



Statutes of the Doctoral School of Chemistry

Version of 2020-06

Preamble

The Doctoral School of Chemistry is a joint, cross-university project between the chemical institutes of Graz University of Technology and the Institute of Chemistry of the University of Graz within the framework of the NAWI Graz cooperation for natural sciences. It is based on:

- the guidelines of § 3 of the Curriculum for the Doctoral Programme in Technical Sciences at Graz University of Technology;
- the guidelines of § 3 of the Curriculum for the Doctoral Programme in Natural Sciences at Graz University of Technology;
- and on § 3 of the declaration of incorporation of the Doctoral School of Chemistry of the University of Graz.

The following paragraphs describe the scope of responsibilities of Graz University of Technology in this cooperation.

1. Scope of the Doctoral School of Chemistry

The Doctoral School of Chemistry (German title: Doctoral School für Chemie) aims at educating doctoral candidates across all universities within the framework of NAWI Graz in the scientific fields of the member institutes and research groups. For this purpose, doctoral candidates are provided with the opportunity to carry out individually supervised work on in the field of chemistry. Independent solving of scientific questions, participation in advanced courses, and a lively exchange of experience form the basis for successful professional development.

2. Academic degree to be awarded

Graduates of the Doctoral School of Chemistry are awarded the academic degree “Doctor of Technical Sciences” (abb. Dr. techn.) or “Doctor of Natural Sciences” (abb. Dr.rer.nat.), depending on whether they are studying in the Doctoral Programme in Technical Sciences or the Doctoral Programme in Natural Sciences. The Dean of Studies is responsible for deciding on admission.

3. Objectives and subject-specific qualification profile

The graduates of the Doctoral School of Chemistry are capable of abstracting scientific questions and independently carrying out scientific tasks at a high level.

They have a broad knowledge base as well as an in-depth area of specialisation within the wider field of chemistry; thus, the graduates of the Doctoral School of Chemistry are able to expand and innovatively implement their scientific knowledge in different fields of applications. Furthermore, they are capable of analysing and successfully solving interdisciplinary, application-orientated questions as well as assuming coordinating and supervising functions.

4. Subjects of the Doctoral School

(1) Associated institutes

6330 Institute of Inorganic Chemistry, Graz University of Technology

6350 Institute of Physical and Theoretical Chemistry, Graz University of Technology

6380 Institute of Chemistry and Technology of Materials, Graz University of Technology

6410 Institute of Organic Chemistry, Graz University of Technology

6430 Institute of Chemistry and Technology of Biobased Systems, Graz University of Technology

6450 Institute of Analytical Chemistry and Food Chemistry, Graz University of Technology

(2) Cooperation partners

In addition to the employees with relevant teaching qualification (selectable supervisors and mentors) from the above-mentioned institutes, the coordination team can also appoint other faculty members from institutes within the NAWI Graz cooperation framework or other universities as members of the Doctoral School, depending on the needs and development of the Doctoral School.

(3) Doctoral candidates

The coordination team must always keep an up-to-date list of all doctoral candidates, which can be viewed by the habilitated members of the Doctoral School using the “Doctoral Management” (“Doktoratsmanagement”) tool.

5. Structure and tasks of the coordination team

The Doctoral School of Chemistry is headed by a tripartite coordination team, consisting of one professor, one representative of the non-professorial teaching staff (habilitated) and one doctoral candidate of the field of chemistry. The members of the coordination team are nominated by their respective peers and are appointed for the duration of a period.

The doctoral candidates of the Doctoral School of Chemistry elect a representative and a deputy representative every other year. The representative participates in the preparation of the course plans for “Scientific Methods” and the doctoral seminar. The representative has the right to be heard in the event of disagreement (as outlined in § 4 (8) of the Curriculum).

The officer responsible for study matters at the Doctoral School of Chemistry is the responsible Dean of Studies, in accordance with the Excerpt of Statutes “Organisation of Academic Affairs” at Graz University of Technology.

