ASIIN Seal

Accreditation Report

Master's Degree Program
Forestry Science

Integrated Doctoral Program
Veterinary Medicine

Provided by
Universitas Gadjah Mada

Version: 20 March 2020

Table of Content

A About the Accreditation Process

Name of the degree program (in original language)	(Official) English translation of the name	Labels applied for [1]	Previous accreditation (issuing agency, validity)	Involved Technical Committees (TC)[2]
"Magister Ilmu Kehutanan"	Master in Forestry Science	ASIIN Label	Accredited by BAN PT 2015-2020	08
"Program Studi Kedokeran Hewan" „Program Studie Pendidikan Profesi Dokter Hewan"	Bachelor in Veterinary Medicine Master/Professional degree in Veterinary Medicine	ASIIN Label	Accredited by BAN PT 2016-2021 Accredited by the Asian University Network 2015-2019	10
Date of the contract: 03.07.2018 **Submission of the final version of the self-assessment report:** 13.11.2018 **Date of the onsite visit:** 17.-18.12.2018 **at: Yogyakarta**				
Peer panel: Prof. Dr. Tillmann Rümenapf, VetMedUni Vienna Prof. Dr. Nicole Kemper, University of Veterinary Medicine Hannover Prof. Dr. Reinhard Mosandl, Technical University Munich (paper based) Prof. Dr. Ute Seeling, Kuratorium für Waldarbeit und Forsttechnik				

[1] ASIIN Seal for degree programmes; EUR-ACE® Label: European Label for Engineering Programmes; EuroInf®: Label European Label for Informatics; Eurobachelor®/Euromaster® Label: European Chemistry Label

[2] TC: Technical Committee for the following subject areas: TC 08 –Agriculture; TC 10 – Life Sciences).

Istiffa Nurfauziah, Student	
Representative of the ASIIN headquarter: Dr. Iring Wasser	
Responsible decision-making committee: Accreditation Commission for Degree Programs	
Criteria used: European Standards and Guidelines as of 15.05.2015 ASIIN General Criteria, as of 10.03.2015 Subject-Specific Criteria for Technical Committee 08 as of 27.03.2015 and for Technical Committee 10 as of 09.12.2011	

B Characteristics of the Degree Programs

a) Name	Final degree (original/English translation)	b) Areas of Specialization	c) Corresponding level of the EQF[3]	d) Mode of Study	e) Double/Joint Degree	f) Duration	g) Credit points/unit	h) Intake rhythm & First time of offer
Forestry	M.Sc		7	Full time	Double Degree Option	4 Semester	90 ECTS/44 sks	Twice a year in August and February
Veterinary Medicine	Doctor of Veterinary Science (DVM)		7	Full time		11 Semester	240,3 ECTS/189 sks	Once a year every August

The Faculty of Forestry Science presents the following vision and mission statement for its **Master's degree program in Forestry Science** (MFS) in its self-assessment report:

"The **vision** of the MFS is "being a pioneer and a leading master program in tropical forestry, innovative and prominent at national level, as well as serving the interests of the peoples and nation imbues with culture values based on Pancasila". The **mission** is "performing education, research and community services as well as sustaining and developing science in the field of tropical forestry and being valuable to society". Graduates of MFS accordingly are "competent, excellent, creative and innovative in practicing forestry knowledge and skill for a broad range of professional careers" as well as "demonstrate effective communication and act with global, ethical, environmental and societal awareness in performing leadership".

As regards the **Doctoral degree program in Veterinary Medicine**, the following profile is formulated by the Faculty of Veterinary Medicine:

"The **vision** of the Veterinary Medicine Study Program (VMSP) and Veterinarian Profession Education Program (VPESP) consists of "being an excellent independent study program with the spirit of Pancasila to serve the interests and prosperity of the nation, capable of competing at the international level". The **mission** is organizing education, research, and

[3] EQF = The European Qualifications Framework for lifelong learning

community service in the field of Veterinary Medicine as well as preservation and development of superior and beneficial knowledge with the ability to be a care provider, decision maker, communicator, community leader and manager in the area of veterinary."

C Peer Report for the ASIIN Seal[4]

1. The Degree Program: Concept, content & implementation

Criterion 1.1 Objectives and learning outcomes of a degree program (intended qualifications profile)

Evidence:

- Self-Assessment Report
- http://fkh.ugm.ac.id/2018/11/03/rencana-strategis-2017-2021
- On-Site Discussions

Preliminary assessment and analysis of the peers:
Universitas Gadjah Mada (UGM) has presented comprehensive Program Educational Objectives (PEOs) for both programs under review, matching them with the corresponding ASIIN field specific criteria in the process.

Concerning the specific learning outcomes for the **Master in Forestry** (MiF), the PEOs accordingly have been designated to educate graduates "who are competent, excellent, creative, and innovative in practicing forestry knowledge and skills for a broad range of professional careers as well as to demonstrate effective communication and act with global, ethical, environ-mental and societal awareness in performing leadership". This overarching competence profile subsequently is broken down in more detail in the different areas of knowledge, skill, and professional attitudes.

Graduates accordingly "believe in God and are able to show religiosity, humanity, integrity, morality, ethic and high academic achievement based on the state ideology "Pancasila".

They are equally "able to obey the rules, being discipline, work effectively in a team as well as independently, and dispose of entrepreneurial spirits". Graduates are capable "to understand and analyse the theory, philosophy and design of sustainable development of forest and natural resources and the complexity of global issues", are able to understand and analyse science, knowledge, technology and art of forestry based on ecosystems and landscape, covering silviculture, forest management, forest products technology and natural resource conservation". In addition the can "develop logical, critical, systematic thinking in conducting research in the area of forestry and environment, apply their knowledge and

[4] This part of the report applies also for the assessment for the European subject-specific labels. After the conclusion of the procedure, the stated requirements and/or recommendations and the deadlines are equally valid for the ASIIN seal as well as for the sought subject-specific label.

understanding in identifying problems, formulating research questions, developing appropriate plans and methods, collecting, analysing and synthesizing the findings with multidisciplinary approaches ". Last but not least, they have the potential "to increase their learning capacity independently and engage in networking within broader research and professional communities".

As regards the competence profile/the program educational objectives **for the Veterinary Medicine Study Program (VMSP) and Veterinarian Profession Education Study Program (VPESP) programs**, the faculty of Veterinary Medicine (FVM) provides the following description:

Students are trained to obtain the qualifications of a so-called "**five star veterinarian"** upon graduation. The first star is acquired by demonstrating the competences of a "**care provider** with the ability to take care of animals holistically as an individual or as a part of owner or community and to provide sustainable qualified treatment in the relation of doctor-animal owner based on truth and mutualism". The second program educational objective revolves around the competences of a **decision-maker** with "the ability to consider diagnose and choose proper and cost effective technology to provide animal health care services". In addition, graduates are educated to function as **communicators** "with the ability to educate animal owners and to promote healthy environments effectively." The fourth star, the fourth group of learning outcomes targets the profile of graduates as **community leaders** encompassing "the ability to motivate animal owner and community to participate and contribute in improving animal health status." Finally, it is the role of a **manager** with the "ability to work effectively in harmonious inside and outside health services system/organization and to understand community needs", for which the program under review is supposed to prepare its graduates".

More specific PLO´s are presented as part of the documentation, which can be found in the Annex to this Report. The experts appreciate the additional presentation of a more detailed learning outcome overview presented in the Self-Assessment Report in combination with a learning outcome matrix matching the described learning outcomes with the subject-specific criteria of ASIIN respective modules of the programmes.

The review team believes that both the Master in Forestry Science as well as the integrated Veterinary Medicine Program are well catered to provide the necessary knowledge and skill set for a promising job market as well as for the further pursuing of academic research. This finding is also supported by the fact that currently Master plans being developed on the national level to increase the output of Master and Ph.D. Graduates in the field). As is the case in all Indonesian educational offerings, a strong emphasis is laid on ethical questions. The experts appreciate that the graduates are familiarized with the opportunities, boundary conditions and risks related to their respective subject.

In summary, the auditors conclude that the objectives and intended learning outcomes of both degree programs under review are reasonable and well founded. Based on the Self-

Assessment Report and the discussions during the on-site-visit, they are convinced that the intended qualification profiles allow the students to take up an occupation that corresponds to their qualification.

Criterion 1.2 Name of the degree programme

Evidence:

- Self-Assessment Report
- http://fkh.ugm.ad.id/2018/10/20/name-of-study-program-in-college/

Preliminary assessment and analysis of the peers:
The panel consider the names of the study programmes under review to adequately reflect the respective aims, learning outcomes, and curricula.

