

Appendix

To the Programme Regulations 2010 of the
Master's degree programme in Pharmaceutical Sciences

6 July 2010 (Version: 1 November 2011)

Applies to students who commence the degree programme in Autumn Semester 2011 or later. For those entering the programme before Autumn Semester 2011 the stipulations of the previous Appendix apply.

This appendix sets out the prerequisites for and further details regarding admission to the Master's degree programme in Pharmaceutical Sciences. It supplements the stipulations of the Admission Regulations of ETH Zurich and the Directive on Admission to Master's Degree Programmes.

Contents

- 1 Profile of requirements**
 - 1.1 Degree qualifications
 - 1.2 Academic prerequisites
 - 1.3 Language prerequisites

- 2 Specific stipulations for persons holding a Bachelor's degree in Pharmaceutical Sciences**
 - 2.1 Bachelor's degree in Pharmaceutical Sciences from ETH Zurich
 - 2.2 Other Bachelor's degrees in Pharmaceutical Sciences
 - 2.2.1 General regulations
 - 2.2.2 Bachelor's degree in Pharmaceutical Sciences from the University of Basel or the École de Pharmacie Genève-Lausanne
 - 2.2.3 Bachelor's degree in Pharmaceutical Sciences from other universities

- 3 Specific stipulations for persons holding Bachelor's degrees in other disciplines**

- 4 Application and admission procedure**

- 5 Fulfilling additional admission requirements**
 - 5.1 General regulations
 - 5.2 Deadlines and conditions for undertaking performance assessments

1 Profile of requirements

Policy

For admission to the Master's degree programme in Pharmaceutical Sciences (subsequently 'the degree programme') all of the following prerequisites must be satisfied.

1.1 Degree qualifications

¹ For admission to the degree programme one of the following is required:

- a. a university Bachelor's comprising at least 180 ECTS⁽¹⁾ credits or an equivalent university degree in Pharmaceutical Sciences
- b. a university Bachelor's degree comprising at least 180 ECTS credits or an equivalent university degree in a discipline whose content covers the academic prerequisites listed in 1.2.

² A Bachelor's degree qualifies its holder for admission to an ETH Master's degree programme only if it also qualifies said holder to enter, without additional requirements, the desired Master's degree programme within the university system where the Bachelor's degree was acquired. The Rector may also demand proof of this, determining whether such proof must come from the home university or from another university in the country where the Bachelor's degree was acquired.

1.2 Academic prerequisites

1.2.1 Knowledge and competences

¹ Attendance of the Master's degree programme in Pharmaceutical Sciences presupposes basic knowledge and competences in the disciplines Mathematics, Chemistry, Biology, Physics and Computer Science which must in content, scope and quality be equivalent to those covered in the ETH Bachelor's degree programme in Pharmaceutical Sciences (Pharm. Sc.) (discipline requirements profile).

² The **discipline requirements profile** comprises **155 ECTS** credits in total and is based on knowledge and competences covered in the ETH Bachelor's degree programme in Pharm. Sc. This includes training in the relevant methodological scientific thinking and in experimental competence.

³ The discipline requirements profile is structured in two parts, as follows. Details regarding the content of the corresponding course units, which form part of the ETH Zurich Bachelor's degree programme in Pharmaceutical Sciences, are published in the course catalogue (www.vvz.ethz.ch).

¹ ECTS: European Credit Transfer System. Credits describe the average time expended to achieve a learning goal. One credit corresponds to 30 hours of work.

