# **Bachelor Project**

#### About the course

Subject

Den internationale naturvidenskabelige bacheloruddannelse

Activity type

the bachelor project

Teaching language

Registration

Registration through STADS-Selvbetjening within the announced registration period, as you can see on the Studyadministration homepage.

Detailed description of content

The bachelor project can study many types of research questions, including the "with", "within" and "about" natural science of BP1, BP2, and BP3, respectively as well as research questions similar to the subject module projects within natural science.

You can read about the study programme, project work, studycurriculum, rules and more at the intranet

Expected work effort (ECTS-declaration)

Project work is 15 ECTS corresponding to a 405 hour workload. Nat Bach has issued a guide for the workload during the semester intranet-side

- Start-up/group formation: 28 hours
- · Research question seminar: 4 hours
- Mid-term evaluations: 3 hours
- Internal evaluation: 3 hours
- Presentation seminar: 4 hours
- Project exam: 2 hours
- Group supervision (incl. Practical help in ex lab/field): ca. 25 hours
- in total = 69 hours
- Report writing: 85 hours
- Literature search and processing in group: 115 hours
- · Practical work e.g. lab, model design, analysis, fieldwork: 110 hours
- Exam preparation: 25 hours

#### - In total: 405 hours

Head of studies/ academic coordinator

Martin Niss (maniss@ruc.dk)

Administration of exams

INM Registration & Exams (inm-exams@ruc.dk)

Responsible for the activity

Martin Niss (maniss@ruc.dk)

David Møbjerg Kristensen (davidmk@ruc.dk)

ECTS

15

Learning outcomes and assessment criteria

- Knowledge of concepts, theories and methods within the Natural Sciences relevant to the chosen issue
- Knowledge of and an overall grasp of selected fields of natural science that are relevant to the issue
- Knowledge of and an overall grasp of methods and approaches relevant to the issue
- Knowledge of relevant academic, societal, scientific-theoretical or didactic perspectives on the issue
- Skills to be able to use relevant experimental or other empirical methods
- Skills to be able to use relevant quantitative and qualitative methods
- Skills to be able to use relevant IT tools in the project work efficiently
- Skills to be able to systematically search for relevant scientific literature as well as to be able to use original scientific literature to illuminate the selected issue
- Skills to be able to share information about an investigation of an issue within the Natural Sciences in accordance with academic standards and norms, both orally and in writing
- Skills to be able to organize and manage a project in an efficient manner within a set timeframe
- The competence to be able to take a critical approach to the strengths and weaknesses of the theories and methods used
- The competence to be able to identify and link elements of empirical data, theories, models and simulations
- The competence to be able to undertake observations and carrying out experiments in relation to the selected issue

- · The competence to be able to design and carry out relevant empirical investigations
- The competence to be able to design, analyze and criticize mathematical or other models within the Natural Sciences
- The competence to be able to reflect on and account for the character of the project and its placement in relation to one or several subjects within the Natural Sciences
- · The competence to be able to reflect on and communicate about one's own academic and personal competences

## Overall content

The purpose of the bachelor's project is for the student to undertake a detailed investigation in relation to their prior studies on the basis of experience and academic insight acquired through their studies. The bachelor's project must decisively draw upon and use natural science theories and methods to illuminate a complex natural science issue.

The Head of Studies must approve the area within which the bachelor's project problem statement is to be formulated. This is to ensure that the student can be allocated relevant supervision. The Head of Studies approves the topic of the bachelor's project and also sets a deadline for submission of the bachelor's project.

#### Prerequisites for participation in the exam

Approval of the project work for the bachelor project is contingent on the student having actively and satisfactorily participated in the project, including the following elements of the project work:

- The project formation process as well as selection and delimitation of the project's problem
- · Problem statement seminar, where the problem statement is presented and discussed
- The halfway evaluation, including the drafting of the written halfway evaluation presentations as well as in the group's
  opponent role at the halfway evaluation
- The group's preparation of the project report and any other products
- The group's project presentation and opponent role at the internal final evaluation

# Teaching and working methods

The bachelor project is problem-oriented, exemplary and participant-led. The intention of the project work is to develop the student's proficiency in applying natural science theories and methods while working on a delimited academic area. The project work entails the student independently formulating a problem statement of their own choosing so that the project provides an exemplary realisation of the purpose of the project in question.

Over the course of the project work, the group will undergo an evaluation together with the supervisor in connection with the halfway evaluation and once more at the end of the project. In addition to the summery the Bachelor project report must include an Extended Abstract in english, the Extended Abstract should be 7200-12000 characters, including spaces. The Extended Abstract can e.g be a popular science article.

