Faculty of Science & Technology

UNIVERSITEIT TWENTE.

Rules of the Board of Examiners for the Chemical Science & Engineering Bachelor's programme

(art. 7.12 WHW)

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Definition of terms

Paragraph 4 of the general section of the programme part of the student charter, including the education and examination regulations of the Bachelor's programmes of the Faculty of Science & Technology (hereinafter the general section of the OER), defines the testing procedures: art. 4.3 Registering for a unit of study and the tests, art. 4.4 Module description and assessment plan, art. 4.5 Oral tests, art. 4.6 Term assessment, date of exam or test, art. 4.7 Period of validity, art. 4.8 Right of discussion and inspection and art. 4.9 Retention period for tests. For the rules of the Board of Examiners the following terms from Art. 1.2 in the general section of the OER apply:

Board of Examiners The Board of Examiners is the body that objectively and expertly establishes

whether a student meets the conditions defined in the education and examination regulations with respect to knowledge, insight and skills required for acquiring the

degree of Bachelor of Science.

Examiner The person who, in line with Article 7.12c of the Higher Education and Research

Act (WHW), is appointed by the Board of Examiners for holding the exams and

tests, and establishing their results.

Module A unit of study equivalent to 15 EC,

Module coordinator

The person tasked with coordinating the module by the programme board.

The person who is appointed by the Board of Examiners for establishing the

results for the module.

Unit of Study A part of a programme as referred to in Article 7.3 paragraphs 2 and 3 of the

Higher Education and Research Act. Each unit of study is completed by an exam.

Exam An evaluation of the student's knowledge, insight and skills, as well as an

assessment of the results of that assessment (Art. 7.10 WHW); an exam may

consist of multiple tests.

Test Part of an exam. If the exam of a unit of study consists of a single test, the result

of that test is treated as the result of the exam.

Assessment plan A plan indicating how the testing of a unit of study is organized.

TOM Education The educational model introduced for Bachelor's programmes at UT in 2013.

Higher Education and Research Act (WHW) Wet op het Hoger onderwijs en Wetenschappelijk onderzoek (WHW),

published in Staatsblad 1992, 593 and subject to later amendments.

In addition to the definition of terms specified in article 1 of the general section of the OER, these Rules of the Board of Examiners understand the following as meaning:

Resit (TOM) The chance to redo a test within the quartile scheduled for the module (general

section OER, art. 4.4.5f). The programme-specific appendix art.5a paragraph 1

stipulates that all students are eligible for a resit;

Repair The chance to redo a test outside the quartile scheduled for the module (general

section OER, art. 4.4.5f). The programme-specific appendix art.5a paragraph 1 stipulates that certain requirements might be set that determine whether a student

is eligible for a retake.

Module component Part of a module that is tested independently, for which the result is registered in

the SIS.

Project Part of a module in which different subject domains are integrated.

Student Information System (SIS) The system indicated by the institutional administration for the registration of

and information on all relevant details of students and programmes, in the sense

of the Higher Education and Research Act.

Article 1 The Board of Examiners

- 1. From among its members, the Board of Examiners appoints a chairperson and a secretary.
- 2. The Board of Examiners may be assisted by programme staff, e.g. the programme director, the programme coordinator, the study adviser, and tutors. These parties attend meetings in an advisory capacity.
- The Board of Examiners can request the advice of study advisers and other study counsellors regarding decisions to be made concerning individual students; all information provided on students will be treated as confidential.
- 4. The Board of Examiners can, as far as this is not in conflict with the law or with this regulation, decide to delegate some of its responsibilities, possibly subject to limiting conditions, to the chairperson or the secretary of the Board of Examiners.
- 5. A staff member of the Centre for Educational Support of the Faculty of Science and Technology (CES-TNW) will attend the meetings of the Board of Examiners as administrator.
- 6. The meetings of the Board of Examiners are closed to the public. The decisions of the Board of Examiners and the outcome of votes are recorded in the meeting minutes.
- 7. The Board of Examiners uses a set of rules which define (1) the composition, (2) the working methods, (3) delegation of responsibilities to the chairperson and the secretary, and (4) the division of duties with respect to testing supervision.