Part 1: Basic knowledge and competences

Part 1 comprises 110 ECTS credits and covers basic knowledge from the disciplines Mathematics and Natural Sciences. The substance of the following course units is required:

- Mathematik [Mathematics] 11 credits
- Statistik [Statistics] 3 credits
- Informatik [Computer Science] 4 credits
- Physik [Physics] 8 credits
- Allgemeine Chemie [General Chemistry] (lecture and practical) 4 + 8 credits
- Organische Chemie [Organic Chemistry] 5 credits
- Organische Chemie (practical) 8 credits
- Physikalische Chemie [Physical Chemistry] (lecture and practical) 7 + 4 credits
- Analytische Chemie [Analytical Chemistry] 2 credits
- Grundlagen der Biologie [Basic Biology] IA (General Biology) 5 credits
- Grundlagen der Biologie [Basic Biology] IB (Molecular Biologie and Biochemistry) 5 credits
- Grundlagen der Biologie [Basic Biology] IIA (Cell Biologie, lecture and practical) 5 + 8 credits
- Grundlagen der Biologie [Basic Biology] IIB (Neurobiology, Microbiology, Immunology) 5 credits
- Systematische Biologie [Systematic Biology] 5 credits
- Anatomie und Physiologie [Anatomy and Physiology] (lecture and practical) 12 + 1 credits

Part 2: Subject-specific knowledge and competences

Part 2 comprises 45 ECTS credits and covers specific knowledge in Pharmaceutical Sciences. The substance of the following course units is required:

- Medizinische Chemie [Medicinal Chemistry] (lecture and practical) 4 + 3 credits
- Pharmazeutische Biologie [Pharmaceutical Biology] (lecture and practical) 3 + 3 credits
- Pharmazeutische Analytik [Pharmaceutical Analytics] (lecture and practical) 4 + 3 credits
- Galenische Pharmazie [Galenical Pharmacy] (lecture and practical) 4 + 5 credits
- Pharmazeutische Immunologie [Pharmaceutical Immunology] 2 credits
- Gentechnologie [Gene Technology] 2 credits
- Pharmakologie und Toxikologie [Pharmacology and Toxicology] (lecture and tutorial) 4 + 1 credits
- Biopharmazie [Biopharmacy] (lecture and practical) 3 + 2 credits

- Klinische Chemie [Clinical Chemistry] I 1 credit
- Qualitätsmanagement in der pharmazeutischen Praxis [Quality Management] I 1 credit

1.2.2 Admission with additional requirements

¹ If the academic prerequisites listed in 1.2.1 are not completely satisfied, admission may be granted subject to the acquisition of the missing knowledge and competences in the form of additional credits (admission with additional requirements).

² The candidate must provide proof of the acquisition of the additional knowledge and competences required by passing the pertaining performance assessments by set deadlines (see 5).

³ If the candidate fails said performance assessments or does not respect the set deadlines he/she will be regarded as having failed the programme and will be excluded from it.

1.3 Language prerequisites

¹ The teaching languages of the programme are German and English.

² For admission to the degree programme, proof of sufficient knowledge of both English and German (level C1)⁽²⁾ must be provided.

2 Specific stipulations for persons holding a Bachelor's degree in Pharmaceutical Sciences

2.1 Bachelor's degree in Pharmaceutical Sciences from ETH Zurich

Unconditional admission

¹ Holders of a Bachelor's degree in Pharmaceutical Sciences (Pharm. Sc.) from ETH Zurich are unconditionally admitted to the degree programme.

² The required language level is measured according to the Common European Framework of Reference for Languages (EFR) scale: *The Common European Framework of Reference for Languages*, p. 23f.
www.coe.int/t/dg4/linguistic/Source/Framework_EN.pdf

Registration

² Students of the Bachelor's degree programme in Pharm. Sc. already matriculated at ETH Zurich should enrol in the degree programme directly via www.mystudies.ethz.ch. The admission procedure outlined in Section 4 is dispensed with.

Entering the Master's degree programme

³ Students of the ETH Bachelor's degree programme in Pharm. Sc. may enrol directly in the programme, as long as only 8 credits for the Bachelor's degree are pending.

⁴ For all Bachelor's degree students already matriculated at ETH Zurich who progress to the ETH Master's degree programme, the following applies:

- a. The normal ETH enrolment dates and deadlines apply.
- b. Admission is provisional until the Bachelor's degree is issued. Admission will be revoked if the Bachelor's degree is not or cannot be issued.