Criterion 1.3 Curriculum

Evidence:

- Self-Assessment Report
- http://fkh.ugm.ad.id/2018/10/20/competent-based-curriculum-decision-letter/
- On-Site Discussions

Preliminary assessment and analysis of the peers:
The expert group reviews the curricula of both programs under consideration in order to reach a conclusion whether the described learning objectives can be achieved by the set of compulsory and elective courses offered. Course descriptions as well as a matrix matching the general learning objectives and the module contents were presented to the peers for a detailed analysis.

As regards the Master in Forestry Science program, it is a graduate program conducted by the Faculty of Forestry Science with a duration of 4 semesters. The program has been offered since September of 1993 and was last modernized and upgraded in 2016 based on Rector Decree No 11/2016. The new structure, which will be elaborated in more detail under criterion 2 of this report has taken into account proposals and recommendations, which were initiated by feedback from various stakeholder groups, especially alumni and employers. As a result, the new curriculum now puts a stronger focus on applied statistics as well as witnesses a shift from general forestry courses towards the area of tropical forestry. Identified shortcomings in the area of communication skills have been addressed in the new program structure by introducing additional academic English courses. The total workload of the program has increased from 42 to 44 credits in the process, with compulsory

courses accounting for 28 SWS (62 credits) including the Thesis worth 10-12 Credits as well as elective subjects with a minimum of 16 SWS (35 ECTS).

Concerning the Veterinary Medicine program, the peers understand that it is an integrated program in the framework of which students first enrol for 8 semesters in an undergraduate program. This is then followed by a 3 semester professional degree that on completion provides graduates with a government licence to practice as veterinarians. The current program has been revised and modernized as of 2015 in close collaboration with stakeholders. Consequently, the former objective based curriculum has been changed to a competence and outcome based education. Also, the practical exposure of students has been intensified, there is now a field semester between the 7-8 semester, albeit with no credits attached. A number of subjects such as “Management of Hospitals” and “Poultry” have been added.

The peers are of the opinion, that the degree program under review are regularly discussed with stakeholder and up to date. They are designed in such a way that they meet their objectives. There is an elaborate system of electives in place leaving ample room for individual choice and specialization. The objectives and learning outcomes of the degree programs do reflect the intended level of academic qualification and respectively correspond with the ASIIN Subject-Specific-Criteria (SSC).

Criterion 1.4 Admission requirements

Evidence:

- UGM Board of Trustees Decree Number: 4/SK/MWA/2014
- www.um.ugm.ac.id
- Self-Assessment Report

Preliminary assessment and analysis of the peers:
The admission procedures and policies for new students follow the UGM Board of Trustees Decree Number: 4/SK/MWA/2014. The requirements, schedule, registration venue, and selection tests are announced on UGM’s webpage and are thus accessible for all stakeholders.

Students can obtain admittance to UGM by three different venues. First, there is the national admission system (National Selection to Enter State Universities SNMPTN) which is based on academic performance at high school. 40% of the students at UGM are admitted through this selection system. Secondly, a national selection test is organized every year for university candidates (Joint Selection to Enter State Universities SBMPTN) which accounts for 30 % of a student cohort. Finally, 30 % of the students are selected based on written tests, specifically designed by UGM. The examinations are organized in three

groups, namely the Science and Technology Examination Group (Saintek), the Social Examinations and Humanities Group (Soshum) and the mixed test group (Saintek and Soshum).

The peers take account of the fact that the admission process at UGM is very selective. For the **Master in Forest Science** 50 students are selected every year, the corresponding numbers for the **Veterinary Program** are 200 students per year. Tuition fees for the MFS amount to around 675 dollars per semester, for the medical program a single tuition fee per semester is paid according to the students' income in six different categories.

From their discussion with the students, the peers gain the impression that the admission system is effective and mostly very motivated and high-performing candidates get admitted and, the dropout rate being low. The peers consider the dedicated students to be one of the strong points of the degree programs under review.

In summary, the auditors find the terms of admission to be binding and transparent. They confirm that the admission requirements support the students in achieving the intended learning outcomes.

Final assessment of the peers after the comment of the Higher Education Institution regarding criterion 1:

UGM does not comment on this criterion.

The peers consider criterion 1 to be fulfilled.

2. The degree programme: structures, methods and implementation

Criterion 2.1 Structure and modules

Evidence:

- Self-Assessment Report
- Academic Guide Books
- On-Site Discussions

Preliminary assessment and analysis of the peers:
The curriculum of MFS has a duration of 4 semesters and consist of compulsory subjects, elective subjects, and a thesis. Students are required to take minimum credits of 44 (97 ECTS), which are distribute between 28 credits (62 ECTS) of compulsory subjects including

thesis, and a minimum 16 credits (35 ECTS) of elective subjects. Each subject is designed to contribute to the achievement of the program learning outcomes.

As to the structure of the MFS curriculum, in the **first semester** students enrol in compulsory courses in Sustainable Forest Development Analysis as well as Tropical Forest Silviculture, Added Value of Tropical Forest Products, Scientific Method for Forestry Research, Tropical Forest Conservation and have to choose two elective courses in accordance with their choice of a major (see below). In the **second semester**, students are dealing with the methods of Applied Statistics, the Added Value of Tropical Forest Products, Tropical Forest Conservation as well as Academic English while again selecting two elective courses. **The third and the fourth semester** are devoted to developing and drafting a research proposal, to familiarize students with the methods of scientific work and to complete their Master thesis.

Regarding the **electives**, students registered in MFS have ample choice to select subjects which support their primary research interest and which constitute the basis for their respective Major. Graduates in MFS thus can major in five different areas. They specialize either in a **Major in Silviculture, in Forest Management, in Forest Product Development, in Forest Resource Conservation or in Forest Extension**. In each of these majors, students can choose from a wide range of different topics, typically there are between 20-30 educational offerings in each field.

Students who specialize in a **Master in Silviculture** will thus choose between the following electives: Ecosystem Restoration Silviculture, Advanced Tree Improvement, Site Manipulation and Land Rehabilitation, Tree Physiology and Environmental Stress, Silviculture for Agroforestry System, Ecological Genetics, Tropical Forest Entomology, Ecosystem Based Forest Protection, Field Work of Advanced Tree Improvement, Genetic Resources Conservation, Tropical Forest Seed Technology, Tree Domestication, Planted Forest Disease Management, Anthropogenic Tree Disturbance Tropical Forrest, Soil Fertility of Tropical Forests, Tropical Forest Disease Tropical Dendrologly, Tropical Forest Pest and Disease Monitoring, Agroforestry for Functional food, Silviculture for Climate Change Mitigation, Genetics, Molecular Detection, Manipulation Genetics, Cell Biology, Cell Propagation, In Vitro Culture Technique, Plant Organogenesis, and Forest Biotechnology.

The **Major of Forest Conservation** offers a range of altogether 23 electives including courses in: Vegetation Ecology, Landscape and Biodiversity Conservation, Wildlife Habitat Management, Wildlife Ecology, Ecology Ecosystem, Mangrove Ecology, Ecotourism Business, Watershed Management, Tropical Forest Ecology, Integrated Coastal Management, Advanced Aquatic Ecology, Environment Impact Analysis, Wildlife Population Management, Tropical Forest Hydrology, Forest Resources Conservation Policy, Economic Valua-

tion of Conservation Areas, Conservation Area Restoration and Management, System Analysis, Modelling and Research Methods on Forest Resources Conservation, Nature Tourism Planning, and finally Forest Landscape Management.

Students majoring in Forest Management can choose among the following course offerings: Forest Resource and Environment Accounting, Science Management, Sustainable Forest Quantitative Management, Economic Value of Forest and Environment, Advanced Forest Products Marketing, Optimization of Forest Resource Management, Forest Business and Forest Landscape Analysis, Advanced Forest Policy, Advanced Social Forestry, Forest Resource Conflict and Political Management, Advanced Forest Planning, SIB and Forestry Remote Sensing, Modelling and System Analysis, Forest Biomass Inventory, Empowerment and Deliberative Policy, Forest Governance, Forest Growth Science, Eco Forest Harvesting, Applied Statistical Methods, Community Forestry, Agroforestry Management, and Forest Production.

The **Major in Forest Product Technology** offers the following electives: Wood Extractives, Biomass for Renewable Energy, Biomass Conversion for Energy and Chemicals, Wood Carbonization for Engineering Materials, Technology of Oil and Fat Plants, Processing of Exudate and Extractive Products, Handling Technique of Forest Waste, Advance Pulp and Paper Technology, Solid Wood Chemistry, Wood Properties Variation, Formation and Quality of Wood, Tree Growth stress, Formation and Characterization of Reaction Wood, Wood Microtechnique, Advanced Wood Trying, Preservation Technology of Tropical Wood, Biocomposite Technology, Composite Materials, Technology of Binderless Composite, Wood Machining, Wood Modification, Life Cycle Assessment, Conservation of Wood Heritage, Processing of Non Wood Forest Products, Forest Research Instrumentation, Formation of Heartwood, and Exudates.