Article 2 Examiners

- 1. For the purpose of holding the exams and tests, the Examination Board appoints one or more examiners for each unit of study. Only staff members who teach as well as non-university experts can be appointed as examiners (WHW Art. 7.12). If there is more than one examiner, one of them is appointed as the examiner responsible. The examiner responsible determines the result of the exam for the entire unit of study (elaboration of WHW art. 7.12c paragraph 1).
- The chairperson of the final Bachelor's project committee acts as the examiner responsible for the Module 12 Bachelor project.
- 3. The examiners will provide the Board of Examiners with the requested information (WHW Art. 7.12c paragraph 2).

Article 3 Contents and form of exams and test format

- Before an examiner holds a written test, at least one other qualified lecturer will assess whether the proposed test is sufficiently representative, whether the questions have been clearly stated, and whether the level of difficulty is in accordance with the programme.
- The description in the course catalogue defines whether the final assessment of a unit of study will be performed in writing, orally or by means of another method. An assessment plan has been established for all units of study. This assessment plan must have been published no later than two weeks before the start of the unit of study.
- 3. For non-TOM module education, the appointed examiner may decide to deviate from the provisions in paragraphs 1 and 2 of this article, in favour of the student.
- 4. The student can request another testing method from the Board of Examiners than the method determined in the second paragraph of this article.

Article 4 Written and oral tests

- A written test has a maximum duration of 3 hours; the maximum for an oral test is 1.5 hours. Deviation from this rule is possible in the case of students with a disability, in line with Article 7.1 of the general section of the OER.
- 2. Written tests are assessed on the basis of pre-defined standards for the various assignments or partial assignments of the test. The student is informed of the maximum score for each assignment in a written test by adding this information to the assignment in the test.
- 3. Oral testing is open to the public. This is subject to the provisions in Article 4.5, paragraphs 2 and 3 of the general section of the OER.
- 4. The examiner cannot hold an oral test for more than one student at a time, unless agreed otherwise in consultation between the examiner and the students involved. In the case of a project-based course, joint oral testing of a group of students is possible.

Article 5 Order during test sessions

- 1. For each written test, the examiner responsible will assign one or more supervisors who will ensure that the test can be taken in an orderly fashion.
- 2. All students who have registered for a particular test are entitled to take the written test.
- 3. All electronic equipment and applications must be switched off during the test session, with the exception of the use of equipment and applications for which the examiner has given explicit permission.
- 4. During a test, students must be able to identify themselves upon request by means of a proof of enrolment (student ID).
- 5. At the start of the test, students must write their name and student number on all test materials.

Article 6 Fraud

- 1. Fraud is defined as follows:
 - a. The use of more or other materials during a test than those mentioned by the examiner as permitted prior to the start of the test.
 - b. The use of materials or assistance or the offering of materials or assistance during a test of which the student knows (or should have known) that this is not permitted. This includes, among other things:
 - i. Cheating during a test, whether or not:
 - by the use of unauthorised materials, such as: books, notes, electronic devices
 - copying from others or allowing others to copy from you
 - communicating about the test matter with persons other than the supervisors, before handing in the test
 - ii. Forgery.
 - c. Behaviour that the examiner has announced, prior to the exam, will be regarded as fraud, and for which measures have been stated that will be taken should such behaviour occur.
 - d. Plagiarism.
- 2. The examiner and/or the department must always inform the Board of Examiners of any possible case of fraud. The Board of Examiners can, after consulting all parties involved, decide to take suitable measures.
- 3. If a student or external student has committed fraud, the Board of Examiners can revoke that person's right to take one or more tests, examinations or final examinations to be indicated by the Board of Examiners, for a period to be defined by the Board of Examiners, for a maximum of one year. In case of serious fraud, the institutional administration can, by recommendation of the Board of Examiners, permanently terminate the student's enrolment (WHW Art.7.12b paragraph 2). The student will not receive any assessment for the unit of study in which he or she committed fraud.
- 4. If a student is allowed to take an exam for the unit of study after fraud has been established, the Board of Examiners can impose the manner of testing of the relevant subject on the student in question.

