Federal State Autonomous Educational Institution of Higher Education
PEOPLES' FRIENDSHIP UNIVERSITY OF RUSSIA
RUDN University

Agrarian and Technological Institute

educational division (faculty/institute/academy) as higher education programme developer

COURSE SYLLABUS

Veterinary ophthalmology

course title

Recommended by the Didactic Council for the Education Field of:

36.05.01 Veterinary

field of studies / speciality code and title

The course instruction is implemented within the professional education programme of higher education:

36.05.01 Veterinary

higher education programme profile/specialisation title

1. COURSE GOAL(s)

The aim of mastering the course "**Veterinary Ophthalmology**" is for students to master theoretical knowledge, practical skills and skills in the diagnosis, prevention and treatment of pathology of the visual analyzer, using knowledge of the basics of biomedical and clinical courses, taking into account the laws of the course of pathology of organs and body systems as a whole, to analyze the patterns of functioning of organs and systems in ophthalmic diseases and pathological processes.

2. REQUIREMENTS FOR LEARNING OUTCOMES

The implementation of the course "**Veterinary Ophthalmology**" is aimed at creating the following competencies (parts of competencies) for students:

Table 2.1. List of competencies formed by students during the development of the course (results of the development of the course)

Competence code	**Competence descriptor**	**Competence formation indicators** (within this course)
PC-3	Ability to plan measures for differential diagnosis of diseases in a patient.	PC-3.1 Systematizes information about a patient's symptoms/syndromes, forms a set of preliminary diagnoses for further confirmation or refutation.
		PC-3.2 Uses a ready-made or creates a unique algorithm for differential diagnosis, taking into account the capabilities of the treatment facility.
		PC-3.3 Uses the information obtained as a result of diagnostic measures to make a final diagnosis(s) and to correct the diagnoses if necessary.
PC-5	Ability and readiness to plan and conduct necessary instrumental diagnostics of the patient's condition	PC-5.2 Selects the necessary and sufficient set of instrumental diagnostic methods to solve the problem.
		PC-5.3 He is able to conduct instrumental diagnosis of diseases in animals.
		PC-5.4 Interprets the results of the diagnosis and uses them to solve the problem.
PC-9	Ability to use methods of operative surgery in the prevention, diagnosis and treatment of animal diseases.	PC-9.1 Selects the necessary method of surgical intervention, including methods of anesthesia if necessary.

3. COURSE IN HIGHER EDUCATION PROGRAMME STRUCTURE

The course "**Veterinary Ophthalmology**" belongs to the part formed by the participants of educational relations of the block B1 of the Educational Program of Higher Education.

As part of the Educational Program of Higher Education, students also master other courses and /or practices that contribute to achieving the planned results of mastering the course "**Veterinary Ophthalmology**".

Table 3.1. List of Higher Education Program components courses that contribute to expected learning outcomes

Competence code	**Competence descriptor**	**Previous courses/modules, internships***	**Subsequent courses/modules, internships***
PC-3	Ability to plan measures for differential diagnosis of diseases in a patient.	Obstetrics, gynecology and andrology Internal diseases General surgery Private Veterinary Surgery Parasitology and invasive diseases Anesthesiology, resuscitation and intensive care Dermatology Cardiology Endocrinology Nephrology Reconstructive surgery	Animal Dentistry Clinical internship Industrial practice Academic research practice with the preparation of a scientific qualification project Preparation for and passing the state exam
PC-5	Ability and readiness to plan and conduct necessary instrumental diagnostics of the patient's condition	Animal anatomy Instrumental diagnostic methods Anesthesiology, resuscitation and intensive care Dermatology Cardiology Endocrinology Nephrology Reconstructive surgery	Animal Dentistry Clinical internship Industrial practice Academic research practice with the preparation of a scientific qualification project Preparation for and passing the state exam
PC-9	Ability to use methods of operative surgery in the prevention, diagnosis and treatment of animal diseases.	Operative surgery with topographic anatomy Anesthesiology, resuscitation and intensive care Reconstructive surgery	Animal Dentistry Clinical internship Industrial practice Academic research practice with the preparation of a scientific

			qualification project Preparation for and passing the state exam

4. COURSE WORKLOAD AND TRAINING ACTIVITIES

Course workload of the course "**Veterinary Ophthalmology**" is 2 credits.

*Table 4.1. Types of academic activities during the period of the HE program mastering for **full-time** study*

Types of academic activities		**HOURS**	**Semesters**			
			9	**-**	**-**	**-**
Contact academic hours		51	51	-	-	-
including						
Lectures		17	17	-	-	-
Lab work		34	34	-	-	-
Seminars (workshops/tutorials)		-	-	-	-	-
Self-study		13	13	-	-	-
Evaluation and assessment (exam/pass/fail grading)		8	8	-	-	-
Course workload	**72**	**72**	**72**	**-**	**-**	**-**
	2	**2**	**2**	**-**	-	-