The **Major in Forest Resource Conservation** boasts the following offer: Vegetation Ecology, Landscape and Biodiversity Conservation, Wildlife Habitat Management, Wildlife Ecology, Ecology Ecosystem, Mangrove Ecology, Ecotourism Business, Watershed Management, Tropical Forest Ecology, Integrated Coastal Management, Advanced Aquatic Ecology, Environment Impact Analysis, Wildlife Population Management, Tropical Forest Hydrology, Forest Resources Conservation Policy, Economic Valuation of Conservation Areas, Conservation Area Restoration and Management, System Analysis and Modelling on Forest Resources Conservation, Nature Tourism Planning, and Forest Landscape Management.

Those students, who are interested in specializing **in the area of Forest Extension** will have the chance to enrol in elective courses such as: Increasing Valued Added of Tropical Forest Products, Intensive Silviculture based Agroforestry, Participatory Methods and Psychology of Forestry Extension, Communication of Forestry Development, Forest Resource Conflict and Political Management, Forestry Extension Planning,

Finally, there is a group of so-called “general elective courses” which consist of one education offering in the area of entrepreneurship and in various case studies.

The peers are impressed by this wide range of course offerings in the elective part of the curriculum. Students can freely choose among 5 specializations and almost 100 different modules. As the admission rate for the MFS program is in a range of 50 students annually, this in practice leads to situations, where courses are provided for only one or very few students, which puts in the eyes of the experts an unnecessary workload on the teaching staff.

The students of MFS also profit from the **existence of an international double degree programs**. Students can thus take part in various mobility programs. Each one is based on a number of agreements with other universities. Such agreements have been signed with Kyoto University, the Tokyo University of Agriculture and Technology (Japan) as well as Kangwoon National University (Republic of Korea). Other exchange programs have been organized in cooperation with Shinzuoka University, Ehime University, Yamagata University, Kyushu University and Nagoya University in Japan. Further cooperation exists with the Korean Kangwon National University, the University of Philippine on Los Banos, Göttingen University in Germany and the University of Putera in Malaysia.

In some instances these agreements allow the student to take part in student exchange programs including the final project/thesis and accomplish a double degree. As the number of outgoing students is still comparatively low, the peers encourage the faculty to advertise these possibilities more.

In terms of **practical exposure**, the possibilities for students are limited apart from regular field trips and self-organized very short internships. Students consequently would appreciate a stronger exposure to the exigencies of their future work life.

Overall, the experts believe that the course structure of the MFS program is well suited to reach the program learning outcomes as described above. It gives the students a wide range of electives and a chance to specialize in their specific area of research interest. The existence of double degree programs opens the door for an international learning experience. More could however been done to increase the possibility of students to engage in practical work and longer, credited internships.

As regards the **program in Veterinary Medicine,** it can be characterized as an integrated program, combining the Veterinary Medicine Study Program (VMSP) and the Veterinarian Profession Education Study Program (VPESP) that provides its graduates with a state licence to work in the field. Students are required to take at least 189 Credits (416 ECTS) including 141 Credits (310 ECTS) of compulsory subjects including the thesis, and community services as well as a minimum of 10 credits (22 ECTS) of elective subjects and 38 credits (84 credits) of so called co-assistances.

In the **first year**, the focus is on basic sciences, especially Physiology, Parasitology, Biochemistry, Basic Histology and Embryo, Cytology, Angiology and Neurology. In addition, there is an emphasis on values and professionalism with courses in Animal Welfare and Ethics, Animal Husbandry and Entrepreneurship and supporting courses in Religion, Citizenship as well as Research Methods and Publications. In the **second year**, a mixture of basic science courses (Virology, Pharmacology, Immunology, Physiology, Animal Organ Systems, Bacteriology and Mycology) plus pre-clinical medicine (applied Veterinary Anatomy, Animal Breeding) are on offer. In the **third and fourth year**, the focus shifts to basis and advanced medical clinic and technology, covering the areas of Parasitic Disease, Mycotical Disease. General Pathology, Fish and Shrimp Disease, Viral Disease, Reproductive Technology, Biotechnology, Applied Microbiology. Also educational focuses on Diagnose and Prevention (Pharmacotherapy, Toxicology, Clinical Pathology, Necropsy, System Pathology, Lameness, Surgery, Radiology, Internal Medicine, Infertility and Sterility, Poultry Disease. These offerings are supplemented by courses in veterinary legislation. There is also a range of elective courses available to students. In the seventh semester, the preparation of the thesis commences. Throughout their undergraduate studies, students have a possibility to engage in working practices in the field (Praktek Kerja Lapangan).

As to the professional program at VPESP of FVM at UGM it is divided in six so called rotations, each one lasting about 8 weeks. In these clinical rotations, students are introduced into the practical work as a veterinary in the field. Unfortunately, the description in the SER is brief on this topic and during the site visit only the small animal teaching hospital could be inspected.

As to internationalization, the faculty entertains a number of partnerships, including Chiang Mai University, Kasetsart University, Mahidol University, Chulalongkorn University in Thailand, as well as Putra Malaysia University. With the Veterinary School of Sydney a credit transfer system has been implemented, with other it is on its way.

Overall, the experts believe that the course structure of the two Veterinary programs under review are suited to reach the program learning outcomes as described above. The peers see however a danger, that the program is too ambitious and overloaded. This leads to the negative side effect that parts of the curriculum like internships are not credited.

Criterion 2.2 Work load and credits

Evidence:

- Self-Assessment Report
- Indonesian Minister of Education and Culture Decree No. 232/U/2000
- On-site Discussions

Preliminary assessment and analysis of the peers:

The curriculum of MFS is divided into modules. The work load and credits in MFS amount to 44 credit units (CU) which correspond to 2816 academic hours or 98 ECTS and are regularly distributed in 4 semesters. Among the 44 CUs there are 28 compulsory and 16 elective credits. The learning system in MFS is designated bases on a so-called semester credit system (SKS). Semester comprises 14 weeks of lectures of other accompanying schedules activities and 2 assessment weeks. On SKS equals 4 academic hours a week (one hour of lectures, one hour of structure activities related to lectures and at least 2 academic hours of independent activities). As regards the laboratory, final project or fieldwork, the calculations are different: one credit unit is equivalent to 4-5 hour s a week for students´ activities for the whole semester. The standard period of study has increased in time and is now on average 2 years and 7 months. There is currently no system in place to evaluate the workload of students in a systematic manner, though students in the discussions do not indicate an overload.

As to the veterinary medicine program, the workload of VMSP is 151 credit unit which corresponds to 4530 academic hours or 181 ECTS and are distributed among 8 semesters whereas the range of permissible credits is between 17-24 credits. 141 credits are compulsory; 10 credits are assigned to the area of electives. The number of units is prescribed by the Indonesian Ministry of Education and Culture. As to the professional degree (VPESP) it comprises an additional 38 credits. The peers see a potential overload of content in the veterinary medicine program as a whole and recommend reviewing the courses and topics with regard to relevance to the veterinary profession.

Since the workload and number of credits for courses is defined by the government the university claims that its options to adapt the workload to students' reality are limited. Nevertheless, the peers detect that no assessment of student workload is carried out at the moment at all. The peers emphasized that such an assessment should be implemented. An assessment of the workload would lay the foundation for a clear analysis of the real distribution of workload in the respective courses and would allow to adapt the curriculum if necessary although the number of credits cannot be increased. All mandatory parts of the curriculum need to be credited.

Apart from this point, the peers talk to all the stakeholders and come to the conclusion that the workload is distributed more or less evenly throughout the semesters and that the students do not complain in any way about an overload.

As regards the recognition of credits from other institutions in Indonesia or from abroad there are rules in place to recognize achievements and competences acquired by students through the Credit Transfer System according to the SAR. In a number of cases, there are formal agreements for a number of double degree programs in place.

Criterion 2.3 Teaching methodology

Evidence:

- Self-Assessment Report
- www.elisa.ugm.ac.id/faculty/profile/KT
- www.kanalpengetahuan.fkt.ugm.ac.id/web-webmenara-ilmu/
- On-Site Discussions

Preliminary assessment and analysis of the peers:
Teaching in all programs under review includes theoretical foundations as well as practical components. In general, teaching includes lectures, classroom exercises, tutorials, group exercises, laboratory work, as well as group work and individual projects.