Article 7 Rules in the event of an emergency

- 1. The Executive Board, or the building manager on their behalf, establishes whether there is an emergency or imminent emergency.
- 2. Once this has been established, (a part of) the building is evacuated in compliance with the corresponding rules that are in force.
- 3. The board of examiners is informed of the emergency mentioned under paragraph 1 by the examiner within one day.
- 4. If an emergency situation occurs or is considered to be imminent, during or shortly before an examination, the following applies: In case of an imminent emergency situation before the start of an examination, the examination is postponed with immediate effect. In consultation with the board of examiners, the examiner responsible sets a new examination time and date. The new examination time and date must be set within a month of the original date (not including holidays) and is binding.
- 5. In the event of an emergency or an expected emergency during a test, the following procedure applies:
 - a. The student's name and student number must be stated by students on all test materials (at the beginning of the test).
 - b. Those present must immediately leave the test room, on instruction of the authority in charge or the supervisor.
 - c. All students leave all their test materials in the test room.
- 6. The Board of Examiners is responsible for concluding a test that was interrupted or postponed due to an emergency or imminent emergency.
- 7. The Board of Examiners may decide that the examiner, if this is reasonably possible, determines the final grade on the basis of the (partially) completed work that was handed in, if the students were able to start work on the test.
- 8. In the event that the Board of Examiners, on the grounds of paragraph 7, rules that the examiner cannot determine a final grade, a re-take of the examination interrupted by the emergency situation will be organised for the affected students within a month (excluding holidays) of the emergency situation, provided the aforementioned students had registered for the examination in question.

Article 8 Determination and publication of the examination results

A. For TOM modules, the following applies:

- 1. In accordance with article 4.1.8 of the general section of the OER, the examination results for modules are determined by the module examiner.
 - when all test results and resit results for a module are known, the module examiner, the module coordinator, the person designated by the Board of Examiners, and a representative of the programme staff (at least) must organise a module evaluation meeting. This group of people may be supplemented with examiners responsible for a component of a module. The person designated by the Board of Examiners ensures that this occurs on the basis of consistent standards with regard to the modules. Following the recommendations made during the module evaluation meeting, the module examiner will determine which students passed, which students failed, and which students are eligible for a repair outside the module in accordance with art. 10 paragraphs 1b and 1c of these rules.
 - b. When the results of a repair are known, the module examiner will determine the examination results on the basis of the agreements made in the module evaluation meeting.
- 2. Examination results of a module component will be included in the student information system to one decimal place.
- 3. If a test consists of several parts taken at different times (sub-tests), the examiner must record the results of these tests in his or her personal administration to one decimal place. The examiner will communicate the results to the students in question with due regard for the privacy of the students.
- 4. When a written test is awarded a grade ≥ 4.5 and < 5.5, the student may request that a second examiner assess the test. If the two examiners do not agree on a final grade, the final grade will be determined by taking the average of both grades.
- Module grades are normally expressed as a number between 1 and 10. These grades have the following meaning:

1: very poor 4: fail 7: distinct pass

2: poor 5: almost a pass 8: good

3: distinct fail 6: pass 9: very good 10: excellent

- 6. Grades obtained at other universities in the Netherlands are accepted. These are rounded when necessary, or expressed in natural numbers, as listed under paragraph 5.
- Grades obtained at foreign institutions are not accepted. Any such units of study will be marked as completed ('V').
- 8. Exemptions for a unit of study are indicated on the list of grades and in the student information system with 'VR'.
- 9. Examination results for units of study for which not all conditions have been met (minimum requirements, for instance), will be marked as 'NVD' (= not completed) on the list of grades and in the student information system.
- 10. In accordance with article 4.1.10 of the general section of the OER, when a student has obtained several valid grades for the same component of a unit of study, the highest grade will apply. The period of validity of the test results is specified in article 5a of the programme-specific appendix of the OER for the programme in Chemical Engineering.