6. Guidelines for supervision and mentoring of doctoral candidates

- (1) At the beginning of the doctoral programme, the doctoral candidate and the supervisor jointly sign an educational agreement that must be submitted to the officer responsible for study matters and must be confirmed by the supervisor. The educational agreement must be accompanied by a brief description of the doctoral project.
- (2) The doctoral candidate has the right to have a mentor. Mentors should come from the environment of the Doctoral School and have earned at least a doctorate or equivalent academic degree. They do not have to be explicitly affiliated with the Doctoral School of Chemistry or Graz University of Technology (e.g. mentor from cooperating company). The mentor is to be nominated by the coordination team on the recommendation of the doctoral candidate. To maintain confidentiality, both the mentor and the mentee must sign a separate non-disclosure agreement before mentoring begins. Mentoring should aim to provide informal and confidential support to the doctoral candidate. The mentors should support the mentees in making progress with their studies and in dealing with the supervisor throughout the entire duration of the doctoral programme.
- (3) The supervisor must conduct a formal dialogue with the doctoral candidate at least once a year, in which the progress of work is discussed and the goals for the following year are set. This dialogue is the basis of the progress report, which must be prepared by the doctoral candidate.
- (4) Doctoral candidates have to upload a progress report in TUGonline via “ My Doctoral Programme” (“Mein Doktorat”) once a year. The form to be used is provided on the intranet-site (TU4U) of the Deans Office of the Faculty of Technical Chemistry, Chemical and Process Engineering, Biotechnology. A list of the courses selected for the curricular workload of the doctoral programme must be submitted along with the first progress report

(no later than 12 months after the start of the doctoral project). Further progress reports must indicate the progress made regarding the completion of these courses.

7. Instructional classes

The scope of the curricular workload according to the guidelines of § 6 (4) of the Curriculum for the Doctoral Programme in Technical Sciences and the Doctoral Programme in Natural Sciences at Graz University of Technology totals 14 semester course hours per week (SWS) and consists of the following:

(1) Subject-specific basic courses (8 SWS)

The course catalogue for subject-specific basic courses includes all courses (with the exception of those of the bachelor's programme) offered at the institutes associated with the Doctoral School and commissioned by the officer responsible for study matters. The selection should include courses relevant for and supporting the work on the doctoral thesis. To support the concept of a broad basic educational foundation at a high level, doctoral candidates are strongly discouraged from choosing only lectures that are given at the institute of their supervisor. It is expressly stated that doctoral candidates also have the option of choosing courses from outside the course catalogue of the Doctoral School (see § 6 (2) 4 of the Curriculum).

Examinations completed at recognised national or international post-secondary educational institutions, universities or non-university research institutions (for instance summer schools or specialist courses) may also be approved by the officer responsible for study matters if equivalence is met. Courses that doctoral candidates have already completed as part of their master's degree programme are not admissible.

Attendance of the course *General Aspects of Chemistry* (2 SWS) is mandatory.

(2) Scientific Methods and Communication (4 SWS)


• Doctoral Seminar (2 SWS)

The doctoral seminar is held once a year in the form of a mini symposium with the title DocDays and must be attended at least twice. All doctoral candidates take part and present their work at least once; all members of the Doctoral School are invited to participate. All doctoral candidates are to present their research project in poster form within the first year as well as their research achievements at the end of their doctoral programme in the form of a presentation.

• Scientific Work and Soft Skills (2 SWS)

A list of recommended courses (on scientific writing, presentation skills, working in teams, etc.) is provided by the coordination team.

In consultation with the officer responsible for study matters, suitable events for internal



continuing education can also be recognised.

(3) Exclusive tutorial for doctoral programmes (2 SWS)

The exclusive tutorial for doctoral candidates aims to provide personal supervision of the doctoral candidate by the supervisor.

The selected courses for the curricular workload must be submitted along with the first progress report. A course catalogue recommended by the coordination team is made available on the intranet-site (TU4U) of the Dean's Office of the Faculty of Technical Chemistry, Chemical and Process Engineering, Biotechnology.