UGM and its faculties as of 2005 have experienced a general change in its teaching philosophy, trying to implement Student Centred Learning, Research Based Learning and a so called Student Teacher Aesthetic role Sharing (STAR). The discussion with the teaching staff show a clear commitment of a many though not all teachers to these new concepts and examples of the innovative and practice-oriented teaching methodology could be provided. The learning process in MFS in supported by ICT facilities (eLisa – eLearning for the academic community). Since 2016 the Academic Policy Innovation Centre provides support for online lectures, production of learning videos, and disseminating online material.

The peers during the onsite visit see that a good start has been made and that especially the younger generation of staff is more and more adapting the new teaching philosophy. While there is – also in the opinion of the interviewed students - ample room for improvement and also potential of instilling more critical thinking capacities in students themselves, the peers are of the opinion that the applied teaching methodology is generally suited to support the students in achieving the defined learning outcomes.

Criterion 2.4 Support and assistance

Evidence:

- Self-Assessment Report
- On-Site Discussions

Preliminary assessment and analysis of the peers:
At UGM there is a comprehensive system of support and assistance in place. All students are assigned an academic supervisor throughout their academic life. Each staff member counsels around 5-10 students in matters of study planning, research interest and other

academic activities, though they were examples that individual teachers faced a potential overload by coaching more students during the preparation of their thesis. Student Success is individually monitored, in case that the student is facing problems, additional support is offered. There is also the Gadjah Mada Medical Care Centre in place for all kinds of physical and psychological problems a student might face.

The peers gain an excellent impression of the manifold offers related to support and assistance of the students at the faculty. The students confirm that the teaching staff is always available to answer any question or deal with queries they might have. In summary, the peers gained the impression of a close relation between teaching staff and students creating a harmonious environment for teaching and learning.

Final assessment of the peers after the comment of the Higher Education Institution regarding criterion 2:

The peers thank UGM for clarifying that the professional veterinary program consists of six rotations, each one lasting about 8 weeks. In these clinical rotations, students are introduced to the practical work as a veterinarian. In its feedback UGM points out that based on curriculum evaluation and feedback from stakeholders, as well as the regulation of the Rector, it is planned to give more room to the rotation in the management of hospital (1 week) followed by industrial training (1 week) worth two credits . With these changes students will acquire 40 credits in the professional program (the Ministry of Education allows a maximum of 42 credits). UGM is convinced that the workload is adequate and students are not overloaded. The peers acknowledge this point of view but stress, that all parts of the curriculum must be credited according to the actual workload.

The peers appreciate that UGM will try to increase the academic mobility and to conduct more collaborations with international universities. They also support the plans to increase the practical work in the Forestry program for example by organising more field trips.

The peers agree that determining the workload is especially challenging for the research project. They expect UGM to develop a more effective system to evaluate the workload and the progress of thesis/research.

The peers consider criterion 2 to be mostly fulfilled

3. Exams: System, concept and organization

Criterion 3 Exams: System, concept and organization

Evidence:

- Self-Assessment Report
- Thesis Regulation
- Rector Decree NOMOR 1666/UN1.p.r/SK/HUKOR/2016.
- On-Site Discussions

Preliminary assessment and analysis of the peers:

The assessments at UGM follow university wide regulations: exams are prepared by the respective lecturer/group of lecturers for each course and entail a variety of different forms including written and oral examinations, though the emphases is mostly on written examinations. During the discussions, interviewed staff point out that in a considerable number of courses, students are engaged in group or individual projects that have to be presented in front of the class during the semester. Although this is considered positive by the peers a stronger focus on at least some oral exams instead of written ones is considered beneficial to assess not only the students' knowledge but also their intellectual skills and competences. Especially with reference to soft and communication skills of the students such a move would contribute to further improvement and also foster critical thinking skills, an area in which the experts see room for improvement. It could also be envisaged in the future, to have an oral exam in English

As to the organization of the exams, it is the Directorate of Education at the central level which arranges the schedule for all examinations in all education units of UGM, using a mid-term and a final examination period each semester. Information about the examination form and date is provided at the outset of the semester and during the interviews, the experts learn that students generally are well informed about exams and their regulations in general.

The assessment results are uniformly expressed using the letters A (competence is 80% or above) to E (competence is below 50%) and follows University regulation (Rector Decree NOMOR 1666/UN1.p.r/SK/HUKOR/2016). The mark T (incomplete) is given in cases where students do not fully meet the assessment criteria or do not complete all tasks. If within a month a student cannot make up for the deficiency, the mark T is changed to an E. In the MFS completes the MFS program, if he has passed the thesis seminar as well as the examination. Both together are worth 12 SKS credits. In the Veterinary Study program, there is also a requirement to engage in a final project/a thesis as students enter the 7th semester.

Students' achievements are generally expressed in Grade Point Averages. The experts note that in recent years there has been an "inflation of grades" especially in the Master of Forestry program, with the GPA´s now being at a staggering 3,7 (out of 4) or more in the past three years. The recommend to review the grading scheme and to use external examiners as corrective mode.

Overall - with the noted exceptions - the experts reach the conclusion that all relevant examination regulations are in place and well communicated in a transparent way. The forms of exams are mostly oriented toward the envisaged learning outcomes of the respective courses and the workload is distributed in an acceptable way. They encourage the faculties to address the topic of critical thinking skills as well as grade inflation.

Final assessment of the peers after the comment of the Higher Education Institution regarding criterion 3:

The peers appreciate that in the Forestry program there will be an oral exam in English in the future and the grading scheme will be reviewed in order to prevent the inflation of grades. In addition, the Department of Forestry plans to invite external experts to take part in thesis examination.

The peers consider criterion 3 to be mostly fulfilled

4. Resources

Criterion 4.1 Staff

Evidence:

- Self-Assessment Report
- htts://psik.fkt.ugm.ac.id/s2
- https://acadstaff.ugm.ac.id
- https:/sdm.ugm.ac.id/departments/
- https://fkh.ugm.ac.id/2018/10/13/965

Preliminary assessment and analysis of the peers:

The Master in Forestry Science is supported by altogether 60 academic staff, which all are Ph.D. holders with their education received from a wide variety of international universities. In addition there are 10 non-academic, supporting staff. The profile of the full faculty members and their area of expertise are described in the Academic Guide Book, the staff handbook and on the website of MFS (htts://psik.fkt.ugm.ac.id/s2) as well as the UGM academic staff website (https://acadstaff.ugm.ac.id/). All faculty members are engaged in education, research and community services. The student-staff ratio in the eyes of the experts is favourable and has recently dropped from 14:1 to 13.1.

As regards the faculty of Veterinary Sciences and the integrated Veterinary Medicine Study Program (VMSP) and Veterinary Profession Study Program (VPESP) it currently employs 84

lectures, most of whom are also holding their PhD from universities abroad. In relation to a study body of currently a little more than 1200 student, the student-staff ratio amounts to 1:14.

Both student-teacher ratios are evaluated periodically and if needed, new lectures are recruited based on the university standard provisions related to lecturer recruitment.

During the discussions on site, the peers entertain in intensive discussions with a representative sample of staff members from both programs under review and agree that the academic quality is adequate to reach the program learning objectives. They nevertheless also voice their concern that almost all of the teaching staff emanate from UGM itself. There is practically no possibility for an engagement of outside teachers (apart from the only randomly used instrument of short-term visiting lectures). It is therefore recommended hiring foreign teaching staff with an international profile to further stimulate teaching and research at UGM and to promote the goal of internationalization

Criterion 4.2 Staff development

Evidence:

- Self-Assessment Report
- On-Site Discussions

Preliminary assessment and analysis of the peers:
From the discussion with the teaching staff, the peers learn that Gadjah Mada University has put an emphasis during the past years on the professional training and development of its staff members. As was already pointed out, there is a variety of support measures in place to support young researchers in completing their PhD degrees at foreign universities. Similarly, the University offers a number of incentives that in sum can make up to the double of the usual salary rewarding teaching staff for publications outstanding evaluation results, or participation in didactical schooling. No incentive system is however in place for the area of teaching.

The performance and development of staff from both faculties are evaluated periodically by assessment systems involving Lecturer Performance Load (BKD) and Performance Report (LKD). Almost 40 academic staffs of MFS have conducted staff mobility programs to various countries for research collaboration, visiting professors and international conferences. As to the VMSP and VPESP programs, the Veterinary Medicine Faculty is also encouraging promising Master students to continue their education in reputable higher education institutions nationally and internationally. Currently, the faculty reports that nine of its lecturers are enrolled in an IELTS course to improve their English language capabilities and another 15 lecturer are receiving further training to improved their teaching skills. The

peers learn that there is also the possibility to take a sabbatical leave, which is funded by the national government. The restriction in this case is the fact that the full funding is only awarded to professors, not to the regular teaching staff.