B. For non-TOM module education:

- Only examination results are included in the student information system. If the exam for a non-TOM unit of study consists of more than one test, the examiner must keep records of the results of these tests in his or her personal administration. These test results will not be considered a grade in the sense of paragraphs 4, 7 and 8 of this article. The examiner will communicate the results to the students in question with due regard for the privacy of the students.
- 2. In the event that examination results of a unit of study are determined by several examiners, the examiner responsible must ensure that all examiners use the same standards to come to their assessment.
- 3. When a written test is awarded a grade 5, the student may request that a second examiner assess the test. If the two examiners do not agree on a final grade, the final grade will be determined by taking the average of both grades.
- 4. Test grades are normally expressed as a number between 1 and 10. These grades have the following meaning:

1: very poor 4: fail 7: distinct pass 2: poor 5: almost a pass 8: good

3: distinct fail 6: pass 9: very good 10: excellent

- 5. Grades obtained at other universities in the Netherlands are accepted. These are rounded when necessary, or expressed in natural numbers, as listed under paragraph 4.
- 6. Grades obtained at foreign institutions are not accepted. Any such units of study will be marked as completed ('V').
- Exemptions for a unit of study are indicated on the list of grades and in the student information system as 'VR'.
- 8. If a student has obtained several valid grades for the same unit of study, the highest grade will apply.

Article 9 Flexible degree programme

Contrary to the provisions in Article 5 of the programme-specific appendix, a student is allowed to take the Bachelor's final examination on the basis of a set of examination components proposed by the student (also known as a Bachelor's flexible degree programme, in line with WHW article 7.3h), provided this set of components has been approved by the Board of Examiners.

A. The following minimum requirements apply for students from the 2013/2014 cohort and later:

- a. The programme must consist of at least 180 EC.
- b. The programme includes at least 6 of the 8 compulsory examination units from the B1 and B2 phases.
- c. The programme includes a final Bachelor's assignment with a nominal study load of no less than 15 EC.
- B. The following minimum requirements apply for students from the 2012/2013 cohort and earlier: The programme for the B2 and B3 years must consist of at least 120 EC.
 - a. The programme includes at least 70% of the mandatory examination units.
 - b. The programme includes a final Bachelor's assignment with a nominal study load of no less than 15 EC.

The Board of Examiners will check that the programme is appropriate and consistent within the domain of the degree programme and that the level is high enough in light of the intended learning outcomes of the degree programme.

Article 10 Resits, retakes, exemption, and validity extension

A. For TOM modules, the following applies:

- 1. For resits and retakes, the following applies:
 - a. For resits within the module, the rules as stated in the assessment plan of the module in question apply.
 - b. For first-year modules, repairs outside the module can be offered. Students are only eligible for a repair if they meet the minimum requirements set for a repair in the module's assessment plan.
 - The module examiner can decide to offer additional assignments for certain project components for a module.
- 2. The Board of Examiners will decide whether any exception to the provisions stated in paragraphs 1b and 1c must be made for individual students.
- 3. If, after retaking certain module components and completing any additional assignments for a project, the student has still not completed the entire module satisfactory, the components that were completed with a passing grade might remain valid for a certain period of time, as described in article 5a of the programme-specific appendix of the bachelor OER.
- 4. Deviating from the rules established in article 5a of the programme-specific appendix with regard to the period of validity of module components, the Board of Examiners may extend the period of validity of certain module components upon request of the student in question or upon recommendation by the study adviser.
- 5. The Board of Examiners may grant full or partial exemptions for module components on the basis of competencies acquired elsewhere. To this end, the student must submit a request accompanied by a positive recommendation from the examiner of the component in question. The Board of Examiners will then determine how the results of the exempted component will be incorporated in the final grade for the module.
- B. For all education, the following applies:
 - An examiner who wants to offer students the option to take an additional test can obtain permission to do so from the Board of Examiners. The Board of Examiners has delegated the authority to make a decision on these matters and to find a suitable time in the timetable to:
 - a. the programme director for non-TOM education.
 - b. the module coordinator for TOM education.