2.2 Other Bachelor's degrees in Pharmaceutical Sciences

2.2.1 General regulations

Application

¹ Interested parties holding a Bachelor's degree in Pharm. Sc. which was *not* issued by ETH Zurich should apply through the ETH Zurich Admissions Office for admission to the programme and are subject to the admissions procedure set out in Section 4.

Entering the Master's degree programme

² Candidates who have been granted admission may enter the programme when they have completed the preceding Bachelor's degree programme.

2.2.2 Bachelor's degree in Pharmaceutical Sciences from the University of Basel or the École de Pharmacie Genève-Lausanne

Unconditional admission

¹ Holders of a Bachelor's degree in Pharmaceutical Sciences (Pharm. Sc.) from the University of Basel or the École de Pharmacie Genève-Lausanne are unconditionally admitted to the degree programme.

² Admission is subject to fulfilment of the language prerequisites listed in (1.3).

2.2.3 Bachelor's degree in Pharmaceutical Sciences from other universities

Admission

¹ For admission to the degree programme all the prerequisites listed in Section 1 must be satisfied.

² Admission may be subject to additional requirements.

³ Admission is not possible if the number of additional credits required to satisfy the academic prerequisites exceeds

- a. 30 credits in total, or
- b. 18 credits from Part 1 of said academic prerequisites (see Section 1.2.1), or
- c. 12 credits from Part 2 of said academic prerequisites (see Section 1.2.1).

3 Specific stipulations for persons holding Bachelor's degrees in other disciplines

Application

¹ Interested parties holding a Bachelor's degree in a subject other than Pharmaceutical Sciences should apply through the ETH Zurich Admissions Office for admission to the programme and are subject to the admissions procedure set out in Section 4.

Admission

² For admission to the degree programme candidates must satisfy all of the prerequisites listed in Section 1, and have shown very good study performance in the preceding course of studies.

³ Admission may be subject to additional requirements.

⁴ Admission is not possible if the number of additional credits required to satisfy the academic prerequisites exceeds

- a. 30 credits in total, or
- b. 18 credits from Part 1 of said academic prerequisites (see Section 1.2.1), or
- c. 12 credits from Part 2 of said academic prerequisites (see Section 1.2.1).

Entering the Master's degree programme

⁵ Candidates who have been granted admission may enter the programme when they have completed the preceding Bachelor's degree programme.

4 Application and admission procedure

¹ All interested parties – with the exception of matriculated ETH Zurich students from the Bachelor's degree programme in Pharm. Sc. – must submit an application for admission to the degree programme. The specifications for application, in particular the documents required and the dates/deadlines for submission, are published on the website of the ETH Zurich Admissions Office (www.admission.ethz.ch).

² Application may be made even if the required preceding degree has not yet been issued.

³ The admissions committee of the degree programme determines how far the background of the candidate corresponds to the profile of requirements and submits an application for admission/rejection to the Director of Studies.

⁴ The Rector makes the final decision regarding admission without additional requirements, admission with additional requirements, or rejection.

⁵ The candidate receives a written admissions decision which includes relevant information concerning any additional admission requirements.

5 Fulfilling additional admission requirements

5.1 General regulations

¹ Candidates who are admitted subject to the fulfilment of additional requirements must acquire the required additional knowledge and competences before or during the Master's programme via self-study or by attending classes. The corresponding individual performance assessments must take place by set deadlines.

² If the candidate fails said performance assessments or does not respect the set deadlines he/she will be regarded as having failed the programme and will be excluded from it.

5.2 Deadlines and conditions for undertaking performance assessments

¹ Candidates must undertake all of the performance assessments pertaining to the additional admission requirements by the end of the first year of the Master's programme at the latest. All additional requirements, including any assessment repetitions, must be fulfilled within 18 months of the start of the Master's programme at the latest.

² A pass grade in each individual performance assessment is required.

³ A failed performance assessment may be repeated once.