In conclusion, the peers are convinced that the development offers for staff members are mostly adequate and contribute to a constant improvement of the learning and teaching environment.

Criterion 4.3 Funds and equipment

Evidence:

- Self-Assessment Report
- Annual Work Plan and Budget
- On-Site Visit

Preliminary assessment and analysis of the peers:
The academic activities of the Faculty of Forest Science and the Veterinary Medicine Faculty are supported by various sources, including tuition fees, government funding and so-called society funds with the biggest (but diminishing) percentage coming from government sources. The faculties of UGM annually prepare an "Annual work plan and Budget (RKAT) five months before the start of the financial year that contains planned income and expenditure. The budgets are prepared bottom up, involving academic staff via their departments and supporting units. The RKAT is then approved by the faculty senate before being approved by the UG Board of Trustees.

The experts learn that there is a very limited autonomy of universities to take control of their own financial affairs in the Indonesian system of higher education (e.g. absence of mid- and long-term budget plans). The peers find limited very limited though much needed capacity to develop into entrepreneurial faculties.

Concerning the ICT equipment, the peers learn find the existing Information Systems for different functions such as Accounting, Human Resources, Academic Information, Building Systems and Space, Student Information, Electronic Learning for the Academic Community and Management Alumni Potential to be adequate.

As regards **the facilities on which the Faculty of Forestry can rely** for teaching and research, they include the following laboratories:

the laboratories in Silviculture and Agroforestry, Tree Breeding, Physiology and Forest Soil, Forest Health and Protection, Forest Ecology, Nature Tourism, Watershed Management, Nature Conservation, Wildlife Management, Computer and Biometric, Forest Harvesting, Forest Spatial Information System and Mapping, Forest Planning and Development, Forest

Social and Economic, Wood Formation and Quality Improvement, Chemical Conversion of Biomaterial, Biomaterial engineering, Intensive Silviculture and the Wanagama Education Forest. In addition, the faculty disposes of Greenhouses, and integrated Laboratory for wood utilisation, a multimedia room as well as an Arboretum.

The **Veterinary Medicine Faculty** is equipped with the following facilities: the laboratories in Gross Anatomy, Histology and Embryology, Biochemistry, Physiology, Pharmacology, Clinical Pathology, Parasitology, Microbiology, Pathology, Epidemiology, Veterinary Public Health, Obstetric, Reproductive Technology, Internal Medicine, Surgery and Radiology, Animal Model and Information Technology. Each laboratory has a minimum of two supporting staff to maintain the laboratory equipment and assist in research activities. In addition, there is the Animal Hospital named after Professor Soeparwi to support student learning and staff/student research activities. Apart from these educational purposes, the clinic also offers public services for animal owners. Among the facilities figure also the Education and Training Unit of Animal Health with cattle and other animal pens as well as the Animal Practical Laboratory, the Agro Technology Innovation Centre in a distance of 8km away from the main campus, incorporating a Chicken Slaughter House.

During the on-site visit, the peers thoroughly inspect the research and teaching facilities of both faculties. The visitation of the laboratories reveals the following findings:

While all facilities provide adequate space for teaching with sufficient work places, the experts find the available facilities and equipment partly not matching international standards. Especially in the microbiological laboratories, modern technology is rare. This technology is essential for competitive research, but also for teaching modern methodologies. In some parts, i.e. the Department of Anatomy, the equipment and facilities are below the standard of occupational safety (general hygiene, ventilating system). In the Forestry Faculty there is a high number of highly specialised laboratories to perform research in forest and wood sciences. Whereas some labs were sufficiently equipped (like the labs for silviculture or for wood products) investments are needed in the sawmill, which is not on the today's state of the technology. Furthermore, it must be paid more attention to the safety equipment for the students and staff employed at the labs.

A final aspect which the peers take note of is the not always adequate barrier-free access to the facilities of the university. According to the teaching staff in the older buildings barrier-free access is not always ensured. The peers understand that this situation cannot be changed immediately and they approve of the fact that the programme coordinators are aware of the situation; thus, in future it should be made certain that the barrier-free access for all stakeholder with physical restrictions is ensured when buildings are constructed or renovated.

Final assessment of the peers after the comment of the Higher Education Institution regarding criterion 4:

The peers see that only two staff members of the veterinary program come from outside UGM but 36 teachers have acquired their Master's or PhD at an international university. The peers support the further internationalization of UGM and recommend inviting more international guest lecturers, sending staff members more frequently abroad, and hiring new teachers from all over Indonesia.

UGM agrees that the Department of Microbiology has faced some shortages and drawbacks, particularly in laboratory facilities and equipment. For this reason, the peers insist that the facilities have to be upgraded and the technical equipment needs to be updated.

The peers acknowledge that students in the veterinary program learn about healthy as well as about ill animals of various domestic and foreign species. In addition, there is the Animal Hospital "Prof. Soeparwi" that treats animals such as cats, dogs, birds, rabbits, but also wild animals such as snakes and turtles. All professional students are involved in various activities at the Animal Hospital like surgery, medical examination, sample examinations, treatment of patients, and other services. The students learn essential practical skills in doing anamnesis, keeping medical record, writing prescriptions, and communicating with clients.

The peers support the plans of the Department of Forestry to invite more foreign lecturers and to establish academic cooperations with international universities, e.g. from Japan. In addition, the Department intends to establish an incentive system for the area of teaching, such as providing funds for updating teaching materials and by designing open online courses.

The peers thank the Department of Forestry for clarifying that the sawmill machines, especially the primary bandsaw machine with the log carriage, have not been operated for practical and other purposes for more than ten years. For practical purposes, students are taken to a sawmill factory. The Department will try to obtain new sawmilling machines within the next 5 years. As primary priority, the Department is constructing a new building "Integrated Forest Farming Center" including new laboratory facilities. The peers understand these priorities and accept that the sawmill will be updated after finishing the construction of the new building.

The peers consider criterion 4 to be mostly fulfilled.

5. Transparency and documentation

Criterion 5.1 Module descriptions

Evidence:

- Academic Guide Books for MFS as well as VMSP and VPESP
- Websites of FoF and FVM
- On-Site Discussions

Preliminary assessment and analysis of the peers:
The Master of Forestry Science Programs as well as the Veterinary Medicine Study Program (VMSP) and Veterinary Profession Education Study Program (VPESP) are composed of a sequence of courses that cover all compulsory and elective courses (for the VPESP program all subjects are compulsory). These modules are compiled in so-called Academic Guide Books (AGB), which are put on the faculties' web page and in addition are distributed to first year students in a printed version as a rule. As regards the module handbook for the integrated doctoral program in veterinary sciences, the experts appreciate that full information about the courses, contents, learning outcomes and recommended literature is given.

The experts identify a problem with the module descriptions of the **Master in Forestry Science** which are not in line with expectations (no clear learning outcomes formulated in modules, essential information missing) and require that the handbook is revised following good practise otherwise identified in UGM.

Criterion 5.2 Diploma and Diploma Supplement

Evidence:

- Diploma Supplement
- Transcript of Records

Preliminary assessment and analysis of the peers:
At UGM, all graduates are receiving a Diploma Supplement in Indonesian and English language along with an official transcript of records attached and in accordance with the policies of the Directorate of Students Affairs. The Diploma Supplement gives all required information about the degree programs under review, the qualifications obtained, the course structure as well as the individual study performance, the relative grade of the student in the cohort and an overview over the Indonesian system of higher education.

Criterion 5.3 Relevant rules

Evidence:

- Self-Assessment Report

- On-Site Discussions

Preliminary assessment and analysis of the peers:
During the course of the audit and on the base of the material provided, the experts have no doubt, that GMU and the faculties for forestry as well as for veterinary medicine dispose of a policy for having transparent and open rules and regulations. All required rules and regulations are made accessible to all stakeholder, most importantly students, at any time online.

The discussions with the students confirm that they feel well informed and are comfortable about the access to information regarding their degree programmes.

Final assessment of the peers after the comment of the Higher Education Institution regarding criterion 5:

The peers emphasise that in the Forestry program the module descriptions need to be improved in order to include information about the content, qualification objectives, teaching formats, admission requirements, usability, conditions for the award of credits, ECTS credits and grades, frequency of offer, workload and duration of each module

The peers consider criterion 5 to be mostly fulfilled.