The programme director / module coordinator must inform the Board of Examiners of their decision at the next exam meeting.

Article 11 Examination results

- Students have passed the Bachelor's final examination (WHW art. 7.10 paragraph 2, art 7.12b paragraph 3) when they meet the criteria set for the cohort concerned:
 - A. Students from the 2019/2020 cohort and later have passed the Bachelor's final examination when they meet both of the following criteria:
 - a. all examination components of the B2 and B3 programme have been assessed;
 - b. none of the examination components of the B2 and B3 programme have been assessed with a grade lower than 6;

and they meet one of the following criteria c and d:

- c. all module parts in the B1-programme have been completed with a pass grade (≥ 5.5);
- d. no more than one of the four Math module parts in the B1 programme (Čalculus 1A, Calculus 1B; Linear algebra; Calculus 2) has been completed within the range 5.0-5.4, and at least one other Math module part has been completed with a grade ≥ 6.5. All other module parts from the B1 programme have been completed with a pass grade (≥ 5.5).
- B. Students from the 2013/2014 cohort and later, and students from earlier cohorts who have been transferred to the 2013/2014 programme (or later) have passed the Bachelor's final examination when they meet both of the following criteria:
 - e. all examination components of the programme have been assessed;
 - f. none of these examination components have been assessed with a grade lower than 6.
- C. Students from the 2012/2013 cohort and students from earlier cohorts who have not been transferred to the 2013/2014 programme (or later) have passed the Bachelor's final examination when they meet both of the following criteria a and b:
 - a. the student has passed the first-year examination or has completed all exam components, adding up to 60 EC, in the B1 phase, meeting one of the following criteria¹:
 - i. all examination components mentioned to belong to groups A, B, C, and D in article 4 of the programme-specific appendix have been completed with a pass grade;
 - ii. no more than one of the exam components has been completed with a 5. No other exam components have been completed with a fail grade, and the average grade of all exam components is higher than 6.0:
 - iii. no more than 2 exam components have been completed with a 5 (a fail grade), which do not belong to the same group, and with the average grade in group A and group B being 6.0 or higher.
 - b. The student has completed all examination components, adding up to 120 EC, in the B2 and B3 phase, meeting the following criteria:
 - i. all examination components in the B2 and B3 phase have been assessed;
 - ii. none of the examination components in the B2 and B3 phase have been awarded a grade lower than 5:
 - iii. the final Bachelor's assignment, or a final internship, was awarded a grade higher than 6;
 - iv. no more than two examination components in the B2 and B3 phase were awarded with a 5 (fail grade);
- 2. The Board of Examiners determines the day on which the exam results for the Bachelor's final examination are dated. As a rule, this is the day that the last unit of study is completed.
- 3. If so desired, the student can submit a written motivated request to the Board of Examiners to postpone their decision that the Bachelor's final examination has been passed, and accordingly, to postpone the granting of the degree certificate (WHW art.7.11 paragraph 3, OER art. 5.2 paragraph 3). When making such a request, the student must indicate at least the duration of the delay. If the student has requested delay, the date on which the Board of Examiners has decided that the student has passed the exam will be considered the examination date.
 - The student will be informed of the possibility to postpone the date on which it is determined that they have passed their exam, in the response they will receive after the 'Bachelor's assignment ST request' has been processed by the Board of Examiners.
 - The request must be submitted no later than six weeks before completing the last² unit of study.
- 4. The provisions in paragraph 3 of this article also apply to the final examination of a Bachelor's flexible degree programme, as described in article 9 of these rules.

The set of exam components is recorded in the programme-specific appendix to the OER of Chemical Engineering, dated 1 September 2012.

Usually, this is the final Bachelor's assignment.

