SELF EVALUATION REPORT 2020

for the
European Association of Establishments
for Veterinary Education (EAEVE)

Full Visitation 21-25 September 2020

BILA TSERKVA NATIONAL AGRARIAN UNIVERSITY
FACULTY OF VETERINARY MEDICINE

Bila Tserkva
2020

Content

INTRODUCTION

A brief history of the Faculty of Veterinary Medicine and previous ESEVT visits. The Faculty of Veterinary Medicine (FVM of BTNAU) was founded in 1931 as part of the Bila Tserkva Agricultural Institute (1920), which since 2007 has the fourth (highest) level of national accreditation - Bila Tserkva National Agrarian University (BTNAU) and is subordinated to the Ministry of Education and Science of Ukraine (MES).

BTNAU enrolls 6,420 students in various educational programs and forms of education at six faculties: veterinary medicine, agrobiotechnology, biotechnology, ecology, economics, law and linguistics. In addition, BTNAU includes the only in Ukraine Institute of Postgraduate Training of Veterinary Medicine Managers and Specialists, which has its own infrastructure and staff. The postgraduate study program and the number of students of this Institute are annually agreed with the State Service of Ukraine on Food Safety and Consumer Protection, which is subordinated to the Cabinet of Ministers of Ukraine.

Since the founding of FVM of BTNAU, the training of a veterinarian has been carried out according to a 5-year training program, and since 2001 - for a period of 5.6 years, which provided for a six-month narrow specialization of the student's choice.

Since 2008, a bachelor's degree with a term of study of 4 years (educational level - "junior veterinarian") and further study for a Master's degree for a period of 2 years have been introduced. Today, in accordance with the Law of Ukraine of 01.07.2014 №1556-VII "On Higher Education" is a thorough training of a veterinarian at the educational level of a Master with a term of study of 6 years.

Training at FVM of BTNAU is carried out in accordance with the standards of higher education in Ukraine. In January 2020, the educational program "Veterinary Medicine" was accredited for the second (Master's) level of higher education for the specialty 211 "Veterinary Medicine" in the field of knowledge 21 "Veterinary Medicine" and received a certificate from the National Agency for Quality Assurance in Higher Education (Annex I1).

In 2004, FVM of BTNAU became a member of the European Association of Veterinary Education Institutions (Lugo, Spain), but since 2008, for subjective reasons, has not confirmed its membership with appropriate financial contributions. In February 2019, the faculty renewed its membership in the European Association of Veterinary Education Institutions (Vienna, Austria) (https://www.eaeve.org/about-eaeve/statutes.html).

In 2018 (November 26-30), the ESEVT Consultation Visit to FVM of BTNAU took place. Based on the results of this visit, based on the evaluation, comments and suggestions of the experts of the Consultation Visit, an Action Plan was developed to eliminate shortcomings and achieve ESEVT standards, approved by the order of the Rector of BTNAU.

The main features of the institution. In addition to BTNAU, the training of veterinary doctors in Ukraine is carried out by 11 other faculties of agricultural universities located in different regions of the country (Annex I2).

The faculty at BTNAU is one of the four largest and oldest in Ukraine, along with the faculties of the Zooveterinary Academy in Kharkiv, the National University of Veterinary Medicine and Biotechnology in Lviv, and the National University of Life and Environmental Sciences in Kyiv.

Traditionally, students from different regions of Ukraine study at the Faculty of Veterinary Medicine of BTNAU (Annex I3).

Graduates of the faculty work in the structures and divisions of the State Service of Ukraine on Food Safety and Consumer Protection, state diagnostic veterinary laboratories, other testing laboratories and diagnostic centers, at border inspection posts of veterinary medicine, of private veterinarians, in veterinary enterprises and the veterinary service of the Armed Forces of Ukraine, agricultural enterprises of various forms of ownership. Also in Ukraine there are 2 research veterinary institutes (as part of the National Academy of Agrarian Sciences), 2 research and control institutes of veterinary drugs, feeds and feed additives and strains of microorganisms (as part of the State Service of Ukraine on Food Safety and Consumer Protection), 4 bio factories (as part of the State Service of Ukraine on Food Safety and Consumer Protection) pharmaceutical companies with a network of veterinary pharmacies of various forms of ownership, which employ mostly graduates of the faculties

of veterinary medicine. This testifies to the professional demand of graduates of the faculty and the relevance of the educational program, which is implemented here.

All areas of activity in the field of veterinary medicine are regulated by the Law of Ukraine "On Veterinary Medicine", according to which all categories of public and private doctors are required to undergo postgraduate training every five years.

FVM of BTNAU has a very deep history of international cooperation: 1998-2004 - within the CEVEO programs (Cooperation d'Echanges Veterinaries Est-Ouest - exchanges of veterinarians, student internships and teacher training); 2001–2004 - a joint project of the Justus Liebig University (Giessen, Germany), the Lyon National Veterinary School and BTNAU in the framework of Tempus TACIS "Management of a stable food production chain in Ukraine"; 2001–2004 internships for teachers and students under the Sasfud project at the Lyon National Veterinary School; 2004 - membership of the Faculty of Veterinary Medicine of BTNAU in the European Association of Veterinary Education; 2012 - internship of teachers under CEVEO programs in France and VetAgroSup; 2012-2014 - bilateral visits of heads and teachers of institutions; 2014 - signing of a cooperation agreement between VetAgro Sup and Bila Tserkva NAU for further development of a project on cooperation within the OIE;

2015 - contract for the OIE twining pre-project in the field of veterinary education (curator - VetAgro Sup, candidate - Bila Tserkva NAU).

During 2015–2017, the institution implemented a twinning project with the International Office of Epizootics and the Lyon National Veterinary School, which was the impetus for the modernization of the educational program and teaching resources, language integration of teachers (Annex I4). In particular, a number of activities were carried out jointly with VetAgroSup (Lyon, France) aimed at improving educational, research and grant activities.

From 2016-2017 International cooperation in the field of academic mobility of students and teachers of the faculty is still carried out within the framework of the Erasmus + KA1 program, in particular, a number of Agreements have been concluded with partners from France, Turkey, Slovakia, Italy, Czech Republic, Poland and Estonia. The faculty is a participant in the EU Erasmus+ KA2 project "Improvement of laboratory practice skills of specialists in the agri-food sector of Eastern Europe ".

Summary of the main events after the ESEVT Consultation Visit in 2018:

- The University has developed and is implementing an Action Plan to address the identified shortcomings and achieve ESEVT standards.
- The University has made significant financial injections into the development and modernization of the Faculty of Veterinary Medicine, animal clinics, cattle farms and poultry farms for broiler farming.
- The Faculty of Veterinary Medicine has received national accreditation of the educational program 211 - Veterinary Medicine.
- The faculty has developed and implemented an educational program in accordance with ESEVT standards.

The main problems faced by the Faculty of Veterinary Medicine at the University.

- This is still insufficient financial support from the state.
- Imperfect national regulatory framework for teacher/student relations; support staff / student support.
- Annual technical changes to the conditions of admission of students, which are introduced by the Ministry of Education and Science (quotas for places of study by state order and quotas for places for social benefits). Socio-economic problems cause annual changes in the amount of tuition fees.
- Access to some species of animals is complicated: pigs - due to the epizootic of African swine fever, horses - due to not enough livestock in Ukraine.
- Like the global world, including Ukraine, FVM of BTNAU has faced the problem of the COVID-19 pandemic.

When preparing the report, we used ESEVT Standard Operating Procedure (SOP) as approved at the Zagreb General Assembly, 30 May 2019.

1. OBJECTIVES, ORGANISATION AND QA POLICY

1.1 The Establishment must have as its main objective the provision, in agreement with the EU Directives and ESG recommendations, of adequate, ethical, research-based, evidence-based veterinary training that enables the new graduate to perform as a veterinarian capable of entering all commonly recognised branches of the veterinary profession and to be aware of the importance of lifelong learning. The Establishment must develop and follow its mission statement which must embrace all the ESEVT standards.

The mission of the Faculty of Veterinary Medicine is to educate highly qualified and competitive veterinarian specialists in all agricultural fields, able to solve non-standard issues, to implement innovative solutions, to solve production problems, to ensure health and animal welfare, to guarantee safe and high-quality food, to increase environmental protection in accordance with the concept of "One Health". The faculty is trying to combine the best national and European practices of training the veterinary medicine specialists.

Features of the student training program:

1. A systematic and integrated approach that combines the practical orientation of learning, innovation and international integration.

2. Opportunity to participate in academic mobility programs (Erasmus +), internships abroad at modern agricultural enterprises and clinics.

3. Obtaining modern knowledge in lectures and workshops of foreign teachers and experts, domestic professionals-practitioners.

4. Obtaining professional advice from employers during lectures, at work during internships, visits to relevant enterprises and organizations.

5. Implementation of research activities by participating in the work of student research groups at the departments of the faculty, scientific and practical conferences.

Development strategy is the modernization of the educational process, namely:

- development of the internal system of quality assurance of education and educational process on the basis of international quality standards ISO 9001:2008 and ISO 9001:2015;
- optimization of the structure and schedule of the educational process to strengthen the logistics between theoretical training and clinical training, its lability and mobility;
- increasing the level of teacher autonomy; internships for teachers abroad at university and private clinics, farms (especially in the fields of anesthesiology, horse surgery, endoscopy, cardiology);
- improving the system of interdisciplinary training;
- organization and introduction of specialized training of specialists in laboratory work;
- strengthening the role of active learning practices and procedures for students' responsibility for learning outcomes;
- creation of information and analytical resource center for trainings;
- improving the system of acquisition of biosafety procedures by students;
- strengthening students' motivation for self-improvement of clinical skills and procedures;
- expanding the training of graduate/doctoral students.

Veterinary training is based on the results of scientific research, taking into account European and national standards of education, which allows to guarantee the quality of the acquired profession to graduates and the development of professional competencies throughout life.

The goals of the study program correspond to the mission of FVM and the University, defined by the Development Strategy of the Regional University Center of Bila Tserkva National Agrarian University for 2020-2025 (https://btsau.edu.ua/sites/default/files/Faculties/osvita/quality/strateg_BTNAU_2018-2022.pdf).

1.2 The Establishment must be part of a university or a higher education institution providing training recognised as being of an equivalent level and formally recognised as such in the respective country.

The person responsible for the veterinary curriculum and the person(s) responsible for the professional, ethical, and academic affairs of the Veterinary Teaching Hospital (VTH) must hold a veterinary degree.

The decision-making process of the Establishment must allow implementation of its strategic plan and of a cohesive study programme, in compliance with the ESEVT standards.

The Bila Tserkva National Agrarian University (BTNAU) as a higher educational institution of agricultural profile was formed in 1920 (then - the Agricultural Institute). In 1995 it acquired the status of the state, and since 2007 has the fourth (highest) level of accreditation, the state form of ownership and is subordinated to the Ministry of Education and Science of Ukraine. As of January 1, 2020, 6420 students studied at the university at six faculties: veterinary medicine, agrobiotechnology, biotechnology, economics, ecology, law and linguistics.

The licenses and certificates of BTNAU: https://btsau.edu.ua/uk/content/licenziyi-i-sertyfikaty.

Table 1.2.1. Information about the management and departments of the university

Details	Bila Tserkva National Agrarian University
Address, telephone number	Ukraine, Kyiv region, Bila Tserkva city, Soborna Square, 8/1, +380456351288
Website address	http://btsau.edu.ua
E-mail address	e-mail: BTNAU-rectorat@ukr.net
Head	Danylenko Anatoliy Stepanovych, Doctor of Science (economics), Professor, Academician of the National Academy of Agrarian Sciences of Ukraine
Official authority that exercises control and licensing	Ministry of Education and Science of Ukraine 01135, Kyiv, street Victory, 10, https://mon.gov.ua
First Vice-Rector, Vice-Rector for Organizational Work	Novak Vitaliy Petrovych, habilitated doctor of biological sciences, professor
Vice-rector for educational, upbringing and international activities	Dyman Tetyana Mykolayivna, habilitated doctor of agricultural sciences, professor
Vice-Rector for Research and Innovation	Varchenko Olga Myronivna, Doctor of Economics, Professor
Department of educational and methodical work	Zubchenko Victoria Volodymyrivna, head of the department
Quality Assurance Department	Demyanenko Olena Oleksandrivna, head of the department
Marketing, Licensing and Accreditation Department	Skyba Volodymyr Vitaliyovych, head of the department
Department of Research and Innovation	Tsarenko Taras Mykhailovich, Chief Researcher
Department of financial and economic activities	Lozitsky Andriy Antonovych, Chief Accountant, responsible for finances
Department of foreign economic and investment activities, work with foreign students	Bonkovsky Olexander Antonovich, head of the department
Editorial and publishing department	Oleshko Olena Hennadiivna, head of the department
Department of document management and record keeping	Yurchenko Olena Mykhailivna, head of the department
Institute of postgraduate training of managers and specialists in veterinary medicine	Mazur Tetiana Grygorovna, director

Each faculty is a structural unit of the university with its own infrastructure: https://btsau.edu.ua/uk/content/fakultet-veterynarnoyi-medycyny.

In accordance with the Law of Ukraine (2014) "On Higher Education", the Faculty of Veterinary Medicine recruits students for the specialty: 211 "Veterinary Medicine" at the educational level of Master for graduates of secondary schools and vocational colleges. The program "Veterinary Medicine" for the second (master's) level of higher education in the specialty 211 "Veterinary Medicine" in the field of knowledge 21 "Veterinary Medicine" was successfully accredited in January 2020 at the faculty and received a certificate from the National Agency for Quality Assurance in Higher Education (Annex I1).

Table 1.2.2 The structure of the Faculty of Veterinary Medicine

9 departments	anatomy and histology named after P O. Kowalski, normal and pathological physiology of animals, microbiology and virology, obstetrics and biotechnology of animal reproduction, therapy and clinical diagnostics, surgery and diseases of small pets, epizootology and infectious diseases of animals, parasitology and pharmacology, veterinary and sanitary examination of animals, hygiene anatomy
2 research institutes	internal diseases of animals, veterinary and sanitary examination of livestock products
7 research laboratories	Research laboratory of molecular methods (with the support of Erasmus + KA2 Ag-Lab), (interfaculty), block G, building № 8. Problem research laboratory of surgical diseases of farm and domestic animals (interdepartmental), aud. № 10 block B of the building № 8. ELISA and PCR research laboratory (interfaculty), premises on the territory of the building № 9. Research Laboratory for Diagnosis of Animal Diseases (interdepartmental), aud. №№ 104, 109, 112, 118, 134 block A of the housing № 8. Research Laboratory of Biochemical and Histochemical Research Methods (interfaculty), aud. № 527 building № 9. Research laboratory of microbiological research methods (interdepartmental), room № 311, building № 9. 7. Research laboratory of veterinary and sanitary examination and hygiene of livestock products, room 602-603 of the building № 8.
Interdepartmental clinics (VTH)	- horses; - ruminants; - pigs; - small animals; - birds, exotic animals and wildlife.

Table 1.2.3. Information on the management of the Faculty of Veterinary Medicine

Details	Veterinary medicine faculty
Address, telephone number	Ukraine, Kiev region, Bila Tserkva, street Stavyshchanska, 126, Tel:+380456398307, +380456398314
Website address	vet.btsau.edu.ua
E-mail address	e-mail: decanvet@ukr.net
Head of FVM (Dean)	Sakhnyuk Volodymyr Volodymyrovych, habilitated doctor of veterinary sciences, professor
Official authority that exercises control and licensing	The Ministry of Education and Science of Ukraine, Rector, Academic Council of the Faculty of Veterinary Medicine

Deputy Deans responsible for the curriculum in veterinary medicine and working with students	Tyshkivskyy Mykhaylo Yaroslavovych, PhD, DVM Solovieva Lyudmyla Mykolaiivna, PhD, DVM
Responsible for professional, ethical and academic affairs of veterinary training clinics	Petrenko Oleg Fedosiyovych, head of VTH, Habilitated Doctor of Veterinary Science, Professor

A description of the composition of the commissions and councils of the university and the faculty of their functions and stakeholder participation is given in Annex 1.1.

1.3 The Establishment must have a strategic plan, which includes a SWOT analysis of its current activities, a list of objectives, and an operating plan with a timeframe and indicators for its implementation.

The strategic plan for the development and educational activities of the Faculty of Veterinary Medicine for the period up to 2020 was approved by the Academic Council of the FVM (Minutes № 3 of October 12, 2017). Currently, such a plan is being drawn up for the next 5 years, in which considerable attention will be paid to the development of the faculty and the requirements of SOP and international integration. Its goal is to achieve European standards of veterinary education to increase the functional capacity of the national veterinary service by increasing the level of competence of graduates of the Faculty of Veterinary Medicine in ensuring epizootic and food safety, animal health and welfare on the principles of "One Health".

It is based on the idea of modernization of the educational process, expansion and deepening of scientific and international activities, increasing postgraduate/doctoral training, implementation of departments in production, training of research and teaching staff, improving the professional orientation of applicants, updating the material and technical base, development of students motivation to self-improvement and career growth. Following the discussion of the achieved results and achievements, the analysis of the Strategic Plan for its use in the formation of its updated version for the future was conducted by an expert method.

The goals of the veterinary medicine training program correspond to the mission and strategy of Bila Tserkva NAU, which are aimed at:

- achieving leadership in the field of agricultural education and science;
- dynamic development;
- ensuring a worthy position in the state and European rankings of higher education institutions in the quality of educational services;
- achievement of European standards to increase the efficiency of the veterinary service of Ukraine by increasing the level of competence of graduates of the educational program in ensuring epizootic and food security;
- animal health and welfare according to the principles of the OIE concept of " One Health";
- compliance with high standards in teaching, research and professional activities.

Table 1.3.1 The results of the SWOT-analysis for the Faculty of Veterinary Medicine of BTNAU

	Strong points	***Weak points***
Internal environment	- EU experience in veterinary education and its implementation in the educational process (according to the results of the pre-twinning project of the RES). Since 2000, the constant participation of academic staff of the faculty in the implementation of international projects (Tempus, FP7 Program, Erasmus + etc.)	Insufficient level of international and grant activities for research and teaching staff. - Insufficient level of funding for research departments. - A software program for registering sick animals is currently being developed.

	- Most academics have a scientific degree and academic title. About a third of teachers have completed internships at universities in France, Poland and the United States. - Experience in using media resources, video channels and educational platforms (Moodle, Zoom, Google Meat, YouTube, Prometheus, etc.) for distance and blended learning of students. - Proper educational and methodological support. High scientific publishing activity of the faculty staff, including its own indexed edition "Scientific Bulletin of Veterinary Medicine". - Certified research laboratories. Autonomous training of graduate students and doctors of sciences. - The presence of a training and production center near the educational buildings of the faculty (up to 2 km), where cattle, horses, sheep, poultry are kept. Sufficient bases of clinical practice in the region of location and traditionally clinically oriented training. - Functioning of the Institute of Postgraduate Training of Veterinary Medicine Managers and Specialists. - Cooperation with businesses And other stakeholders	- Insufficient number of teachers and staff per student. - Low motivation of teacher rotation between the educational process and research. - Development of modern teaching practices based on collaboration, individualization and differentiation of the learning process. - Insufficient amount of modern equipment for training and research. - The publication "Scientific Bulletin of Veterinary Medicine" is indexed in the scientific-metric database of category B (International databases and catalogs that index the publication: RINC, Google Scholar International Innovative Journal Impact Factor (IIJIF), National Library of Ukraine named after VI Vernadsky - Insufficient flexibility and mobility of the schedule of the educational process, the level of inter subject training.
External environment	**Opportunities**	**Threats**
	- High national reputation and prospects for infrastructure development. - Favorable economic and logistical location and regional conditions for training and employment - Powerful material and technical base and territorial opportunities for infrastructure development - Motivated scientific and pedagogical staff for scientific cooperation and implementation of international projects - Proven training of competent veterinarians - There are precondition for compliance with all indicators and requirements of ESEVT.	Unstable socio-economic situation in the country and the region. - A small number of graduate students in the last few years due to low motivation for further career growth and socio-economic conditions in the country. - Education policy in the state is no longer motivational, but regulatory in nature, which inhibits the innovative development of the educational process. - The normative base of the educational policy of the Ministry of Education and Science of Ukraine is too unified and does not take into account the peculiarities of the training of veterinary doctors.

1.4 The Establishment must have a policy and associated written procedures for the assurance of the quality and standards of its programmes and awards. It must also commit itself explicitly to the development of a culture which recognises the importance

of quality, and quality assurance, within their Establishment. To achieve this, the Establishment must develop and implement a strategy for the continuous enhancement of quality. The development and implementation of the Establishment's strategy must include a role for students and other stakeholders, both internal and external, and the strategy must have a formal status and be publicly available.

An important area of activity at BTNAU is the creation and development of an internal QA system. The BTNAU Policy in the field of QA and a package of University Regulations have been developed: "On the system of internal quality assurance in BTNAU", "On the procedure for conducting internal audits of the quality assurance system and corrective and preventive actions in BTNAU", "On surveys on the quality of educational activities of BTNAU", "On QA groups at BTNAU", "On academic integrity in BTNAU", "Code of Ethics" https://btsau.edu.ua/uk/content/yakistosvity, https://btsau.edu.ua/uk/content/normatyvne-zabezpechennya.

Regulatory documents in accordance with national and international QA standards are presented in the tabular annex (Annex 1.2).

The process model of quality management at BTNAU is presented on the university website https://btsau.edu.ua/en/content/quality-assurance.

Representatives of the quality management are: for educational activities - Vice-Rector for Educational, Educational and International Activities, for Scientific Activities - Vice-Rector for Scientific and Innovative Activities.

The university has a Department of Quality Assurance. The department organizes and conducts systematic monitoring of the quality of education and elaborates on this basis Regulations for improving the educational process and youth policy. The specialists in the sector develop questionnaires to conduct routine cyclical surveys of all stakeholders in the educational process, analyze their results and ensure accessibility for all participants.

The purpose of the survey is to determine the opinion of a representative set (group) of respondents on the quality of educational activities at the University and at the faculty.

The objectives of the survey are:

- to obtain aggregate information on the quality of content and forms of education in the implemented study programs, as well as on other processes that affect the quality of educational activities (learning conditions and resources, external factors motivating learning, socio-psychological factors of the educational process, etc.);
- determining the attitude of students to the activities of research and teaching staff, including - the use of innovative educational technologies and teaching aids in their work;
- analysis of qualitative indicators of the interaction of learning with research, the participants of which are various subjects of educational activity;
- use of questionnaires as one of the elements of monitoring the quality control system of the educational process;
- preparation of analytical materials in order to identify problematic issues of the educational process at the University and provide information for the formation of recommendations for its improvement.

Levels of surveys: "internal audit" of educational activities (student - teacher - department - faculty); "External" monitoring of the quality of education (expert survey) at the level of faculty, University (defined group of respondents - department of quality assurance - department of educational and methodical work - department of accreditation and licensing/admission commission - administration).

Groups of respondents -, students, teachers, heads of departments, heads of departments of the University, graduates and employers. The schedule is compiled and adjusted for the academic year (semester). An indicative sample of the matrix for conducting such surveys at the faculties and at BTNAU is given in Annex 1.3.

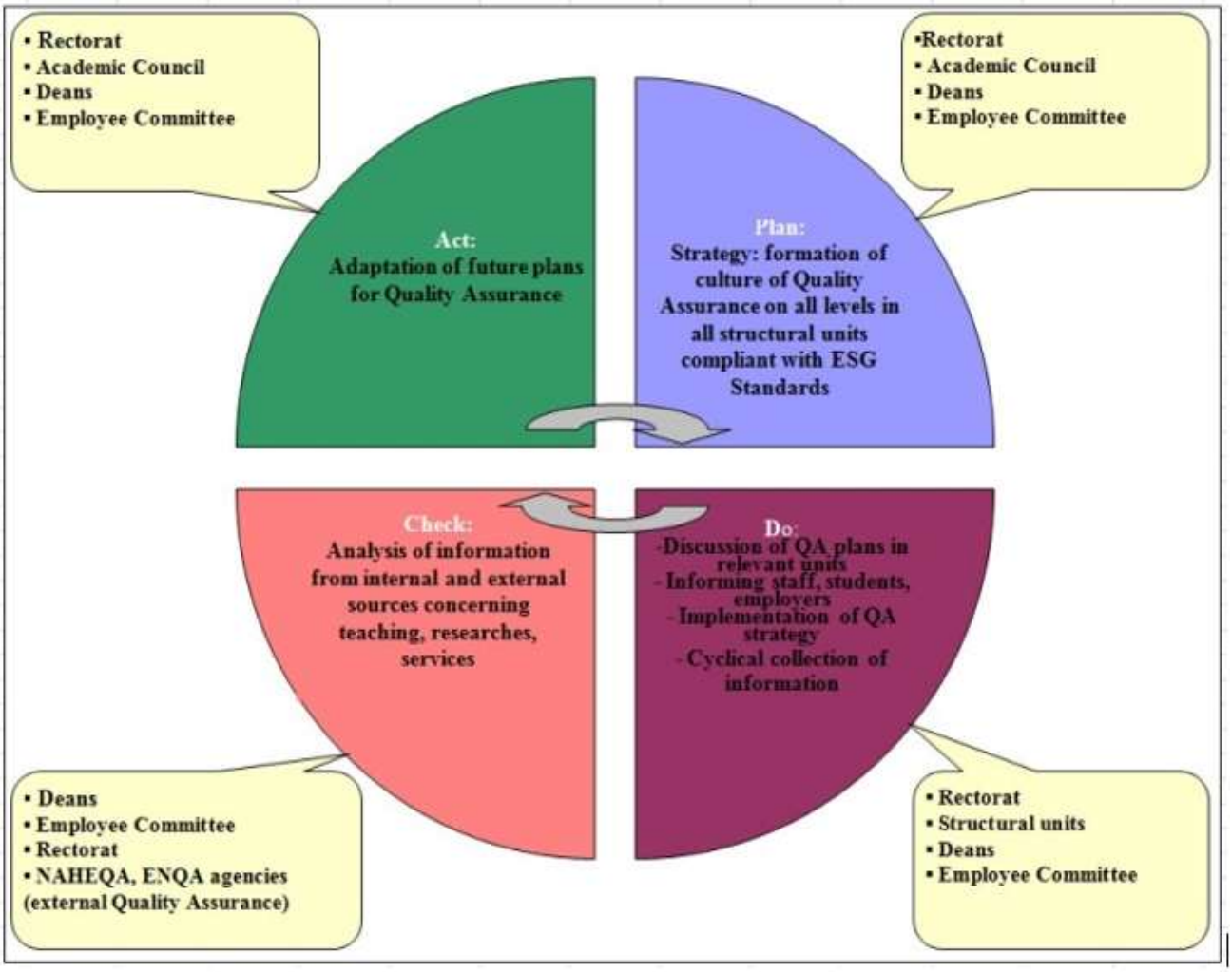
To manage periodic cycles of quality assurance, the PDCA methodology (Deming cycle) was used as an algorithm for managing processes and achieving the goals of quality assurance at BTNAU, taking into account national and international standards and recommendations.

Stage planning. Defining goals and objectives for the formation of a culture of quality at the university level - faculties for 3 years and each academic year. Planning to work with different representatives and groups of stakeholders. Distribution of levels and tasks, required resources.

Stage execution. Implementation of planned actions, actions and events (public meetings with students, scientific and pedagogical workers, meetings with management, innovative trainings, surveys, etc.).

Stage control and evaluation. Data collection and processing, qualimetric analysis, data systematization, determination of deviations and errors and the reasons for their occurrence, etc. Disclosure of data at different levels.

Stage actions and adjustments. Management makes effective management decisions based on the results of the measures involved, including - adjusting measures to avoid risks (reducing or taking them) hot to violate the quality of education. Redistribution of resources.



Thus, due to the systematic actions aimed at forming the Policy of BTNAU in the field of quality assurance, for all subjects of educational activity of BTNAU and faculties are provided: planning-educational and information-explanatory measures on the quality of higher education; educational activities (extended psychological and pedagogical seminar for academic staff on topical issues of education development, distance learning courses, seminars for education experts, etc.); control and corrective actions (surveys and questionnaires, interviews, trainings, round tables and panel discussions on the quality of education and academic integrity).

In the educational practice of BTNAU the PDCA cycle is used systematically with different periodicity: during the semester - academic year - 3-year period. Thus, in terms of analyzing the quality of teaching the discipline, when student surveys can take place every semester before the session, this cycle is the shortest, while the review of goals and objectives, quality indicators of the educational

program by employers can take place at faculties once every 2-3 years. That is, in the course of corrective action, the duration of the PDCA can be set according to the nature, scope, duration and content of measures to correct the causes of deviations.

As a result of cyclical and systemic actions, a culture of quality is gradually formed. In order for the members of the academic community to feel the content of their involvement in the quality assurance system, the faculty constantly holds meetings with representatives of the administration, the quality assurance department, who acquaint participants with new trends and challenges. At meetings of departments and councils of FVM, in QA group urgent questions of quality and procedures of its maintenance are constantly discussed. Surveys of staff and students are conducted. Teachers attend a prolonged methodological and psychological seminar "School of Professional Development", the topic of which is aimed at improving the level of teaching https://btsau.edu.ua/uk/content/molodizhna-polityka. Relevant provisions have been developed and mechanisms for assessing academic staff on the basis of ratings have been introduced, as well as the evaluation of teachers by students. The results of evaluation and rating are published at annual conferences, in the newspaper "University" and on the website of the University.

In the process of forming the internal system of quality assurance at the faculty, in addition to general university procedures and activities (planned, informational, monitoring, final control, prognostic), the program and learning outcomes are reviewed, including on the basis of interaction of different stakeholders.

Teachers, students, employers, and faculty graduates are involved in the discussion and adjustment, the choice of action strategy, and the adoption of management decisions aimed at the quality of education. Coordination of analysis processes, publication of the results of their evaluative judgments about the content of the curriculum, forms of teaching, important for the development of competence, etc., at the faculty is carried out by the group on the content and quality of education (link to https://btsau.edu.ua/sites/default/files/Faculties/osvita/quality/polog_grupy_quality_BTNAU.pdf). This group includes representatives of these stakeholder groups.

The evaluation judgments of different stakeholder groups are the results of their periodic questionnaires, interviews, blitz polls (online or offline), as well as direct participation in the work of the group on the content and quality of education. The result of the group's work is decision-making on the publication of respondents' recommendations, development of strategies for implementing changes or revising the content of the program, forms of training, assessment methods, and more.

1.5 The Establishment must provide evidence that it interacts with its stakeholders and the wider society. Such public information must be clear, objective and readily accessible; the information must include up-to-date information about the study programme, views and employment destinations of past students as well as the profile of the current student population. The Establishment's website must mention the ESEVT Establishment's status and its last Self Evaluation Report and Visitation Report must be easily available for the public.