6. Quality management: quality assessment and development

Criterion 6 Quality management: quality assessment and development

Evidence:

- Self-Assessment Report
- Tracer Studies (http://tracer.simaster.ugm.ac.id);
- http://www.kerjasamadanalumni/tracerstudy.
- http://adademik.s2

Preliminary assessment and analysis of the peers:
UGM and the Faculties in Forestry Science (MFS) and Veterinary Medicine (FVM) have established a thorough system of internal and external quality assurance over a considerable period of time. It entertains a comprehensive mix of internal and external QA instruments and review procedures.

Externally, the faculties and their programs have passed the periodic review by the national Indonesian Quality Assurance Agency (BAN-PT) in the framework of which UGM and its two faculties have scored with the excellence grade A. In addition, VMSP and VPESP have been evaluated by the Asian University Network (AUN) and also undergone an ISO 9001 certification procedure for their academic service management systems. Finally, the ASIIN international accreditation procedures is complementing the external monitoring scheme.

Internally, there is an extensive system of internal quality assurance in place, operating on the level of Quality Assurance office at university level (Kantor Jaminan Mutu) as well as on the faculty level (Unit Jaminan Mutu). Based on the UGM QA cycle, both faculties on an annual basis are required to conduct a systematic self-evaluation of their programs through an online system. The internal quality audit experiences a follow-up procedure by review meetings of the top management in order to define remedial actions to overcome the problems identified in these AMI (Audit Mutu Internal) findings.

The curricula of both programs are regularly reviewed regarding the attainment of intended learning objectives and outcomes. The results are discussed twice a year in the team semester meetings (TKS) after the end of each semester. Also, the quality of the master theses is evaluated and the feedback of the employers compiled. As a standard practice, every course is evaluated each semester by the students and assessed by a central audit committee. The findings are communicated to the respective teacher and measures are taken if the evaluation results are below average. The teacher then will inform the class of the following semester about major findings and actions taken, thus outlining what consequences will be drawn from the assessment. The students who filled out the questionnaire however do not receive any notification about their input. In this sense the quality loop in the eyes of the experts is not entirely closed. This impression is reinforced during the discussions with students who express the general desire to receive more information about their suggestions and criticism. Students tend to view the entire procedure rather as a compulsory formality necessary (to be followed in order to get access to their grades) but not as an active contribution to the further development of the quality of teaching and learning. The peers agree with this assessment and recommend closing the feedback loops accordingly.

UGM and its faculties also have formal tracer studies in place, distributed through alumni meetings (such as Gamavet – the Gadjah Mata Veterinary) giving further insights into the satisfaction of graduates with their educational experience and their preparation for a successful professional career. Questionnaires are also distributed to graduates regularly once a year. In these exit interviews, the focus is on the three areas of interest, namely the quality of the academic atmosphere, the contribution of UGM education on learning and development of skills and student satisfaction on services and facilities.

Overall, there is a continuous Learning assessment (MFLC – Monitoring and Evaluation System) in place. In this context student´s progress, retention rates and standard period of study as well as the students satisfaction rate are regularly analysed and their research activities analysed.

The experts in summary commend the two faculties and the program coordinators of the two programs under review for their efforts in terms of external and internal QA. They believe that a considerable effort is directed toward the continuous quality improvement of both educational offerings. From the discussions with all stakeholders, the peers gain the impression that at GMU a thorough quality management system has been established including feedback from several stakeholder groups. As mentioned above student´s involvement in improving teaching and research in both programs under review should be further strengthened.

Final assessment of the peers after the comment of the Higher Education Institution regarding criterion 6:

The peers appreciate that UGM will give students a feedback on the results of the course evaluations. They expect UGM to submit substantial evidence in the further course of the procedure.

The peers consider criterion 6 to be mostly fulfilled.

D Additional Documents

- none

E Comment of the Higher Education Institution (04.03.2019)

UGM provides a detailed statement.

F Summary: Peer recommendations (12.03.2019)

Taking into account the additional information and the comments given by UGM, the peers summarise their analysis and **final assessment** for the award of the seals as follows:

Degree Programme	ASIIN seal	Subject-specific Label	Maximum duration of accreditation
Ma Forestry Science	With requirements for one year	/	30.09.2024
Veterinary Medicine	With requirements for one year	/	30.09.2024

Requirements

For all degree programs

A 1. (ASIIN 4.3) Improve the safety standards in the laboratories.

A 2. (ASIIN 6) Ensure that the students get a feedback about the results of the course evaluations.

For the Master's degree program Forestry Sciences

A 3. (ASIIN 5.1) Rewrite the module descriptions so as to include information about the content, qualification objectives, teaching formats, admission requirements, usability, conditions for the award of credits, ECTS credits and grades, frequency of offer, workload and duration of each module.

For the Veterinary program

A 4. (ASIIN 4.3) Technical equipment and instruments in the Departments of Microbiology and Anatomy need to be upgraded and increased in numbers.

A 5. (ASIIN 2.1) Make sure that all compulsory courses are credited and that the actual workload fits the awarded credits.

Recommendations

For all degree programmes

E 1. (ASIIN 4.3) It is recommended to provide barrier-free access to all buildings.

E 2. (ASIIN 4.2) It is recommended to introduce an incentive system for good teaching.

E 3. (ASIIN 4.1) It is recommended to hire more staff members from outside UGM and to send more teachers abroad in order to further promote the internationalisation at UGM.

E 4. (ASIIN 2.2) It is recommended to conduct a comprehensive students' workload survey.

For the Master's degree program Forestry Science

E 5. (ASIIN 2.1) It is recommended to give students more opportunities to gain practical experience.

E 6. (ASIIN 3) It is recommended to review the grading scheme and to use external examiners as corrective mode.

G Comment of the Technical Committees

Technical Committee 08- Agriculture, Nutritional Sciences and Landscape Architecture (18.03.2019)

Assessment and analysis for the award of the ASIIN seal:

The Technical Committee discusses the procedure and largely agrees with the assessment and recommended resolution of the peers. It stresses that it needs to be plausibly evidenced that the labs and lab equipment of the Departments of Microbiology and Anatomy have been upgraded and increased or at least that significant and meaningful steps to this end have been taken (see requirement 5). Furthermore, the Technical Committee suggests monitoring the student workload *on a regular basis* instead of providing for a single survey in order to contribute to a reliable and continuous quality assurance (see recommendation 4). For the rest, the Technical Committee fully agrees with the recommended resolution of the peers.

The Technical Committee 08 – Agriculture, Nutritional Sciences and Landscape Architecture recommends the award of the seals as follows:

Degree Programme	ASIIN-seal	Subject-specific label	Maximum duration of accreditation
Ma Forestry Science	With requirements for one year	/	30.09.2024
Veterinary Medicine	With requirements for one year	/	30.09.2024

Recommendations

For all degree programmes

E 4. (ASIIN 2.2) It is recommended to conduct a comprehensive students' workload survey on a regular basis.

Technical Committee 10- Life Sciences (08.03.2019)

Assessment and analysis for the award of the ASIIN seal:

This is the first procedure carried out by ASIIN in the field of veterinary medicine. However, experienced experts have been recruited who have already participated in accreditation procedures in this field with other agencies. Meanwhile the complete statement of the

university is available and the auditors have agreed to the report including the proposed conditions and recommendations. The Technical Committee therefore agrees with the report and the proposed conditions and recommendations.

The Technical Committee 10 – Life Sciences recommends the award of the seals as follows:

Degree Programme	ASIIN-seal	Subject-specific label	Maximum duration of accreditation
Ma Forestry Science	With requirements for one year	/	30.09.2024
Veterinary Medicine	With requirements for one year	/	30.09.2024

H Decision of the Accreditation Commission (29.03.2019)

Assessment and analysis for the award of the subject-specific ASIIN seal:

The Accreditation Commission endorses the requirements and recommendations as presented by the peers. The only thing they change is that they do not issue a recommendation with respect to the barrier free access to all buildings because this request is not covered by the ASIIN criteria.

The Accreditation Commission for Degree Programmes decides to award the following seals:

Degree Programme	ASIIN-seal	Subject-specific label	Maximum duration of accreditation
Ma Forestry Science	With requirements for one year	/	30.09.2024
Veterinary Medicine	With requirements for one year	/	30.09.2024

Requirements

For all degree programs

A 1. (ASIIN 4.3) Improve the safety standards in the laboratories.

A 2. (ASIIN 6) Ensure that the students get a feedback about the results of the course evaluations.

For the Master's degree programme Forestry Science

A 3. (ASIIN 5.1) Rewrite the module descriptions so as to include information about the content, qualification objectives, teaching formats, admission requirements, usability, conditions for the award of credits, ECTS credits and grades, frequency of offer, workload and duration of each module.

For the Veterinary programme

A 4. (ASIIN 4.3) Technical equipment and instruments in the Departments of Microbiology and Anatomy need to be upgraded and increased in numbers.