5. COURSE CONTENTS

Table 5.1 Content of the course (module) by type of academic work

Modules	**Content of the modules (topics)**	**Types of academic activities**
Module 1. General concepts and methods of operative surgery.	Topic 1.1 General concepts of operative surgery, (surgical clinic, surgical manipulations, surgical operation).	Lectures, Lab work.
	Topic 1.2 Fixation of animals, anesthesia, local anesthesia.	Lectures, Lab work.
	Topic 1.3 Surgical instruments.	Lectures, Lab work.
	Topic 1.4 Methods of asepsis and antiseptics in operative surgery.	Lectures, Lab work.
	Topic 1.5. Separation of tissues. Bleeding, types, methods of stopping.	Lectures, Lab work.
	Topic 1.6. General principles of surgical suture application.	Lectures, Lab work.
	Topic 1.7. Desmurgy.	Lectures, Lab work.
Module 2. Methods and features of surgical	Topic 2.1. Operational access.	Lectures, Lab work.

operations.	Topic 2.2. Operational techniques, types, methods, features.	Lectures, Lab work.
	Topic 2.3. Features of oncological operations. Principles of ablasty.	Lectures, Lab work.
	Topic 2.4. Connection of soft tissues. The final stage of the operation.	Lectures, Lab work.
	Topic 2.5. The connection of dense fabrics. Osteosynthesis.	Lectures, Lab work.

6. COURSE EQUIPMENT AND TECHNOLOGY SUPPORT REQUIREMENTS

Table 6.1. Material and technical support of the course

Classroom for Academic Activity Type	***Equipping the classroom***	**Specialized educational/laboratory equipment, software and materials for the development of the course** (if necessary)
Lecture	An auditorium for conducting lecture-type classes, equipped with a set of specialized furniture; a board (screen) and technical means of multimedia presentations.	- *Ophthalmological instruments.*
Laboratory	An auditorium for laboratory work, individual consultations, routine monitoring and interim certification, equipped with a set of specialized furniture and equipment.	- *Ophthalmological instruments.*
Self-studies	An auditorium for independent work of students (can be used for seminars and consultations), equipped with a set of specialized furniture and computers with access to an electronic information and educational environment.	-

7. RESOURCES RECOMMENDED FOR COURSE STUDIES

Main readings:

1. Shakurov M.Sh. Fundamentals of general veterinary surgery [Electronic resource] : Textbook / M.Sh. Shakurov. - 2nd ed., erased. - St. Petersburg : Publishing House "Lan", 2016. - 252 p. http://lib.rudn.ru/MegaPro/UserEntry?Action=Rudn_FindDoc&id=465067&idb=0
2. Petrakov K.A. Salenko P.T. Paninsky S.M. Operative surgery with animal anatomy. -2nd ed. - Moscow: KolosS, 2013. - 453 p.
3. Semenov B. S., Videnin V. N., Nechaev A. Yu., Kuznetsova T. S., Guseva V. A. Operative surgery in animals 2021.-704 p. https://e.lanbook.com/book/162365

Additional Readings:

1. Videnin V.N. Surgical treatment of abdominal wall defects in animals [Electronic resource] : Textbook / V.N. Videnin, B.S. Semenov. - St. Petersburg : Publishing house "Lan", 2015. - 224 p. http://lib.rudn.ru/MegaPro/UserEntry?Action=Rudn_FindDoc&id=465109&idb=0
2. Local anesthesia and methods of novocaine therapy of animals [Electronic resource] : Educational and methodical manual / A.F. Sapozhnikov [et al.]. - St. Petersburg : Publishing House "Lan", 2011. - 176 p. http://lib.rudn.ru/MegaPro/UserEntry?Action=Rudn_FindDoc&id=465268&idb=0
3. Semenov B.S. Practicum on operative surgery with the basics of topographic anatomy of domestic animals [Electronic resource] / B.S. Semenov, V.A. Ermolaev, S.V. Timofeev. - M. : KolosS, 2013. - 263 p. http://lib.rudn.ru/MegaPro/UserEntry?Action=Rudn_FindDoc&id=475874&idb=0

Internet sources

1. Electronic libraries (EL) of RUDN University and other institutions, to which university students have access on the basis of concluded agreements:

- RUDN Electronic Library System (RUDN ELS) http://lib.rudn.ru/MegaPro/Web
- EL "University Library Online" http://www.biblioclub.ru
- EL "Yurayt" http://www.biblio-online.ru
- EL "Student Consultant" www.studentlibrary.ru
- EL "Lan" http://e.lanbook.com/
- EL "Trinity Bridge"

2.*Databases and search engines:*

- electronic foundation of legal and normative-technical documentation http://docs.cntd.ru/
- Yandex search engine https:// www.yandex.ru/
- Google search engine https://www.google.ru/
- Scopus abstract database http://www.elsevierscience.ru/products/scopus/

Educational and methodological materials for independent work of students during the development of the course/ module*:

1. A course of lectures on the course "**Veterinary Ophthalmology**".
2. Laboratory workshop on the course "**Veterinary Ophthalmology**".

* - The training toolkit and guidelines for the internship are placed on the internship page in the university telecommunication training and information system under the set procedure.

8. ASSESSMENT TOOLKIT AND GRADING SYSTEM* FOR EVALUATION OF STUDENTS' COMPETENCES LEVEL AS COURSE RESULTS

The assessment toolkit and the grading system* to evaluate the level of competences (competences in part) formation as the course results are specified in the Appendix to the course syllabus.

* The assessment toolkit and the grading system are formed on the basis of the requirements of the relevant local normative act of RUDN University (regulations / order).

DEVELOPER:

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