ESEVT status, self-assessment report and consultation visit report in November 2018 (Consultative visitation of the Bila Tserkva National Agrarian University) are posted on the website of the faculty (vet.btsau.edu.ua). The portfolio of the study program is placed and constantly updated on the website of the faculty (educational program, curriculum, annotations of obligatory and elective disciplines, description of practical training, etc.).

Educational, research and teaching activities are covered on the university website https://btsau.edu.ua/ and the faculty page https://btsau.edu.ua/content/fakultet-veterynarnoyi-medycyny.

Information on practical training, cooperation with employers is also posted on the university website https://btsau.edu.ua/uk/content/praktychna-pidgotovka.

The university has a practice of collecting, analyzing and recording information about the career path of graduates. The employment of graduates of the faculty is monitored annually. This activity is provided at the University level by the Department of marketing, licensing and accreditation (responsible - leading specialist, associate professor Liskovych Volodymyr), and at the faculty - dean's

office and lecturer, responsible for practical training and work with graduates (associate professor Shmayun Serhiy). According to them, the employment rate of graduates of the Faculty of Veterinary Medicine (who have confirmed their employment) is 82-90% over the past three years. The department constantly studies the needs of the market in veterinary medicine and provides information to the faculty. Information on employment prospects and requests is posted on the information board of the faculty (building №8) and the faculty's Facebook page https://www.facebook.com/BTNAUfvm/. Traditional at the university are conferences-meetings of graduates of the Faculty of Veterinary Medicine of different years, where their survey on modern production needs and requirements for veterinary specialists is conducted.

Areas of employment of graduates of previous years: small animal clinics, agricultural enterprises, the Department of State Service of Ukraine for Food Safety and Consumer Protection, veterinary pharmacies, testing laboratories, zoos, and research institutions, colleges of professional higher education, the Association of Milk Producers and others.

1.6 The Establishment must monitor and periodically review its activities, both quantitative and qualitative, to ensure that they achieve the objectives set for them and respond to the needs of students and society. The Establishment must make public how this analysis of information has been utilised in the further development of its activities and provide evidence as to the involvement of both students and staff in the provision, analysis and implementation of such data.

Any action planned or taken as a result of this data analysis must be communicated to all those concerned.

Representatives of student government are members of the faculty council, the academic council of the university, the group on the content and quality of education. They participate in the discussion of all issues related to the improvement of the educational process, research, scholarships, leisure, health, living and nutrition, as well as in addressing these issues.

FVM students are directly involved in the process of periodic review of the educational program, as they are part of the group on the content and quality of education (among the 11 members of the faculty group there are two students - the chairman of the FVM student council and a third-year student). Students' suggestions on the educational process are also taken into account through surveys. During the academic year, students take part in questionnaires conducted by the Department of Quality Assurance. The questionnaires contain questions about students' expectations from studying (for students of the 1st year of study), the organization of the educational process, the quality of educational services, the level of teaching, their own attitude to learning, etc. (Annex 1.4). Questionnaires and processed results of questionnaires of students of each faculty with conclusions are posted on the university website (https://btsau.edu.ua/uk/content/yakist-osvity). At the faculty level, upon completion of the discipline, teachers conduct a survey of students to evaluate the course according to the following criteria: comprehensibility and accessibility of material, focus on future profession, complexity of tasks, volume of classroom classes, methodological support of the discipline. Academic staff must take into account the appropriate suggestions and wishes.

The faculty has a council of employers who are involved in various quality assurance procedures. Representatives of employers are part of the group on the content and quality of education of FVM. The opinion of employers regarding the preparation of students is also studied by questionnaires, obtaining feedback from students during the internship (characteristics are attached to the reporting documentation for the internship). Every year, in the framework of such events as the "Job Fair" employers are surveyed on the quality of training of higher education, applicants in improving the educational process. Lectures opinions on teaching methods and student assessment are also studied through questionnaires.

The results of the questionnaire conducted by the Department of Quality Assurance are brought to the attention of the faculty, where they are discussed at the departments, the methodical commission and the faculty council. All proposals are analyzed in detail and appropriate measures are developed to improve the educational process at the faculty.

Table 1.6.1. The results of a survey of stakeholders in 2019-2020 on the forms and methods of teaching, the quality of the educational program

Students' suggestions on teaching and assessment methods	Place of discussion	Decisions made (where and how published, communicated, taken into account or not)
Involve students in discussions, use debates / quizzes, use games or quests, videos	meetings of departments, methodical commission of faculty	Suggestions are taken into account, interactive teaching methods are included in the programs of disciplines. During classroom classes, staff gradually introduce innovative pedagogical approaches to learning; attend a prolonged methodological and psychological seminar, where they study and test these methods
Clarity, objectivity and fairness in evaluating the results	meetings of departments, methodical commission and faculty council	Criteria for evaluating the results are clearly defined in the work programs for each discipline. The principles of academic integrity and assessment criteria are taught to students in the first lesson of each discipline.
Organize classes using devices, tools, technical equipment. More practical training with animals and experiments in laboratories	meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account. The educational program, the curriculum for 2020-2021 have been updated, the topics and modules of clinical disciplines have been updated, the redistribution of hours of practical training and the schedule of duty in clinics by animal species have been made.
To envisage not only purely educational activities, but to promote clubs, circles, research cohesion outside the classroom	meetings of departments, faculty councils	Suggestions are taken into account. The combination of teaching and research is done by involving students in student scientific conferences, seminars, competitions of student research papers. There are 11 scientific student groups at the Faculty of Veterinary Medicine (information about the work of the groups is covered on the information stands of the departments).
Modernization of textbooks and teaching materials is very important;	meetings of departments, methodical commission of faculty	Suggestions are taken into account. In recent years, pedagogical resources have been significantly updated, the library fund of the faculty has been replenished. Training materials on the Moodle remote platform from each discipline are constantly updated.
Staffing and providing the laboratory, which is so necessary for a full study of microbiology;	meeting of the department, methodical commission of the faculty	Suggestions are taken into account. Updated material base by purchasing binocular and monocular microscopes (15 pieces)

The study of small animals is equivalent to agriculture (ie, cats and dogs should be studied as deeply as cows and pigs, because 80% of graduates will work with small animals);	meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account. The curriculum for 2020-2021 has been updated (a number of new disciplines has been introduced in the 5th year, during which students study the physiological and pathological aspects of small animals) and the rotation in the small animal clinic.
Study of work with modern devices (ultrasound, MRI, X-ray, hemoanalyzer and others),	meetings of departments, methodical commission of faculty	Suggestions are taken into account. The curriculum has been modernized (relevant topics and modules in the work programs of clinical disciplines). The material base of FVM clinics was updated by purchasing modern diagnostic devices (ultrasound device, X-ray machine, diagnostic ophthalmological instruments, anesthesia equipment, patient monitors, blood analyzers, construction of a horse clinic).
Monitoring the ethical behavior of teachers	meetings of departments, faculty council	All participants of the educational process are acquainted with the "Regulations on Academic Integrity in Bila Tserkva National Agrarian University", "Code of Ethics of the University Community", which are aimed at compliance with norms and rules of ethical conduct. The University has established a Commission on Ethics and Academic Integrity (Rector's Order №63 / O of 14.04.2020), which consists of 2 people from the Faculty (teacher and student).
Staff proposals on teaching and assessment methods		
Students are most receptive to practical classes and individual consultations, and from teaching methods - discussion. It is easier for students to be open for communication in small groups, and the discussion can lead to answer options or questions on a particular topic. Collaborative learning, which promotes cohesion, and teaches the teamwork..	meetings of departments, methodical commission of faculty	Staff attends classes of prolonged methodological and psychological seminar, where they study and then introduce into the educational process innovative pedagogical approaches to learning in the form of business games, cases, seminars, lectures, dialogues and polylogues, trainings, discussions, web-quests, PBL, round tables . Methodical approaches are specified in the work program of each discipline in the section "Methods of training".
Use information, media technology, which makes the study material personally meaningful	meetings of departments, methodical commission of faculty	During classroom classes, independent work uses a set of methodological support for the discipline, posted on Moodle, which is constantly updated. The official websites of national (State Service of Ukraine on Food Safety and Consumer Protection, research institutions, MES,

		scientific libraries, etc.) and international (OIE, WHO, FAO, Codex Alimentarius, EU, etc.) organizations are actively used.
Classes-role play, case studies in combination with brainstorming. This type of work is interesting for students, inspires them to work actively, encourages practical action, gives the opportunity to implement their own ideas.	meetings of departments, methodical commission of faculty	Staff actively uses interactive teaching methods in the educational process, which provide both professional and social skills of future veterinary specialists. Methodical approaches are specified in the work program of each discipline in the section "Methods of training".
"Live Discussion". Students have the opportunity to participate in the study and to work on of problematic issues, developing critical thinking and showing flexibility in a given situation	meetings of departments, methodical commission of faculty	Academic staff pays considerable attention to the components and methodological approaches, problem-oriented learning, which develops the student's analytical and critical thinking. Methodical approaches are specified in the work program of each discipline in the section "Methods of training".
Joint work on the project, scientific and practical topic. Modern research and production base	meetings of departments, methodical commission of faculty	during the educational process, students are encouraged to work in scientific research groups, are involved in work in economic contract and state research topics. Reports on research work of the departments are delivered annually at the faculty council.
Organization of field trips, allow the student to choose the most interesting topics and be a researcher of new material. Creating demonstration presentations of own research	meetings of departments, faculty council	Students are systematically involved in scientific work on scientific topics of departments, have the opportunity to independently choose the direction of scientific research. The results of scientific work are annually presented by students at meetings of scientific circles, scientific student conferences, competitions of scientific works. Reports on research work of the departments are heard annually at the faculty council.
To develop together with students the topics of collective research, to conduct research on scientific topics of departments in scientific circles	meetings of departments, faculty council	Students are encouraged to work in scientific research circles, are involved in work in economic contract and state research topics. This further helps to focus on the subject of the Master's thesis. Reports on research work of the departments are presented annually at the faculty council.

Employers' proposals based on the results of questionnaires and interviews		
Increase the number of hours for practical classes in disciplines that have a practical focus	meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account. The educational program, the curriculum for 2020-2021 have been updated, the topics and modules of clinical disciplines have been updated, the redistribution of hours of practical training and the schedule of duty in clinics by animal species have been made.
Improve laboratory training of students, ability to work with laboratory equipment	Meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account. The educational program, curriculum for 2020-2021 have been updated (in the 6th year students are offered the elective course "Laboratory Diagnostics"), the material base of clinics and research laboratories has been updated with modern equipment, the educational and scientific laboratory for molecular diagnostics has been equipped.
Updating the material base of the faculty	meetings of departments (development of proposals), dean's office	Departments submitted proposals to the dean's office on the need to purchase devices and equipment to ensure the educational process. The material base of FVM departments and clinics has been updated by purchasing modern diagnostic devices, microscopes, etc.
Improving knowledge of the regulatory framework, the ability to work with documentation	meetings of departments, group on the content and quality of education of the faculty, faculty’s methodical commission	Proposals are taken into account, additions are made to certain disciplines (topics and modules for studying the requirements of national, European and international legislation on veterinary medicine, animal health and welfare, food safety).
- Improving social skills, in particular the ability to respond quickly to difficult production situations, organizational skills, communication	meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account when updating the educational program and curriculum. Academic staff actively implements innovative pedagogical approaches to learning in the form of business games, cases, seminars, lectures, dialogues and polylogues, trainings, discussions, web-quests, PBL, round tables, etc. Acquisition of social skills is also facilitated by the work of students in FVM clinics, participation together with representatives of the Main Department of the State Service of Ukraine on Food Safety and Consumer Protection in Bila Tserkva, veterinary clinics, volunteer organizations in conducting anti-epizootic and other treatment and prevention activities, seminars, workshops for animals, consultations.

From the interview of former graduates		
Updating the material base of the faculty	meetings of departments (development of proposals), dean's office	Departments submitted proposals to the dean's office on the need to purchase devices and equipment to ensure the educational process. The material base of FVM departments and clinics has been updated by purchasing modern diagnostic devices, microscopes, etc.
Add more hours to the study program to study small animal diseases	meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account. The curriculum for 2020-2021 has been updated (a number of new disciplines has been introduced in the 5th year, during students which study the physiological and pathological aspects of small animals) and the rotation in the small animal clinic.
Add hours to the study program to study the diseases of exotic animals	meetings of departments, group on the content and quality of education of the faculty, methodical commission of the faculty	Suggestions are taken into account. The curriculum for 2020-2021 has been updated (the discipline "Diseases of Exotic Animals and Wild Fauna" was introduced in the 6th year).

1.7. The Establishment must undergo external review through the ESEVT on a cyclical basis. Evidence must be provided of such external evaluation with the assurance that the progress made since the last ESEVT evaluation was linked to a continuous quality assurance process.

Table 1.7.1 The self-assessment report of this visit was generated by ESEVT "Uppsala" SOP May, 2016)

Comments in the context of standards	Procedures for their elimination
Standard 1, item 5	The institution has optimized the procedures for interaction between departments and external stakeholders for a continuous quality assurance process, which is reflected in the tables, diagrams and annexes to standard 1.
Standard 2	Although Ukrainian universities are underfunded by the state, the BTNAU has found opportunities to almost double funding for infrastructure changes at FVM, mainly to equip its maintenance and to upgrade facilities.
Standard 3, item 1, item 5	The faculty has completed the transition phase to the educational program and its curriculum, according to which the list of disciplines has been brought in full compliance with the SOP requirements, clinical training in animal species has been formalized and substantially improved to ensure students gain One Day competences.
Standard 3, item 8	Realistic procedures of management of external practice and its standardized assessment are formalized, which is confirmed by the agreements with regional State Service of Ukraine on Food Safety and Consumer Protection provided in the appendices.

Standard 4, item 6	Modernization of isolators and procedures of biosafety and biosecurity is completed, the corresponding manual which is accessible and processed by the personnel and students with proper control of this process is issued
Standard 4, item 8	The work of the emergency service 24/7 in VTH is formalized and carried out
Standard 4,	Investments in diagnostic imaging and anesthesia have enhanced students' access to practical skills, including biosafety procedures and laboratory practice, which are properly assessed and recorded.
items 11, 12, 13, 14	All indicators of the number and variety of healthy and sick animals, carcasses and material of animal origin are listed in accordance with the comments, formalized and introduced the acquisition of nursing skills
Standard 5, paragraphs 1, 2, 3	The volumes and procedures of e-learning of students have been optimized
Standard 6, items 1, 4	The presented new self-assessment report structures and optimizing information on the procedures for selection, admission and professional growth of academic and support staff.
Standard 9, paragraphs 2, 5	The participation of academic staff in research work and procedures for implementing its results in the educational process has been expanded. Added new evidence of internship and postgraduate staff education programs
Standard 10, paragraphs 1, 4	The university has radically improved the policy of quality assurance of education with appropriate evidence-based procedures that reflect the student-centered educational process and the participation of all stakeholders, which is reflected in Standard 1 of the new self-assessment report.

Comments

A brief overview of the faculty's development strategy shows its ambition to achieve European standards of veterinary education. The efforts of the faculty are aimed at further improving the practical training of students and the traceability of this process, strengthening and deepening research with their international integration, modernization of the faculty infrastructure with appropriate financial support. The latest policy in education has been introduced.

Suggestions for improvement

It is necessary to complete the analysis of FVM activities and to elaborate a new plan for its development with the participation of all stakeholders.

2. FINANCING

2.1 Finances must be demonstrably adequate to sustain the requirements for the Establishment to meet its mission and to achieve its objectives for education, research and services. The description must include both expenditures (separated into personnel costs, operating costs, maintenance costs and equipment) and revenues (separated into public funding, tuition fees, services, research grants and other sources).

Funding of the faculty is carried out within the funding of the university from two sources - the state budget, the funds of which are distributed through the Ministry of Education and Science and a special fund of the university. This special fund is replenished by students' fees for tuition, services (including clinical) and economic activities of the university, including revenues from the University's Educational Farm, whose veterinary services are provided by faculty and students, grants, diagnostic services, donations and others. From these sources the general budget of the university (including the faculty) is formed, which is approved and controlled by the Ministry of Education and Science.

Given the general level of the economy of Ukraine and compared to other faculties of the university, the Faculty of Veterinary Medicine receives sufficient funding that meets national standards. In 2019-2020, the faculty received significant investments from the university fund for the infrastructure development of and implementation of teaching methods and livestock resources.

The institution carries out economic activities, including provision of clinical treatment and diagnostic services, scientific and advisory support of livestock farms, etc. The contract students pay tuition fees, which from, a special fund of the institution is formed. The amount of staff salaries is determined by the national legislation, according to which the salary fund of the institution is formed. Additional surcharges of 30-50% of the basic salary for individual employees are possible.

The institution independently decides when and what equipment and materials to purchase at the expense of the special fund and must adhere to the targeted use of funds from the general (budget) fund in accordance with the previously approved budget.

All income from business activities and services provided (clinical and research) remain at the disposal of the university except for taxes. Taxes make for 20% of revenues and another 23.5% of the amount of wages paid. Research funding, as well as the cost of maintaining it from the amount of research grants are supervise and coordinate Academic Council Faculty and Academic Council University. Administration and accounting support of business contracts is carried out by the Department of Research and Innovation and the Accounting Department of the University on common terms for all faculties.

Every year the institution receives the number of places for budget (free for students) and contract (paid for students) forms of education, these figures are about 215 and 204 places, respectively.

For the contract form of national students the tuition fee is - 18200 UAH per year, for foreign students 1500 USD per year (groups of foreign students at the Faculty of Veterinary Medicine do not study). Payment for the contract is divided mainly on the reimbursement of tuition costs and on the provision of student learning conditions and on the activities of student government.

2.1.1. Annual expenditures during the last 3 academic years (in Euros)

Area of expenditure	AY*	AY-1	AY-2	Mean
Personnel	468714	378571	346428	397904,3
Operating costs	101964	85711	71561	86412
Maintenance costs [+]	278500	22212	18940	106550,7
Equipment	116230	56309	56740	76426,33
Total expenses	965408	542803	493669	667293,3

* Last full academic year before Visiting

[+] Including investments in the reconstruction and modernization of VTH

2.1.2. Annual revenues during the last 3 academic years (in Euros)

Revenues source	AY*	AY-1	AY-2	Mean
Public authorities	-	-	-	-
Tuition fees (standard students)	547050	509010	477300	511120
Tuition fee (full fee students)	185083	190002	108674	161253
Clinical services	11387	2672	3612	5890
Diagnostic services	30800	14128	10991	18640
Other services				
Research grants	71145	68951	15000	51700
Continuing Education	36360	41800	21900	33353
Donation	14200	9500	8400	10700
Other sources	-	-	-	-
Total revenues	896025	836063	645877	792655

2.1.3. Annual balance between expenditures and revenues (in Euros)

Academic (academic) year	Total expenditures	Total revenues	Balance ***
AY-2 (2 years before Visiting)	493669	645877	**152208**
AY-1 (one year before the Visit)	542803	836063	**293260**
AY * (Current year)	965408	896025	**-69383**

*** Total revenues minus total expenditures

The dynamics of the faculty's finances indicates an increase in revenues due to the activities of the training veterinary clinic and diagnostic services. The new equipment was purchased through international projects, including Erasmus+ KA2 project.

In the tables above all data on expenses and receipts on balance of faculty are resulted. The national budget funding system does not provide for transfers for utilities outside the university. The amount of budget funds that come to the accounts of the university depends on the number of students studying under the state order. utilities are paid for 50/50 at the expense of the state and of the funds received from the economic activities of the university, but they all go through the accounts of the university and are included in the appropriate column above.

2.2 Clinical and field services must function as instructional resources. Instructional integrity of these resources must take priority over financial self-sufficiency of clinical services operations.

The Establishment must have sufficient autonomy in order to use the resources to implement its strategic plan and to meet the ESEVT Standards.

Realizing the need to implement standards in the work of the Educational Veterinary Clinic and Laboratories, the university in 2019 and 2020 is actively investing in the construction and equipment of clinics, purchase of diagnostic and treatment equipment, so in 2019 the balance of the faculty was negative, which generally shows the level of investment in development. The university management

is determined to continue investing in the Educational Veterinary Clinic, realizing its important role as a holistic educational unit and only then as a commercial self-sustaining enterprise.

In 2017-2018, UAH 550,000 was allocated for the arrangement of the clinic. (19 thousand euros) for the reconstruction of the faculty premises, in particular the faculty clinics, at the expense of the special fund of the university. Equipment for training clinics worth 50 thousand euros was purchased. In 2019, about UAH 2.8 million (EUR 100,000) was spent on the reconstruction and purchase of equipment for the training veterinary hospital. Investments in the educational clinical complex continue, for this the university has sufficient financial autonomy. The university is also looking for additional funding from the faculty at the expense of the Ministry of Education and Science and the State Service of Ukraine on Food Safety and Consumer Protection.

2.3 Resources allocation must be regularly reviewed to ensure that available resources meet the requirements.

Projected costs and revenues for the next 3 years are expected at the same level as this year. Revenues of 700-850 thousand euros, costs of 600-650 thousand euros to support the activities of the faculty and additional investments of 100-120 thousand euros in the development and achievement of the required standards are expected.

The first part of cost planning and their purpose is the departments, which during the year based on the analysis of their needs and feedback from students and stakeholders prepare applications for replenishment of consumables, reagents, medicines, repair and purchase of equipment, reconstruction and repair of premises. Applications are accumulated and considered by the dean of the faculty and in consultation with the heads of departments a list of priority needs is created, which is proposed to be met by making the appropriate costs in the budget for next year. This list is considered at an open meeting by a collegial body - the Academic Council of the faculty, which consists of the most experienced members of the team, heads of departments and students. The dean submits the agreed list-application for consideration by the management with a substantiation. The application is evaluated by the economic service and approved by the university management.

Technical design and decisions on costs, investments and revenues are prepared by the university accounting department, based on the recommendations of management, business service, faculties and departments of the university.

As a result, the University estimates for the financial year are formed, which take into account budget and other revenues. The estimate is approved at a meeting of the Academic Council of the University, which consists of professors from all faculties. After approval by the Academic Council of the University, the Budget is approved by the Rector and sent for approval to the Ministry of Education and Science.

Unplanned current expenses, such as minor repairs of premises, purchase of low-value consumables, repair of equipment can be carried out on the basis of the application of the head of the department to the economic service of the university.

The main planned investments for the next 3 years will be: continuation of the training of the Training Veterinary Hospital, Horse Clinic, purchase of equipment for diagnostic imaging and surgery, creation of a pig farm on the Training Farm and development of a horse farm.

Comments

The financial condition of the institution corresponds to the financial condition of the country and is objectively insufficient for the rapid achievement of European standards. The strategy of financing the needs of the faculty development envisages gradual reconstruction and purchase of equipment according to the most urgent needs. The university management shows a significant commitment and understanding of the needs of the faculty and allocates significant investments from the special fund of the university.

Suggestions for improvement

The search for infrastructure grants and opportunities for targeted financing of reconstruction at the expense of the state budget or the State Service of Ukraine on Food Safety and Consumer Protection needs to be intensified.

Increase of incomes from expansion of grant activity, rendering of clinical services at the expense of improvement and expansion of services of educational veterinary clinics (preventive medicine, laboratory diagnostics, maintenance of health of a herd) which will be directed on faculty development. The range of postgraduate training services for doctors and inspectors in relevant areas (artificial insemination, anesthesiology, antibiotic resistance, current cross-border diseases, etc.) will be expanded. Attracting sponsorship.

Student learning conditions will be improved, copiers for the library will be purchased, additional computer classes, teaching equipment and tools, phantoms, visual aids, etc. will be installed. Investments will be aimed at improving the work of the Veterinary Training Hospital in order to achieve a competence level of European standards.

3. CURRICULUM

3.1. The curriculum must be designed, resourced and managed to ensure all graduates have achieved the graduate attributes expected to be fully compliant with the EU Directive 2005/36/EC (as amended by directive 2013/55/EU) and its Annex V.4.1. The curriculum must include the subjects (input) and must allow the acquisition of the Day One Competences (output) listed in Annex 2. This concerns Basic Sciences, Clinical Sciences in companion animals (including equine and exotic pets), Clinical Sciences in food-producing animals (including Animal Production and Herd Health Management), Food Safety and Quality, and Professional Knowledge.

The educational objectives of the Institution are the formation of a complex of general and special (professional) competencies in the future veterinarian, the ability to dynamically combine knowledge, skills, communication skills (soft skills) with autonomous activity and responsibility, the ability to combine effective professional and human social activities to identify production problems in order to ensure the health and welfare of animals, obtaining safe and quality food, environmental protection in accordance with the concept of "One Health". The objects of activity are the following - the system of acquisition by graduates of competencies to determine the indication of changes in the organs and systems of the body at different physiological conditions of the animal, the relationship between clinical manifestations of the disease and the results of laboratory tests; features of activity of the doctor of veterinary medicine in the conditions of functioning of branch production structures in modern conditions of management.

The modern study program of veterinary medicine training at FVM of BTNAU includes the following components: 1) fundamental knowledge of animal biology; 2) the impact on the animal body of environmental factors and technologies; 3) establishing the causes and prevention of diseases on the principles of ensuring animal welfare; 4) ensuring food security and public health; 5) clinical training by animal species and herd health management.

The educational process of veterinary specialists training is carried out in accordance with national legislation, which includes the Law of Ukraine "On Higher Education", the Law of Ukraine "On Education", the Law of Ukraine "On Veterinary Medicine", National Classification of Ukraine: Classifier of Professions DK 003: 2010, National Framework qualifications, 2011; The standard of higher education of Ukraine, specialty 211 "Veterinary Medicine" for the Master educational level (on the basis of complete general secondary education), approved by order № 558 of 24.04.2019. Ministry of Education and Science of Ukraine; other national legislative acts, orders of the Ministry of Education and Science of Ukraine, internal university regulations. Standards of higher veterinary education are approved by the Ministry of Education and Science of Ukraine, and are developed and coordinated by the structural unit of the Ministry of Education and Science of Ukraine - the State Institution "Scientific and Methodological Center for Higher and Professional Higher Education". The latter has a collegial body - the Scientific and Methodological Commission and a subcommittee on the training of specialists "Veterinary Medicine", which is formed on a competitive basis from representatives of all faculties of veterinary medicine of Ukraine. This subcommittee prepares proposals and develops primary materials for improving veterinary education in Ukraine.

Until 2014, in Ukraine, the entire cycle of training a veterinary was carried out according to the formula (4 + 2): 4 years (bachelor - a junior veterinarian who was not entitled to licensed practice). However, the thorough training of master of veterinary medicine with a term of study of 5, 6 years, which BTNAU has used since 2002 in its educational activities, was also allowed.

According to the Law "On Higher Education" (updated version of 21.06.2020), the training of veterinarians takes place only at the educational level "Master" with a term of full-time training for 6 years (5 years and 10 months). In accordance with the Law of Ukraine “On Higher Education” (Section 2, Article 5), a Master's degree is obtained in a study-professional or study-scientific program. The degree of Master of Veterinary Medicine is obtained on the basis of a complete general secondary education or

a Bachelor degree and is awarded by a higher education institution as a result of successful completion of a higher education program of 300-360 ECTS credits.

According to Article 32 of the Law of Ukraine "On Higher Education", higher education institutions have equal rights that constitute the content of their autonomy and self-government, including the right to: develop and implement study (scientific) programs within the licensed specialty; independently determine the forms of education and forms of organization of the educational process; choose the types of Bachelor's and Master's degree programs provided by the International Standard Classification of Education; independently develop and implement their own programs of educational, scientific, scientific-technical and innovative activities; independently introduce specializations, determine their content and programs of academic disciplines. The principles of academic freedom are taken into account by the "Regulations on the organization of the educational process in BTNAU": https://btsau.edu.ua/sites/default/files/news/pdf/pologen_pechat/pologen_pro_osvitn_proces_2.pdf.

The indicative curriculum is considered and recommended by the State Institution "Scientific and Methodological Center for Higher and Professional Higher Education" of the Ministry of Education and Science of Ukraine.

During the formation of the study program (SP) and the curriculum, the university follows the following recommendations: the amount of independent work does not exceed 2/3 of the total amount of the discipline. The weekly study (classroom) workload for a full-time student is not more than 28 hours per week.

In January 2020, the study program "Veterinary Medicine" was accredited for the second (Master's) level of higher education for the specialty 211 "Veterinary Medicine" in the field of knowledge 21 "Veterinary Medicine", which is held at FVM of BTNAU, and received a certificate from the National Agency for Quality Assurance in higher education (Annex I1).

National legislation allows for autonomous modification of study programs, which allowed FVM of BTNAU after a short transition period to develop and implement a modern study program for the training of veterinarians, which allowed to eliminate inconsistencies with the SOP observed during the Consultation Visit. The new curriculum allows the student to acquire adequate and in-depth competencies in all mandatory trends in public health, food safety and cyclical clinical training in animal species. The quantitative and substantive ratio of compulsory and elective courses in all years of study allows the student not only to acquire the necessary compulsory competencies, but also to form the basis of his professional career (animal clinics, state inspection service and food hygiene or veterinary science) (Annex 3.1; 3.2).

All shortcomings in the curriculum (duplication, lack, lack of consistency, transversality and/or integration of the curriculum) can be identified by all participants in the educational process (researchers, students, heads of departments, deans of the Establishment, vice-rectors and rector of the university). Identified shortcomings are submitted to the educational and methodical commission of the Institution. Meetings of this commission are held regularly, once every 2 months during the academic year. At the next meeting of the educational and methodical commission of the institution, its members consider the wishes for correction and make decisions on the expediency of making changes.