A 5. (ASIIN 2.1) Make sure that all compulsory courses are credited and that the actual workload fits the awarded credits.

Recommendations

For all degree programmes

E 1. (ASIIN 4.2) It is recommended to introduce an incentive system for good teaching.

E 2. (ASIIN 4.1) It is recommended to hire more staff members from outside UGM and to send more teachers abroad in order to further promote the internationalisation at UGM.

E 3. (ASIIN 2.2) It is recommended to conduct a comprehensive students' workload survey on a regular basis.

For the Master's degree programme Forestry Science

E 4. (ASIIN 2.1) It is recommended to give students more opportunities to gain practical experience.

E 5. (ASIIN 3) It is recommended to review the grading scheme and to use external examiners as corrective mode.

I Fulfilment of Requirements (March 2020)

Comments of the peers and the Technical Committees (10.03.2020)

Requirements

For all degree programmes

A 1. (ASIIN 4.3) Improve the safety standards in the laboratories.

Initial Treatment	
Peers	fulfilled Justification: The safety standards in the labs have been improved. Several new safety instruments have been purchased and are now available in the labs. In addition, safety and health environment protocols and laboratories safety standard training for all lectures and technicians to refresh their knowledge and skill on assessing and minimizing the risk of hazard have been established.
TC 08	fulfilled Justification: The Technical Committee agrees with the peers' assessment.
TC 10	fulfilled Justification: The Technical Committee follows the peers' assessment.

A 2. (ASIIN 6) Ensure that the students get a feedback about the results of the course evaluations.

Initial Treatment	
Peers	fulfilled Justification: UGM has established a mechanism of course evaluation in the middle and in the end of semester. Students are asked to evaluate the class twice, i.e. at the last meetings before mid and final examinations. Afterwards, the lecturers will then give feedback as a response to the students.
TC 08	fulfilled Justification: The Technical Committee agrees with the peers' assessment.
TC 10	fulfilled Justification: The Technical Committee follows the peers' assessment.

For the Master's degree programme Forestry Science

A 3. (ASIIN 5.1) Rewrite the module descriptions so as to include information about the content, qualification objectives, teaching formats, admission requirements, usability, conditions for the award of credits, ECTS credits and grades, frequency of offer, workload and duration of each module.

Initial Treatment	
Peers	fulfilled Justification: UGM has updated the module description; they include all necessary information.
TC 08	fulfilled Justification: The Technical Committee agrees with the peers' assessment.

For the Veterinary programme

A 4. (ASIIN 4.3) Technical equipment and instruments in the Departments of Microbiology and Anatomy need to be upgraded and increased in numbers.

Initial Treatment	
Peers	fulfilled Justification: The Faculty of Veterinary Medicine has bought new laboratory equipment, which is needed for practical work and research. A detailed list was provided.
TC 10	fulfilled Justification: The Technical Committee follows the peers' assessment.

A 5. (ASIIN 2.1) Make sure that all compulsory courses are credited and that the actual workload fits the awarded credits.

Initial Treatment	
Peers	fulfilled Justification: The previously not credited Veterinary Hospital Management Course is now included in the professional programme of the veterinary curriculum with 2 credits. Evaluation of students' workload is carried out continuously. If there are complaints from students, both directly and through scheduled questionnaires adjustments will be discussed.
TC 10	fulfilled Justification: The Technical Committee follows the peers' assessment.

Decision of the Accreditation Commission (March 2020)

Degree programme	ASIIN-label	Subject-specific label	Accreditation until max.
Ma Forestry Science	All requirements fulfilled	/	30.09.2024
Veterinary Medicine	All requirements fulfilled	/	30.09.2024

Appendix: Programme Learning Outcomes and Curricula

According to the self-assessment report the following **objectives** and **learning outcomes (intended qualifications profile)** shall be achieved by the Master of Forestry Science program:

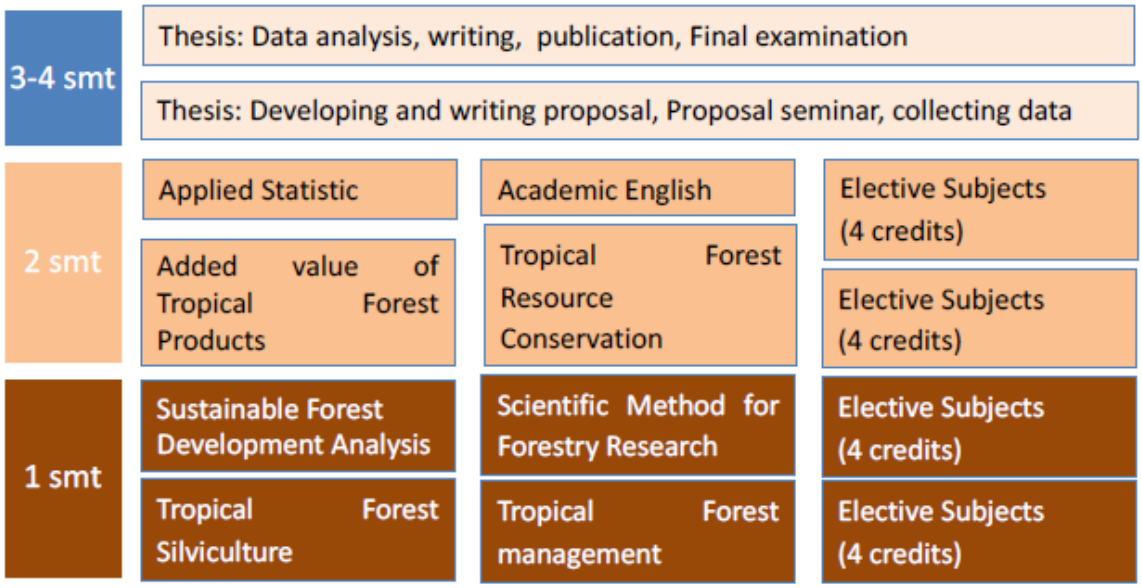
PLO No.	PEO No	Learning Outcome	SSC ASIIN TC 08
1.	2	Believe in God, able to show religiosity, humanity, integrity, morality, ethic and high academic achievement based on Pancasila (state ideology)	have differentiated and advanced knowledge of the legal provisions relevant for their professional field
			fulfil the requirements on graduates of Bachelor's degree programs with a view to key qualifications on the higher level of Master's degree programs
2.	2	Able to obey the rules, being discipline, work effectively in a team as well as independently, and have entrepreneurial spirit	have differentiated and advanced knowledge of the legal provisions relevant for their professional field
			have advanced knowledge of quality standards and quality processes as well as their management
			can work effectively as leaders of teams comprising different disciplines and levels
3.	1	Able to understand the theory, philosophy, and design of sustainable development of forest and natural resources, and to analyse the complexity of global issues.	have profound knowledge and understanding of their technical including engineering specialisation and the further scientific context
			have developed differentiated knowledge and critical awareness of the latest findings in their discipline
			are qualified to apply suitable methods to pursue investigations or detailed research as to technical-scientific issues in accordance with the status of their knowledge and understanding

PLO No.	PEO No	Learning Outcome	SSC ASIIN TC 08
			can define and conduct investigations using the means of analysing, modelling, and experimenting
			can combine theory and practice to achieve quality of structures, processes, and results
			have developed a comprehensive understanding of applicable theories, models, techniques, and methods and their limitations
4	1	Able to understand and criticise science, knowledge, technology and art of forestry based on ecosystem and landscape, covering silviculture, forest management, forest products technology and natural resource conservation	have profound knowledge and understanding of their technical including engineering specialisation and the further scientific context
			have developed differentiated knowledge and critical awareness of the latest findings in their discipline
			have advanced knowledge of quality standards and quality processes as well as their management
5	1	Able to understand and analyse comprehensively updated issues in the specific fields of silviculture, forest management, forest products technology or natural resource conservation	have profound knowledge and understanding of their technical including engineering specialisation and the further scientific context
			have developed differentiated knowledge and critical awareness of the latest findings in their discipline
			have advanced knowledge of quality standards and quality processes as well as their management
			are qualified to formulate and solve problems arising in new and developing