Article 12 Exceptional ability

During the graduation ceremony, the Bachelor's certificate may be issued with the designation 'with distinction'. For this, the Board of Examiners assesses all results obtained during the Bachelor's programme, using the following minimum conditions for qualifying for the designation 'with distinction':

A. For students of the 2013/2014 cohort (and later), the Board of Examiners assesses all results obtained during the Bachelor's programme, using the following minimum conditions for qualifying for the designation 'with distinction':

- a. the grade for the final Bachelor's assignment is 9 or higher;
- b. no grades lower than 5.5 are recorded for any module components in the student information system:
- the unweighted average grade of the examinations that are part of the Bachelor's curriculum is 8.0 or higher, before rounding.

B. For students of the 2012-2013 cohort (and earlier), the Board of Examiners assesses all results obtained during the B2 and B3 phase, using the following minimum conditions for qualifying for the designation 'with distinction':

- a. the grade for the final Bachelor's assignment is 9 or higher;
- b. none of the examination components in the B2 and B3 phase have been awarded a grade lower than 6:
- c. the unweighted average grade of the exam components completed in the B2 and B3 phase is 8.0 or higher, before rounding.

Article 13 Permission to take exam components from the B2 and B3 programme

Students wishing to deviate from the order of units of study as specified in article 7 of the programme-specific appendix to the OER of the programme of Chemical Engineering can submit a request to the Board of Examiners. The Board of Examiners is authorised to grant exemptions from the provisions stated in article 7, paragraphs 2 through 4 of the programme-specific appendix to the OER of the programme of Chemical Engineering, in the event that the strict application of the provisions included therein would entail an unjustifiable delay in the study progress of the student in question.

Article 14 Final Bachelor's assignment procedure

A. The following procedure applies for students from the 2013/2014 cohort and later.

- 1. The literature study and drafting of the research plan (preparation for the final Bachelor's assignment) are part of the eleventh module. During the eleventh module, before the student starts writing the research proposal and conducting the literature study, the student picks an assignment from a research group and submits his or her choice of subject to the Board of Examiners for approval, using a form ('Final Bachelor's assignment agreement CE'), which can be downloaded from the website of the Chemical Science & Engineering degree programme. This application indicates the head supervisor for the project, as well as the day-to-day supervisor.
- 2. The final Bachelor's assignment covers an entire module. The criteria that students must meet before starting the final Bachelor's assignment are included in article 7 of the programme-specific appendix to the OER of the Chemical Engineering degree programme. In order to prevent study delays, exceptions may be made. To this end, the student must submit a request to the Board of Examiners. All successful requests shall include a study plan, containing *Preparation for the Bachelor's assignment*.

Research

3. The student conducts the research in accordance with the research plan. At least one progress meeting with the supervisor and head supervisor must be held during the research period.

Reporting

- 4. The final printed report must be submitted to the final Bachelor's assignment committee by the start of the last week of the module. The final report must include the research plan, as well as a description of the research process, which will be considered when determining the final grade (in the main report or in an appendix).
- 5. In the last week of the module, all students must give presentations, which are grouped in clusters. These presentations may last about 15 minutes. After each presentation, the students must prepare a 10-minute defence of their work in front of the committee and fellow students. The defence is public.
- 6. Each presentation will be followed up by a discussion about the grade, for which research process, content, communication, cooperation, and attitude are evaluated. The assessment is finalised on the assessment form ('Assessment form Bachelor's assignment', which can be downloaded from the website of the Chemical Science & Engineering degree programme).
- 7. If the final Bachelor's assignment is awarded a 6 or a 9 or higher, the final Bachelor's assignment committee must include a justification of the grade in question on the assessment form.