Table 3.1.1. Curriculum hours in each academic year taken by each student

Academic years	**A**	**B**	**C**	**D**	**E**	**F**	**G**	**H**
Year 1	212	170	750	320	78		144	1674
Year 2	238	132	690	313	89	8	144	1614
Year 3	282	89	834	251	146	222		1824
Year 4	304	61	838	249	98	220	234	2004
Year 5	316	82	808	196	90	308	24	1824
Year 6	220	51	786	126	166	265	246	1860
Total	**1572**	**585**	**4706**	**1455**	**667**	**1023**	**792**	**10800**

A: lectures; B: seminars; C: supervised self learning; D: laboratory and deskbased work, E: non-clinical animal work; F: clinical animal work; G: others (specify); H: total

Table 3.1.2. Curriculum hours taken by each student

Subjects	**A**	**B**	**C**	**D**	**E**	**F**	**G**	**H**
A. ***Basic subjects***								
Introduction to the specialty	14	4	48	24				90
Latin language and terminology		28	62					90
Biophysics	14		34	42				90
Zoology	14		48	28				90
Feed plant biology and toxic plants	14	2	48	26				90
Foreign language (for professional purposes)		120	120					240
Biomedical statistics and computer science	16		58	16				90
Ukrainian language (for professional purposes)		32	58					90
Chemistry	60	6	88	86				240
Cell genetics and molecular biology	14		48	28				90
B. ***Specific veterinary subjects***								
a. ***Basic Sciences***	**A**	**B**	**C**	**D**	**E**	**F**	**G**	**H**
Animal anatomy	44	6	140	70	70			330
Cytology, histology, embryology	46	6	104	27	27			210
Animal physiology	44	10	136	50	30			270
Veterinary microbiology and immunology	72	20	156	76	36			360
Pathological physiology	30	10	108	42	20			210
Anesthesiology and operative surgery	28	10	92		34	16		180
Pharmacology and pharmacotherapy	44	14	106	70	6			240
Veterinary epidemiology	16	6	50	18				90
Animal nutrition	16		56	48				120
Ethology and animal welfare	16	4	42	10	10	8		90
Parasitology and invasive diseases	46	10	104	50				210
Pathological anatomy and necropsy	30		102	28		50		210
Epizootology, infectious diseases and preventive medicine	66		128	82	12	12		300
Veterinary toxicology	16	3	42	29				90
Veterinary clinical biochemistry	14	3	48	21	4			90
Professional ethics and communications of veterinary practice	16	4	58	12				90
b. ***Clinical Sciences***	**A**	**B**	**C**	**D**	**E**	**F**	**G**	**H**
Propaedeutics and diagnostic imaging	44	14	120	32	42	18		270
Obstetrics and biotechnology of animal reproduction with basics of andrology	46	10	148	34	36	26		300
General and special surgery of large animals	30	14	120	10	20	46		240

Clinical practical training in common animal species							519	519
Medicine of internal diseases of large animals	68	8	140		64	50		330
Surgical diseases of small animals with anesthesiology and resuscitation	14	4	48			24		90
Traumatology and orthopedics of small animals	16	8	86		10	30		150
Internal diseases of small animals	16	6	86	4	10	28		150
Reproductology of small animals	16	2	42	8	12	10		90
Ruminants Diseases	48	8	156		52	36		300
Pigs Diseases	48	4	156	26	45	21		300
Poultry Diseases	48	7	156	34	23	32		300
c. ***Animal Production***	**A**	**B**	**C**	**D**	**E**	**F**	**G**	**H**
Animal production, including breeding and husbandry	32		70	48				150
Herd health management	32	10	84	8	10	36		180
d. ***Food Safety and Quality, Veterinary Public Health and One Health Concept***	**A**	**B**	**C**	**D**	**E**	**F**	**G**	**H**
Safety, quality of food and feed	60	20	118	42	30			270
Food hygiene and state control	28	10	50	32				120
Organization of veterinary service and public health	28	6	64	22				120
National and international veterinary legislation and forensic medicine	32		56	24		8		120
Zoonoses and the concept of One health	32	8	56	24				120

Table 3.1.3. Practical rotations under academic staff supervision (excluding EPT)

Types	List of practical rotations (Disciplines/Species)	Duration (hours)	Year of the programme
Intra-mural clinics (VTH)	Clinic of productive animals (ruminants and pigs)	20	3, 4, 6
	Equine Clinic	48	3, 4, 6
	Clinic of small animals	180	3, 4, 5, 6
	Clinic of poultry and exotic animals	12	3, 4, 6
Ambulatory clinics	Clinic of productive animals (ruminants and pigs)	135	3, 4, 6
	Equine Clinic	19	3, 4, 6
	Clinic of small animals	14	3, 4, 5, 6
	Clinic of poultry and exotic animals	31	3, 4, 6
	Ensuring epizootic welfare (all species of animals)	36	4
Herd health management	Productive animals	24	5
FSQ & VPH	Safety, quality of food and feed	24	4
	Prevention of zoonoses in the system of FSQ and VPH	24	5
Electives	-	-	-
Other	-	-	-

Table 3.1.4. Curriculum hours taken as electives for each student

Subjects	A	B	C	D	E	F	G	H
Basic subjects								
Life safety and civil protection /	16		42	32				90
Labor protection in the vet. medicine	16		42	32				90
Philosophy	16	32	42					90
Ecology and environmental protection	14	42	34					90
Basic sciences								
Research methodology	14	14	48	14				90
Applied cytology and histology	16		56	48				120
Radiobiology /	16	4	58	12				90
Radiographic anatomy	16	4	58	12				90
Veterinary management /	14	6	48	22				90
Organization and management of veterinary clinics	14	6	48	22				90
Food chemistry /	16	6	58	10				90
Food microbiology	16	6	58	10				90
Veterinary pharmacy	14	10	48	10	8			90
Clinical sciences								
Clinical microbiology /	14	2	62	4	8			90
Clinical immunology	14	2	62	4	8			90
Reproductive endocrinology /	16	6	42	12	6	8		90
Veterinary endocrinology /	16	6	42	12	6	8		90
Clinical and ecological toxicology	16	6	42	12	6	8		90
Bees Diseases /	16	4	58	4	4	4		90
Fur animals Diseases /	16	4	58	4	4	4		90
Fish diseases	16	4	58	4	4	4		90
Clinical pharmacology	14	10	48	10	8			90
Laboratory diagnostics /	24	14	114	38	10	10		210
Laboratory animals diseases /	24	14	114	38	10	10		210
Exotic and wild animals diseases	24	14	114	38	10	10		210
Dermatology/	14		48		14	14		90
Clinical oncology	14		48		14	14		90
Equine Orthopedics /	12	2	54		14	8		90
Small animals Neurology /	12	2	54		14	8		90
Ophthalmology	12	2	54		14	8		90
Animal husbandry								
Animal hygiene	16		56	48				120
Biotechnology and veterinary ecology	14	42	34					90
Food Safety and Quality, Veterinary Public health and One Health Concept								
Biosafety and biosecurity /	12	6	54	18				90
Bio drugs	12	6	54	18				90

Optional courses proposed to students (not compulsory). Every year in the summer students of FVM of BTNAU have the opportunity to undergo practical training in agricultural enterprises of Germany and France (internship) by participating in summer schools under the programs of the German Peasants' Union, APOLLO and FEFU during 2-3 months. According to the competitive

selection, students receive a grant for an internship on farms, where, while working with animals, they also acquire practical skills in accordance with the Day One Competences. Over the last two years, 14 students have completed an internship under the DUC program on livestock farms in Denmark and made relevant reports in the form of multimedia presentations to students and teachers with their discussion.

Before starting work in clinics (clinical rotation) students undergo theoretical and practical training, starting from the second semester of 1 year of study, during practical classes, individual tasks in supervised self-learning and preclinical practice.

During the first two years of study, students receive, first of all, preclinical training to master the knowledge and skills of general rules of care and basics of nursing, feeding, hygiene, breeding, physiology, ethology and welfare of animals of different species under the guidance of faculty and staff in the form of shifts and work with healthy animals in the training and production center of the university, vivarium and veterinary training hospital (data on the amount of hours of preclinical practice for each student are given in table 3.5.1). The results of animals' examination, the conditions of their maintenance and care (cleaning, feeding, watering, resting etc.) are drawn up in the form of appropriate protocols. Forms and rules for filling in the protocols are attached (Annex 3.3). The purpose and main tasks of preclinical training, its content by individual educational components, rules of protocols and evaluation criteria are set out in guidelines for preclinical training, which are considered and approved by the FVM Board and approved by the Rector of the University.

During the next 3, 4, 5 and 6 years of study, in addition to theoretical, students acquire practical knowledge and skills during clinical classes in the disciplines of propaedeutics and diagnostic imaging, anesthesiology and surgery, pathological anatomy and necropsy, epizootology, infectious diseases and preventive medicine, veterinary endocrinology, clinical and environmental toxicology.

Students gain special practical knowledge on the health of companion animals by studying courses in surgical diseases of small animals with anesthesiology and resuscitation, traumatology and orthopedics of small animals, internal diseases of small animals and reproductive endocrinology, dermatology, clinical oncology, ophthalmology and neurology.

For productive animals, horses and poultry, students have the opportunity to undergo clinical training in such disciplines as obstetrics and biotechnology of animal reproduction with the basics of andrology, general and special surgery of large animals, medicine of internal diseases of large animals, equine orthopedics, herd health management, ruminants, pigs, poultries diseases.

The practical skills regarding the laboratory diagnostics, biomaterial sampling, interpretation of laboratory results, diagnostic and therapeutic measures for laboratory animal diseases students acquire by taking subjects in veterinary clinical biochemistry, laboratory animal diseases and laboratory diagnostics.

In addition, before the start of clinical rotations, students master clinical skills in the disciplines of bee, fish, fur animals, exotic and wild animals diseases.

Before the beginning of the clinical rotation, students will get the main clinical exercises while working with healthy animals, dummies, through practical modeling and the use of video material.

From the 3rd to the 6th year inclusive, students undergo mandatory clinical rotation on the basis of an veterinary teaching clinic, which, according to the Regulations on educational and scientific production Interdepartmental veterinary clinic of horses, ruminants, pigs, small and exotic animals (VTH) (approved by the Scientist The University Council, Minutes № 11 of April 17, 2018), began its work in April 2018, and ambulatory clinics. In previous years, clinics also functioned, but administratively they were subordinated to the departments and had a disciplinary character.

Before the clinical practice, the dean's office and the departments of the Faculty of Veterinary Medicine provide timely distribution of students at the place of clinical rotation and coordinate its schedules, conduct instruction for students to acquaint them with the practice program, its sequence, safety and biosafety rules in terms of production, list the practical skills they should acquire during rotation in clinics, control procedures, reporting and evaluation.

Within the veterinary teaching hospital (VTH) students are rotated in the clinics of companion animals, ruminants and pigs, horses, birds and exotic animals (table 3.1.3) in groups of 2-3 students under the guidance of the duty academic staff and in the presence of a resident veterinarian. Intramural clinical training lasts 260 hours per student.

During the clinical practice in the clinic of companion animals, students gradually acquire skills in accordance with the Day One Competences, they independently register, identify, collect anamnesis, fixation, initial clinical examination of animals, preparation of the operative field. Develop diagnostic and therapeutic algorithms (dermatological, cardiorespiratory, endocrine, nephrourological, gastroenterological), acquire skills in methods of drug administration, blood sampling and other samples of biological material for research, surgical and obstetric manipulations (caesarean section, castration, injection and inhalation anesthesia, wound healing, surgery, suturing), diagnostic imaging procedures (ECG, X-ray and ultrasound), cadaver necropsy and determining the cause of death, documentation of the results of the necropsy.

For large animals and poultry, students undergo clinical rotation on the basis of VTH, training and production center of BTNAU and extramurally on the basis of farm agricultural enterprises. Within the training veterinary hospital, work in clinics of ruminants, pigs, poultry and horses is carried out in groups of 2-3 students, while extramural practice is carried out in groups of 8-12 students under the supervision of academic staff, who go to the farms and conduct there diagnostic tests, therapeutic and preventive measures for surgical, internal, obstetric and gynecological, infectious and invasive pathologies, including classes on herd health management (4 days). After the visits to the farms, the students are required to fill the protocols of the herd health examination and give their recommendations, this information is entered by students into the electronic animal registration system VetForce.

Emergency clinic, starting from February 2019, operates 24/7 - from 8.00 to 18.00 from Monday to Saturday in the normal mode, while from 18.00 to 8.00 and on Sundays and holidays - urgent assistance is provided by the duty academic staff or the resident veterinarian and the group of 2-3 duty students in accordance with a telephone message sent to the number of the clinic duty officer.

Practical training to ensure epizootic welfare (for all species of animals) is carried out in the form of extra-mural clinical practice, which aims to provide students with knowledge about the process of planning, organizing and implementing anti-epizootic preventive measures among different species of animals kept by citizens or industrial enterprises. Also, this type of practice provides students with skills in filling up the documents of vaccinations, diagnostic tests, etc. and skills of direct implementation of vaccinations and diagnostic tests directly in the production environment in a real situation. Training practice to ensure epizootic well-being is conducted for 1 week and takes 6 hours per day. At this time, the academic group is divided into subgroups of 5-6 students who perform work under the guidance of a teacher.

The internship program is planned in advance and agreed with the schedule of anti-epizootic measures in the service area of the State Veterinary Hospital of Bila Tserkva and / or Bila Tserkva district and in partner livestock farms. Students participate in the actual work of the veterinary service under the guidance of a teacher in accordance with the tasks set by the Veterinary Service. During the internship, students receive a temporary status of "Trainee" in a veterinary service, which is documented.

Here are the typical tasks that students study during their internship:

- informing the population about preventive vaccination of animals and advising animal owners (vaccination against rabies, anthrax and Newcastle disease in Ukraine is free for the owner and mandatory, it is provided by the state veterinary service);
- vaccination of carnivores against rabies in the city and district;
- vaccination of poultry against Newcastle disease in the yard;
- sampling of blood serum from cattle for leukemia and brucellosis;
- cattle tuberculinization;
- vaccination and diagnostic tests of cattle, poultry, pigs in farms of the relevant profile.

Each group of students performs all types of work due to the planned rotation during the internship. Before the start of the internship there is an initial briefing (2 hours), after the end of the internship - a final seminar and defense of reports (2 hours).

The purpose and main tasks of clinical teaching practice, its content by individual educational components, rules of documentation and evaluation criteria are set out in the guidelines, which are considered and approved by the FVM Committee (Minutes №1 from 29.08.2019), approved by the Rector of the University.

The discipline "Food and feed safety and quality" is taught in the 4th year of study throughout the whole study year (semesters 7-8), the discipline "Food Hygiene" - in the 5th year (semester 9). Classes are held in the conditions of the department and research laboratory of veterinary and sanitary examination and hygiene of livestock products of BTNAU. The Department of Veterinary Sanitary Examination, Animal Hygiene and Pathological Anatomy provides practical classes (seminars, laboratory and descriptive work, non-clinical work on animals) with the necessary material (individual products of animal slaughter, samples of various food products, materials and reagents for quality and safety research food products), educational videos. The department has close relations with businesses. Students undergo practical training (separate practical classes, training practice) in agricultural enterprises, slaughterhouses, processing enterprises, retail enterprises, testing laboratories, with which the provisions on the establishment of a branch of the department in production and agreements on industrial training and research cooperation:

a) agricultural enterprises for primary production and provision of milk. Bases of practice: training and production center of BTNAU, FG "Tomylivske" of Bila Tserkva district. During the internship, students consolidate theoretical knowledge and gain practical skills in the production hygiene and primary milk processing.

b) enterprises for the animal origin food production. Bases of practice: ***Dairy processing enterprises:*** "ZhLK-Ukraine" Bila Tserkva (dairy processing enterprise). Students consolidate in practice the theoretical knowledge of milk processing hygiene and control of dairy production over the course of the technological process. ***Meat processing enterprises:*** Antonivsky Meat Processing Factory, Bila Tserkva District (slaughterhouse), Barvinok Invest, Myronivka, Kyiv Region (slaughterhouse), Myronivsky Khliboprodukt, Myronivka, Kyiv Region (slaughterhouse enterprise) poultry), LLC "BMK MATADOR" Myronivka, Kyiv region (slaughterhouse), "Marshalok" Bila Tserkva, Kyiv region (meat processing enterprise), "Lysenko" Myronivka, Kyiv region, "Verkholaz NO" Myronivka, Kyiv region (fish processing enterprise). Students consolidate in practice theoretical knowledge of the slaughter hygiene and primary processing of animals, conduct pre- and post-slaughter inspections of products of slaughter of animals, master the method of state control during the production chain of meat products.

c) testing laboratories. Bases of practice: Research Laboratory of Veterinary and Sanitary Examination and Hygiene of Livestock Products of BTNAU, Bila Tserkva State Laboratory of Veterinary Medicine, Testing Laboratory of "Kyiv Regional Research and Production Center for Standardization, Metrology and Certification" (Bila Tserkva). In the Research Laboratory of Veterinary Sanitary Examination and Hygiene of Livestock Products, students conduct research on food quality and safety. In other testing laboratories, students study the organization and operation of laboratories, their accreditation and metrological support; laboratory quality control procedures and food safety.

d) state laboratories of veterinary and sanitary examination of agri-food markets. Bases of practice: Department of the State Service of Ukraine on Food Safety and Consumer Protection in Bila Tserkva (6 state laboratories of veterinary and sanitary examination in the markets). Students under the guidance of a teacher of the department and a veterinarian of the laboratory in the inspection hall of the laboratory conduct post-mortem inspection of carcasses and other products of slaughter of animals (cattle, pigs, poultry, rabbits and coypu). The company provides material for research (carcasses, meat cuts, internal organs) in sufficient quantities. In the laboratory, students assess the

quality of aquaculture and beekeeping products, eggs, dairy products, plant foods; study the procedure for disinfection and disposal of waste samples of products and confiscations.

e) border inspection post. Base of practice: Bila Tserkva Border Inspection Point of the South-Western Regional Service of State Veterinary and Sanitary Control and Supervision at the State Border and Transport). Students get acquainted with the activities of the border inspection post, state control procedures at the border and record keeping.

f) food retail enterprises. Bases of practice: retail trade networks and markets (in the control zone of the Department of State Service of Ukraine on Food Safety and Consumer Protection in Bila Tserkva). Students under the guidance of a lecturer of the department and an official veterinarian study the hygienic requirements for the sale of food products in retail chains, the procedure for state control of food products in direct sales networks.

Part of the hours provided by the program of the discipline for self-learning work, students also use to consolidate practical skills in the research laboratory of the department and production. Students practice in the discipline "Safety, quality of food and feed" in the 8th semester (for one academic group: 24 hours - 4 days). In the enterprises, a group of students is divided into 2-3 subgroups of 8-12 people working under the supervision of academic staff and specialists of the enterprise. At the end of the internship, students fill up reporting documentation (diary with appendices and a brief summary). Reports are defended at the department, grades are placed in the record book.

In the curriculum, students are offered 36 elective subjects, from which they can choose 18 subjects (50%). Starting from the 1st year, applicants for higher education have the opportunity to form an individual educational trajectory. For this the dean's office offers students to pre-read the catalogs of elective courses of FVM and other faculties of BTNAU, posted on the university website. At the beginning of the semester, the students of the relevant course gather in the classroom and the professors in elective subjects present their courses. After that, students write applications for their chosen disciplines. The dean's office of FVM processes applications and in case of recruitment for the discipline of 12 or more students forms groups for training. If the number of students wishing to study the discipline is less than 12, the dean's office organizes a re-meeting with these students and invites them to join groups in those disciplines where the majority is recruited. In this case, students write repeated applications. The selection procedure is described in the "Regulations on elective courses at Bila Tserkva National Agrarian University" https://btsau.edu.ua/sites/default/files/Faculties/osvita/normatyvne/polog_vubirkov_duscup_BTNAU.pdf

Procedures for ascertain the achievements of each core clinical activity by each student are carried out in accordance with the Regulation "On practical training of students of BTNAU", https://btsau.edu.ua/sites/default/files/Faculties/osvita/dualna/pologen_praktyka_BTNAU_2017.pdf "On the assessment of learning outcomes of higher education in BTNAU" https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_pro_ocinuvan_result.pdf, guidelines for preclinical training (Annex 3.3), guidelines for clinical training and external practical training (reviewed and approved by the FVM Board (Minutes №1 from 29.08.2019 and №2 from 08.10.2019) and approved by the Rector of the University (Chapter «Guidebooks» in the website http://vet.btsau.edu.ua/).

Registration of learning by the student of pre-clinical practical achievements is carried out in the form of filling in the according protocols of a credit book on practical skills of pre-clinical preparation. Protocols, tables and relevant columns of this "Credit book" are certified by the signature of the supervisor of preclinical training. At the end of the pre-clinical practice, the student submits a report, which is checked and evaluated by the responsible teacher, such a decision is approved by the relevant minutes of the meeting.

All clinical activity performed by the student is reflected in the relevant protocols, computer program for electronic registration of animals VetForce, in addition, all practical skills acquired by the student during clinical rotation in accordance with the Day One Competences are recorded and evaluated by the supervised academic staff in the individual record book, which was recently

developed and implemented from 2020 (http://vet.btsau.edu.ua/). In addition, traditionally, after the end of the clinical practice, the students fill up a report, the defense of which is carried out at the department, the grades are put down in the academic credit-book.

At the end of the external clinical practice, the students fill up reporting documentation (diary with appendices and a report with a brief summary). The reports are defended at the department and the grades are posted in the credit book.

Description of the procedures used to ascertain each student's achievement of practical / clinical activity

Types of training	Procedures for confirmation the achievements
Preclinical training	Filling up and defense of animal and poultry examination protocols, writing and defense the report
Clinical training	Filling up and defending curations, examination and treatment protocols for animals and poultry, registering the clinical activity by filling out journals of practical work in the clinic, individual record book of practical skills, electronic registration of clinical activities of students in VetForce, writing and defending the report of clinical training
Ambulatory clinics	Writing and defending term papers, curations, protocols for research and treatment of animals and poultry, registering the clinical activity by filling out journals of practical work in the clinic, individual record book on practical skills, electronic registration of students' clinical activities in VetForce, writing and defending the report of clinical training
EPT	Arrangement of protocols of animals and poultry examination and treatment, writing and defense of reporting documentation (practice diary, report)

3.2 Each study programme provided by the Establishment must be competency-based and designed so that it meets the objectives set for it, including the intended learning outcomes. The qualification resulting from a programme must be clearly specified and communicated and must refer to the correct level of the national qualifications framework for higher education and, consequently, to the Framework for Qualifications of the European Higher Education Area.

The Establishment must provide proof of a QA system that promotes and monitors the presence of an academic environment highly conducive to learning including selflearning. Details of the type, provision and updating of appropriate learning opportunities for the students must be clearly described, as well as the involvement of students.

The Establishment must also describe how it encourages and prepares students for selflearning and lifelong learning.

The basis of training of veterinary specialists at FVM of BTNAU is a comprehensive approach that combines practical training, innovation and international integration, the opportunity to participate in academic mobility programs (Erasmus+), internships abroad in modern agricultural enterprises, obtaining modern knowledge in lectures and master classes of foreign teachers and experts, domestic professionals-practitioners, receiving professional advice from employers during lectures, on the job during internships, research activities by participating in student research groups, scientific and practical conferences. Participation of students in reviewing the study program, formation of their individual educational trajectory by choosing elective disciplines, disciplines, self-learning activity of

students through independent choice of scientific circles, interactive teaching methods, various forms of independent work prepare students for self-study.

All this in general improves the quality of the curriculum, promotes the development of the academic environment and the orientation of students to lifelong learning.

3.3 Programme learning outcomes must:

- **ensure the effective alignment of all content, teaching, learning and assessment activities of the degree programme to form a cohesive framework**
- **include a description of Day One Competences**
- **form the basis for explicit statements of the objectives and learning outcomes ofindividual units of study**
- **be communicated to staff and students**
- **be regularly reviewed, managed and updated to ensure they remain relevant, adequate and are effectively achieved. Description of the educational aims and strategy in order to propose a cohesive framework and to achieve the learning outcomes**

Program learning outcomes are set out in the study program. The knowledge and skills that students must acquire to achieve the required learning outcomes are described in curriculum and summary in each discipline (http://vet.btsau.edu.ua/).

The content of students' training is formulated according the competencies and learning experts (Annex 3.4). The ESEVT learning outcomes, criteria and indicators are taken into account during the review of the study program and the curriculum. Particular attention was paid to the modernization of methodological approaches and practical training in accordance with the requirements of the OIE on the Day One Veterinarian Competencies. Thanks to this analysis, the curriculum is optimized for the mandatory and selective components.

In accordance with the "Regulations on the system of internal quality assurance of education and educational activities in BTNAU", "Regulations on the evaluation of learning outcomes of higher education in BTNAU", "Regulations on the learning management system Moodle in BTNAU" participants are provided with information on goals, content and expected learning outcomes, procedure and evaluation criteria. This information within certain disciplines is placed in the curriculum, it is provided to participants in the educational process in electronic form on the remote platform Moodle. Students get acquainted with these materials at the beginning of the academic year (usually in the introductory lesson in each discipline). The university website presents study programs, curricula, catalogs of disciplines, schedule of the educational process, schedule of classes, results of questionnaires, links to distance learning, etc. Information on the educational process at FVM can also be found on the page of the faculty, posted on the website of BTNAU.

Academic staff, employers (EPT providers) and students are active participants in the educational process. They are part of the project group, the group on the content and quality of education of the faculty. Every year, teachers undergo in-service training, where they have the opportunity to communicate with employers and graduates in the production environment, to obtain from them information on current production needs and requirements for veterinary specialists. Suggestions and wishes are taken into account when reviewing the SP and curriculum. Discussion of the SP project, curriculum and learning outcomes is held at meetings of the group on the content and quality of education, departments and faculty council, where they are analyzed for the need of updating.

3.4 The Establishment must have a formally constituted committee structure (which includes effective student representation), with clear and empowered reporting lines, tob oversee and manage the curriculum and its delivery. The committee(s) must:

• determine the pedagogical basis, design, delivery methods and assessment methods of the curriculum

• oversee QA of the curriculum, particularly gathering, evaluating, making change and responding to feedback from stakeholders, peer reviewers and external assessors, and data from examination/assessment outcomes

• perform on going and periodic review of the curriculum at least every seven years by involving staff, students and stakeholders; these reviews must lead to continuous improvement. Any action taken or planned as a result of such a review must be communicated to all those concerned

• identify and meet training needs for all types of staff, maintaining and enhancing their competence for the ongoing curriculum development

Training within the specialty "Veterinary Medicine" is carried out according to the study program (SP). Procedures for development, approval, monitoring and periodic review of study programs in BTNAU are regulated by "Regulations on educational programs at Bila Tserkva NAU" https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_osvit_prog.pdf.

The SP includes the list of disciplines and the logical sequence of their study, the number of ECTS credits required to complete this program, competencies and learning outcomes. Compliance with the requirements is controlled by the internal quality assurance system of the university in accordance with the provisions https://btsau.edu.ua/sites/default/files/Faculties/osvita/normatyvne/polog_vn_syst_qa_BTNAU.pdf.

According to the "Regulations on the organization of the educational process in BTNAU" (https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/pologen_pro_osvitn_proces_2.pdf) SP is annually reviewed and updated if necessary. Study programs are considered at a meeting of the group on the content and quality of education and the faculty council. SP is approved by the Academic Council of the University. On the basis of SP, the staff of the dean's office of the faculty draws up a curriculum, which is approved by the department of monitoring the quality of education and study work, vice-rector for educational and international activities of the university, and then approved by the rector. The approved curriculum is posted on the BTNAU website (https://btsau.edu.ua/uk/content/osvitni-programy) and on the FVM page (http://vet.btsau.edu.ua/), as well as sent to the departments that provide the educational process in the specialty "Veterinary Medicine". In accordance with the SP and curriculum, the departments annually review and update work programs in the disciplines considered at the meetings of the departments, the methodical commission of the faculty in August before the beginning of the new academic year and approved by the vice-rector for educational and international activities. Updated work programs for the beginning of the academic year are posted on the Moodle remote platform for each discipline.

Students have the opportunity to present their opinion on the educational process, as they are part of the group on the content and quality of education, student government. For higher education students, an anonymous survey is conducted on the quality of teaching and content of disciplines, wishes for changes within disciplines, study program and curriculum. The results of the survey are reflected in the design of the SP for the next period. Questionnaires and results of student questionnaires are posted on the website of BTNAU (section "Quality of Education", subsection "Quality Monitoring"): https://btsau.edu.ua/uk/content/yakist-osvity.

3.5. External Practical Training (EPT) is compulsory training activities organised outside the Establishment, the student being under the direct supervision of a non-academic person (e.g. a practitioner). EPT cannot replace the core intramural training nor the extramural training under the close supervision of academic staff (e.g. ambulatory clinics, herd health management, practical training in FSQ and VPH).
Since the veterinary degree is a professional qualification with Day One Competences, EPT must complement and strengthen the academic education inter alia by enhancing student's professional knowledge.

Organization, conduct and control of students' external (internship) practical training (EPT) of the Establishment is carried out in accordance with the "Regulations on practical training of students of Bila Tserkva National Agrarian University" https://btsau.edu.ua/sites/default/files/Faculties/osvita/dualna/pologen_praktyka_BTNAU_2017.pdf

This Regulation is the basis for the development of regulations on the organization of industrial practice at the faculties, taking into account the peculiarities of training in the specialty. It assumes that the external practice of students is an integral part of the educational and professional training program. It aims to test the competencies and clinical skills acquired by students during their studies, to improve them in the following areas: veterinary support of livestock industries, work in clinics of production and companion animals, food safety and public health.

The purpose of the training is also the formation and development of students' professional ability to make independent decisions in terms of specific production, ability to communicate and socialize. External practice also involves the collection of the experimental component to perform the practical part of the master thesis. Undergraduate students of the Faculty of Veterinary Medicine undergo an internship in the 4th year (8 semester) and 6th year (12 semester) for 11 weeks in a total of 420 hours, 5 weeks of which the student undergoes external clinical practice on production animals on farms in accordance with concluded agreements, 4 weeks - on companion animals on the basis of clinics for small animals also according to agreements, and on 1 week on 4 and 6 courses on FSQ + VPH.

External practical training of students takes place under the guidance of a practicing veterinarian, who is appointed to supervise the practice according to the order of the regional department of the State Service of Ukraine on Food Safety and Consumer Protection in accordance with the agreements with FVM of BTNAU (Annex 3.5).

Students independently choose the place of external practice. Enterprises that are the bases for internships must: meet the requirements for internships; provide the trainee with the first job; if there are technical means provide access to the Internet; provide housing that meets sanitary requirements for the period of practice; ensure compliance with safety conditions; if possible, provide further employment of the graduate after graduation.

Students of the faculty during the external practical training are obliged to:

- before the start the training to receive from the supervised staff at the faculty directions, methodical materials (methodical instructions, program, diary), consultations on registration of all necessary documents;
- fully perform all tasks provided by the program of practice;
- comply with the rules of labor protection, safety, biosafety and internal regulations;
- be responsible for the work performed;
- timely take a test and defend the EPT report.

The responsible of students' practical training person from the university should: inform students about the reporting system that must be provided to the university after the end of the training, as well as check the progress of EPT by students.

The purpose and main tasks of industrial practice, its content by individual educational components, rules of documentation and evaluation criteria are set out in the guidelines, which are considered and approved by the Board of FVM (Minutes №2 from 08.10.2019), approved by the Rector of the University.

Table 3.5.1. Curriculum days of External Practical Training (EPT) for each student

Fields of Practice	Minimum duration (weeks)	Year of programme
Production animals (pre-clinical) *	4 (144 hours, 6 days×6 h)	1-2
Companion animals (pre-clinical) *	4 (144 hours, 6 days×6 h)	1-2
Production animals (clinical)	5 (180 hours, 6 days×6 h)	4, 6
Companion animals (clinical)	4 (160 hours, 5 days×8 h)	4, 6
FSQ+VPH	1 (40 hours, 5 days×8 h) 1 (40 hours, 5 days×8 h)	4 6
Other	-	-

* - preclinical practice of students is carried out under the supervision of academic staff.

3.6 The EPT providers must have an agreement with the Establishment and the student (in order to state their respective rights and duties, including insurance matters), provide a standardised evaluation of the performance of the student during their EPT and be allowed to provide feedback to the Establishment on the EPT programme. There must be a member of the academic staff responsible for the overall supervision of the EPT, including liaison with EPT providers.

