules	Elective modules ^{3) 4)}		See Section 56 (2)				6	15			10		See Section 56 (3)	1
										5				0
	Total elective modules						6	15	0	5	10	0		
Compulsory elective modules (consolidation)	Modules from the module catalog for the specialization		See Section 57 (2)				8	20	10	5	5		See Section 57 (3)	1
	Project planning and preparation		Project planning and preparation ⁵⁾				2	5			5		Research report (20-50 pages) and reflective discussion (15–30 min) (0 % + 0 %)	0

No.	Module	Teaching unit	SWS (semester hours)				Total ECTS credits	Workload per semester in ECTS credits ¹⁾				Type and scope of the examination ²⁾	Grade factor
			L	T	P	S		1. sem.	2. sem.	3. sem.	4th sem.		
												(Research report (20–50 pages) and reflexive discussion (15-30 min.) (0 % + 0 %))	
	Total compulsory elective modules (consolidation modules)					10	25	10	5	10	0		
Master's thesis		Master's thesis					30				25	Master's thesis (approx. 80 pages) and oral examination (approx. 30 min) (100 % + 0 %) (Master's thesis (approx. 80 pages) and oral examination (approx. 30 min) (100 % + 0 %))	2
	MT: Master's thesis	Master's thesis defense									5		
	Total for Master's thesis pursuant to Section 57						30	0	0	0	30		
	Total SWS and ECTS credits					30	120	30	30	30	30		

TA = tutorial achievement pursuant to Section 6 (4)(1) **ABMPO/NatFak**

SA = seminar achievement pursuant to Section 6 (4)(3), (5) **ABMPO/NatFak**

pTA = practical tutorial achievement pursuant to Section 6 (4)(2) **ABMPO/NatFak**

¹⁾ The distribution shown is a recommendation.

²⁾ Unless stated otherwise, these are graded course achievements.

³⁾ Selection of specialization modules that are not part of the chosen specializations. The number of compulsory elective modules can be extended.

⁴⁾ One of the compulsory elective modules can be taken as an ungraded module. This module can be replaced by an external placement lasting at least six weeks.

⁵⁾ The research colloquium offers various presentations about current research at the Institute of Geography at FAU, presentations by external researchers, the Franconian Geographical Society (FGG) and participation in the practical forum of the DVAG (German Association of Applied Geography). By participating in the colloquium, students gain additional insights beyond their Master's thesis into selected examples from the fields of research and work in the social and natural sciences. Participation is documented in a colloquium booklet.