## Type of activity

Project

# Form of examination (p1)

Individual or group exam for the participants in the bachelor project.

The bachelor project is normally written in groups, but may be written individually. The oral exam is an individual exam for students who have completed the project report alone or for those who have requested an individual exam. All other oral exams are held as group exams.

The starting point for the oral exam is the students' bachelor project report and any supplementary material. The exam includes individual presentations within one of the topics selected by the examiner, which will be communicated to the students no later than 3 working days prior to the exam. Each individual presentation may last up to 5 minutes. A dialogue between the student(s) and the assessors about the project, will be conducted after the individual presentation(s). There may be posed questions to any part of the the subject area of the project report.

The assessment is individual and is based on the project report, any additional material and the student's oral performance.

Permitted group size: 2-6 students.

The character limits of the project report are:

For 1 student: 24,000-180,000 characters, including spaces.

For 2 students: 24,000-180,000 characters, including spaces.

For 3 students: 24,000-192,000 characters, including spaces.

For 4 students: 24,000-192,000 characters, including spaces.

For 5 students: 24,000-204,000 characters, including spaces.

For 6 students:24,000-204,000 characters, including spaces.

The character limits include the cover, table of contents, summary, bibliography, figures and other illustrations, but exclude any appendices.

The project report must include a summary. The summary can either be written in English or Danish.

The summary is included in the overall assessment with a weighting of 5 percent.

Time allowed for exam including time used for assessment:

1 student: 30 minutes.

2 students: 60 minutes.

3 students: 75 minutes.

4 students: 90 minutes. 5 students: 105 minutes.

6 students: 120 minutes.

Writing and spelling skills in the project report are part of the assessment.

Permitted support and preparation materials at the oral exam: All

Assessment: 7-point grading scale. Moderation: External examiner

Form of Reexamination (p1)

Samme som ordinær eksamen

Exam code(s)

Exam code(s): U27204

## Course days:

#### Hold: 1

#### **Bachelor Project - Project Formation (NIB)**

time 01-02-2024 10:00 til

01-02-2024 16:00

forberedelsesnorm D-VIP ikke valgt

location 21.2-032 - undervisningslokale (120)

Teacher David Møbjerg Kristensen ( davidmk@ruc.dk )

#### **Bachelor Project - Project Formation (NIB)**

time 05-02-2024 12:15 til

05-02-2024 17:00

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

location 25.1-035 - teorirum 25.1 (130)

Teacher David Møbjerg Kristensen ( davidmk@ruc.dk )

### **Bachelor Project - Project Formation (NIB)**

time 07-02-2024 12:15 til

07-02-2024 17:00

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

location 25.1-035 - teorirum 25.1 (130)

Teacher David Møbjerg Kristensen ( davidmk@ruc.dk )

# **Bachelor Project - Deadline for project descriptions with indication of wishes for supervisor (NIB)**

time 08-02-2024 23:59 til

08-02-2024 23:59

ikke valgt

forberedelsesnorm ikke valgt

forberedelsesnorm D-VIP

## Bachelor Project - Deadline for signing up for projects at STADS (NIB)

time 15-02-2024 23:59 til

15-02-2024 23:59

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

#### **Bachelor Project - Midterm Evaluation (NIB)**

time 20-03-2024 08:15 til

05-04-2024 18:00

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

#### **Bachelor Project - Internal Evaluation (NIB)**

time 06-05-2024 08:15 til

08-05-2024 18:00

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

#### **Bachelor Project - Project Hand-in (NIB)**

time 29-05-2024 10:00 til

29-05-2024 10:00

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

### **Bachelor Project - Project examination (NIB)**

time 18-06-2024 08:15 til

28-06-2024 13:30

forberedelsesnorm ikke valgt forberedelsesnorm D-VIP ikke valgt

#### **Bachelor Project - Presentation seminar (NIB)**

time 28-06-2024 14:15 til

28-06-2024 18:00

location 25.1-035 - teorirum 25.1 (130)

### **Bachelor Project - Project reexamination (NIB)**

time 01-08-2024 08:15 til

30-08-2024 18:00

forberedelsesnorm ikke valgt

forberedelsesnorm

ikke valgt

D-VIP
Content

The common study regulations § 18, 5:

A student who has failed to pass an ordinary project examination is automatically registered for the re-examination. The student is entitled to make changes to the failed project report. The project report must be submitted no later than 14 days after the date for the

ordinary project examination