The University has a Department of Marketing, Licensing and Accreditation, which includes a specialist in promoting employment of students and graduates (Associate Professor Liskovich V.A.), which deals with cooperation with employers, the organization of EPT for students, including the search for enterprises, institutions and organizations (employers), the introduction of a feedback system between enterprises, institutions, organizations and the university to obtain an objective assessment of the quality of professional training of students. Associate Professor Shmayun S.S. is responsible for the connection with production and practical training of students at FVM. Employers (EPT providers) are involved in the educational process during the organization and conduct of EPT (according to the concluded agreements – Annex 3.5), as well as - classroom classes. Bases of practical training of students of FVM of BTNAU are the enterprises and capacities which make production of animal husbandry and carry out primary processing of slaughter animals (agricultural enterprises, agrofirms, poultry farms, animal farms, dairy farms, livestock complexes of Ukraine and foreign countries, slaughterhouse); carry out diagnostic and laboratory research (research laboratories of BTNAU, testing laboratories), clinics of small domestic animals, zoos, regional Departments of the State Service of Ukraine on Food Safety and Consumer Protection, etc. Employers (EPT providers) take an active part in the organization and conduct of EPT, manage the internship at the enterprise. The content and tasks of practical training are agreed with the employers who are members of the employers' council. Bases of practices, branches, schedule of practices are posted on the BTNAU website. At the end of the EPT host (veterinarian) certify the diary and give a description of the student with an assessment of the completeness of the training program and acquired competencies.

Feedback from production is also provided by monitoring (by means of questionnaire)s. The questionnaire for evaluating the cooperation of the university with employers and the questionnaire for evaluating the study program are posted on the BTNAU website https://btsau.edu.ua/uk/content/yakist-osvity,

3.7 Students must take responsibility for their own learning during EPT. This includes preparing properly before each placement, keeping a proper record of their experience during EPT by using a logbook provided by the Establishment and evaluating the EPT. Students must be allowed to complain officially and/or anonymously about issues occurring during EPT. The Establishment must have a system of QA to monitor the implementation, progress and then feedback within the EPT activities.

Regulations "On practical training of students of BTNAU", "On evaluation of learning outcomes of higher education at BTNAU" determine the procedure for appealing the results of control measures and their re-passing, types of control measures and procedure, forms, methods and criteria for evaluating student learning outcomes, procedures consideration of students' applications for assessment:
https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_pro_ocinuvan_result.pdf;
https://btsau.edu.ua/sites/default/files/Faculties/osvita/dualna/pologen_praktyka_BTNAU_2017.pdf.

The student can present the remarks and offers concerning the organization and carrying out EPT in the generalization of the reporting documentation, and also to address with complaints or offers to the dean's office, to the person responsible for communication with production and practical training at faculty. In addition, the university conducts an internal audit of the quality of the educational process in accordance with the "Regulations on the procedure for conducting an internal audit of the quality assurance system and the implementation of corrective and preventive actions at BTNAU" https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_pro_proved_vnutr_audit.pdf. During the internal audit, students' complaints or comments on EPT (if any) are reviewed and corrective actions are developed.

Comments

Over the last three years, transitional changes have been made to the curriculum, which allowed to develop and implement a radically updated curriculum for master's studies lasting 6 years, taking into account the requirements of Directive 2005/36/EC (as amended by Directive 2013/55/EU). The main differences from the curriculum of previous years: introduced a number of new disciplines by category according to the requirements of ESEVT SOP 2019; eliminated learning trajectories (specializations); a clear distinction is made between educational, preclinical and clinical practices; a clear division of duty in clinics by animal species is made. The curriculum includes mandatory and optional components. The changes in the curriculum and methodological approaches are aimed at implementing the OIE recommendations on the Day One Veterinarian Competencies.

Suggestions for improvement

The introduced new curriculum is unique for Ukrainian faculties of veterinary medicine, as it takes into account the recommendations and requirements of the SOP. At the same time, its implementation requires careful monitoring and analysis by all stakeholders: teachers, students, external stakeholders and veterinarians.

4. FACILITIES AND EQUIPMENT

4.1. All aspects of the physical facilities must provide an environment conducive to learning, including internet access. The veterinary Establishment must have a clear strategy and programme for maintaining and upgrading its buildings and equipment. Facilities must comply with all relevant legislation including health, safety, biosecurity, accessibility to people with reduced mobility, and EU animal welfare and care standards.

The central building (№1) of the University is located in the center of Bila Tserkva. The Faculty of Veterinary Medicine gradually became part of the residential quarters with the development of the city. Due to this, new buildings were built for the faculty on the outskirts of the city, which have been operating since 1991.

The educational buildings (campuses) of the Faculty of Veterinary Medicine are located 1.5 km from the central building of the university. The campuses includ educational buildings № 8, № 9, № 10, educational veterinary clinic specialized in horses, ruminants, pigs, small and exotic animals with isolators and a separate block of animal reproduction by species, a separate block of necropsy. Within the campuses there is an area for walking and grazing animals. Clinic facilities are fenced, marked with biosafety symbols and are guarded.

The structural subdivisions of Bila Tserkva NAU are the training and production center, which is located 3 km away from FVM. Its total area is 1716.9 hectares, including the area of agricultural land - 1422.2 hectares, farms keep 290 heads of cattle, 165 heads of sheep, 19 heads of horses, 16,700 heads on a poultry farm, which has its own slaughterhouse.

Student dormitories and the central student canteen are located 200 m from the educational buildings (Annex 4.1). Public transport provides connection of FVM with other districts of Bila Tserkva.

Students study at FVM in the main and three other buildings (№№ 8−10). For the lecture course and practical classes rooms with a total area of 4238.2 m^2 are used. All educational buildings have wardrobes. Students leave their outerwear in them. VTH has a total area of 1100 m^2. In separate rooms (Block G, D) there are insulation cells for animals of different species.

During 2017−19 the reconstruction and modernization of clinical buildings was carried out and an interdepartmental educational veterinary clinic (VTH) was established. It has a general management, but the clinic of each species has separate blocks of rooms with its own infrastructure with a common hematology laboratory and a molecular diagnostic laboratory (created with the support of Erasmus+KA2 Ag-Lab).

After the Consultation visit in 2018, the university administration continued the policy of modernization of premises and equipment to ensure the operation of FVM clinics. At the same time, the operating room for companion-animals was completely reconstructed, the construction and equipment of isolators (for certain species of animals) were completed in accordance with biosafety standards, a horse clinic was built and the modernization of the animal necropsy unit was completed. Additionally, machines for horses treatment, operating table for horses, sets of instruments (surgical and obstetric) for all types of animals, treatment and operating machines for cattle, resuscitators for calves, veterinary ketometer-glucometer, automatic sterilizers, electronic scales for animals, veterinary infusion pumps, portable veterinary pulse oximeters, breathing bag Macintosh type laryngoscope, portable ultrasound scanner, ENT scanning kits, biological microscopes, freezers, eye washers, corkscrews, washing machines for necropsy room and sectional storage room material, operating tables for small companion animals, ophthalmic tonometer, slit lamp, surgical kit prefabricated for ophthalmology, biosafety equipment and materials for insulators, portable mobile X-ray machine IMAX-102. VTH's funds are aimed at building its infrastructure and expanding service opportunities.

Diagnostic and laboratory equipment is licensed, subject to annual certification, licensed equipment and premises for radiography in accordance with national legislation. For its part for the purpose of current service at faculty the engineer of the corresponding specialty works.

On the territory of the training and production center there are training laboratories: for quality control and safety of milk (S = 350 m^2), for horse breeding and sheep breeding (S = 741.6 m^2); for growing young cattle (S = 1498.4 m^2); from biotechnologies of reproduction in dairy cattle breeding

(S = 1510.8 m^2), from technologies in poultry farming (S = 701.8 m^2); from bioresources and aquatic aquaculture (S = 391.8 m^2). In these laboratories, students undergo intramural practice. It is planned to build a laboratory for pig fattening technology (S = 1264.3 m^2).

In addition, the faculty, based on cooperation agreements, has a number of branches in clinics, agricultural enterprises, processing plants and laboratories in order to expand the opportunities for practical work for students, increase the number of animals and biological material in the educational process (Annex 4.2).

Students acquire skills in proper production and hygiene practices, production technologies that ensure safe and quality products of animal origin. Acquire the skills of personal hygiene of staff involved in the food chain "From the field to the table." Evaluate the procedures for proper storage and transportation of processed industrial products (Annex 4.3).

Due to the proximity of the location of the training and production center and the presence of branches of clinics, a significant proportion of training on animals is carried out on his farms on both healthy and sick animals.

In addition, each department has research laboratories, which also train students, where they conduct clinical laboratory research.

4.2 Lecture theatres, teaching laboratories, tutorial rooms, clinical facilities and other teaching spaces must be adequate in number, size and equipped for the instructional purposes and must be well maintained. The facilities must be adapted for the number of students enrolled. Students must have ready access to adequate and sufficient study, selflearning, recreation, locker, sanitary and food service facilities.

Offices, teaching preparation and research laboratories must be sufficient for the needs of the academic and support staff.

Lectures are held in three buildings №№ 8−10, in 13 classrooms, which are equipped with multimedia projectors, laptops and Internet. It is also possible to hold seminars in lectures. In addition, on each floor of the building № 8 there are 6-7 rooms for theoretical and practical classes at the rate of 20-25 students, as well as rooms for academic and support staff and research laboratories. On each floor of the building there are recreation (S = 30 m^2), where students have the opportunity to relax after classes with a WiFi zone, as well as bathrooms. In each building during the day there are buffets with the possibility of hot meals. There are libraries for students in buildings 1, 8, 9, which have a reading room with computers, the Internet and a subscription. The literature has a biological and veterinary profile. In the building №1 there is a library, which has a subscription to fiction. Computer classes, museums of surgical pathology, anatomy and pathology anatomy, parasitology are also used for self-preparation of students. The clinics are equipped with separate rooms for regular students.

Table 4.2.1. The total area of FVM buildings

№ of building	Area, m^2	Unit
8	8409	block A
	1541	block A
	508	block A
	401	block A
	350	vivarium
	265,8	horse clinic
9	11024	
10	4556	

Table 4.2.2. Total area of classrooms

a) Lecture halls			
	Building №8	**Number**	**Area, m^2**
Block A	Less than 150 seats	2	104
	More than 150 seats	2	379
	Building № 9		
	Less than 150 seats	3	346,8
	More than 150 seats	3	533,3
	Building №10		
	More than 250 seats	1	269
	Less than 100 seats	2	150,3
	Total	**13**	**1782,4**
b) Premises for group work (seminars and consultations)			
	Rooms	Number	Area
	Rooms for seminars, consultations	18	967,6
	Rooms for practical work	26	1397,8
	Total	**44**	**2365,4**
c) Laboratories, premises for clinical training			
	Complex of clinics	4	1095,8
	Research	1	49
	Clinical laboratory diagnostics	2	121,1
	Molecular diagnostics laboratory	1	107,7
	Total	**8**	**992**

Departments of normal and pathological physiology, microbiology and virology are located in the building № 9, which are separated with limited access in the block of premises. The Department of Microbiology is equipped with laboratory workshops, rooms for autoclaving, preparation of media, bacteriological laboratory with appropriate equipment (microscopes, autoclave, air sterilizer, stationary boxing).

The Department of Anatomy and Histology has a museum, bone base, microscopic analysis laboratory, taxidermy and museum laboratory, corpse material storage of about 80 m^2, preparation room, microscopes for each student workplace and microscopes with electronic programming. Anatomy classes use a bone base (about 7000 bones from different animals), "wet" anatomical preparations (without formalin fixation) and an X-ray museum. Histology uses histological preparations of different tissues and organs by different methods of staining.

At the Department of Food Hygiene and Veterinary Examination, the students work with biological material that comes from poultry slaughterhouses, fisheries and university farms, processing and agricultural enterprises, state laboratories of veterinary examination in the markets.

In the laboratory of clinical biochemistry (Department of Therapy and Clinical Diagnostics) and the interdepartmental research laboratory for the diagnosis of animal diseases, students under the guidance of teachers conduct research on various biological substrates (blood, urine, cerebrospinal fluid, stomach contents and rumen).

In the laboratory of parasitology (Department of Parasitology and Pharmacology) students conduct helminthic and larvosopic studies.

In the research laboratory (Department of Epizootology and Infectious Diseases of Animals) under the guidance of teachers, students perform various serological reactions: immunodiffusion reaction (RID), neutralization reaction (RN), complement fixation reaction (CFR), agglutination test (RA).

In the educational and scientific laboratory of the Department of Obstetrics and Biotechnology of Reproduction, students assess and determine the quality of sperm, its storage, artificial insemination of various species of animals and transplantation of embryos in rabbits

The surgery widely uses video films of its own production, as well as museum material on the pathology of bones, joints and hooves, electronic atlases of radiographs.

The Museum of Pathological anatomy and the electronic database of histological preparations are used in the study of pathological anatomy.

The laboratory (S = 51 m^2) of clinical mannequins for carrying out to clinical training and mastering of skills (research of cardiovascular, respiratory systems, carrying out various parenteral injections) is created.

4.3 The livestock facilities, animal housing, core clinical teaching facilities and equipment used by the Establishment for teaching purposes must:

- **be sufficient in capacity and adapted for the number of students enrolled in order to allow safe hands-on training for all students**
- **be of a high standard, well maintained and fit for the purpose**
- **promote best husbandry, welfare and management practices**
- **ensure relevant biosecurity and bio-containment**
- **be designed to enhance learning.**

Farm animals are kept in block B (building 8). For pigs, there are five cages in the room, each measuring 9 m^2 (45 m^2 in total). In the same block there are three logs for keeping horses (7.5 m^2, 10.5 m^2 and 9 m^2). In addition, there are seven diaries for keeping ruminants (6 m^2; 6.9; 6.6; 6.3; 5.7; 6.9 and 6.3 m^2).

Schemes of arrangement and logistics of individual clinics by animal species are presented in the annexes (Annex 4.4, 4.5, 4.6).

Table 4.3.1. Areas for keeping animals in clinics

Species of animals	healthy		sick		isolation	
	Number of seats, heads	Area, m^2	Number of seats, heads	Area m^2	Number of seats, heads	Area, m^2
Dogs Cats	3	50	2	25	8 6	40 35
Cattle	2	13	2	13	5	54,8
Small ruminants	2	12	1	6,6	3	53,7
Horses	1	10	1	22	1	27,7
Pigs	2	17	3	26	3	43,0

Table 4.3.2. Areas for keeping Industrial Training centre animals

Species of animals	Number of animals, heads	Area of room, m^2
Horses	19	280
Cattle	290	5520
Small cattle	165	250
Poultry	16050	2524,5

Table 4.3.3. Areas of infrastructure of the interdepartmental veterinary clinic (VTH)

Species of animals	Rooms	Number	Area, m^2
Companion animals	Manipulative	4	209
	Clinical laboratory diagnostics	2	70
	Intensive care	2	70
	Preventive medicine	1	20

	X-ray	1	50
	Operating	3	170
	Sterilization	2	20
Ruminant	Diagnostic and manipulative	3	120
	Operational and manipulative	1	50
Pigs	Operating room	1	18
Horses	Operational and manipulative	1	75,1
Necropsy complex		1	175

Necropsy is performed in a separate section hall (Block A), which is equipped with refrigerators, tables for necropsy and the necessary tools for its conduct. A sufficient number of overalls is provided for students This department has logistics and biosafety facilities, equipped with refrigerators, a crane-beam for transporting and lifting large animals. Sewage from the necropsy hall enters the insulated sewer (Annex 4.7).

The clinic of companion animals is represented by an integral complex, which includes a reception, examination and manipulation room, diagnostic imaging room (electrocardiography, ultrasound diagnostics), a room for primary surgical care, a sterile operating room, a unit with a postoperative room, an X-ray room, an X-ray room , office of preventive medicine, hematology laboratory, room for clinical seminars, room for academic staff and room for students. The pig clinic has an operating room, 4 boxes, a bathroom, a room for students and a room for residents. The Ruminant Clinic has the same infrastructure. These two clinics have a common laboratory for processing primary samples. The horse clinic includes a room for treatment of limbs and oral cavity and cleaning of the animal, a room for examination and diagnostics, a room for anesthesia, an operating room and a postoperative diary. All clinics are equipped with diagnostic imaging: patient monitors, X-rays, ultrasound, anesthesia-respiratory system, laparoscope.

The following is a list of laboratories that provide training, research and other services.

Table 4.3.4. Diagnostic services, including necropsy

Name of the unit	Building, №	Number of rooms	Area, m^2
Educational and research laboratory of the Department of Epizootology and Infectious Diseases	8	2	154,2
Laboratory of microbiological research	9	2	67,5
Department of Laboratory Diagnostics	10	3	159,9
Laboratory of veterinary and sanitary examination and hygiene of livestock products	8	3	152,8
Laboratory of hemostasiology	8	1	50,0
Research Laboratory of Animal Diseases (interdepartmental)	8	2	75,3
Educational and scientific laboratory of the department of obstetrics	8	1	50,4
Laboratory of Parasitology, Department of Parasitology and Pharmacology	8	1	45,3
Laboratory of pathohistology	8	1	54,0
Laboratory of molecular diagnostics	8	5	109,3
Laboratory of Milk and Meat Production Technology	9	1	19
Clinical Biochemistry Laboratory	8	1	51,2
Biotechnology Laboratory	9	2	43
Cathedral Laboratory of Biochemical Research Methods	9	5	113,4

4.4. Core clinical teaching facilities must be provided in a veterinary teaching hospital (VTH) with 24/7 emergency services at least for companion animals and equines. Within the VTH, the Establishment must unequivocally demonstrate that standard of education and clinical research are compliant with all ESEVT Standards, e.g. research-based and evidence-based clinical training supervised by academic staff trained to teach and to assess, availability for staff and students of facilities and patients for performing clinical research and relevant QA procedures.

For ruminants, on-call service must be available if emergency services do not exist for those species in a VTH.

The Establishment must ensure state-of-the-art standards of teaching clinics which remain comparable with or exceeding the best available in the private sector. The VTH and any hospitals, practices and facilities (including EPT) which are involved with the curriculum must meet the relevant national Practice Standards.

On the basis of the Interdepartmental clinic of horses, ruminants, pigs, small and exotic animals (VTH) there is an ambulance car, which is designed for emergency trips regardless of the time of day. The car is equipped with surgical and obstetric sets of instruments and medicines (anti-shock, analgesic, antispasmodics, rehydration therapy drugs, means for maintaining the cardiovascular and respiratory systems). The visiting team includes a doctor on duty at the clinic and 2-3 students.

During clinical training, students provide veterinary care to animals under the guidance of a teacher. When conducting classes in the clinic, students are dressed in protective suits (according to requirements). Each student's overalls have a badge with the full name in Ukrainian and English. Before each lesson with animals, students are instructed in safety.

The main clinical training since 2018 is conducted in the training veterinary hospital. The hospital staff is represented by the head and five resident doctors. The basic clinical training in the clinic is provided by academic staff in the areas of specialization - diagnostic imaging, anesthesiology and surgery, reproductive medicine, internal metabolic diseases, ophthalmology, intensive care, preventive medicine.

The duty in the clinic is according to the schedule approved by the dean's office. The clinic works 24/7. The emergency services for pets, horses, ruminants and pigs are available by telephone. However, in all cases, in the presence of patients in inpatient treatment, alternation is mandatory. Preliminary acquaintance of students with work of clinic, safety instructions, procedures and logistics is carried out. The rotation of students begins with the registration of patients, the study of their anamnestic data and the initial clinical examination with the participation of a doctor, which is reported to the teacher. If necessary, additional diagnostic procedures are assigned in which the student participates. During the free time the student analyzes this and similar clinical cases, which he discusses with the teacher. The student's responsibilities also include registering patients, entering all relevant data into the electronic database and filling in his / her protocol. At the end of the working day, the students on duty discuss all clinical cases during the day, and the teacher evaluates their work. Students work in a similar way in outpatient clinics. In the aggregate of the results of students' work in clinics, which are stored in the electronic database, the student is credited or not credited with one or another indicator of his clinical training.

4.5. The Establishment must ensure that students have access to a broad range of diagnostic and therapeutic facilities, including but not limited to: diagnostic imaging, anaesthesia, clinical pathology, intensive/critical care, surgeries and treatment facilities, ambulatory services, pharmacy and necropsy facilities.

Students have access to a wide range of diagnostic and therapeutic tools. In the process of learning, students develop skills in diagnosing various pathologies using special devices and equipment: patient monitor, X-ray machine (stationary and mobile), ultrasound machine, laparoscopy, ophthalmoscopy, biomicroscopy of the eye and various methods of laboratory diagnosis. During surgery, students have access to anesthesia techniques and operations on animals. They have the opportunity to provide emergency care under the supervision of a teacher. When studying the

discipline "Clinical Pharmacology" and during the duty in the clinic, students study the organization of the veterinary pharmacy. They participate actively under the supervision of teachers in conducting necropsy procedures. All procedures must be formalized in a protocol, discussed with the teacher with the participation of other students and animal owners. Mastering the relevant procedures should be recorded in the journal of progress and record book of clinical skills.

4.6 Appropriate isolation facilities must be provided to meet the need for the isolation and containment of animals with communicable diseases. Such isolation facilities must be properly constructed, ventilated, maintained and operated to provide for animal care and for prevention of spread of infectious agents. They must be adapted to all animal species commonly handled in the VTH.

For the safe treatment of infectious and infection suspected animals on the campus of the faculty, namely, next to the Interdepartmental veterinary clinic (VTH) there are isolator on cells. Their presence makes it possible to control infections and prevent threats to humans, animals and the environment.

Table 4.6.1. Isolators on the territory of the interdepartmental veterinary clinic (VTH)

№	Species of animals	Total area, m^2	Number of places for animals
1	Horses	27,7	1
2	Cattle	54,8	2 cows + 3 calves
3	Small ruminant	53,7	3
4	Pigs	43	3
5	Dogs	40	8
6	Cats	35	6

Infirmary is sufficient for the usual mode of clinics, correspond (in number of places) for animals to usual loading. Infirmaries for horses, large and small ruminants, pigs are arranged in separate rooms. The infirmary for dogs and cats is located in the same building, has common facilities for students on duty and storage of medicines. All infirmaries follow measures to isolate and prevent the spread of infectious diseases: entrances for animals and staff are separated, there are separate passages. Animals enter the infirmary through a special door or gate, the size of which corresponds to the type of animal and allows in case of death of animals to evacuate it from the room. The infirmaries are supplied by autonomous ventilation. Faeces and waste are removed from the storage tanks, where they are disinfected and removed to the biowaste site.

The pathways of animals of different species do not intersect directly, which is the transmission of pathogens through fomites. Staff and students enter detention facilities through biosafety barriers, which are equipped with hygienic units, changeable footwear and clothing, and personal protective equipment. The premises are equipped with means for washing and cleaning of premises, care items, places for their storage, places for storage of fodder and medicines, disinfectants.

Isolators for dogs and cats in the clinic are the busiest and are used for inpatient treatment of infectious and sick animals.

Compliance with the rules of biosafety in infirmaries is supported by authorized staff (doctors) and teachers. Students undergo introductory and current instruction on the rules of work in isolation wards. The isolators have a system of visualization of biosafety rules with the help of special signs and explanations available for perception and understanding.

4.7. The Establishment must have an ambulatory clinic for production animals or equivalent facilities so that students can practise field veterinary medicine and Herd Health Management under academic supervision.

Students have the opportunity to provide veterinary care on call under the supervision of a teacher. To do this, the clinic has a schedule of teachers on the phone around the clock. The clinic is provided with a permanent car for expatriate assistance, as well as buses.

4.8. The transport of students, live animals, cadavers, materials from animal origin and other teaching materials must be done in agreement with national and EU standards, to ensure the safety of students and staff and to prevent the spread of infectious agents.

The faculty uses university transport, which is distributed centrally, to transport students to places of extramural practice in the Training and Production Center (university farm) and in farms. Mostly it is 4 passenger buses for 25 seats and a minibus for 10 seats. To use the buses, an application is submitted in advance to the university garage, which is usually always satisfied. The use of own transport of teachers and / or students is allowed in case of extramural work in small groups. Transport and drivers are allowed to transport people by a special civil service in accordance with the requirements of national legislation.

Patients are delivered to clinics by animal owners in special or adapted for animal transport. In some cases, for example, the transportation of animals from the Training Farm of University to the Interdepartmental Clinic (VTH) is carried out by university transport, a truck equipped for the transportation of live animals.

Corpses for necropsy for the purpose of diagnosis are delivered by animal owners by special or adapted transport. In the absence of the possibility of delivery by special transport, all measures are taken to prevent contamination of transport with corpse material, for which waterproof materials are used for temporary adaptation of transport. Such transport is disinfected after delivery of corpses. Individual organs or carcasses of small animals are delivered in waterproof dense plastic containers marked with biohazards. In some cases, the corpses can be followed by faculty members with their containers, which are available in the necropsy department.

The carcasses of animals that died during treatment at the training veterinary hospital are transported to the necropsy department in special containers or in dense special bags.

After necropsy, the corpses are stored in freezers and periodically removed by special transport of a commercial enterprise with the appropriate specialization, permits and equipped transport. The faculty has a contract with this company for the removal of corpses and medical waste, which are accumulated on a special controlled site near the necropsy hall.

The implemented rules for transportation and storage of corpses and biowaste ensure the protection of humans and animals from infectious diseases and prevent the spread of infectious disease agents into the environment.

4.9. Operational policies and procedures (including e.g. biosecurity, good laboratory practice and good clinical practice) must be taught and posted for students, staff and visitors and a Biosafety manual must be available. The Establishment must demonstrate a clear commitment for the delivery of biosafety and biosecurity, e.g. by a specific committee structure. The Establishment must have a system of QA to monitor and assure clinical, laboratory and farm services, including a regular monitoring of the feedback from students, staff and clients.

Management of safety of students and teachers while studying at the university and respectively at the faculty is built in accordance with national legislation: the Law of Ukraine "On labor protection", "Regulations on the organization of labor protection and safety of participants in the educational process in educational institutions", the recommendations given in the normative document “Rules of labor protection in veterinary laboratories” and the faculty SOP on biosafety are taken into account (Annex 4.8).

The University has an Occupational Safety Service headed by an Occupational Safety Engineer, a responsible official who coordinates the creation and implementation of appropriate conditions and practices aimed at ensuring the safety of people during the educational process and business activities at the University.

All heads of structural subdivisions periodically (every 5 years) undergo training on labor protection and are responsible for compliance with the law, training of their subordinates and monitoring compliance with safety rules during the training process. This system is part of the management system of the university and is built in a way that covers every employee and student and

all areas of the institution. Occupational safety measures are recorded in journals and reports and can be easily analyzed and adjusted if necessary. Periodic state control over compliance with the law by the State Labor Protection Inspectorate is carried out.

Additionally, the rules of biosafety are set out in the internal document "Standard operating procedures for biosafety at the Faculty of Veterinary Medicine", which is available on the website of the faculty for staff students.

At the beginning of the school year, all students and faculty are instructed in occupational safety and fire safety and biosafety rules. The instructed students are registered in the appropriate logs. At the beginning of classes, students are introduced to emergency exits from the premises, safety rules in accordance with the specifics of specific educational activities.

Before visiting the farm, students are instructed in the farm (compliance with biosafety requirements, hygiene requirements and treatment of animals being inspected). Getting started in the laboratory is accompanied by instruction. Students receive instructions on safety and biosafety rules in specific conditions. Each unit has a short and logically clear instruction on biosafety as a supplement to the general SOP on biosafety of the faculty. Such instructions are the basis for initial and ongoing instruction on the training farm, training veterinary hospital, laboratories and other departments. Biosafety rules are visualized using a system of signs and explanations understandable to staff, students and visitors.

Biosafety rules are periodically reviewed by the Biosafety Committee. The committee consists of 11 people, headed by the Dean, who is the chairman and responsible for biosafety at the faculty. The members of the Committee are represented by specialists in all major areas of training and have an appropriate level of competence to make decisions on the effective operation of the biosafety system. The Committee reviews compliance with biosafety rules, identifies weaknesses and amends guidelines to improve them. Feedback from students, faculty and students is also considered by the committee and taken into account. The main principles that guide the Committee are the efficiency, adequacy and reality of biosafety procedures.

Waste disposal at the university is carried out by the relevant service within the structure of the administrative and economic part. Household waste is collected in garbage containers and taken to the landfill by utilitys.

Biological waste, which may contain hazardous microorganisms, is pre-disposed by autoclaving or treatment with disinfectants, according to the requirements of each case. The collection and disposal of biological waste is the responsibility of an authorized person designated for each unit from among laboratory assistants or teachers. For the disposal of biological waste, the units are provided with a stock of personal protective equipment, special bags, containers and disinfectants.

Chemical reagents are inactivated and disposed of according to sanitary regulations. Separately controlled circulation (purchase, use, transportation and disposal) of precursors (list of acids and organic solvents), which are subject to strict control by the state and the university has a license for such activities.

Waste from productive animals that are in the Interdepartmental veterinary clinic of the faculty (VTH) and are not infectious, excrement (urine, feces) is collected in the manure storage, composted and then used as organic fertilizers.

After dissection, the corpses of animals are stored in refrigerated chambers and periodically sent to a specialized enterprise (sanitary-veterinary recycling plant in the village of Pyshchyky) for disposal, transportation of corpses by the enterprise with its own special transport. An agreement on such services has been concluded between the university and the recycling plant.

Employees are trained annually on biosafety rules and changes in procedures. Lectures with a presentation of the biosafety system are held for new students. Communication with staff, students, clients, other stakeholders and the media on biosafety issues is carried out by the Chairman of the Committee, the Dean, on behalf of the faculty or a person authorized by him from among the teachers.

Comments

Over the past few years, the university has provided significant financial contributions to the development of FVM infrastructure and especially in the clinic. The logistics of clinics by animal species, the role of teaching and support staff, the responsibility of students, which allows for a multidisciplinary approach in clinical training, objectively assess the practical skills of students and help them to choose the direction of professional and career growth.

Suggestions and improvements

In the strategy of development of the faculty for the next period it is necessary to develop a reasonable program and sources of funding to expand the base of visual diagnostics, especially to ensure the clinic of horses.

5. ANIMAL RESOURCES AND TRAINING MATERIALS OF ANIMAL ORIGIN

5.1 The number and variety of healthy and diseased animals, cadavers, and material of animal origin must be adequate for providing the practical and safe hands-on training (in the areas of Basic Sciences, Clinical Sciences, Pathology, Animal Production, Food Safety and Quality) and adapted to the number of students enrolled. Evidence must be provided that these data are regularly recorded and that procedures are in place for correcting any deficiencies.

The global strategy of BTNAU consists of maximum use of healthy and sick animals and materials of animal origin for the students to acquire the Day One Competences.