PLO No.	PEO No	Learning Outcome	SSC ASIIN TC 08
			fields of the area of their specialization
			are able to use their knowledge and understanding to develop solutions for unusual problems together with the integration of other disciplines
			are qualified to apply innovative methods to problem solving processes
6	1	Able to develop logical, critical, systematic, and creative thinking in conducting research in the area of forestry and environment	have profound knowledge and understanding of their technical including engineering specialisation and the further scientific context
			have developed differentiated knowledge and critical awareness of the latest findings in their discipline
7	1	Able to apply their knowledge and understanding in identifying problems, formulating research questions, developing appropriate plan and method, collecting and analysing data and synthesising and inferring the findings in forestry with multidisciplinary approaches that publishable on nationally accredited and/or international journal.	are qualified to formulate and solve problems arising in new and developing fields of the area of their specialization
			are able to use their knowledge and understanding to design scientific including engineering models, systems, strategies, and processes
			are qualified to plan, conduct, and evaluate field and laboratory experiments
			are qualified to apply suitable methods to pursue investigations or detailed research as to technical-scientific issues in accordance with the status of their knowledge and understanding
			are able to identify, locate, and procure required information

PLO No.	PEO No	Learning Outcome	SSC ASIIN TC 08
			can define and conduct investigations using the means of analysing, modelling, and experimenting
			are qualified to assess data critically and to draw conclusions
			are able to investigate the application of new emerging technologies in their scientific discipline
			are able to use their knowledge and understanding to develop solutions for unusual problems together with the integration of other disciplines
			are qualified to apply innovative methods to problem solving processes
8	2	Able to increase learning capacity independently and organise networking within broader research and professional communities.	can work effectively as leaders of teams comprising different disciplines and levels
			can work and communicate in national and international contexts

The following curriculum is presented:



According to the self-assessment report the following **objectives** and **learning outcomes (intended qualifications profile)** shall be achieved by the Veterinary Medicine program:

PEO	Domain	PLO of DVMPS (Code A 1-17)	PLO of VPESP (Code B 1-18)	SCC ASIIN (TC 10 and TC 8)
1	1	1. General value: Faith in God, Having morals, ethics and good behavior in completing their duties; Excellence in academics and professional life; Responsible for the social welfare; Able to implement, develop and also enrich the veterinary – animal science field; Maintain an Indonesian moral value; Able to work independently or in group, creative, innovative and having entrepreneurship skills; Highly motivated, open minded; Possess a high working spirit, dedication and high commitment	1. Having insight of veteriner ethic and comprehension towards the essence of profession vow and ethic code also baseline of veterinary profession;	• have relevant knowledge of safety and environmental issues as well as the associated legal fundamentals (TC 10) • have an awareness of possible social, ethical and environment-related effects of their actions (TC 10) • know and understand the principles of natural sciences, social science, mathematics,medical science, economics and engineering their discipline is based on (TC 8) • have acquired lifelong learning strategies (TC 10)
3 2	3 2	2. Mastering knowledge about basic concepts, principles and theories related to veterinary science. 3. Mastering skills in applying Science and Technology laboratory of biomedical	2. Having skills in doing: (a) clinical, laboratoric, patologic, and epidemiologic diagnosis of animal diseases; (b) Creating nutrition for medical health and disorder; (c) antemortem and	• have acquired sound fundamental biology-relevant knowledge of mathematics and the natural sciences (TC 10) • have sound knowledge of the

2 2	4 2	anatomy, histology, physiology, biochemical, embryology, reproduction, clinical pathology, pathology, microbiology, parasitology, immunology, pharmacology, toxicology, radiology and Veterinary Public Health. 4. Mastering skills in measuring physiological parameter and animal welfare. 5. Able to analyze the way drugs work and toxin.	postmortem examination; (d) pregnancy examination, handling of reproduction disorder and application of reproduction technology; (f) supervision and control of animal medicine quality and biological ingredients, including the usage and distribution; (g) assesment and supervision of animal welfare;	fundamentals of molecular, cell and organismic biology (TC 10) • have relevant knowledge of safety and environmental issues as well as the associated legal fundamentals (TC 10) • have a coherent knowledge in their discipline including knowledge of the latest findings in their dicipline (TC 8)
2	2	6. Able to do agent identifications that are; virus, bacteria, parasite, fungi and toxin, and cause determination of animal diseases.	3. Having skills in practicing *lege-artis* medical treatment;	• have gained methodological competence in bio sciences and are also able to apply this in other contexts (TC 10)
2	4	7. Mastering skills in doing agent identification, such as; virus, bacteria, parasite, fungi and toxin, and cause determination of animal diseases.	4. Having skills in handling some diseases in large animals, small animals, poultry, exotic animals, wildlife, aquatic animals and laboratory animals;	• know concepts of identification and safeguarding of quality in their respective fields of work (TC 8)
3	3	8. Mastering and understanding knowledge about zoonotical and non zoonotical animal diseases.	5. Having skills in handling some diseases of wildlife, exotic animals and management at the zoo.	• are able to carry out practical work in labs and outdoors independently as well as handle organisms (TC 10)
4	5	9. Responsible to own job and can be given responsibility for the work result	6. Having skills in control and prevention management of strategic and Zoonoses	

		achievement of biomedical laboratory, such as; anatomy, histology, physiology, biochemical, embryology, reproduction, clinical pathology, pathology, microbiology, parasitology, immunology, pharmacology, toxicology, radiology, and veterinary public health.	diseases, biosecurity-biosafety, also environment control; 7. Having skills in "therapeutic transaction", doing anamnese, medical record, informed consent of medical treatment, prescription writing, doctor's certificate, and client education; 8. Able to decide therapy appropriately, mastering traditional medicines, mastering animal medicine quality, mastering therapy side effects;	• are able to recognize and solve subject-relevant problems (TC 10) • have relevant knowledge of safety and environmental issues as well as the associated legal fundamentals (TC 10) • are able to solve life science problems and present the results (TC 10) • have acquired communication skills – also in a foreign language – and can communicate scientific information to experts and laypersons in a suitable manner (TC 10) • have trained conceptual, analytical and logical thinking (TC 10)
2 3	2 3	10. Able to compile formula and make animal food, compile formula and make veterinary clinical nutrition or clinical dietetic. 11. Mastering knowledge about animal food and compile veterinary clinical nutrition or clinical dietetic.	9. Having insight in actualizing food self-sufficiency;	• have gained sound knowledge in at least one special life science area of the degree programme (TC 10)
3	3	12. Mastering knowledge about national animal health system,	10. Having insight in the field of national animal health system and eterinary	• have relevant knowledge of safety and environmental issues as well as the

		veterinary legislation also authority limits of medical veterinary.	legislation;	associated legal fundamentals (TC 10) • have an awareness of possible social, ethical and environment-related effects of their actions (TC 10) • have acquired sound fundamental biology-relevant knowledge of mathematics and the natural sciences (TC 10) • have sound knowledge of the fundamentals of molecular, cell and organismic biology (TC 10)
2 2 2 5	4 4 4 5	13. Able to analyze epidemiology and veterinary economic also compiling animal diseases reporting. 14. Mastering skills in analyzing epidemiology and veterinary economic also compiling animal diseases reporting 15. Able to do risk analysis, veterinary economic analysis 16. Mastering skills in applying care management and health management in food-producing animals or livestocks, pets and companion animals, wildlifes and	11. Having skills in professional communication/ dialogue; 12. Having basic knowledge of risk analysis, veterinary economic analysis and entrepreneurship.	• have gained sound knowledge in at least one special life science area of the degree programme (TC 10) • have acquired communication skills – also in a foreign language – and can communicate scientific information to experts and laypersons in a suitable manner (TC 10) • have relevant knowledge of safety and environmental issues as well as the associated legal fundamentals (TC 10) • know and understand the principles of natural sciences, social science, mathematics,medical science,

		conservations, aquatic animals, and laboratory animals.	13. Able to do innovation in the field of medical veterinary aligned with improvement of biotechnology and genetic engineering; 14. Able to do research, handling biological safety of animal diseases, and environment control;	economics and engineering their discipline is based on (TC 8) • have an awareness of possible social, ethical and environment-related effects of their actions (TC 10) • are able to carry out practical work in labs and outdoors independently as well as handle organisms (TC 10)
2	4	17. Mastering skills doing scientific study by compiling research plan and report also forming scientific papers.	15. Well-communicate, able to cooperate in team; 16. Able to make research proposal, able to compile seminar materials, delivering in form of presentation and poster, writing according to rules of scientific journals;	• have acquired communication skills – also in a foreign language – and can communicate scientific information to experts and laypersons in a suitable manner (TC 10) • have acquired lifelong learning strategies (TC 10) • have acquired communication skills – also in a foreign language – and can communicate scientific information to experts and laypersons in a suitable manner (TC 10) • have a capacity for teamwork, also on an intercultural basis (TC 10)

			17. Able to process research data, do the data analysis, take summary and decision correctly; 18. Mastering leadership management aspect and doing it well;	• have trained conceptual, analytical and logical thinking (TC 10) • have acquired lifelong learning strategies (TC 10)

The following curriculum is presented.