8. Publication guidelines at the Doctoral School


Publication of the doctoral project results in peer-reviewed international journals is highly encouraged. A minimum requirement is one publication as first author. Furthermore, the results should be presented at international conferences. When submitting the doctoral thesis, a list of publications and, for submitted manuscripts, a confirmation of acceptance for publication by the journal must be enclosed.

9. Guidelines for the doctoral thesis

It is recommended that the doctoral thesis is written in English.

If the doctoral thesis is a collection of several publications, e.g. articles or papers ("Manteldissertation" or "kumulative Dissertation" in German), it must include at least three works that have either already been published or have been accepted for publication in peer-reviewed scientific journals. The doctoral candidate's share of work in the publications must be clearly stated and confirmed by the co-authors, and must constitute at least 60% in at least one of the publications. The percentages of contribution to the publications must be made available to the evaluators. Methods, measurement arrangements, evaluations, solution methods etc. that are not included or not listed in the publications must be included in the descriptive chapters of such a publication-based doctoral thesis, e.g. in the form of attachments, and must be described in sufficient detail.

In accordance with § 31 (4) of the Excerpt of Statutes Legal Regulations for Academic Affairs, the doctoral thesis is assessed by two evaluators, at least one of which must not be an employee of Graz University of Technology. If no publication exists, at least three reviews must be obtained for assessments of the doctoral thesis. At least eight weeks before the planned date of the doctoral examination, the evaluators are pre-selected in accordance with § 5 (2) of the Curriculum by the members of the coordination team on the recommendation of the doctoral candidate. From this point on, all evaluators must familiarise themselves with the preliminary



version of the doctoral thesis. Four copies (five if there is no publication) of the doctoral thesis must be submitted as hard cover to the Dean's Office at least four weeks before the oral examination.

A current check list for the submission process is available on the intranet-site (TU4U) of the Dean's Office of the Faculty of Technical Chemistry, Chemical and Process Engineering, Biotechnology.

10. Guidelines for the doctoral examination

The composition of the board of examiners is defined under § 7 (1) and (2) of the Curriculum for the Doctoral Programme in Technical Sciences or the Doctoral Programme in Natural Sciences. Evaluators do not have to be members of the board of examiners. The doctoral candidate has the right to submit a list of recommended examiners to the Dean of Studies at least five weeks before the desired examination date.


The doctoral examination consists of two parts, these are (i) a presentation with a maximum length of approx. 30-40 minutes followed by a discussion and (ii) an oral exam by the board of examiners with a maximum length of 1 hour on the subject area of the doctoral thesis.

11. Confidentiality agreement

The habilitated members of the Doctoral School of Chemistry and the doctoral candidate representative on the coordination team must provide a written confidentiality agreement. This agreement refers in particular to (i) reports and statements issued by the doctoral candidate and his/her supervisor (§ 4 (4, 6) of the Curriculum of the Doctoral Programme in Technical Sciences or the Doctoral Programme in Natural Sciences at Graz University of Technology), (ii) any aspects regarding the assessment of a doctoral thesis (§ 5 (2) of the Curriculum), and (iii) the overall scope of the doctoral project and the doctoral thesis as whole, if access to the doctoral thesis is blocked or restricted by the officer responsible for study matters (§ 5 (1, 7) of the Curriculum).

12. Transitional agreement

The present statutes are applicable to doctoral candidates who are subject to the Curriculum for the Doctoral Programme in Technical Sciences and the Curriculum for the Doctoral Programme in Natural Sciences at Graz University of Technology, version 2019, which came into effect on October 1, 2020. Full-time doctoral candidates who began the Doctoral Programme in Technical Sciences or the Doctoral Programme in Natural Sciences at Graz University of Technology



before October 1, 2020 and did not submit to the Curriculum in the 2019 version are entitled to continue and complete their doctoral programme in accordance with the statutes that were previously valid until September 30, 2024.