The faculty of veterinary medicine has a favorable economic and geographic location: it is close to the Kyiv megapolis and to the agricultural enterprises – big complexes for production of cattle, pigs and poultry and small farms, veterinary clinics of small animals in Kyiv and in Bila Tserkva. During last years, thanks to cooperation with private zoos, we have more possibility of paying attention to veterinary service for exotic animals. Another advantage is our university training and production centre with its farms of cattle, horses, sheep, poultry, bees and pond fishery. All these allow to provide valuable clinical training with different animal species.

We also would like to point out that the farming in the central regions of Ukraine is focused mainly on dairy production, poultry, pigs, rabbit production and that is why more attention is paid to these animal species. Unfortunately, in Ukraine there is not big number of horses – about 200 thousand only, which makes some difficulties with the training on this species. However, during last years in the faculty region, small private horse farms are more developing and thus although slowly but the horses population is getting larger. Also in Ukraine and in the region the apiculture and pond fishery are rather good developed and they require professional veterinary service as well, so the faculty is paying attention to them too.

During last years, due to the biosafety requirements, the access of students groups to the big pig farms has become complicated (epizooty of ASF of pigs in Ukraine) and to the poultry farms. Partly this is compensated by our university poultry farm with the slaughter house and by the students' practical individual or group of 2-3 persons work (in the framework of Master program) on the biggest poultry farms in Ukraine – "Myronivskyi khliboproduct" and "Agromars". The BTNAU has long term partner agreements with these companies.

Additionally, the population in the region, including the region of Bila Tserkva, keep traditionally in their private hold cows, pigs, rabbits and poultry (chicken, duck, goose, quail, turkey), which are being served in the faculty clinics or on call.

That is why poultry and rabbits are mainly the material for necropsy.

The faculty has partnership agreements with farms and companies of different property forms with access to market laboratories, slaughter houses and processing enterprises. The faculty has its own clinics and the basis for pre-clinical training on the farms of the training and production centre of the BTNAU (Annex – 4.3).

A valuable use of the listed advantages in the education and research of the faculty is crucial for design of the global strategy for the use of animals and materials of animal origin for students to obtain the Day One Competences.

The faculty concrete strategy for the students' appropriate clinical training consists in creation of maximal conditions for students work with animals and materials of animal origin in groups, individually, on farms, in clinics and processing enterprises. This work begins already during pre-

clinical training and continues during cycle of clinical disciplines and rotation in the university clinics of different animal species.

According to the actual teaching plan, the structural elements of the disciplines look as follows: lectures - 14,5%, practical seminars – 29,7%, self-instruction – 43,7%, clinical practice – 8,1%, practical training – 4% of 360 credits for the whole study period. At that, the most of practical seminars on clinical disciplines include the work with animals or materials of animal origin.

Since 2018 50% of students self-instruction of pre-clinical cycle foresee the work with museum material, preparation, obtaining skills in keeping the animals and caring for them, estimation of their physiological condition, behavior and welfare in the conditions of hospitalization in training clinics, vivarium, farms of the training and production centre.

According to the timetable of the clinical disciplines cycle, a duty work of students in clinics is planned with different animal species (including the emergency aid and 24/7 duty), in the clinic filiations, on the farms of the training and production centre of the university.

During clinical rotations the students keep the records and discuss them with the teacher and the students on duty.

During practical seminars in clinics the group of students is divided according to the requirements of national legislation into smaller group with relation of 10 students per 1 teacher.

Beside practical seminars and self-instruction, the students under the guidance of a teacher have once per year practical training (in pre-clinical cycle) and practice in the clinics (in clinical cycle) with a duration of 4 credits. Such practice can partly be done at the university training and production centre, still the preference is given to agricultural and processing enterprises, public and private veterinary establishments, hospitals on a contractual basis. The students work on concrete tasks under supervision of teacher or experienced doctor on the farm, a brief report is delivered and evaluated with a mark.

Every student must do external clinical practice in an enterprise (14 credits) (EPT), a standard report about the training has to be supplied including clinical protocols, characteristics and mark officially notified by the practical training supervisor. This supervisor of external practical training is appointed after agreement with the regional office of veterinary service.

During the work in the clinics, on the farms or enterprises, an attention is paid to development of communication skills of students in their work with clients, service personnel, specialists on the farm, establishment or enterprise.

The procedures for provision of animals welfare on the faculty of veterinary medicine are based on the EU Directive (2010/63/EU), Law of Ukraine “On animal protection against cruelty” (2006), Regulation “On ethical committee at Bila Tserkva national agrarian university for animal handling in scientific research and educational process” (https://btsau.edu.ua/sites/default/files/news/pdf/nakazi/pologenua_pro_etich_komitet.pdf) and “On animal handling in scientific research and educational process at Bila Tserkva national agrarian university”, order № 111/O from May 22 2018 (https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_pro_povodg_z_tvarin.pdf). According to these documents, the use of animals in the research and educational process requires a prior consideration by the Ethical committee and its decision in form of an Act of bioethical expertise.

The faculty uses also all possibilities of its material base for substitution of animals in educational process when it is not essential for the teaching quality. So our anatomic and pathologic anatomic theatres are quite rich of cadaveric material and samples of animal origin (bones, skeleton base, anatomic and pathologic anatomic museums etc.).

Already during pre-clinical training, the students learn to work with protocols of evaluation of welfare level of animals in faculty vivarium, hospital of training clinics or other places of pre-clinical training outside the faculty.

During the clinical training, the most of operative interventions are conducted only according to the medical data. The animal fixation time, duration and number of painful procedures are minimized.

In the study on methods of provision the heard health, the principles of animal welfare stand out as the basis of preventive medicine.

The pathological material for the dissections in the educational process is supplied from the veterinary clinics of the faculty, private veterinary clinics of the city, physical persons, enterprises of different forms of ownership.

Such material supplied by accompanying documents is accepted by the prosector and is stored in a fridge. The cadavers are used for the practical lessons as required. The used material is put into other freezing chamber. After the freezing chamber is full, the cadaver material is brought by special transport to recycling plant in Skvyra. Every year an agreement between BTNAU and recycling plant in Skvyra is concluded.

When studying the pathology, the cadavers are preserved in a fridge of necropsy department. The key tasks of necropsy are to study the methodology and technics of necropsy, differentiation of pathological changes from posthumous ones, training in diagnosing (additional histomorphological investigation of biopsy material if needed), determination of pathological-anatomical criteria of diseases and understanding of their pathogenesis, accompanying documentation and necropsy protocols with obtaining the skills in biosafety for working with cadaver material, for sampling and storage or utilization of samples. Some unique samples of organs are preserved in hermetic containers for the museum of pathology.

The students work in the autopsy room is regulated by instructions on labor safety and biosafety. Before the work, the students personally get acquainted with the instructions and notify that by signing in the register.

The cadaver material and material of animal origin are used for anatomy and pathology lessons.

For anatomy lessons and renewal of anatomy base in the museum, there is an autopsy room, bones base and a storage room with baths where the cadaver material is preserved in salt solutions and partly in formalin (internal organs) in hermetic containers. The material we receive from agricultural enterprises, private households and slaughter houses (cooled down or frozen after euthanasia). The material fixed in formalin is used for research, the biosafety measures have to be taken (dry box, respirators). The isolated organs or biopsy materials are used in the classes on embryology, cytology and histology for the students to obtain the skills in histological technics, histological research and to renew the base of histological preparations for tests in the form of diagnostical histo-morphological trainings.

Before starting to study anatomy and pathology and before starting to work with cadaver material, the students get instructed on biosafety.

The used pathological material is kept in a fridge and is then utilized at a regional veterinary-sanitary recycling plant in 10 km from the university campus (transportation by special vehicles on a contract basis).

Table 5.1.1. Cadavers and material of animal origin used in practical anatomical training

Animal species	AY – 1*	AY - 2	AY - 3	Mean
Cattle	3	5	10	6
Small ruminants	1	2	2	1,67
Pigs	3	8	17	9,33
Companion animals	4	8	13	8,33
Equine	0	1	2	1
Poultry & rabbits	45	24	58	42,33
Aquatic animals	0	0	0	0
Exotic pets	0	2	5	2,33
Others	1	1	7	3

* Last full academic year before the visit

Table 5.1.2. Healthy live animals used for pre-clinical training (animal handling, physiology, animal production, propaedeutics, ...)

Species of animals	AY – 1*	AY - 2	AY - 3	Mean
Cattle	100	100	100	100
Small ruminants	200	20	20	80
Pigs	5	5	5	5
Companion animals	3	3	3	3
Equine	31	8	8	15,7
Poultry & rabbits	25	25	25	25
Aquatic animals	-	-	-	-
Exotic pets	-	-	-	-
Other animals (specify):	-	-	-	-
Guinea pigs	-	-	-	-
Mice	-	-	-	-

Table 5.1.3. Number of patients seen intra-murally (in the VTH)**

Species of animals	AY – 1*	AY - 2	AY - 3	Mean
Cattle	40	68	76	61,3
Small ruminants	37	36	37	36,3
Pigs	23	1	7	10,33
Companion animals	4150	4700	4950	4600
Equine	155	165	170	163,33
Poultry & rabbits	102	126	141	123,0
Exotic pets (monkey, chinchilla, raccoon, donkey, tiger, nose, porcupine, emu, pony, ferret, nutria, guinea pig, hamster, turtle, wolf)	8	9	9	8,67

** Each patient must be officially registered in the electronic patient registration system of the Institution and must undergo individual examination/treatment by at least 1 student under the supervision of at least 1 employee. Each animal in a single clinical episode is counted as 1 patient, even if it has been examined/treated by several departments/wards/clinics.

Table 5.1.4. Number of patients seen extra-murally** (in the ambulatory clinics)

Species of animals	AY – 1*	AY - 2	AY - 3	Mean
Cattle	380	680	487	515,67
Small ruminants	30	24	38	30,67
Pigs	480	276	625	460,33
Companion animals	55	60	80	65
Equine	68	65	70	67,67
Poultry & rabbits	-	-	-	-
Exotic pets	-	-	-	-
Other animals	-	-	-	-

** Each patient must be officially registered in the electronic patient registration system of the Institution and must undergo individual examination/ treatment by at least 1 student under the supervision of at least 1 employee. Each live animal in a separate clinical episode is counted as 1 patient.

Table 5.1.5. Percentage (%) of first opinion patients used for clinical training (both in VTH and ambulatory clinics, i.e. tables 5.1.3 & 5.1.4)

Species of animals	AY - 1	AY - 2	AY - 3	Mean
Cattle	86	89	76	83,7
Small ruminants	95	97	92	94,7
Pigs	93	84	88	88,3
Companion animals	74	83	81	79,3

Equine	78	68	94	80,0
Poultry & rabbits	95	97	99	97,0
Exotic pets	70	83	76	76,3
Other animals (specify)	58	64	48	56,7

Table 5.1.6. Cadavers used in necropsy

Species of animals	AY - 1	AY - 2	AY - 3	Mean
Cattle	28	29	52	36,33
Small ruminants	12	8	1	7,0
Pigs	56	55	67	59,33
Companion animals	147	150	180	159
Equine	10	10	12	10,67
Poultry & rabbits	84	86	115	95,33
Aquatic animals	-	-	-	-
Exotic pets	6	9	3	6,0
Other animals (specify)	-	-	-	-
Total	**343**	**347**	**430**	**373,33**

Table 5.1.7. Number of visits in herds/flocks/units for training in Animal Production and Herd Health Management

Species of animal	AY - 1	AY - 2	AY - 3	Mean
Cattle	26	38	55	39,67
Small ruminants	11	2	10	7,67
Pigs	15	20	7	14,0
Poultry rabbits	10	10	15	11,7
Aquatic animals	-	-	-	-

Table 5.1.8. Number of visits in slaughterhouses and related premises for training in FSQ

Species of animals	AY - 1	AY - 2	AY - 3	Mean
Slaughterhouses of ruminants	11	13	12	12
Slaughterhouses of pigs	13	11	12	12
Slaughterhouses of poultry	10	9	12	10,3
Related companies***	23	21	22	22
Others (specify)	-	-	–	-
Total	57	54	58	56,3

*** Premises for the production, processing, distribution or consumption of products of animal origin.

The training and methodological commission, the Scientific Council and the dean's office of the faculty of veterinary medicine discuss and take decision on the number and diversity of animals and animal materials for pre-clinical and clinical training.

Heads of clinics and heads of departments are responsible for sufficient filling the educational process with the clinical material (healthy and diseased animals).

In case of shortage of clinical material, the appropriate decisions are made (reduction of cost or expansion of the range of services, organization of breeding or purchasing of animals, etc.).

At the same time, important decisions are taken with the participation of personnel, students and stakeholders who are members of the training and methodical commission and the Scientific Council of the faculty of veterinary medicine.

Heads of clinics monitor the effectiveness of implemented measures, and if necessary, raise questions about the need to change or improve the performance of clinics.

5.2 In addition to the training provided in the Establishment, experience can include practical training at external sites, provided this training is organised under direct academic supervision and following the same standards as those applied in the Establishment.

The main base for the study of the fundamentals of farm management, preclinical and clinical training of students are training farms of cattle, small ruminants, horses and poultry at the training and production centre of BTNAU, which is located 3 km from the main building (No. 8) of the faculty of veterinary medicine. In addition to farms, the Center has developed crop production (cereals, sugar beet, sunflower, perennial culture), fodder production units, storage facilities for fodder. This allows students to trace all feed chain for different types of productive animals: cultivation, harvesting, processing, storing of feed and their quantitative and qualitative analysis, feeding technology.

The basics of farm management the students learn during all training period, first of all, during the practical training in preclinical disciplines: animal hygiene, veterinary ecology, basics of genetics and breeding, physiology, feeding, ethology and welfare of animals (semesters 2 – 4). Taking into account the substantial increase of students from cities and suburbs, the faculty has introduced the rotation duty of students of study years 1 and 2 on the farms of training and production center of BTNAU to study technological processes, animal behavior, characteristics of livestock facilities, hygiene and animal welfare, physiology and feeding technologies, specifics of caring for different animal species. Along with this, the attention is paid to environmental safety in various livestock productions, ability of animal identification, assessment of their development and productivity.

At the same time, other agricultural enterprises in the region located 10 – 30 km away from the school are used for the study of farm management. Only pig farms, due to strict biosafety measures coursed by the spread of African Swine Fever in Ukraine, are problematic for visits. This disadvantage is offset by the production practice, which students, as a rule, pass individually. Before visiting livestock farms, students receive safety instructions, rules of conduct with animals and biosafety rules.

During the clinical practice, the students deepen their competence in farm management by an interdisciplinary principle through acquiring skills in assessing and managing herd health and in shaping the programs of preventive medicine and realization of its measures, in controlling animal food products safety (the experience gained from the OIE twinning-project between BTNAU and VetAgro Sup, Lyon https://vettwinning.btsau.edu.ua).

5.3 The VTH must provide nursing care skills and instruction in nursing procedures. Under all situations students must be active participants in the clinical workup of patients, including problem-oriented diagnostic approach together with diagnostic decision-making.

For a long time, the department clinics functioned on the faculty after the disciplinary principle. In April 2018, the inter-departmental training, research and production clinics were created for horses, ruminants, pigs, poultry and exotic animals, small domestic animals in accordance with the Rector's order N 61/0 from 22.03.18. These clinics are Veterinary Training Hospital of the faculty governed by the regulations on the basis of the University Academic Council decision. The inter-departmental

clinics have staff positions of head, five attending physicians and accountant. The head of the clinics is responsible for the management of the clinics.
The teachers work in the clinics according to their administrative functions. Each clinic has separated facilities and equipment, as well as its affiliates. Before the beginning of the academic year, according to the curriculum, the dean's office together with the head of the inter-departmental clinics set up schedule of teachers and students duty in clinics with rotation after animal species. In each clinic there is a duty schedule on the board indicating the persons on duty and their phone numbers, which provides a 24 h availability of medical service. Such clinics allow to strengthen acquiring professional competencies by students, to balance clinical training by animal species and specialized aid, to increase professionalism of teachers and to expand the list of specialized services.
The formal motivation and control instrument of this is a record book for assessing the clinical skills where the student's achievements are recorded in mastering the procedures necessary for obtaining of competencies.
Along with this, the students in small groups (2 – 4 persons) on an individual schedule do clinical practice in the affiliates of the clinics in Bila Tserkva in agreement with private clinics and under the guidance of teachers, including the clinic of animal companions "Aibolyt", where a doctor with a PhD degree is employed.
The training clinics, except for bird and exotic animal, work within 24 hours on working days from 8.00 to 18.00. There is a rota for duties of attending physician and a teacher in the night and in the holidays and week-ends in the clinic of companions. The rest of clinics work on call around the clock and on holidays and weekends by phone of emergency, indicated on the website of the faculty, bulletin boards on the territory and near the campus. The clinic of birds has a base on the poultry farm BTNAU, where, mainly, the measures of preventive medicine are carried out, and an office at the local zoo, where medical treatment takes place. The clinic works also with out-patients. Under the agreement with Regional Veterinary Service, the students also vaccinate animals and poultry of population in Bila Tserkva and its suburbs.

Table 5.3.1. Types of specialized care provided by clinics (VTH)

Clinics	Specialized care
Horses	Internal medicine, surgery (including orthopedics, traumatological surgery, anesthesia), dermatology, ophthalmology, dentistry, obstetrics and gynecology, andrology
Small animals	Internal medicine (including cardiology), surgery (including orthopedy, endoscopic surgery, traumatological surgery), anesthesia, dermatology, oncology, physiotherapy, ophthalmology, reproduction
Small mammals, reptiles, birds	Internal medicine and surgery, diagnostic visualization of small mammals, reptiles, ornamental birds
Cattle	Internal medicine, surgery, orthopedy, obstetrics, gynecology, andrology
Pigs, small ruminants	Internal medicine, surgery, orthopedics, reproduction of pigs, small ruminants (sheep, goats)

In vacations period, teachers and students work in the clinics as volunteers. In accordance with the current topic of the educational process for certain discipline, small groups of students work in the clinic (4 – 8 students per one teacher).

Clinical training for the students of the faculty is carried out in the form of practical classes, rotational duty in clinics by types of animals, visits to provide consultative or medical aid during 24/7 clinical service, practical classes or duty in the clinic during planned trips outside the university.

In clinical practice, subgroups of 6-12 students, under the guidance of at least 2 teachers, can do clinical practice by working with one or several patients at the same time.

During planned duty in clinics, 2-4 students under the guidance of the teacher work with sick animals in the clinic of each species during their shift.

When going out to provide consultative or medical assistance during clinical 24/7 service, 2– 4 students visit the patients or receive patients at night or on weekends and holidays under the guidance of teacher.

The students pass their practical training in "safety, quality of food products and fodder" in agricultural enterprises, slaughterhouses, processing enterprises, retail enterprises and testing laboratories. There are agreements concluded with these partners about creation of a department branch at production and about cooperation in production, educational and research spheres.

The practice in "safety, quality of food products and fodder" the students pass in production. The student groups are divided into 2-3 subgroups of 8-12 persons, these subgroups work under supervision of teachers and specialists in the enterprise.

In the course of a practical classes or during duty in the clinic, having planned visits to the patients outside the university, the subgroups of 4 to 12 students, under the guidance of two or more teachers, do clinical work with animals (castration, celotomy, vaccinations and other preventive treatment of pigs, hoof cleaning, diagnosis of pregnancy in pigs, cows and sheep, etc.).

During such training, the students acquire clinical skills, doing by hand fixation and anesthesia of animals, performing the preparation of the surgical field, assisting or performing surgery or other manipulations with animals (clinical study, injections, hydration therapy, bandage application etc.).

All students are actively encouraged to take part in the discussion of clinical cases – results of anamnesis and clinical examinations, the need in laboratory or instrumental study, decision on treatment or prevention methods, prognosis of disease, etc.

The clinic of exotic animals and poultry has several bases: one on the poultry farm of BTNAU training and production centre (productive agricultural poultry) and another affiliate of the faculty - "Museum of Wildlife of flora and fauna of Olexandria" (exotic animals and birds). In these establishments, the students study animal care, basic clinical-visual methods of examination, determine the application sequence of these methods and preventive and therapeutic measures for infectious and non-infectious diseases.

Every day, two students and one teacher are on duty in the clinic of exotic animals and birds. At the beginning, the teacher instructs the students on safety rules for the work with the given animal species. Special attention is paid to fixation and biosafety. The students can use auxiliary material – posters and brochures on fixation. The beginning of reception is indicated in the e-base VetForce of the clinic with following registration of the patient. The students independently work with the software. The collection of anamnestic data with the definition of diagnostic tactics and sequences of additional and special methods of examination is carried out. Then the animal is getting fixated and the students do a primary examination. After clinical examination, a decision is made about manipulations, according to the diagnosis, and the strategy of therapeutic measures with the use of pharmacological medications is set.

At the affiliate of the faculty - "Museum of Wildlife of flora and fauna of Olexandria", before the beginning of the work, the students are getting instructed on safety rules. The patients are registered in the electronic database by a VPN channel, which has access to the clinics server and all the manipulations performed are registered in the visit card. A clinical examination algorithm based on biological peculiarities is indicated under the instructor's supervision. Sick animals and poultry are moved to an insulator.

During clinical work, the students are active participants in communication with the owners of animals, they are obliged to take part in the care of sick animals and in therapeutic manipulations, reanimation, necropsy and preparation of relevant documents (protocols, autopsy acts, etc.).

During the work with animals in clinics and hospitalization of animals, the students have the opportunity to acquire the skills of nursing animals (injections, dressing application, intravenous infusion, physiological monitoring, etc.).

Acquiring nursing skills by students is foreseen already for the pre-clinical training (Appendix – Manual). During work with the hospitalized animals of the training clinic or with the sick animals of the training and production centre (farms by species), the students are directly involved in the caring of sick animals (cleaning, watering, feeding, etc.), they perform simple diagnostic procedures (measuring temperature, pulse, breathing, etc.), selection of blood, urine, skin scrape, etc. for further laboratory study. The students make fixation of animals for medical manipulations, bandage, control the infusion systems, promenade sick animals, etc.

During examinations and preparation of protocols for the extramural pre-clinical preparation, the students should pay attention to the condition of the animal (clinically healthy or sick) and interpret the results of the examination, analyze the conditions of keeping the animal, changes of physiological state, behavior, etc.

The student's performance is notified by the teacher with his signature in the log book of pre-clinical training or in the respective protocol.

During the clinical training, the biosafety requirements are duly ensured and controlled.

The clinical training includes also treatment of diseased animal and infections, in particular those of cats and dogs. There are equipped insulations in the clinics with conditions for keeping and treatment of infected animals. The insulations for horses, small ruminants, pigs and cattle offer good possibilities to teach the students the clinical works in conditions of infection risks, the rules of isolated premises use and the biosafety rules. The insulator for cats and dogs has an equipped room personnel and students on duty, which allows a 24/7 duty of students.

On the faculty clinics weekly, the meetings of the open clinical rounds are held where the students, in the presence of teachers, report and discuss clinical cases of the training hospital by animal species. The students can use manuals and internet at the rounds. Anyone may express their opinion on a clinical case or suggest changes or additions to the treatment protocol.

While working in clinics, the students are encouraged to take an active part in decisions about the need for additional methods of examination, diagnosing, determining the treatment protocol, the need for hospitalization, etc.

The doctor on duty has to discuss the clinical cases with the students after their shift is over.

In the practical seminars and lectures, the preference is given to such teaching methods like "problem-solving" and "case-study".

5.4. Medical records must be comprehensive and maintained in an effective retrieval system (preferably an electronic patient record system) to efficiently support the teaching, research, and service programmes of the Establishment.

Till 2018 all patients were registered traditionally in the log books for clinical work of the departments. To be in compliance with modern standards of veterinary clinic managements, a software "VetForce" of company "Oberon" is used since October 17 2018. During 2018-1019 the software was added by a module "Teaching". This feature provides for the beginning of the new academic year to download freshman students with the subsequent accounting of their practical training during the entire educational period. At present, all students and lecturers are identified in the electronic base of the faculty and the clinics. Each teacher has his/her login and password to the electronic database, through the built-in VPN network. Every day, with the beginning of the clinic operation, a new group is opened with registration of the students on duty. A teacher or attending physician having a laptop or desktop computer can get online any information about the number of patients received, animal species, diagnosis, and the most important, about the type and number of veterinary manipulations that have been performed with the patient by the student. Thus, having such information, it is possible to monitor practical training of the student in part of his clinical training. An affiliate of the faculty – "Museum of Wildlife of flora and fauna of Olexandria" ltd. has access to the electronic database and directly to

the program through VPN network. At present, a computer class (10 – 12 computers) is being set up with connection to the central computer with the installed software.

Starting 09.09.2019 for monitoring of remote work and training of students in production practice we use GoogleForms. At present we have 588 registrations of clinical cases, 102 of which are supplied by photos and videos.

Comments

In recent years there has been considerable progress in development of clinical and preclinical training of students (work with animals and materials of animal origin). The work of the veterinary training hospital and training farms has been reorganized. The digitization of the work with clients and of monitoring of clinical skills acquisition by students is actively implemented. Some areas are in the process of improvement and need some better working algorithm (a combination of training with the schedule of the training clinic), more computers and clinical equipment, expansion of laboratory services etc.).

Suggestions for improvement

It is important for the preclinical and clinical skills of students to further invest into the development of clinics and into means for diagnostic visualization, especially for the clinics of horses and exotic pets, for a stable provision of livestock resources for clinical training.

6. LEARNING RESOURCES

6.1 State-of-the-art learning resources must be adequate and available to support veterinary education, research, services and continuing education. When the study programme is provided in several tracks/languages, the learning resources must be available in all used languages. Timely access to learning resources, whether through print, electronic media or other means, must be available to students and staff and, when appropriate, to stakeholders. State-of-the-art procedures for bibliographical search and for access to databases and learning resources must be taught to undergraduate students.

The Scientific University Library is the main provider of pedagogical and electronic information resources and services for students and research and teaching staff.

The Scientific Library of the University operates on the basis of the Law of Ukraine "On Libraries and Library Affairs" (March 16, 2000, https://zakon.rada.gov.ua/laws/show/1561-14#Text), Regulations "Standard rules for using libraries in Ukraine" (https://zakon.rada.gov.ua/laws/show/z0449-99#Text), approved by the order of the Ministry of Culture and Arts of Ukraine from 25.05.2001 №319 and Standard Regulations on the library of a higher educational institution", approved by the Ministry of Education and Science on August 6, 2004, and the regulation" On the scientific library of Bila Tserkva National Agrarian University", approved by the Academic Council of the University on April 14, 2014 https://btsau.edu.ua/sites/default/files/news/pdf/pologen_nauk_bibliotek. According to this provision, the university has a number of its departments that have access to the Internet, and library services can be obtained through remote access.

All member of the university can use the Library: students, graduate students, faculty, staff and support staff of structural units of the University, and students of the Institute of Postgraduate Training of Heads and Specialists in Veterinary Medicine.

The main elements of the strategy for the development of modern educational resources are free access to databases of all participants in the educational process, the maximum provision of all areas of training with participation in the formation of funds for educational resources of teachers and students; use of the maximum number of adequate e-learning tools with the availability of visualized clinical material.

Mastering the procedures of bibliographic search takes place from the first year of study (since 2019, a new discipline "Biostatistics and Informatics" was introduced into the curriculum). This also happens during weekly organizational and communication hours by library staff in the first semester of the first year, periodically by mentors - teachers (tutors) assigned to each administrative group of students, and individually by supervisors of course and master's theses.

The library program "UFD Library" works for bibliographic search. An electronic catalog has been created on its platform, which is constantly available on-line at the link http://ek.btsau.edu.ua/. Users can access the online catalog and remotely use its capabilities through the WEB-interface. The catalog includes the entire active fund, where there is a separate database of foreign publications on veterinary medicine. Literature search services are provided to library users upon request. The University Library provides assistance to students and teachers to search for both domestic and foreign publications. Library staff periodically conducts trainings, seminars and consultations for students and teachers to improve information culture.

From the beginning of 2018, the Institutional Repository of the University, available at the link http://rep.btsau.edu.ua/home.jsp?locale=uk, started working. iRBTNAU (Institutional Repository of Bila Tserkva National Agrarian University). It is an electronic archive that collects, systematizes, stores scientific, educational and methodological documents created by employees of any structural unit of BTNAU, graduate students or students of the university, by archiving and self-archiving, and provides them with permanent free full-text access via the Internet.

Since the beginning of 2020, a library website has been created, where students and staff can also receive all the necessary information remotely https://library.btsau.edu.ua/.

The fund of educational and scientific literature of veterinary direction is more than 150,000 copies of textbooks and other pedagogical resources. The authors of pedagogical resources are also

teachers of BTNAU (Annex 6.1). Textbooks on disciplines authored by BTNAU teachers are also used in the educational process by other faculties of veterinary medicine of Ukraine.

The University Library has an electronic database of more than 150 textbooks. To date, the Ministry of Education and Science of Ukraine has paid for access to scientific metrics, in particular to the Web of Science, Scopus, EBESCO, AGORA, Springer. The latter for the period of quarantine COVID 2019 showed charity and provided open access to textbooks.

The University publishes a peer-reviewed scientific journal "Scientific Bulletin of Veterinary Medicine", which is published twice a year and is available at http://nvvm.btsau.edu.ua/.

The educational resources of the library are formed on the basis of annual proposals of the staff of the departments, the results of the survey of students with their subsequent consideration by the scientific and methodological council of the Faculty of Veterinary Medicine and approval by the rector. At the same time, the library staff analyzes the use of professional library publications by users, cooperates with libraries of partner institutions (VetAgro Sup, Lyon, University of Veterinary Medicine and Pharmacy, Košice, Slovakia) and with the European Association of Libraries of Veterinary Schools fund. These suggestions are also taken into account (Annex 6.2).

The university library has about 250 textbooks by foreign authors. In 2019, the VetAgroSup library, as part of a partnership, donated 44 copies of veterinary textbooks to the FVM library of the BTNAU, the vast majority of which are in English.

The obligatory information-analytical event of the library is quarterly exhibitions-reviews of new arrivals with the placement of this information on the websites of the university and the library.

6.2. Staff and students must have full access on site to an academic library administered by a qualified librarian, an Information Technology (IT) unit managed by an IT expert, an e-learning platform, and all the relevant human and physical resources necessary for the development of instructional materials by the staff and their use by the students. The relevant electronic information, database and other intranet resources must be easily available for students and staff both in the Establishment's core facilities via wireless connection (Wi-Fi) and from outside the Establishment through a hosted secured connection, e.g. Virtual Private Network (VPN).

Staff and students have full access to the university library, where they receive pedagogical resources, both in traditional (paper) and electronic formats. The total area of the library and its branches in the university building is 1271 m^2, its premises include 7 reading rooms for 250 workplaces, modernized in 2019, a book depository, 9 subscription rooms, a separate library server and 43 computers. The working staff of the library consist 11 people.