- B. The following procedure applies for students from the 2012/2013 cohort and earlier.
 - 1. At least a month before the start of the 4th quarter, the student chooses an assignment at a research group and submits his or her choice of subject to the Board of Examiners for approval, using a form ('Final Bachelor's assignment agreement CSE'), which can be downloaded from the website of the Chemical Science & Engineering degree programme and submitted through 'mobility online'. This application indicates the head supervisor for the project, as well as the day-to-day supervisor.
 - 2. If all criteria have been met, the Board of Examiners will give the student permission to start his final Bachelor's assignment. These criteria are as follows:
 - The B1 phase has been completed,
 - when starting the assignment in the fourth quarter, the following components may still be pending completion: the final Bachelor's assignment, courses taken during the third quarter that have not yet been completed at the time of application, but are scheduled to be completed in the fourth quarter, and no more than one other course;
 - the student may, with the approval of the Board of Examiners, start the final Bachelor's assignment earlier than indicated in the schedule if they have no further courses to complete; in this case, the student must still participate in the joint final session (in week T+10).
 - the content of the final assignment meets the appropriate standards.
 - The student can choose to take the 'preparations for the final Bachelor's assignment' course in module 11, worth 4 EC. Taking this course means the student need not meet the criteria stated in points 4 through 7.

Literature study

- 4. The time required to complete the literature study is about 2 weeks. Students are allowed to start the literature study before the start of the quarter in question, which may be necessary to free up time for a resit, for example. The draft version of the literature study must be approved (go/no-go) by the information specialist. Key criteria include: search strategy, the structure of the report, and reference use. Students must schedule an appointment with the information specialist in time.
- 5. The information specialist's approval is passed on to BOZ. The student is allowed to continue the assignment.

Research plan

- 6. Drafting the research plan can take up to 1 week. A standard form has been drawn up for the research plan, which is available from the Centre for Educational Support of the Faculty of Science and Technology. The research plan must be approved (go/no-go) by the head supervisor and the delegate. The student must schedule an appointment with the delegate in time.
- 7. The delegate's approval is passed on to the Centre for Educational Support of the Faculty of Science and Technology. The student is allowed to continue the assignment.

Research

8. The student conducts the research in accordance with the research plan. At least one progress meeting with the supervisor and head supervisor must be held during the research period.

Reporting

- 9. The final printed report must be submitted to the final Bachelor's assignment committee by the start of the 10th week of the quarter. The final report must include the research plan, as well as a description of the research process, which will be considered when determining the final grade (in the main report or in an appendix).
- 10. In the last week of the quarter, all students must give presentations, which are grouped in clusters. These presentations may last about 15 minutes. After each presentation, the students must prepare a 10-minute defence of their work in front of the committee and fellow students. The defence is public.
- 11. Each presentation will be followed up by a discussion about the grade, for which research process, content, communication, cooperation, and attitude are evaluated. The assessment is finalised on the assessment form ('Assessment form Bachelor assignment', which can be downloaded from the website of the Chemical Science & Engineering degree programme).
- 12. If the final Bachelor's assignment is awarded a 6 or a 9 or higher, the final Bachelor's assignment committee must include a justification of the grade in question on the assessment form.

Article 15 Final Bachelor's assignment committee

- 1. A final Bachelor's assignment committee is appointed for the supervision and assessment of the final assignment.
- 2. The final Bachelor's assignment committee consists of at least three members. The committee must meet the following conditions:
 - a. the chairperson is the delegate of the Board of Examiners; they will assess the research process and the structure of the literature study, report, and presentation;
 - b. the head supervisor; they are a member of the research group within which the assignment is carried out and they are responsible for content-related aspects;
 - the daily supervisor (usually a PhD student); their assessment will mainly emphasize attitude and professionalism.
- 3. The Bachelor's assignment committee may also contain scientific experts from outside the university or from outside the field of Chemical Engineering.
- 4. It is possible to carry out the final Bachelor's assignment at another university or research institute if one of the lecturers in the field of Chemical Engineering is prepared to take the role as head supervisor.
- 5. The composition of the final Bachelor's assignment committee must be approved by the Board of Examiners.

Article 16 Effectuation

These regulations will come into effect on 1 December 2019 and will replace the regulations dated 27 August 2019.

Established by the Board of Examiners for Chemical Engineering,

Enschede, 26 November 2019.