The central information and bibliographic department are located in the educational building № 1, which serves the students from all over the university. This unit has the following departments: acquisition and scientific processing of documents; bibliographic and information technologies; fiction. They compile thematic bibliographic lists, provide bibliographic references, make analytical entries in the electronic catalog, select journals for publication in scientific and metric databases.

In the building № 8, in the clinical building, where students of the Faculty of Veterinary Medicine study, there is a branch library department № 2 (176 m^2, 24 places for work with literature, seven computers for students and one for staff). FVM students also work in the branch department № 3 of the university library, located in the academic building № 9 (173 m^2, 32 workstations, 4 computers for students and 2 for staff), where FVM students also study, Department of Normal and Pathological Animal Physiology, microbiology and virology), Faculty of Biology, Technology and Ecology. The department has one employee, 173 m^2, 32 workplaces for literature, four computers for students and two for staff.

Along with this, students have access to two computer classes (building № 8, classrooms № 306 and 406) with an connected Internet and access to a bibliographic search of e-learning tools, as well as an internal database of e-learning resources (textbooks, multimedia programs, videos, etc.) and virtual study of clinical cases through access to the electronic database of the program Oberon Vet.Force,

which works in the educational clinic of the university (diagnostic and treatment protocols, additional files of radiographs, echograms, etc.).

All library staff have the appropriate professional education. In May 2017, they took refresher courses (in accordance with national legislation once every 5 years) on the basis of the National Scientific Agricultural Library of the National Academy of Agrarian Sciences of Ukraine, periodically employees participate in thematic webinars, including work on Web of Science. Library staff is constantly improving their skills at seminars and webinars, in particular on the use of scientometric databases Web of Science and Scopus, PubMed, etc. and cascading this knowledge among staff and students of the faculty.

All sections of the library are open from 08:00 to 17:00, Monday to Friday.

Financial costs for the purchase of educational resources in the library are 609722 UAH (Table 6.1). At the same time, preference when subscribing to periodicals is given to collections and journals that are included in indexed publications (Scopus, WoS, etc.) and research and production publications.

6.2.1 Financial costs for the purchase of pedagogical resources

№ п/п	Years	Total in the library, UAH
1	2017	188061
2	2018	173616
3	2019	248045
TOTAL		**609722**

At the beginning of the academic year, all students receive (subject to the return of previous pedagogical resources after the end of the course) free necessary pedagogical resources (printed textbooks and manuals).

The institution has a department of information support, which is overseen by the Department of Information Systems and Technologies, to which the IT department is subordinated. The IT department employs 5 qualified IT specialists who are responsible for the serviceability of electronic systems and provide advice as needed. The efficiency of the electronic services of the faculty is provided on the servers, which are the property of the university, have a system of protection against shutdown and a backup system. The capacity of the equipment is sufficient for the regular operation of electronic training platforms, library catalog, websites and access to the clinical training program at the Training Veterinary Hospital (VTH). The university's IT department accepts reports of malfunctions in electronic services 24/7 and is obliged to promptly correct problems.

The university fully uses the distance e-learning system based on the Moodle platform, which is available at https://teach.btsau.net.ua/login/index.php. The institution has "Regulations on the learning management system Moodle at the Bila Tserkva National Agrarian University." It regulates the use in the educational process of an electronic learning platform for the organization of automated educational process, disciplines (courses of lectures, videos, multimedia presentations) of various types of control and evaluation of educational achievements of higher education using distance learning technologies in all forms of learning. The system is available on the Internet to the university management, research and teaching staff and higher education students according to the rights of access to its information resources and subsystems.

The Vice-Rector for Education International Affairs of the University is responsible for the establishment and operation of LMS Moodle. To ensure the functioning of LMS Moodle in BTNAU, a person responsible for LMS Moodle is appointed - System Administrator.

The Moodle platform is used after identification by password and login and can be either from the university network or remotely in 24/7 format from any personal computer or mobile device connected to the Internet at the link http://teach.btsau.net.ua.

Quite actively in 2020, under the quarantine of COVID-2019, the institution began to use the electronic platform ZOOM for distance learning (lecturing and conducting practical classes).

All staff computers and classroom and library computers are permanently connected to the Internet via the university's local network. The entire campus of the Faculty of Veterinary Medicine is covered by a Wi-Fi network accessible to students and staff.

A corporate e-mail and document management system based on the Google Suit for Education service has been introduced, the applications of which are used to exchange resources and create educational content.

Through VPN connections, teachers and students have access to local area network services, library services and scientometric databases Scopus and Web of Science outside the institution. In particular, VPN access is used to access materials about clinical cases and statistics of VTH work, which are recorded in the commercial-curriculum for accounting of clinical and educational work Oberon VetForce FVM BTNAU. This product was developed exclusively for the faculty on the basis of Oberon VetForce, a commercial program for veterinary clinics popular in Ukraine and the region.

6.3 The Establishment must provide students with unimpeded access to learning resources, internet and internal study resources, and equipment for the development of procedural skills (e.g. models). The use of these resources must be aligned with the pedagogical environment and learning outcomes within the programme and have mechanisms in place to evaluate the teaching value of changes in learning resources.

Brief description:

- number of veterinary books and periodicals - 152314;
- number of veterinary e-books and electronic periodicals 150;
- number of other books and periodicals - 390377.

Replenishment of the library fund of the branch department №2:

2017 - 807

2018 - 544

2019 - 916, including 71 manuals in foreign languages

The average annual payment for periodicals is 24.

Students have free access not only to the reading room of the library and its electronic database, but also to electronic resources in the offices of departments, VTH departments and rest rooms in clinics (Annex 6.3, 6.4). Students can use computers for educational purposes and for the preparation of printed works. This opportunity for them is from 9 a.m. to 6 p.m. hours on weekdays.

During self-training in the laboratories and classrooms of the departments, students have access in accordance with administrative procedures to electronic databases, museum preparations, histological preparations etc. Such resources are placed at the relevant departments and organized according to the planned learning outcomes of the department's disciplines. For example, at the Department of Anatomy and Histology during the day, from 9 am to 8 pm, students have access to the Osteological Department (bone collection) and an anatomical museum, where they can study independently under the supervision and consultation of a regular laboratory assistant. There are also classes with microscopes and electronic resources for the study of fixed micro preparations and the consolidation of microscopy skills within the courses of histology and microbiology. Computerized situational tasks are widely used in the study of clinical disciplines (for example, at the Department of Surgery they formed more than 600, and at the Department of Epizootology and Infectious Diseases - 100), which include a description of clinical situations accompanied by clinical photos, laboratory protocols and visualized diagnostic documents.

On the basis of the Educational Veterinary Hospital for the last year a class with models was created, on which students can practice clinical manipulations. Such work is taken into account and taken into account in the overall assessment of the student's work.

Students have the opportunity to work in laboratories (scientific circles) of various directions, both preclinical (junior courses) and clinical (senior courses), where students prepare scientific reports at meetings, the best of which are presented at student scientific conferences.

Comments

During the Consultation Visit (November 2018), we were not able to fully reflect the available e-learning resources, as noted. In this regard, we have increased the flow of printed pedagogical resources in 2019, primarily foreign, both through its own investment and through partner assistance. Relevant appendices, in particular Annex 6.3, reflects a fairly large number of available electronic resources on most aspects of veterinary education. The VPN is used more efficiently.

All e-learning and library resources are freely available, both on the local network and externally via the Internet. The property has free Wi-Fi throughout. The university also constantly upgrades existing and purchases new communication equipment. So, from the beginning of 2020, all educational buildings were connected to the Internet via fiber-optic cable, which will allow it to work faster. Information capacities in computer classes and the library were also expanded, and the libraries own website was created.

The adaptation of the existing video-informative electronic resources in accordance with the content of training in the disciplines and in the clinic.

In 2020, it was planned to increase investment in the development of bibliographic fund and e-learning tools, but the prompt solution of these problems was somewhat hindered by COVID-19.

Suggestions for improvement

Continuation of the policy of increasing the base of adequate printed and electronic books and periodicals, primarily foreign ones, as the demand for such publications is dynamically growing among students and teachers. The growing the computer park of the scientific library is permanently updated and is strengthening the capacities of electronic information networks, increase of information-visualized base of various clinical cases and carrying out of high-tech diagnostic and medical procedures and manipulations. Also, focus efforts on information and electronic support of veterinary medicine for horses and exotic animals should be strengthened, as these areas in Ukraine are underdeveloped.

7. STUDENT ADMISSION, PROGRESSION AND WELFARE

7.1. The Establishment must consistently apply pre-defined and published regulations covering all phases of the student "life cycle", e.g. student admission, progression and certification. In relation to enrolment, the Establishment must provide accurate and complete information regarding all aspects of the educational programme in all advertisings for prospective national and international students. Formal cooperations with other Establishments must also be clearly advertised.

Prospective students of Bila Tserkva NAU can access information about the provisions covering different stages of the student's life cycle on the website (https://btsau.edu.ua/): information about the history of the university (https://btsau.edu.ua/uk/content/istoriya0), Academic Council (https://btsau.edu.ua/uk/content/vchena-rada), subdivisions (https://btsau.edu.ua/uk/content/kerivnyctvo-ta-pidrozdily), normative-legal documents (https://btsau.edu.ua/uk/content/normatyvno-pravovi-dokumenty), employees (https://btsau.edu.ua/sites/default/files/news /pdf/zvit_buhalteria/shtat_rozpis_2020.pdf), faculties of BTNAU (https://btsau.edu.ua/uk/content/fakultety-ta-koledzhi), structure of FVM organization (https://btsau.edu.ua/uk/content/kafedry-fakultetu-veterynarnoyi-medycyny), educational process (https://btsau.edu.ua/uk/content/osvitniy-proces), educational programs (https://btsau.edu.ua/uk/content/osvitni-programy), curricula (https://btsau.edu.ua/sites/default/files/Faculties/osvita/osvitni_programy/katalog_nav_plan_bak_BTNAU-2019.pdf), schedules of the educational process (https://btsau.edu.ua/uk/content/grafiky-navchalnogo-procesu) and more are freely available. Information for admission (entrance examinations, necessary documents for admission, admission rules, tuition fees, license and certificates, pre-university training) is posted on the website (https://btsau.edu.ua/content/vstupnyku).

To disseminate information, Bila Tserkva NAU cooperates with regional, district and city departments of agro-industrial development, with employment centers, education departments, colleges and secondary schools. According to the concluded agreements, scientific and pedagogical workers take part in various events, where they make speeches, present presentations and videos, distribute advertising products and flyers (with information about BTNAU, faculties and specialties, admission rules, study conditions, leisure and student accommodation). Every year, research and teaching staff visit secondary schools, where they meet with graduating students and talk about the university. At the end of the presentation, students fill out questionnaires and indicate the specialty in which they plan to study at BTNAU.

Every March, BTNAU holds an "Open Day", which invites students of secondary schools, students of colleges and all comers. During this event, potential entrants get acquainted with the educational buildings, dormitories, libraries and inspect the material and technical base of the faculty.

In addition, all advertising and information products are covered in advertisements, on TV and radio, in newspapers of national and local importance, placed on the Internet, on the university website, on social media pages (https://www.facebook.com/btsau/, https://www.facebook.com/groups/865842653570654/, https://www.youtube.com/results?search_query=%D0%B1%D0%BD%D0%B0%D1%83, https://btsau.edu.ua/uk, https://www.instagram.com/agrarvard_BTNAU/?igshid=164uauyi5q6n2,https://www.facebook.com/BTNAUfvm/, https://www.facebook.com/FVMBTNAU/).

Every year, students of the faculty take part in the All-Ukrainian Olympiad in Biology and Veterinary Medicine (since 2017-2019, 21 people were involved, in 2020 the Olympiad was canceled), where students constantly win prizes. The traditional annual is the All-Ukrainian Student Olympiad "Best in the profession" (for graduate students). Participation in the annual All-Ukrainian competition of student research works is also traditional - 45 students of different courses were involved.

For academic exchanges of students and academic staff, scientific cooperation, the university has signed agreements with the Slovak University of Agriculture (Nitra), VetAgro Sup (Lyon, France), University of Veterinary Medicine and Pharmacy (Kosice, Slovakia), University. Federico II (Naples, Italy), Cluj-Napoca University of Agricultural Sciences and Veterinary Medicine (Romania), Ondokuz Mays University and Afyon Kocatepe University (Turkey), University of Zagreb (Croatia), University

of Washington, USA), Pomeranian Academy (Slupsk, Poland), Kazakh NAU (Almaty), Belarusian DSGA (Gorky), Vitebsk DAVM (Republic of Belarus).

Students of the Faculty of Veterinary Medicine undergo internships in accordance with the "Regulations on the organization of training, internships for students of Bila Tserkva National Agrarian University Abroad" (https://btsau.edu.ua/uk/content/informaciya-dlya-studentiv) in the USA, Denmark , Finland, Switzerland, France, Germany, Poland under the programs "WISE", "MAST", "EI", "II", "SAER", "SAER" Precision Agriculture", "SAER Pioneer Seeds"," AB-farms", "DUC", "Internship International", FEFU program of internships on livestock farms in France, Programs "German Peasants'Union" and "Apollo", training and internships on livestock farms in Germany. In 2017–2018, 124 students underwent internships, in 2018–2019 - 144 people, in 2019–2020 - 72 people. Thus, in the period 2017-2019, 14 students underwent internships on Danish farms under the "AB-farms" and "DUC" programs (1 year internship - 13 people, mostly non-graduate courses).

FVM students and staff take an active part in Erasmus + programs. Also, FVM students study at foreign universities. Individual international academic mobility is carried out according to agreements. Up to 20 different international exchange programs operate at BTNAU (https://btsau.edu.ua/uk/content/mizhnarodna-spivpracya-6, https://ag-lab.isle.eummena.org/). This allows them to improve their level of professional skills, knowledge of a foreign language, communication skills, financial status, to get acquainted with the world technologies of animal husbandry and its veterinary support. After the internship, students prepare relevant reports and defend them. The reports are kept in the dean's office for three years.

The faculty has a student government council, the regulations on its organization were approved by the Academic Council of the University on 07.07.2015 protocol. 20156 (https://btsau.edu.ua/uk/content/normatyvne-zabezpechennya). The chairman of the student council is elected for a term of one academic year from among the undergraduate students by voting. The main tasks of student government are: protection of the rights and interests of students; ensuring students' duties performance; promotion of educational, scientific and creative activities of students; assistance in improving the living and recreation conditions of students; promoting the creation of various student groups, societies, associations, interest clubs and coordinating their activities; cooperation with student self-government bodies of the regional university center and other higher educational institutions. The financial basis of student self-government are: funds determined by the Academic Council of the University in the amount of not less than 0.5 percent of own revenues received by the higher education institution from the main activity; membership fees of students (cadets), the amount of which is set by the highest body of student self-government of the higher educational institution. The amount of the monthly membership fee of one person may not exceed 1% of the subsistence level established by law. Funds of student self-government bodies are directed to the performance of their tasks and exercise of powers in accordance with the estimates approved by them.

The faculty also has student councils in dormitories. All students of the Faculty of Veterinary Medicine are 100% provided with a dormitory (according to the contract https://btsau.edu.ua/uk/content/normatyvno-pravovi-dokumenty) with all amenities and are located next to the educational buildings. The amount of payment for accommodation in a dormitory according to the contract (https://btsau.edu.ua/sites/default/files/news/pdf/nakazi/nakaz_oplata_gurtogitkiv_2019-2020.pdf). Postgraduate students enjoy similar benefits as students.

7.2 The number of students admitted must be consistent with the resources available at the Establishment for staff, buildings, equipment, healthy and diseased animals, and materials of animal origin.

One student of BTNAU has 2.4 m^2 of classroom space, which meets the National Standards of Education. The educational complex of the Faculty of Veterinary Medicine includes three buildings; clinics for small animals, ruminants, pigs, horses and poultry; 6 research laboratories; hospital, vivarium, necropsy hall and training and production center (cattle farms, small ruminants, horses, poultry, pond fish).

Clinical training equipment includes: video information systems and video studio, computer base, X-ray machines, equipment for ultrasound and endoscopic, ophthalmic diagnostic tools, equipment for artificial insemination of animals, analyzers for morphological, biochemical and immunological and molecular biological methods.

In the educational process, video presentations, visits to exhibitions of modern diagnostic equipment and devices, veterinary drugs, conducting classes with the involvement of production representatives are actively used.

The material and technical base of the departments is gradually filled with tools and devices that contribute to the achievement of program learning outcomes. The educational process is fully provided with educational, methodical and scientific literature on paper and electronic media thanks to the funds of the scientific library, repository (http://rep.btsau.edu.ua/handle/123456789/12) and web resources of scientometric databases. Students are provided with social infrastructure, which includes dormitories, sports facilities, catering facilities, sports and recreation camp, Center for Patriotic and Legal Education, premises for preparation and holding of cultural events (assembly, reading rooms, dormitory libraries, dance class, etc.).

BTNAU provides free access to the relevant infrastructure and information resources required for teaching, teaching and research activities within the educational program. The University provides free passage within the program of practice at enterprises, institutions, establishments and organizations; participation in research works, conferences, symposiums, exhibitions, competitions, presentation of their works for publication; academic mobility, including international; participation in discussion and decision of questions of improvement of educational process, the organization of leisure, life improvement; choice of academic disciplines within the limits provided by the program and the working curriculum, as well as from the university catalog; use of cultural, educational, household, health base of BTNAU; provision of dormitories for the period of study in the manner prescribed by law (https://btsau.edu.ua/uk/content/normatyvno-pravovi-dokumenty, https://btsau.edu.ua/sites/default/files/news/pdf /pologenna_navh_proces/poruad_suprovod_osib_z_invalidnistu.pdf, https://btsau.edu.ua/sites/default/files/news/pdf/pologenna_navh_proces/center_patriot_vihov.pdf, https://btsau.itesde.ua/osvita/molodigna/pologen_pro_stud_samovruaduvan.pdf).

Infrastructural resources are constantly updated at the expense of a special fund of the university.

Table 7.2.1. Number of new veterinary students admitted by the Establishment

Types of students	AY*	AY-1	AY-2	Mean
Standard students	103	74	71	82,7
Full fee students	56	60	66	60,6
Total	**159**	**134**	**137**	**143,3**

* Last Full Academic (academic) year before Visiting

Table 7.2.2. Number of veterinary undergraduate students registered at the Establishment

Year of programme	AY*	AY-1	AY-2	Mean
First year	159	134	137	143,3
Second year	144	169	126	146,3
Third year	159	157	120	145,3
Fourth year	141	141	111	131,0
Fifth year	153	152	101	135,3
Sixth year	143	101	94	112,7
Total	**899**	**854**	**689**	**814,0**

Table 7.2.3. Number of veterinary students graduating annually

Types of students	AY*	AY	AY-2	Mean
Standard students (bachelors masters)	25	12	48	28,3
Students pay in full	104	82	45	77,0
Total	**129**	**94**	**93**	**105,3**

Note. The discrepancy between the data in Table 7.2.3 and the data in Table 7.2.1 is related to the transition of bachelor students to the master's cycle. Therefore, Table 7.2.3 takes into account only graduate students with a full cycle of veterinary training.

Table 7.2.4. Average duration of veterinary studies

Duration	% of students who graduated from AY * (current year)
+ 0 **	100 %
+ 1 year	17,7 %
+ 2 year	16,02 %
+ 3 years and more	17,7 %

** Total duration of study corresponds to the minimum number of years of the program (for example, 5 or 6 years)

Table 7.2.5. Number of postgraduate students registered at the Establishment

Programms	AY*	AY-1	AY-2	Mean
Interns	-	-	-	-
Residents	-	-	-	-
Postgraduate students/Doctoral students	27	25	18	23,3

7.3. The selection and progression criteria must be clearly defined, consistent, and defensible, be free of discrimination or bias, and take into account of the fact that students are admitted with a view to their entry to the veterinary profession in due course.

The Establishment must regularly review and reflect on the selection processes to ensure they are appropriate for students to complete the programme successfully. If the selection processes are decided by another authority, the latter must regularly receive feedback from the Establishment.

Adequate training (including periodic refresher training) must be provided for those involved in the selection process to ensure applicants are evaluated fairly and consistently.

Admission is determined by the "Conditions of admission to higher education institutions of Ukraine", which are approved annually by the Ministry of Education and Science of Ukraine (https://mon.gov.ua/ua/tag/vishcha-osvita). Based on this document, the admissions committee develops the "Rules of admission to BTNAU", which are approved annually by the Academic Council of the University (https://btsau.edu.ua/uk/content/pravyla-pryyomu).

According to the Rules of admission to the educational program "Veterinary Medicine" of the educational degree "Master" the applications from persons are accepted who have completed a general secondary education based on the results of external independent assessment in three subjects: 1. Ukrainian language and literature; 2. Biology; 3. Mathematics or Chemistry. External independent evaluation is conducted by the Ukrainian Center for Educational Quality Assessment in accordance with the current legislation of Ukraine (https://testportal.gov.ua/normatyvni-dokumenty/).

Also, persons with a diploma of "junior specialist" in veterinary medicine (graduates of veterinary colleges who are veterinary assistants) are accepted for training. For this category of entrants an entrance professional test in the specialty "veterinary medicine" is conducted.

Annually, entrants submit 700-800 applications for admission to the educational program "Veterinary Medicine". According to the competitive score, a rating of entrants is formed, which is published on the university website. The best students enroll at the expense of the state budget. Applicants with a lower rating enter the study at the expense of individuals and/or legal entities. The order of enrollment is formed automatically in the "Unified electronic database on education of Ukraine" (https://vstup2019.edbo.gov.ua/offers/?qualification=2&education-base=40&university-name=362) is signed by the rector of BTNAU and published on the information stand of the selection committee and on the website (https://btsau.edu.ua/uk/content/nakazy-na-zarahuvannya-4).
According to the Law of Ukraine "On Higher Education" (https://zakon.rada.gov.ua/laws/show/1556-18#Text) and "Standard on Higher Education of Ukraine" (https://mon.gov.ua/storage/app/media/vishcha-osvita/zatverdzeni%20standarty/2019/04/25/211-veterinarna-meditsina-magistr.pdf) training in the educational program "Veterinary Medicine" of the educational level "Master" lasts 6 years (360 ECTS credits).

For entrants with disabilities there are special conditions of admission depending on the category: war invalids and persons who are unable to attend the institution are enrolled at the expense of the interview; persons with disabilities of groups 1 and 2 and children with disabilities up to 18 years of age, disabled people from among the participants in the liquidation of the consequences of the Chernobyl accident are subject to transfer to vacant places of the state order, if they study on a contract basis; entrants with diseases defined by the order of the Ministry of Health of Ukraine №1027/900 of August 29, 2016 (https://zakon.rada.gov.ua/laws/show/z1707-16#Text), have the right instead submission of external evaluation certificates to pass the entrance exam at the university. All entrants of privileged categories study at the expense of the state budget.

The projected number of entrants is governed by a License issued by the Ministry of Education and Science of Ukraine (https://mon.gov.ua/storage/app/media/22.%2006.%202020/ilotserkivnatsionalagrarnunivervo220620-5.pdf), according to which the license volume for the annual training in the specialty 211 "Veterinary Medicine" is 175 people.

Admission procedures are no different for students planning to study on a contract basis. The amount of the contract (fixed by the contract) is set annually, but may vary depending on the level of inflation in Ukraine.

Permission to conduct educational activities at BTNAU is a license issued by the Ministry of Education and Science of Ukraine (https://btsau.edu.ua/sites/default/files/news/pdf/pravila_priomu/licenzii_BTNAU.pdf) and a certificate of accreditation of the educational program (https://btsau.edu.ua/sites/default/files/news/pdf/pravila_priomu/sertificaty_BTNAU.pdf).

The admission procedure is determined by the Ministry of Education and Science and is prescribed in the document "Conditions of admission to higher education institutions of Ukraine" (https://mon.gov.ua/ua/osvita/visha-osvita/vstupna-kampaniya-2020/umovi-receipt-to-higher-educational-treasures-in-2020-year). Based on this document, the Admissions Committee develops the "Rules of Admission to BTNAU", which are approved by the Academic Council of the University annually (https://btsau.edu.ua/sites/default/files/news/pdf/pravila_priomu/pravila_priomu_red_2020.pdf).

The composition of the Admissions Committee of the University is approved by order of the Rector, who is the chairman of the commission. The Admissions Committee consists of: Deputy Chairman of the Admissions Committee; Executive Secretary of the Admissions Committee; authorized person of the Admissions Committee for the acceptance and consideration of electronic applications; Deputy Executive Secretary of the Admissions Committee; members of the Admissions Committee (deans of faculties, heads of departments of the university; representatives of student

government and trade unions: subject examination commissions, professional attestation commissions, subject commissions, appeal commission, selection commission.

The process of appealing the decision of the Admissions Committee is conducted by the Appeals Commission in the prescribed manner in accordance with the provisions (https://btsau.edu.ua/sites/default/files/news/pdf/pravila_priomu/polog_apeluac_komisiu.pdf). An appeal commission is set up to consider applicants' appeals. The first vice-rector of the university (deputy director of the structural subdivision), who is not a member of the subject or professional attestation commissions, is appointed the chairman of the appeal commission.

7.4 There must be clear policies and procedures on how applicants with disabilities or illnesses are considered and, if appropriate, accommodated in the programme, taking into account the requirement that all students must be capable of meeting the ESEVT Day One Competences by the time they graduate.

In each academic group of students there is a mentor (one of the teachers of the institution). The mentor constantly meets with the assigned group (information and educational hour every Wednesday according to the class schedule) as needed and more often, where all the necessary issues in the life of students are resolved. Between the teacher and the student such forms of communicative interaction as cooperation of the teacher and the student in the course of scientific, educational and educational activity are developed; direct supervision with the student not only in the classroom, but also outside the educational process; regular holding of individual, group and mass forms of scientific, educational and upbringing activities, in particular scientific student conferences of international, all-Ukrainian and regional levels; availability of a learning management system (on the Moodle platform), which creates favorable conditions for communication and information transfer; use the Internet, including e-mail, to exchange messages.

The faculty has established mechanisms for organizational support of students, which is provided primarily by the dean's office. Administrative issues are resolved either through the head of the academic group, or directly with the participation of the applicant and employees of the dean's office. The university has a powerful institute of curatorship (curators of academic groups are appointed for all groups of students), the rotation of teachers in the dormitory, lectures, seminars and talks on various social and organizational topics. Specialists of various specialties (healthcare, law enforcement agencies, the State Service of Ukraine on Food Safety and Consumer Protection, psychologists, etc.) are constantly invited to educational classes. In order to provide social support for students, various incentives are provided: awarding diplomas and certificates, bonuses, opportunities to receive financial assistance (https://btsau.edu.ua/sites/default/files/news/pdf/pologenna_navh_proces/polog_premiuvan_doplat_mat_dopomog.pdf), vacation at sea, foreign internship, etc. The results of the survey of students on the page: https://btsau.edu.ua/content/yakist-osvity. We constantly analyze and take into account the results of surveys to improve the work on social support.

The institution has a "Health Center", which students turn to in case of deterioration. This medical center has all the conditions for admission and examination of students. Qualified doctor, nurse provide primary care: examination, primary (basic) diagnosis, treatment (recommends temporary disability or day hospital), and in case of difficult situations - referral to a specialized medical institution. The doctor of "Health Center" registers each student accordingly journal, after recovery, the relevant "Sick leave" - for the relevant period, as evidence of temporary or permanent disability of the student. The doctor's services are free of charge at the expense of the university budget. In case of need of attraction of additional means for treatment and prevention of illnesses of students, the trade union committee of BTNAU has well-presented program of the address help. In addition, BTNAU has a recreation cente on the Black Sea coast (Koblevo village, Odessa region) - 45 people were rehabilitated in the period 2018-2020.

BTNAU has created conditions for ensuring the rights and opportunities of individuals with special educational needs to receive education at all levels, taking into account their individual needs, capabilities, abilities and interests. The Procedure for support (assistance and encouragement

https://btsau.edu.ua/sites/default/files/news/pdf/poruadok%20vikoristan_koshtiv_nadan_mat_dopomog.pdf) of persons with disabilities and other low-mobility groups in BTNAU https://btsau.edu.ua/sites/default/files/news/pdf/pologenna_navh_proces/poruad_suprovod_osib_z_invalidnistu.pdf.

Open days are held only on the ground floor, and the entrances to the buildings, if necessary, are equipped with ramps for comfortable movement of a person in a wheelchair. Evacuation plans have been developed, supplemented by sections on the priority evacuation of persons with disabilities.

7.5 The basis for decisions on progression (including academic progression and professional fitness to practise) must be explicit and readily available to the students. The Establishment must provide evidence that it has mechanisms in place to identify and provide remediation and appropriate support (including termination) for students who are not performing adequately.

The Establishment must have mechanisms in place to monitor attrition and progression and be able to respond and amend admission selection criteria (if permitted by national or university law) and student support if required.

The credit transfer system of education has been introduced in BTNAU. The list of exams and semester control tests is determined by the educational program and curriculum. Semester control in a particular discipline is carried out in accordance with the curriculum in the form of a semester exam or credit in the period established by the schedule of the educational process and in the amount of educational material determined by the work program of the discipline.

A student is not admitted to the semester control in a particular discipline if he or she has not completed all types of work (laboratory work, computer workshop and certain individual tasks) provided for in the work curriculum for the semester of this discipline, or has unsatisfactory both certifications in the discipline and did not receive a positive assessment of the additional control measures of the second certification.

The schedule of liquidation of academic debt must be drawn up in time by the dean's office and communicated to the teachers and students who will participate in this procedure. The form of control is student testing, or written or oral questioning, practical work in the laboratory, practical skills in clinics or on the farm. Previously, at the beginning of the study of the discipline or work in clinics, the student gets acquainted with the list of competencies and practical skills provided for his acquisition.

The reason for granting a student the right to re-study may be failure to fulfill the curriculum of the current semester before the examination session for valid reasons, confirmed by relevant documents (due to long-term illnesses, including epidemics; frequent illnesses - more than one month per semester; difficult family circumstances, including the need to care for family members, etc.).

The issue of granting the student of higher education the right to re-education is decided by the rector at the request of the dean of the faculty before the beginning of the relevant semester and is formalized by order. Re-education is carried out from the beginning of the semester, the curriculum of which the applicant has not fulfilled.

Students may be credited with disciplines during re-education, of which, according to the results of the final control, they previously had grades not lower than "good" or "passed", which is carried out on the basis of the application of the applicant by the dean of the faculty.

During the entire period of study, the student can exercise the right to repeat the course of study no more than twice.

Renewal of students is carried out by the rector of the university, regardless of the duration of the break in study, the reason for expulsion, length of service, forms of study and taking into account the ability of the applicant to successfully complete the schedule of the educational process.

The application for transfer or renewal is considered at the university within two weeks, and the applicant is notified of the conditions of enrollment or the reason for refusal. The elimination of academic differences is usually carried out before the start of training. Renewal of higher education students to the first year is prohibited.

Although fluctuations in the number of students by year are often quite significant, they are mainly due to financial difficulties, which forces students to work. Some of them are renewed, in their place come bachelor's graduates of other faculties (for the last 3 years 10 - 18 people).

The main reasons for expulsion: academic debt, transfer to other educational institutions, non-return from academic leave, at will, violation of internal regulations, due to family circumstances. The difficult demographic situation in Ukraine also affects the quantitative and qualitative indicators of the Faculty of Veterinary Medicine.

7.6. Mechanisms for the exclusion of students from the programme for any reason must be explicit.

The Establishment's policies for managing appeals against decisions, including admissions, academic and progression decisions and exclusion, must be transparent and publicly available.

Students who have not eliminated academic debt within the deadlines set by the university, in accordance with Article 46 of the Law of Ukraine "On Higher Education" are expelled from the university for non-compliance with the curriculum (https://zakon.rada.gov.ua/laws/show/1556-18#Text). The student can be expelled from the university: at his own request; in connection with transfer to another educational institution; on the state of health on the basis of the conclusion of the state medical-consultative commission (MCC); for academic failure (for unsatisfactory passing of exams and tests during the session); for non-compliance with the requirements of the curriculum and schedule of the educational process; for appearing in classes, in the educational building, in the library in an intoxicated state, in a state of narcotic or toxicological intoxication; for violation of academic discipline and internal regulations of a higher education institution; by a court judgment that has entered into force.

7.7 Provisions must be made by the Establishment to support the physical, emotional and welfare needs of students. This includes, but is not limited to, learning support and counselling services, career advice, and fair and transparent mechanisms for dealing with student illness, impairment and disability during the programme. This shall include provision of reasonable adjustments for disabled students, consistent with all relevant equality and/or human rights legislation.

There must be effective mechanisms for resolution of student grievances (e.g. interpersonal conflict or harassment).

The Center for Patriotic and Legal Education of Youth operates at BTNAU, the purpose of which is patriotic, spiritual, moral and legal education of youth, able to provide positive dynamics of growth of patriotism and social activity of youth on the basis of formation of civic and patriotic feelings and consciousness (https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_patriotich_vihov.pdf), "Code of Ethics of the University Community", whose mission is to train highly qualified competitive professionals of the new generation for the field of agricultural production by providing educational services, adherence to high standards in teaching, research and professional activities (https://btsau.edu.ua/sites/default/files/Faculties/osvita/quality/etych_kodeks.pdf), the Commission on Ethics and Academic Integrity at BTNAU was established» (Https://btsau.edu.ua/sites/default/files/Faculties/osvita/normatyvne/polog_komis_etyka.pdf), which defines the procedure for resolving conflict situations.

The BTNAU has an "Anti-Corruption Program" (https://btsau.edu.ua/sites/default/files/news/pdf/nakazi/antikorupciina_programa_BTNAU.pdf). As part of the implementation of the Anti-Corruption Program in the educational process of BTNAU, a number of measures have been implemented to ensure transparency and objective assessment during the certification controls and during the session, yes. For example, exams in all subjects are conducted in the presence of at least two teachers.

The university pays great attention to the leisure of students; in particular, there are a large number of different clubs and sections. The most popular sports sections (football, volleyball, basketball, athletics, weightlifting, tennis). Students of the Faculty of Veterinary Medicine have been multiple winners of competitions at the European level: European Champion in hand-to-hand combat 2016 - one student; three students of the faculty are masters of sports in boxing and arm wrestling.

Creative sections are actively working in BTNAU: (folk choir "Batkivska Niva" - winner of International Folklore Festivals in Italy, France, Belgium, Hungary, Poland, Ukraine; folk amateur brass band - winner of International Folklore Festivals in Poland and Ukrainian Drama Theater; folk - Laureate of International Theater Festivals, Laureate of the City Youth Prize, Folk Amateur Bandura Ensemble - Laureate of International Folklore Festivals in Italy and Ukraine, modern and pop dance group "Promotion", folk dance ensemble "Youth" and studio; club of cheerful and clever (CCC), student vocal ensemble winner and graduate of the International and Folklore Festival in France, Youth Prize named after M. Vingranovsky, participant of the International Conference (Slovakia, Nitra), graduate and winner of the international festival-competition of arts and talents "My Star Time"; circle "Leader", circle of journalism, university TV channel on YouTube "SIABTNAU1" (https://www.youtube.com/channel/UCscW-EqOmijs7FqVj5PivnA). The total number of students of the Faculty of Veterinary Medicine who are engaged in creative teams is - 52 people.

The institution pays great attention to student research. Each department has a scientific group (11 groups at the faculty): taxidermy, surgery and anesthesiology, histological, microbiological, parasitological, veterinary examination, "Stork" (obstetrics and gynecology), "pharmacology and pharmacotherapy", veterinary medicine ethology of animals", "Therapist", "Epizootologist", where students conduct research, the materials of which are then reported at student scientific conferences (in/outside the faculty). The traditional conference at the university is held in March-April every year. The best reports of students are celebrated, and students are accordingly awarded diplomas and valuable gifts. The winning students have additional points to the rating for the scholarship (Rules for the appointment and payment of academic and social scholarships https://btsau.edu.ua/sites/default/files/news/pdf/pravila_priznach_stipend.pdf). Based on the results of the reports, students together with the supervisors write theses, which are posted on the official website of the institution in open access (http://science.btsau.edu.ua/sites/default/files/tezy/tezy_stud_vet_2017).

7.8 Mechanisms must be in place by which students can convey their needs and wants to the Establishment. The Establishment must provide students with a mechanism, anonymously if they wish, to offer suggestions, comments and complaints regarding compliance of the Establishment with national and international legislation and the ESEVT standards.

Students are involved in the process of periodic review of the EP, as they are part of the group on the content and quality of education (among the 11 members of the faculty group, two students). Students' suggestions on EP are also taken into account through surveys. During the academic year, students take part in questionnaires conducted by the Department of Education Quality Assurance. The questionnaires contain questions about students' expectations from studying (for students of the 1st year of study), the organization of the educational process, the quality of educational services, the level of teaching, their own attitude to learning, etc. Questionnaires and processed results of student questionnaires with conclusions are posted on the university website (https://btsau.edu.ua/uk/content/yakist-osvity).

At the faculty level, upon completion of the scientific and pedagogical workers course, students are surveyed to evaluate the course according to the following criteria: comprehensibility and availability of material, focus on the future profession, complexity of tasks, volume of classroom classes, and methodological support of the discipline. scientific and pedagogical workers must take into account the right suggestions and wishes.

Student surveys (questionnaires, interviews) are systematically conducted. Independent experts - representatives of employers - are involved in the work of state examination commissions. Meetings of students with the rector, vice-rectors, deans, and heads of departments are regularly held.

BTNAU provides an immediate response to complaints of sexual harassment, discrimination and corruption. The University has a "Legal Clinic Law and Practice" to provide students with access to free legal aid (https://btsau.edu.ua/uk/content/yurydychna-klinika), the faculty has a trust box.

Comments

The university conducts a lot of informational work on enrollment in FVM, according to annual surveys of freshmen. By the Admissions Committee, about 30% of entrants were motivated by information from BTNAU students and 25-32% - informed through the media. At the same time, the demographic situation in Ukraine is quite critical. In addition, the visa-free regime has created conditions for free access of secondary school graduates to study at foreign universities.

The Ukrainian system of admission to the university is quite transparent, but the annual change in the technical conditions of admission, often disorganizes applicants. The lack of stable public funding forces the university to increase tuition fees.

At the same time, the university has a well-developed infrastructure of student self-government and personal progress.

Suggestions for improving

The new strategic plan of the university development envisages a student-centered principle, the popularization of which has the main goal to increase the attractiveness of entrants to study at the university. To increase the motivation of the professional component of training at FVM, the course "Introduction to the specialty" was resumed.

8. STUDENTS ASSESSMENT

8.1 The Establishment must ensure that there is a clearly identified structure within the Establishment showing lines of responsibility for the assessment strategy to ensure coherence of the overall assessment regime and to allow the demonstration of progressive development across the programme towards entry-level competence.

The general strategy of student assessment in Bila Tserkva NAU is presented in the University Regulation "On assessment of learning outcomes of higher education" (2018), which describes the types of control measures and procedures, forms, methods and criteria for students learning outcomes assessment, information requirements and feedback, communication with students, the mechanism of appealing against the results and maintaining relevant documentation. The regulations are a public document and are presented on the university's website. https://btsau.edu.ua/sites/default/files/news/pdf/norm_doc_pechat/polog_pro_ocinuvan_result.pdf.

The learning outcomes assessment system for each course is presented in the relevant StudyGuide (course program), which is a public document on the faculty's website, presented on LMS Moodle and published before the beginning of the academic year. Student's assessment procedures have been designed to objectively assess the achievement of planned learning outcomes, including Day One Competences, as well as communication skills and multisectoral interaction (soft skills). Competences and learning outcomes are defined in accordance with the Standard of Higher Education of Ukraine for the specialty "Veterinary Medicine" of the second (Master's) level of higher education and the EAEVE specifications (Annex 8.1).

The student's assessment is carried out in accordance with the Bologna ECTS system. Students' achievements in each subject are assessed by the teacher using the following strategies: small tests, multiple-choice tests, homework through e-learning system, written essays), computer-assisted and oral examination.

The periods of examination sessions are determined depending on the duration of the semesters and are indicated in the Schedule of the educational process (Academic Calendar), which is posted on the university website a month before the beginning of the academic year. The Curriculum and instruction Department of BTNAU, in coordination with the FVM and the Dean, develops a schedule for each semester.

Assessment results are recorded in the student's record book, examination (test) information is available on the Moodle platform.

At the end of year 6, after full completion of the curriculum, students pass the final certification. To assess graduates, the Examination Commission is established, which operates in accordance with the University Regulation "On the establishment and organization of the examination commission" (2015). The commission consists of 3 people and includes representatives of academic staff, leading specialists in veterinary medicine. The heads of the State Service of Ukraine on Food Safety and Consumer Protection of the region have been the chairmen of the EC for the last 5 years. Formation, organization of work and control over the activities of Examination Commissions are carried out by the Rector. The final certification of graduates is carried out in the form of public defense of the master's thesis and oral exam. All master's theses are checked for plagiarism (https://unicheck.com/).

Specific methodologies for assessing the acquisition of:

-) theoretical knowledge

Theoretical knowledge is assessed in accordance with the acquired knowledge and skills. Forms for assessing the theoretical achievements - test, term paper, case study, written or oral exam. The content of the test is determined by the teacher taking into account the expected specific learning outcomes within the discipline. The student chooses the topic of their course work at the beginning of the study of the discipline after acquaintance with its content. The topic of course works is individual. The structure of the tests and the form of assessment are the same for all students.

-) pre-clinical practical skills

Animal treatment and other propaedeutic skills are assessed in practical classes in small groups (for example, for the disciplines of microbiology, animal welfare, feeding). Preclinical practices are assessed by the teacher in accordance with the results of examinations for the course (oral, written or

computer-based). In almost every such discipline, before passing the theoretical exam, students make a practical minimum depending on the discipline, for example, in histology, students diagnose histopreparations, for feeding make rations.

-) clinical practical skills

clinical practical skills are acquired through laboratory work, clinical rotation and practical clinical work on animals performed under academic supervision in clinics for small animals and large animals at the FVM. Clinical skills are also acquired during extramural practice at enterprises, farms, veterinary clinics, slaughterhouses under the guidance of academic staff. Students prepare clinical protocols of patients, and during the study of pathomorphology - necropsy protocols, which they represent and defend in their groups.

Students' clinical skills are assessed by faculty staff. This assessment is part of the overall assessment for clinical or educational practice.

-) soft skills (e.g. communication skills, team player, dealing with pressure, strong work ethic, positive mental attitude, flexibility, time management, self-confidence, dealing with criticism…).

Assessment of social skills depends on the subject being studied. If the subject involves working in groups, the teacher while assessing assessment this task takes into account such social skills as collaboration, teamwork. Creativity, critical thinking are taken into account while assessing self-study and term papers. Communication skills and problem solving are assessed while working at the clinic. The teacher can assess specific social skills if they are embedded in the study of a particular subject. Time management and dealing with criticism are assessed in presentations and reposts at the student scientific conferences

8.2. The assessment tasks and grading criteria for each unit of study in the programme must be published, applied consistently, clearly identified and available to students in a timely manner well in advance of the assessment. Requirements to pass must be explicit. The Establishment must properly document the results of assessment and provide the students with timely feedback on their assessments. Mechanisms for students to appeal against assessment outcomes must be explicit

Student's Assessment at the Establishment is quite transparent, which is achieved, in particular, through the use of LMS Moodle. Each teacher has a classic (paper) register. The student has permanent (for 24 hours) free access to Moodle, as well as during the working hours - to the paper register.

Criteria and examination procedures are communicated through the BTNAU and FVM (University Regulations and Study Guides) websites. For each subject before the beginning of the academic year, the method of assessing student's learning outcomes and exam deadlines are determined. Students are also informed in advance about the forms, frequency, methods and criteria of assessment, the results of which will later affect the final assessment of the discipline's results. The examination board is also familiar with all evaluation criteria.

Students have the right to review their answers to the exam after the assessment and compare them with the typical answers or assessment criteria.

Assessment criteria are given in the curriculum of the discipline and are communicated to students at the first lesson. Assessment of the student's learning no outcomes is carried out in accordance with the 100-point, national and ECTS assessment scale (Table 1).

Table 8.2.1. Scale for assessing student's success.

100-point	**National scale**		**ECTS grade**
scale	exam	test	
90–100	excellent		A
82–89 75–81	good	passed	B C
64–74 60–63	satisfactory		D E
35–59	unsatisfactory (not passed) with the possibility of re-assembly		FX
1–34	unsatisfactory un-passed) with mandatory re-study of the		F

Criteria for evaluating the results of the student's classroom work and self study work is the ability to analyze and evaluate phenomena, facts, substantiate statements and conclusions.

Each student on the Moodle platform can only see his own grades. The student has the right to get acquainted with a detailed assessment of his work and get an explanation from the teacher about his mistakes. In case of inaccuracies, the student can apply to the dean's office. Various ways of feedback with students are offered. For example, some teachers arrange feedback sessions immediately after exams. During the semester, subject supervisions are organized, where students have the opportunity to discuss with the teacher typical mistakes in the answers, their own progress and other issues related to the discipline.

Students are informed orally at the beginning of each semester about the procedure of appealing against results of the current control, as well as semester control in the form of credit, exam, defense of term paper. Written information is available on the university's website in the Regulation "On the evaluation of learning outcomes of higher education." If the student is not satisfied with the results of the final certification, he has the right to appeal to the rector before midday of the next working day (following the day after the announcement the exam results). In case of the appeal by the order of the rector the commission for its consideration is organized. The chairman of the appeal commission is usually appointed by the vice-rector for educational activities of BTNAU. The commission must include a representative of the student government. The appeal is considered within three working days after its submission.

8.3 The Establishment must have a process in place to review assessment outcomes, to change assessment strategies and to ensure the accuracy of the procedures when required. Programme learning outcomes covering the full range of professional knowledge, skills, competences and attributes must form the basis for assessment design and underpin decisions on progression.

The educational program is the legal basis of the FVM curriculum, which also defines the assessment strategy. The educational program, as well as student's assessment strategies are discussed, finalized by the project team, considered by the group on the content and quality of education at FVM, the methodical commission of the faculty. Then the educational program is considered by the Scientific-methodological Commission of BTNAU and approved by the Scientific Council of BTNAU. Subject assessment procedures are proposed at the Department Councils, discussed at QA group meetings, and approved by the Faculty Council. The draft schedule of tests and exams is developed by the Academic services office of BTNAU. Once approved, all information is published on the university's website.

The results of semester and final assessment are discussed at the meetings of departments, faculty council and academic council of the university in order to conduct self-analysis in the context of quality management of student's assessment procedure and its improvement during the next examination period. Information on all forms of control and evaluation is provided in the curriculum of the discipline. Mandatory sections of the program are "Assessment Methods", "Assessment Criteria", "Distribution of Final Assessment Points".

Due to restrictions caused by the COVID-19 outbreak, adjustments were made to the training process at BTNAU on March 12, 2020. The management of BTNAU issued a number of orders regulating the procedures for classes, practical training of students and summer examination session, as well as Regulations "On the organization of current, semester control and certification of applicants for professional higher and higher education using distance learning technologies" and "Temporary procedure for attestation of applicants for professional higher and higher education in the use of distance technologies in the regional university center of Bila Tserkva National Agrarian University in 2019-2020 in the conditions of quarantine "(Annex 8.2).

According to these documents, the educational process, including student's assessment, was carried out using distance learning technologies in both asynchronous and synchronous modes, using the official university platform Moodle, web services ZOOM, Google Classroom, mobile applications

with video chat and audio, and also email and social networking. The final Certification exams and defense of qualification works were conducted in a remote synchronous mode with the provision of reliable authentication of applicants and strict compliance with quarantine requirements by all participants of the educational process.

At the end of each semester, the dean prepares a report on the evaluation of student learning outcomes. The report is discussed at the Faculty Council and the Scientific Council of BTNAU. The results of the evaluation are announced at meetings with teachers, students of the faculty and representatives of the administration. Deans' reports contain information on average grades, the amount and cause of failed academic assignment. The dynamics of changes in the results of assessment of various subjects are characterized. In cases of inadequate assessment of learning outcomes, the dean organizes meetings with teachers of relevant subjects to find out the reasons for this and discuss how to improve the learning process. The reasons for students' non-compliance with the requirements for the relevant subject are analyzed and recommendations on the strategy of its assessment are provided.

8.4 Assessment strategies must allow the Establishment to certify student achievement of learning objectives at the level of the programme and individual units of study. The Establishment must ensure that the programmes are delivered in a way that encourages students to take an active role in creating the learning process, and that the assessment of students reflects this approach.

Upon completion of the study of the discipline, other educational activities and the achievement of appropriate learning outcomes, which is confirmed by the proper assessment, students are awarded with ECTS credits.

The following types of assessment of students' academic achievements are used at BTNAU: entrance (at the beginning of the course to identify the primary level of performance skills), current (to track student progress during the semester), modular (to determine the level at which students mastered the module), the final semester control (at the end of course in order to identify the level of mastering the material or scoring) (Fig. 1).

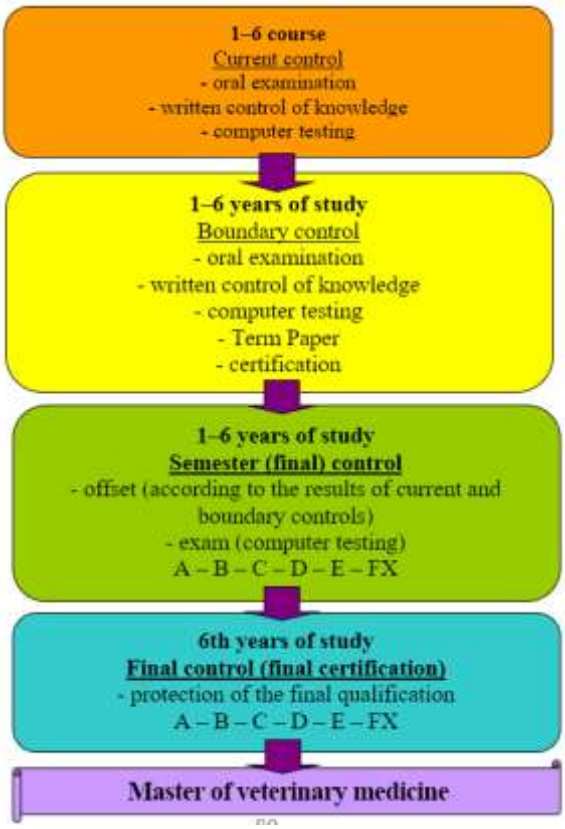


Figure 1 Scheme of student's assessment procedure in Bila Tserkva NAU

Encouraging students to actively participate in the educational process and promote the development of their internal motivation to learn is carried out through such teaching practices as mutual evaluation of students, self-evaluation, teacher evaluation. Mutual evaluation is practiced during the defense of internship reports, term papers, individual research assignments. Online testing on Moodle is used for self-assessment, and anonymous offline and online questionnaires are used for teacher assessment.

8.5 Methods of formative and summative assessment must be valid and reliable and comprise a variety of approaches. Direct assessment of clinical skills and Day One Competences (some of which may be on simulated patients), must form a significant component of the overall process of assessment. It must also include the quality control of the student logbooks in order to ensure that all clinical procedures, practical and hands-on training planned in the study programme have been fully completed by each individual student.

The goals of training and competence, level in accordance with the initial guidelines of the University and Day One Competences, are regularly updated in accordance with the requirements and changes in the system of higher education and the needs of production business.

Assessment of learning outcomes in the block of disciplines includes ensuring food safety, hygienic conditions, possession of practical skills (methods) to control the safety and quality of food, the ability to interpret research results, analyze risks and make decisions about further use of food.

In the block of disciplines on epidemiology and infectious diseases, including zoonosis and infectious diseases of exotic, laboratory animals, etc. from the student on completion of training it is expected:

knowledge and understanding of the epidemiological process, understanding of the patterns of infectious diseases spread knowledge of methods for assessing the epizootic situation and predicting outbreaks of infectious diseases, knowledge of the nomenclature of infectious diseases by animal species, their symptoms, diagnostic methods, treatment and prevention of infectious diseases;

ability to organize surveillance of the epizootic situation, conduct epidemiological research, detect, diagnose and treat infectious diseases, plan, organize and implement anti-epizootic measures to prevent the spread of infectious diseases, including cross-border, and eliminate outbreaks and recovery from infectious diseases.

In the block of disciplines on the veterinary legislation, the organization of veterinary services, maintenance of veterinary public health, on completion of the training it is expected to offline the following outcomes:

knowledge of the nomenclature and provisions of national and international laws related to veterinary medicine, the organizational structure and functions of the state veterinary service and private veterinary enterprises, means and methods of public health;

ability to analyze and implement the provisions of the law, to organize the activities of veterinary institutions of the public or commercial sector, to plan and implement measures to ensure public health.

Student assessment is carried out by comparing the level of his knowledge and skills with those declared in the curricula of specific disciplines.

Comments

Since 2017, students have been participating in Erasmus + academic mobility programs and have the opportunity to study at EU and associated universities, including the Pomeranian Academy (Slupsk, Poland), and the universities of Turkey (Afyon Kocatepe University, Ondokuz Mayıs University). In view of this, the student assessment system at the university continues to be improved and harmonized in accordance with European requirements.

Today, the faculty is implementing a project under the Erasmus + KA2 program "AgLab - Improving laboratory practice skills of specialists in the agri-food sector of Eastern Europe." One of the goals of the project is to develop new methodologies for assessing acquired competencies, especially technical skills.

Suggestions for improvement

The teacher needs more autonomy in the choice of student assessment methodology to be more mobile in responding to the results of their performance analysis. To harmonize it with the system of Day One Competences of improvement, a system of practical training assessment is required.

It is planned to continue to improve digital student assessment procedures to ensure greater transparency.

Particular attention needs to be paid to the introduction of best practices in teaching and learning, the development of new strategies for assessing learning outcomes, social skills acquired for veterinary education and practice.

9. ACADEMIC AND SUPPORT STAFF

9.1 The Establishment must ensure that all staff are appropriately qualified and prepared for their roles, in agreement with national and EU regulations and must apply fair and transparent processes for the recruitment and development of staff. A formal training (including good teaching and evaluation practices, learning and elearning resources, biosecurity and QA procedures) must be in place for all staff involved with teaching.

Most academic staff (calculated as FTE) involved in veterinary training must be veterinarians. It is expected that more than 2/3 of the instruction that the students receive, as determined by student teaching hours, is delivered by qualified veterinarians.

The global strategy of the university is providing an educational program of veterinary medicine training with sufficiently qualified academic staff and consists in is systematical selection of applicants with a diploma of veterinary medicine, PhD degree in special clinical areas, and even better practical experience, foreign language skills, analytical and scientific abilities with organizational skills, electronic means of obtaining information and purposeful use of their technologies in clinical practice, research and educational process. At the same time, very significant attention is paid to the involvement in the educational process of advanced representatives of various branches of practical veterinary medicine, foreign faculties of veterinary medicine, internships for academic staff in specialized domestic and foreign academic and industry institutions, motivation of academic staff for self-analysis based on the improvement of individual scientific component, clinical and academic skills.

Formal instruments and procedures of this strategy are regulated by the Law of Ukraine "On Higher Education", Resolution of the Cabinet of Ministers of Ukraine (dated 30.12.2015 № 1187 as amended on 10.05.2018 № 347) "Licensing conditions for educational activities" (http://mdu.edu.ua/wp-content/uploads/postanova%E2%84%96347.pdf), according to which the recognition of qualifications is carried out according to 18 criteria that can be supplemented or modified by the university in view of its areas of educational activity, goals and objectives on the basis of autonomy, the University Charter or the terms of the Collective Agreement of the university).

At the same time, in accordance with the above regulations, the licensing conditions for the master's degree in higher education determine the ratio of one teacher with a PhD degree per 10 applicants, and the share of academic staff with a PhD degree in the educational program must be at least 60%, doctor habilitated - 20%.

At the BTNAU the FVM faculty according blocks of basic disciplines (except Latin and terminology, zoology, biology of fodder crops and toxic substances, foreign language, Ukrainian language, chemistry, genetics and molecular biology of the cell), basic veterinary disciplines (except animal feeding, animal husbandry), clinical disciplines and food safety and public health are provided with 80–85 scientific and pedagogical workers with a diploma of a veterinarian and a PhD degree in veterinary medicine, and 14 of them are habilitated doctors of veterinary sciences. Postgraduate students are also involved in the educational process, and in accordance with their educational programs, they must spend 50-60 academic hours teaching students under the supervision of academic staff.

Heads of external practice are determined in accordance with the agreements of the university with regional institutions of the State Service of Ukraine on Food Safety and Consumer Protection (Annex 3.5), which regularly take postgraduate training or internship in the best agricultural enterprises and clinics once every 5 years. There are no categories of interns and residents in the national system of veterinary education.

Support staff includes equipment engineers, librarians, administrative and training staff, accountants and drivers serving the faculty, employees of the information and publishing department and postgraduate education, laboratory assistants and doctors, doctors and caretakers of farms of the training and production center, technical and sanitary employees. Support staff who is directly involved in the educational process and the formation of Day One Competences is also represented by certified veterinarians in accordance with the licensing requirements.

All academic and support staff meet the qualification and position held in accordance with job descriptions and prior certification (introductory and periodic) of their competencies in matters and skills of safety and biosafety.

9.2 The total number, qualifications and skills of all staff involved with the programme, including teaching staff, 'adjunct' staff, technical, administrative and support staff, must be sufficient and appropriate to deliver the educational programme and fulfil the Establishment's mission.

A procedure must be in place to assess if the staff involved with teaching display competence and effective teaching skills in all relevant aspects of the curriculum that they teach, regardless of whether they are full or part time, residents, interns or other postgraduate students, adjuncts or off-campus contracted teachers.

Table 9.2.1. Academic staff of the veterinary programme**

Type of contract	AY *	AY-1	AY-2	Mean
Permanent (full rate)	90	92	93	92
Temporary:	-	-	-	-
Interns (full rate)	-	-	-	-
Residents (full rate)	-	-	-	-
Postgraduate students (full time)	-	-	-	-
Practices (full rate)	-	-	-	-
Others (specify) (full rate)	90	92	93	92

Table 9.2.2. Percentage (%) of veterinarians in academic staff

Type of contract	AY *	AY-1	AY-2	Mean
Permanent (full rate)	88,8 %	92,4 %	89,2 %	89,1 %
Temporary (full rate)	-	-	-	-

Table 9.2.3. Support staff of the veterinary programme

Type of contract	AY *	AY-1	AY-2	Mean
Permanent (full rate)	73	71	69	71
Temporary (full rate)	-	-	-	-
Total (full rate)	73	71	69	71

Table 9.2.4. Research staff of the Establishment

Type of contract	AY *	AY-1	AY-2	Mean
Carrying out scientific research under contracts (agreements) with payment (part-time)	30	29	32	30,3

The selection of academic staff is carried out on a competitive basis after its announcement in several media and on the website of BTNAU about filling vacancies of research and teaching staff. The main criteria for applications are veterinary education, PhD, scientific achievements (articles in scientific and metric publications, patents, monographs), foreign language level, experience in practical (pedagogical, clinical) work, experience in research or educational grants.

Recruitment of academic staff is based on the Regulations "On the procedure for replacing positions (election and employment) of scientific and pedagogical (pedagogical) employees of

BTNAU" https://btsau.edu.ua/sites/default/files/news/pdf/pologenna_navh_proces/polog_poruad_zamish_posad_btnau.pdf. After the announcement of the competitive selection, the candidate for the vacant position (senior lecturer, associate professor, professor, head of the department, dean of the faculty) submits a package of documents to the personnel department, and his candidacy is considered at a meeting of the Faculty Council, Academic Council. The position of assistant is replaced by order of the rector without conducting competitive procedures.

The positions of associate professor, professor, head of the department, dean of the faculty belong to the category of those which are elected. The applicant, after the formal procedure of reviewing his dossier in the personnel department and admission to the competitive selection to fill the vacancy, is considered at the department (usually the applicant must hold a public lecture or practical session) and the faculty council, and the decision is made by secret ballot at the university, which is approved by the rector with the signing of a contract. This contract defines the term of office and the obligation of the teacher to achieve clear indicators in his teaching, research and publishing activities. Filling vacancies of academic staff takes into account the relevant scientific specialization of the PhD diploma of the department. The position of assistant is replaced by order of the rector with a probationary period. He is assigned a mentor, usually the head of the department or an experienced teacher. The assistant draws up a plan of his professional and scientific development, which is considered at the department and approved by the Faculty Council. The staff of veterinary clinics is also enrolled by order of the rector with a probationary period. Auxiliary staff is enrolled by order of the rector, taking into account the available professional skills the relevant educational level.

Teachers, graduate students, support staff and even students can work part-time with appropriate remuneration of the implementation of grants, research contracts, clinics, farms of the faculty training center this case, there is no conflict of interest and they are appointed by a written statement by order of the rector.

9.3 Staff must be given opportunities to develop and extend their teaching and assessment knowledge and must be encouraged to improve their skills. Opportunities for didactic and pedagogic training and specialisation must be available. The Establishment must clearly define any systems of reward for teaching excellence in operation. Academic positions must offer the security and benefits necessary to maintain stability, continuity, and competence of the academic staff. Academic staff must have a balanced workload of teaching, research and service depending on their role. They must have reasonable opportunities and resources for participation in scholarly activities.

The total workload for a teacher is 1548 hours, including 600 hours - study load, 200-400 hours - scientific work, up to 300 hours of teaching and methodological, the rest - organizational and methodological activities. The hours of study load are clearly regulated by national and internal university legislation, the rest may vary depending on the tasks of the department, faculty or individual tasks (conducting research, internships, participation in governing bodies, etc.). The structure of the total workload teacher's for the next year is agreed by the staff of the department, teaching and research units, the management of the faculty and the university. Part of the study hours includes work with students in clinics (classes, shifts in clinics). Work in clinics is also motivated by 30% of surcharges the work performed there.

Most academic staff work on a permanent basis for a full salary under a contract, the term of which (1-5 years) depends on the previous results of scientific and organizational, methodological work, publishing activity and evaluation by students. As the hours of study can vary (changes in the curriculum, the number of students, expectations for filling vacancies by a highly professional teacher, etc.), staff often receive an additional 0.25 salary with the appropriate financial reward.

9.4 The Establishment must provide evidence that it utilises a well-defined, comprehensive and publicised programme for the professional growth and development of academic and support staff, including formal appraisal and informal mentoring procedures.

Staff must have the opportunity to contribute to the Establishment's direction and decision-making processes.

Promotion criteria for academic and support staff must be clear and explicit. Promotions for teaching staff must recognise excellence in, and (if permitted by the national or university law) place equal emphasis on all aspects of teaching (including clinical teaching), research, service and other scholarly activities.

To improve pedagogical skills, all teachers take past once every 3-5 years in the training seminars "Modern methods of teaching in higher education" (2 ECTS credits) training in safety (1.5 ECTS credits), and young teachers and interested "Prolonged methodological and psychological seminar: school of professional and pedagogical growth" (1 ECTS credit).

The teaching staff recruitment system must take into account the participation and effectiveness of academic staff in internship programs in the field of discipline and pedagogical improvement, grants or international educational programs to improve their foreign language lever.

Every year, teachers of all categories must spend 30 hours (I ECTS) of internships in specialized departments of other faculties of veterinary medicine, institutions of the State Service of Ukraine on Food Safety and Consumer Protection, research institutes, farms or processing enterprises, veterinary clinics. The results of the internship are reported at the department, public lectures with the participation of students and are formalized by a certificate (Annex 9.1) through the Institute of Postgraduate Studies.

In the system of the teacher's career growth in order to create, creating opportunities to apply for management positions or have a financial reward, a significant role is played by the procedure of awarding the academic title of associate professor or professor, which is formalized by the Cabinet of Ministers https://zakon.rada.gov.ua/laws/show/z0183-16#Text. According to this resolution, the applicant after the defense of the thesis must publish scientific articles in journals included in the scientific and metric databases (5-10 depending on the expected degree).

Due to the expansion of international activities in recent years, significant opportunities have been created for the development and professional growth of academic and support staff. In particular, in recent years the following seminars have been held: 1) in the framework of the OIE pretwinning project - international scientific and practical seminars on anesthesiology, food safety and quality control, harmonization of Ukrainian legislation on food safety, infectious diseases and International scientific-practical final seminar of the pre-twinning project "Implementation of the OIE educational policy in veterinary medicine of Ukraine"; 2) in the framework of cooperation between the Dutch-Ukrainian Dairy Center and Bila Tserkva NAU - International training seminar "Udder Health and Mastitis" with the participation of experts from GD Animal Health; International training seminar "Cow Signals", organized by DUDC in cooperation with CowSignals Training Company, seminar "Udder Health and Mastitis", organized by the Dutch Ukrainian Dairy Center (DUDC). The results of this work are presented in the appendix (Annex 9.2).

The selection of support staff takes into account the required direction and the appropriate level of higher or vocational education, and enrollment is carried out after an interview with the head of the structural unit, trade union representative, life safety specialist by order of the rector without a contract. Support staff enjoy all social security rights under the BTNAU collective bargaining agreement. Laboratory assistants and resident physicians of basic (pre-clinical) and clinical departments of the Faculty of Veterinary Medicine must have veterinary education and annually undergo training seminars on fire safety and occupational safety with elements of biosafety (1.5 ECTS credits) in accordance with the rector's order. For them, in accordance with the recommendations of the Advisory Visit experts, seminars on biosafety and modern technologies of veterinary care were held to ensure sufficient communication with students. Also, veterinary support staff participates in scientific and practical seminars on the relevant topic of departments or clinics where they work, with the appropriate receipt of the certificate (Annex 9.1).

Academic and support staff have permanent quotas and a mandate to participate in the Labor Conference, which is held at least twice a year, where university decisions are made.

Academic staff has the right to apply for elected management positions - dean and rector.

9.5 A system for assessment of teaching staff must be in operation and must include student participation. Results must be available to those undertaking external reviews and commented upon in reports.

The evaluation system of academic staff is based on licensing requirements (Annex 9.4). The University, based on them, taking into account the development strategy, develops its indicators, about 22-26 of them annually (Annex 9.3). According to these criteria, teachers report twice a year. The results of the evaluation are considered by the Academic Council of the faculty, problem issues are identified and measures of individual or general nature are developed to solve them. The results of the evaluation of teachers' work are also analyzed by the Department of Quality Education Assurance in Higher Education. The results of this analysis are reported to the rector and taken into account when concluding a contract for the next term. The evaluation of teachers by students (Annex 9.5) is also very important, which is conducted by anonymous questionnaires in two categories: "Evaluation of the studied course by students" and "Teacher with the eyes of students". This questionnaire is organized and analyzed by the Department of Education Quality Assurance. In case of a teacher's complaint, a conversation is held with the dean and the university management and it is taken into account while concluding the contract.

Comments

It is extremely important for the improvement of the educational process to have the large number of internships of teachers in foreign faculties and lectures of foreign colleagues for students of our faculty. The need to improve professional postgraduate training, especially among support staff with veterinary education, has been taken into account.

Unfortunately, national legislation on education is still unified in terms of teacher/student ratios. The university at the expense of the special fund tries to level this negative that allows to reach the minimum indicators for realization of the educational program by pedagogical and auxiliary personnel. It also significantly limits the possibilities for involving practicing teachers for extramural learning. Among teaching staff, the share of veterinary education ranges from 90%.

Suggestions for improvement

In the new strategic plan of the faculty development it is necessary to expand the professional development of teachers of endoscopic diagnostic and therapeutic technologies, ophthalmology, equine diseases with a strong scientific component. It is necessary to expand the involvement of medical practitioners and foreign teachers in the educational process. Motivation to increase professional training of auxiliary veterinary staff needs comprehensive development.

10. RESEARCH PROGRAMMES, CONTINUING AND POSTGRADUATE EDUCATION

10.1 The Establishment must demonstrate significant and broad research activities of staff that integrate with and strengthen the veterinary degree programme through research-based teaching.

According to the national legislation (the Law of Ukraine "On Higher Education", the Law of Ukraine "On Scientific and Scientific-Technical Activity") scientific activity is an integral part of the work of every teacher at the faculty. The teacher spends 200-300 hours on it with 1548 annual workload. There is a national system of degrees and academic titles that formalizes the career path. Most of the faculty members have the degree of Candidate of Veterinary Sciences (corresponds to the level of Doctor of Philosophy PhD), some have the degree of Doctor of Veterinary Sciences (corresponds to the habilitated doctor). The vast majority of teachers have a degree in accordance with their veterinary specialization. All teachers have veterinary education. The faculty has two teachers with the title of Academician of the National Academy of Agrarian Sciences, which is demonstrates the integration of national scientific institutions and educational institutions and promotes close cooperation between veterinary science and education.

The directions of teachers' scientific work at the faculty correspond to the direction of teaching, it is encouraged by national legislation and guidance to strengthen educational programs and individual courses, ensure their updating on the basis of the latest scientific data and introduction of research-based learning elements through student involvement. Topics of scientific research are considered and approved by the Academic Council of the faculty. Teachers regularly publish the results of their research in domestic and foreign journals. Areas of research interests usually correspond to the pedagogical direction of the teacher, which enhances the quality of teaching (Annex 10.1, 10.2).

The faculty has a specialized academic council D 27.821.02 in the specialties: 16.00.01 "Diagnosis and therapy of animals" and 16.00.05 "Veterinary surgery" in which the defense of PhD and doctoral thesis. During 2018-2019, 5 doctoral and 4 candidate thesis were defended.

The faculty publishes a scientific journal: Scientific journal "Scientific journal of veterinary medicine" is a professional periodical on Veterinary Medicine (Order of the Ministry of Education and Science of Ukraine of November 06, 2014 No. 1279). ISSN 2310-9270 (print) ISSN 2415-7457 (online) DOI 10.33245 / 2310-4902 (CrossRef system) https://nvvm.btsau.edu.ua/en. Published twice a year, 15-20 articles in the issue.

Scientific publication, publishes scientific researches on questions of obstetrics, gynecology and biotechnology of reproduction; veterinary expert examination; diagnostics, therapy, internal diseases and clinical biochemistry; microbiology, epizootology, infectious diseases and immunology; parasitology and invasive diseases; Surgery, Oncology and Anesthesiology; pharmacology and toxicology, which are of interest to scientists and a wide range of practitioners.

The presentation of «Scientific journal of veterinary medicine» journal complies with international standards (COPE), the articles structure is designed in accordance with international requirements (IMRaD).

Articles are published in Ukrainian, Russian and English, accompanied by identical abstracts in Ukrainian and Russian and an extended abstract in English.

The editorial board of the journal comprises Ukrainian and foreign scholars according to the indicated research areas (specialties).

Scientific journal of veterinary medicine do not charge publication fee.

Research funding is possible from university funds, contracts with private production institutions and state funds that provide funding on a competitive basis: the Ministry of Education and Science (https://kis.mon.gov.ua/) or SFFD - the State Fund for Basic Research (dffd.gov.ua). Since 2018, a competition of intra-university grants for the most promising research projects of young scientists has been launched. The grant is provided by the university for the research on the basis of consideration of the application with justification of the research plan.

Table 10.1.1 List of the major funded research programmes in the Establishment which were ongoing during the last full academic year prior the Visitation (AY*)

Scientific topics:	Contract / year (€)	Duration (years)
Contracts with private enterprises		
Scientifically based system for ensuring the sustainable well-being of herds of cattle for leukemia using the latest methods of diagnosis (ELISA, PCR) and effective prevention schemes.	425 thousand UAH / 15.3 thousand euros	1
Diagnosis, treatment and prevention of internal diseases in farm animals	40 thousand UAH / 1.5 thousand euros	1
Mycological, mycotoxicological and microbiological study of feed and raw materials	120 thousand UAH / 4.0 thousand euros	1
State scientific program		
Study of the values of integration properties and methods of using osteotropic implants from new materials on animals	280 thousand UAH / 10 thousand euros	2

10.2 All students must be trained in scientific method and research techniques relevant to evidence-based veterinary medicine and must have opportunities to participate in research programmes.

From the very beginning, the educational process is built on a scientific basis, students are given scientifically based theories, and students learn the scientific method, critical thinking and evaluation of scientific information. Curricula are built on the principles of evidence-based medicine, they are constantly updated by teachers on the basis of modern scientific research, and students are given tasks for self-study work based on the search and use of new scientific data. Before writing a thesis, students can take a course "Research Methodology" with gaining deeper knowledge in this area. In this way, students understand the importance of evidence-based medicine and lifelong learning.

Students are encouraged to bibliographically search and analyze the latest scientific publications while performing individual research tasks during their studies, writing term papers and performing final qualifying work. All these types of works contain requirements for sections of literature review and discussion of the results of their own research, which the student perform on the basis of bibliographic search, their works contain a list of used sources properly designed according to one of the citation styles (mostly national style National Standards of Ukraine 8302:2015). The usual number of processed sources in the course work - 15-25, in the master's thesis - 50-60. The scientific library provides students with advice on the use of reference managers to form a bibliographic database and manage references to primary sources (Mendeley, Zotero). Students' acquaintance with academic writing and bibliography design begins in the first semester at library seminars and is supported by teachers throughout their studies.

Qualification work involves the implementation of scientific research on a scientifically sound methodology, which must be properly justified and described. Statistical processing of experimental data is a mandatory element in the final works. The next stage before the defense of the work is the report of the work results at the scientific student conference with speeches and discussions. Abstracts of conferences are published online, for example, the latest collection is available at link: http://science.btsau.edu.ua/sites/default/files/tezy/tezy_stud_vet_15.04.2020.pdf. Writing research theses and reporting at the conference is taken into account during the defense of the final qualifying work.

Students are mobilized to perform optional research activities through participation in special elective activities in the areas of research activities of the departments - Scientific Clubs, there are 9 of them at each department. Clubs work is an optional meeting where students receive research assignments, teacher's advice, join to the active research projects as performers. At the meetings of the groups, students report on the obtained scientific results in the format of a scientific seminar, gaining experience of public speeches and scientific discussion. Completed results of scientific research, which are mostly related to the topic of the final qualifying work, students report at the annual scientific-practical conferences (http://science.btsau.edu.ua/node/33) (Annex 10.3). Every year students with the best works take part in the all-Ukrainian competition of student scientific works. Every year 1-3 students' scientific works of a research student receive prizes (I-III) places at the national level.

Regardless of the activity in Scientific Clubs, students can participate in scientific programs of departments under the guidance of teachers, graduate students or doctoral students, in particular in the implementation of scientific topics under the state order and economic contracts. Invitations are announced through the dean's office of the faculty and directly by the heads of scientific topics.

Students can co-author scientific papers based on the results of research in which they have participated.

Research activity of students during the writing of the final qualifying work (master's dissertation) is obligatory. Writing a master's thesis is regulated by the requirements that it must contain scientific methods and scientific novelty. The minimum amount of work and its structure, which correspond to the typical structure of a scientific thesis, is regulated. The supervisor of the master's thesis can be a teacher who has a degree and works at the department on a permanent basis. The student performs the final qualification work under the guidance of a teacher on a specific topic in a clinic, laboratory, government agency or livestock. Material for the master's thesis is accumulated mainly during the internship, but the part of the research can be carried out in the laboratories of the faculty or the Educational Veterinary Hospital.

The evaluation of the master's thesis goes through several stages. First, the response to the completed work is provided by the supervisor, who describes the contribution and diligence of the student, then the work is sent to the reviewer, who evaluates the work and provides recommendations for its evaluation. The work is defended publicly before the state attestation commission, which consists of teachers from different departments and the chairman of the commission, who is often a representative of the state veterinary service. The defense consists of a master's report lasting 10-15 minutes with a multimedia presentation and answers to questions of the commission members for, 10-15 minutes. The evaluation of the work is the total average of the commission member evaluations.

To be admitted to the defense procedure, the work must be checked for plagiarism in the Education Quality Assurance Department, using licensed software Unicheck (https://unicheck.com/). Adherence to academic integrity is encouraged at each stage of the final work by all participants of the process.

10.3 The Establishment must provide advanced postgraduate degree programmes, e.g. PhD, internships, residencies and continuing education programmes that complement and strengthen the veterinary degree programme and are relevant to the needs of the profession and society.

Postgraduate veterinary education according to the national system: it is the performance of scientific work (PhD and Doc. of science) or periodic (every 5 years) advanced training of practical veterinarians. Training of practical veterinarians at the University does not interfere with the education of students. Advanced training of practical veterinarians is entrusted to a separate department of the university - the Institute for Advanced Training of Heads and Specialists of Veterinary Medicine, which has a separate staff and part of the teachers from the departments of the faculty who work there part-time. The workload of faculty members is regulated by the planned number of hours for students and trainees and does not create conflict.

Teachers write articles in practical journals focused on practicing physicians, undergo internships in advanced farms with modern technology. An international internship is a prerequisite for obtaining the academic titles of associate professor and professor, which encourages teachers to work internationally, such as Erasmus + KA2 Ag-Lab.

PhD training is based on individual programs according to the chosen scientific program under the guidance of a doctor of sciences. Such training includes in-depth study of selected topics and English language and philosophy, taking exams in these disciplines. Separately, graduate students study the basics of the scientific method, biostatistics, computer science with programming. This is based on the principles of evidence-based veterinary medicine. Doctoral students (candidates for Doctor of Science) already have a PhD degree and perform research independently using the advice of a designated scientific advisor. Students can participate in such research projects and master scientific research methods under the guidance of graduate and doctoral students. This is optional but approved by the administration and teachers.

Currently, 22 postgraduate and 5 doctoral students are conducting research dissertations at the faculty, conducting research in the following areas: therapy and clinical diagnostics, surgery and diseases of small pets, parasitology and pharmacology, anatomy and histology of pets, obstetrics and biotechnology of animal reproduction, normal and pathological animals, epizootology and infectious diseases (Annex 10.4).

The main topics of research at the faculty are the creation of modern technologies to improve the health and productivity of farm animals, molecular diagnosis of internal and infectious animal diseases, development of diagnostic methods, prevention and treatment of animal diseases, study of antibiotic-resistant strains of microorganisms, study of new composite materials for osteosynthesis homeostasis systems, etc.

The national system of veterinary education does not provide such forms of postgraduate training as internships and residencies, so the faculty cannot provide statistics on these indicators.

The participation of veterinary specialists and faculty members in EBVS colleges is complicated by the need for significant financial costs for the preparation and maintenance of membership. Given the country's economic situation and the significant income gap, EBSVs still remain inaccessible to faculty members. However, management and staff are aware of the importance and need to participate in EBVS and take all measures to get real opportunities to participate in the future.

According to these practices, the faculty runs on a commercial basis courses "Intensive reproduction of cows with the basics of ultrasound diagnostics" for practicing veterinarians lasting 90 hours.

Table 10.3.1. Number of students registered at postgraduate clinical training

Training	AY *	AY-1	AY-2	Mean
Interns: Companion animals Equine Productive animals Others (specify) Total	-	-	-	-
Residents: EBVS disciplines Total	-	-	-	-
Other : Training courses Intensive reproduction of cows with basics of ultrasound diagnostics.	3	2	5	3

Table 10.3.2. Number of students registered at postgraduate research training.

Scientific degrees	AY *	AY-1	AY-1	Mean
PhD	22	19	12	18
Doctor of Science	5	6	6	6
Total	27	25	18	23

Table 10.3.3. Number of applicants registered in other postgraduate programs (including external / distance learning courses)

Programmes	AY *	AY-1	AY-2	Mean
No applicants	-	-	-	-

There is no form of external/distance postgraduate education in the national system and the faculty does not provide this type of education.

Table 10.3.4. Number of participants in refresher courses provided by the Institution

Courses	AY *	AY-1	AY-2	Mean
Medicine	712	755	750	739
Veterinary inspection	410	431	418	419
Diagnostics	222	234	250	235
Total	1344	1420	1418	1394

Continuing education programs for practicing veterinarians are tailored to the current challenges of the industry and are based on requests from veterinary institutions. Such programs are approved at the level of the relevant department of the State Service of Ukraine on Food Safety and Consumer Protection and are useful for practicing veterinarians. In particular, according to available statistics, in 2018 the total number of veterinary specialists in Ukraine who improve their skills was 2535 people. Such work in Ukraine is carried out by 4 faculties of veterinary medicine, in Kyiv, Lviv and Kharkiv. The Faculty of Veterinary Medicine of BTNAU trains 56% of veterinarians, is most and more than the other three faculties together.

In 2019, the Institute for Advanced Training of Managers and Specialists of Veterinary Medicine trained 1,344 specialists, including 222 people in the field of "Diagnostic Affairs", "Veterinary Inspection" - 410 people and "Medical Affairs" - 712 people.

The projected number of students of advanced training courses is determined by the licensed volume issued by the Ministry of Education and Science and the needs of the State Service of Ukraine on Food Safety and Consumer Protection. Taking into account the average annual number of students, their projected number in 2020-2022 will be about 1,500 students per year, in particular in the areas: medical - 780, inspection service - 460, diagnostic - 255, with a tender.

10.4 The Establishment must have a system of QA to evaluate how research activities provide opportunities for student training and staff promotion, and how research approaches, methods and results are integrated into the veterinary teaching programmes.

The quality assessment system of research activity is part of the university quality assessment system. Quality is controlled at all stages of research projects. Ensuring the quality and effectiveness of PhD preparation and habilitated doctoral dissertations is important for the university, because this indicator is taken into account in the National Accreditation of the institution. Topics of candidate and doctoral theses are determined within the fields defined by law, approved at a meeting of the department and approved by the Academic Council of the Faculty. This is based on the review of research prospectuses by at least two reviewers from among recognized scientists in the field, who usually have a doctorate. Approval of the topic and work plan takes place collectively at the Academic

Council after the presentation of the research prospectus by the applicant and the resume of the supervisor. If the topic of research of a graduate student or doctoral student needs to be corrected in the future, it can be reconsidered at a meeting of the department and then at a meeting of the Academic Council of the faculty and adjusted.

Postgraduate and doctoral students annually report on the progress of their work at the Academic Council and submit reports to the Department of Postgraduate and Doctoral Studies, which carries out administrative supervision of research activities. Upon completion of research work at the stage of preparation to the thesis defense, a mandatory condition for admission to the defense is the submission, among other things the acts of implementation of scientific results in the educational process.

The scientific topics of the departments are coordinated with the branch programs of the National Academy of Agrarian Sciences (NAAS of Ukraine), and registered in the national database of scientific works in "State scientific organization - Ukrainian Institute of Scientific and Technical Expertise and Information" (UkrINTEI) on the basis of the university application and receive a unique identification number. For this purpose by the decision of the department, the academic council of the faculty, the technical task with the calendar plan of works is made out. The Thematic plan of scientific topics is drawn up annually and is available on the university website.

Teachers work closely with research institutes of the State Service of Ukraine on Food Safety and Consumer Protection and NAAS of Ukraine, in particular with the State Research and Control Institute of Biotechnology and Strains of Microorganisms (DNKIBSHM, DNDILVSE, Kyiv), the Institute of Veterinary Medicine of the National Academy of Agrarian Sciences of Ukraine. research center "Institute of Experimental and Clinical Veterinary Medicine" (IEVM, Kharkiv), etc. (Annex 10.5).

Continuing and postgraduate study programs are compiled by the relevant departments of Institute of Postgraduate Training of Veterinary Medicine Managers and Specialists and approved at the level of the State Service of Ukraine on Food Safety and Consumer Protection. Working curricula are considered and approved by the Methodical Commission of the faculty, which consists of leading experts in the field. This ensures their quality and compliance with the needs of practitioners.Annually working curricula are subject to correction and re-review by the Methodical Commission.

Comments

Research work at the University corresponds to the national system and is regulated by acts of the Ministry of Education and Science of Ukraine. Postgraduate and doctoral students provide training in all fields of the departments of the faculty. The number of publications in international peer-reviewed publications is increasing every year (Annex 10.6).

The absence of residents and interns in the clinic is due to the peculiarity of the national education system. Despite significant financial and organizational difficulties, the faculty seeks to participate in the training of EBVS residents in the future. The system of postgraduate training of practical veterinarians complies with veterinary legislation and is licensed by the Ministry of Education and Science and the State Service of Ukraine on Food Safety and Consumer Protection. The content and quality of postgraduate education meets the needs of the market of veterinary specialists and professional requirements for them.

Suggestions for improvement

Activities are underway to establish a Center for the Training of Veterinary Inspectors, as a development of cooperation between the OIE twinning project and VetAgroSup (Lyon National School of Veterinary Services) to develop postgraduate and continuing education of veterinarians (primarily veterinary inspectors), including short courses and distance learning. In 2019, pilot courses were developed for State Inspectors in the areas of "Inspection of establishments for direct sales" and "Antibiotic resistance".

It is important to find sources of funding for research for teachers and students at the national and international levels. As well as to improve the level of research through the formation of a culture of experimental work, finding relevant topics for research, introduce the training for students, graduate students and teachers.

The system of postgraduate clinical training and empowerment for graduate students and practicing veterinarians in clinical specialization, accession to European internship and residency programs, and the lack of such a form in the national training system and obvious incentives from the state need to be revised. This can be done by initiating alternative programs (as defined on the EBVS website) in collaboration with accredited VTHs.

11. ESEVT INDICATORS

Name of the Establishment:	Faculty of Veterinary Medicine of Bila Tserkva National Agrarian University
Date of the form filling:	Volodymyr Sakhniuk, decanvet@ukr.net

Calculated Indicators from raw data - 20.07.2020		Establishment values	Median values[1]	Minimal values[2]	Balance[3]
I1	n° of FTE academic staff involved in veterinary training / n° of undergraduate students	0,113	0,15	0,13	-0,013
I2	n° of FTE veterinarians involved in veterinary training / n° of students graduating annually	0,785	0,84	0,63	0,155
I3	n° of FTE support staff involved in veterinary training / n° of students graduating annually	0,674	0,88	0,54	0,134
I4	n° of hours of practical (non-clinical) training	2082,000	953,5	700,59	1381,410
I5	n° of hours of clinical training	1092,333	941,58	704,8	387,533
I6	n° of hours of FSQ & VPH training	550,000	293,5	191,8	358,200
I7	n° of hours of extra-mural practical training in FSQ & VPH	101,333	75	31,8	69,533
I8	n° of companion animal patients seen intra-murally / n° of students graduating annually	43,671	62,31	43,58	0,091
I9	n° of ruminant and pig patients seen intra-murally / n° of students graduating annually	1,028	2,49	0,89	0,138
I10	n° of equine patients seen intra-murally / n° of students graduating annually	1,551	4,16	1,53	0,021
I11	n° of rabbit, rodent, bird and exotic seen intra-murally / n° of students graduating annually	1,250	3,11	1,16	0,090
I12	n° of companion animal patients seen extra-murally / n° of students graduating annually	0,617	5,06	0,43	0,187
I13	n° of individual ruminants and pig patients seen extra-murally / n° of students graduating annu	9,557	16,26	8,85	0,707
I14	n° of equine patients seen extra-murally / n° of students graduating annually	0,642	1,80	0,62	0,022
I15	n° of visits to ruminant and pig herds / n° of students graduating annually	0,582	1,29	0,54	0,042
I16	n° of visits of poultry and farmed rabbit units / n° of students graduating annually	0,111	0,11	0,04	0,066
I17	n° of companion animal necropsies / n° of students graduating annually	1,509	2,11	1,40	0,109
I18	n° of ruminant and pig necropsies / n° of students graduating annually	0,975	1,36	0,90	0,075
I19	n° of equine necropsies / n° of students graduating annually	0,101	0,18	0,10	0,001
I20	n° of rabbit, rodent, bird and exotic pet necropsies / n° of students graduating annually	0,959	2,65	0,88	0,079
I21*	n° of FTE specialised veterinarians involved in veterinary training / n° of students graduating	0,041	0,27	0,06	-0,019
I22*	n° of PhD graduating annually / n° of students graduating annually	0,022	0,15	0,07	-0,048
1	Median values defined by data from Establishments with Accreditation/Approval status in May 2019				
2	Recommended minimal values calculated as the 20th percentile of data from Establishments with Accreditation/Approval status in May 2019				
3	A negative balance indicates that the Indicator is below the recommended minimal value				
*	Indicators used only for statistical purpose				

	Name of the Establishment:	Faculty of Veterinary Medicine of Bila Tserkva National Agrarian University			
	Name & mail of the Head:	Volodymyr Sakhniuk, decanvet@ukr.net			
	Date of the form filling:	20.07.2020			
	Raw data from the last 3 full academic years	Year -1	Year -2	Year -3	Mean
1	n° of FTE academic staff involved in veterinary training	93	92	90	91,7
2	n° of undergraduate students	689	854	899	814,0
3	n° of FTE veterinarians involved in veterinary training	83	85	80	82,7
4	n° of students graduating annually	93	94	129	105,3
5	n° of FTE support staff involved in veterinary training	69	71	73	71,0
6	n° of hours of practical (non-clinical) training	2004	2120	2122	2082,0
7	n° of hours of clinical training	1148	1106	1023	1092,3
8	n° of hours of FSQ & VPH training	510	510	630	550,0
9	n° of hours of extra-mural practical training in FSQ & VPH	88	88	128	101,3
10	n° of companion animal patients seen intra-murally	4150	4700	4950	4600,0
11	n° of ruminant and pig patients seen intra-murally	100	105	120	108,3
12	n° of equine patients seen intra-murally	155	165	170	163,3
13	n° of rabbit, rodent, bird and exotic patients seen intra-mural	110	135	150	131,7
14	n° of companion animal patients seen extra-murally	55	60	80	65,0
15	n° of individual ruminants and pig patients seen extra-mural	890	980	1150	1006,7
16	n° of equine patients seen extra-murally	68	65	70	67,7
17	n° of visits to ruminant and pig herds	52	60	72	61,3
18	n° of visits of poultry and farmed rabbit units	10	10	15	11,7
19	n° of companion animal necropsies	147	150	180	159,0
20	n° of ruminant and pig necropsies	96	92	120	102,7
21	n° of equine necropsies	10	10	12	10,7
22	n° of rabbit, rodent, bird and exotic pet necropsies	90	95	118	101,0
23	n° of FTE specialised veterinarians involved in veterinary tr	4	4	5	4,3
24	n° of PhD graduating annually	2	3	2	2,3

The boxes within the red frames must be filled in by the Establishment (the other values will be automatically calculated)

Comments

During the Consultation Visit, it was proposed to list the indicators in terms of non-clinical and clinical training, hours of public health and food safety training, as the balance between them was disturbed. It was also necessary to list indicators on the number of patients in intra- and extramural practice, as the number of animals from external practice was involved.

The somewhat negative balance of I1 indicator is due to the presence of large groups in the study of basic disciplines, such as biophysics, Ukrainian language, animal husbandry, which is due to the requirements of national legislation. Other indicators have a positive balance, especially those

related to work that reflects clinical training on ruminants, pigs, poultry and rabbits. Insufficient development of the horse breeding industry significantly complicates the achievement of high performance.

Suggestions for improvement

The faculty focuses its efforts on the infrastructural provision of clinical training, which will allow to achieve higher indicators.

12. GLOSSARY AND ABBREVIATIONS

ACF - Academic Council of the Faculty
ACU - Academic Council of the University
AgLab - Improving laboratory practice skills of specialists in the agri-food sector of Eastern Europe – Erasmus + KA2 Project.
BTNAU - Bila Tserkva National Agrarian University
CEVEO - Cooperation d'Echanges Veterinaries Est-Ouest
EC - Examining Commission
EP - educational program
EPT - external (internship) practical training
ECTS - European Credit Transfer and Accumulation System
QA group - groups on the content and quality of education
ESEVT - European System of Evaluation of Veterinary Training
FVM - Faculty of Veterinary Medicine
MES - Ministry of Education and Science. Of Ukraine
MCC - state medical-consultative commission
NAAS - National Agrarian Academy of Sciences of Ukraine
OIE - World Organisation for Animal Health
PDCA - methodology Deming cycle
SOP- Standard operating procedure
SP- study program
SFFD - State Fund for Basic Research
UAH - Ukrainian Hryvnia
VetAgroSup - Lyon National School of Veterinary
VTH - veterinary teaching hospital

13. LIST OF APPENDICES

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Annex 10.5 - Agreement of scientific collaboration between BTNAU and Institute of veterinary medicine NAAS
Annex 10.6 - Publications teachers of the Faculty of Veterinary Medicine in journals, which are indexed in scientometric databases Scopus and Web of Science for 2017-2020

Additionally - Standard operating procedures (SOP) on Biosecurity of FVM BTNAU (in Ukraine)