

# Legal Status and Epistemological Characteristics of Forensic Veterinary Science Objects

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*This research paper purpose is to reveal the legal status and provide the epistemological characteristics of objects of forensic veterinary science. General specific research methods were used to achieve the goal. For the first time, the definition of “objects of forensic veterinary research” was formulated as material and materialized sources of information about the crime, that forensic expert comprehensively, completely, objectively and directly investigates while forensic veterinary examination based on specific expertise using mutual complex of methods and means for solving diagnostic and situational expert tasks set in the procedural document on the appointment of forensic veterinary examination (forensic expert recruitment). It is argued that tangible objects of forensic veterinary examination are live examinee animals and examinee carcasses of animals, feed and feed supplements, biological material of animal origin and elements of physical environment of the scene, and material objects are case materials (proceedings) and materials obtained during operative search and/or investigative activities (reports of inspection of the scene, diagrams, photo and video documents, etc.), veterinary documents (protocols of the pathological autopsy of animal corpses, acts of farm epizootic inspection, logs of registration and treatment of sick animals and issuance of veterinary documents, medical*

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history and an extract from the animal's outpatient card, the results of laboratory tests of biological body fluids (blood, urine, bile, feces, gastric juice, etc.) and bacteriological, virology, mycology tests of biological material, clinical diagnostic tests, operating permit, etc.).

**Keywords:** forensic science activity; definition of objects of forensic veterinary research; theory, legal status, epistemological characteristics of forensic veterinary examination; tangible and materialized objects of forensic veterinary research.

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### Research Problem Formulation

Currently, forensic veterinary examination (as new forensic veterinary science species in many countries of the world) is at the stage of formation, therefore, it requires development of its own theoretical, organizational, legal and praxeological conceptual foundations<sup>1</sup>. Scientists are actively developing its theoretical basis (in particular, regarding definition of subject of forensic veterinary research, place of forensic veterinary science in the system of

forensic sciences and its importance for legal proceedings)<sup>2</sup>, however, principles of forensic veterinary science have not yet been formulated, methodology of scientific and forensic research has not been developed, tested and introduced into practice, solved tasks have not been substantiated, range of specific objects of its research has not been outlined<sup>3</sup>.

Lack of theoretical substantiation (in particular, definition, characteristics and classification of objects) of forensic veterinary examination negatively affects practice of appointing and conducting

- 1 Клюев О. М. Удосконалення експертного забезпечення правосуддя: теоретичні, правові та організаційні аспекти. *Теорія та практика судової експертизи і криміналістики*. 2019. Вип. 19. С. 102–117. DOI: [10.32353/khrife.1.2019.08](https://doi.org/10.32353/khrife.1.2019.08) (date accessed: 01.02.2023) ; McDonough S. P., McEwen B. J. Veterinary Forensic Pathology: The Search for Truth. *Veterinary pathology*. 2016. Vol. 53. Is. 5. Pp. 875–877. DOI: [10.1177/03009858166647450](https://doi.org/10.1177/03009858166647450) (date accessed: 10.03.2022).
- 2 Яценко І. В. Місце судово-ветеринарної експертизи в системі судових експертиз та її значення у судочинстві. *Eurasian scientific discussions*. Proceedings of the 4th International scientific and practical conference. Barca Academy Publishing. Barcelona, Spain. 2022. Pp. 27–39. URL: <https://sci-conf.com.ua/wp-content/uploads/2022/05/EURASIAN-SCIENTIFIC-DISCUSSIONS-8-10.05.22.pdf> (date accessed: 01.02.2023) ; Idem. Можливості судово-ветеринарної експертизи у забезпеченні відшкодування шкоди, завданої внаслідок ведення агресивної війни. *Актуальні питання судової експертології, криміналістики та кримінального процесу* : мат-ли IV Міжнар. наук.-практ. конф. (Київ, 16.12.2022). Київ, 2022. С. 510–514 ; Idem. Предмет судово-ветеринарної експертизи та його значення в теорії і практиці судової експертизи. *Науковий вісник Ужгородського Національного університету. Серія: Право*. 2022. Вип. 73. Ч. 2. С. 154–173. DOI: [10.24144/2307-3322.2022.73.55](https://doi.org/10.24144/2307-3322.2022.73.55) (date accessed: 01.02.2023).
- 3 Яценко І. В., Дереча Л. М. Можливості судово-ветеринарної експертизи як нового виду судових експертиз. *Теорія та практика судової експертизи і криміналістики*. 2019. Вип. 19. С. 550–567. DOI: [10.32353/khrife.1.2019.044](https://doi.org/10.32353/khrife.1.2019.044) (date accessed: 01.02.2023).

this type of forensic examination, causes unreasonable refusals to its conducting, substitution of forensic examination with other procedural actions, raising issues in the procedural document on its appointment that go beyond the of forensic expert competence.

### Analysis of Essential Researches and Publications

One of fundamental science concepts of forensic examination and forensic expert practice is concept of *object of forensic examination*. Object essence is reflected in the tasks that subject of appointment of forensic examination (forensic expert involvement) puts to forensic expert. Prerequisite for effective resolution of any case (proceedings) is a correct understanding of research objects, outlining their range and specific

characteristics, clear and substantiated determination of the grounds for appointment and conducting forensic examination, correct application of legal norms that contain this concept, because the relationship between the object and the topic of forensic examination and proof topic (range of circumstances to be established in each case) is proven <sup>4</sup>.

Essence of forensic science objects as a field of practical activity was studied by: O. Bondarenko <sup>5</sup> and M. Scherbakovskiy <sup>6</sup> (outlined object of forensic science in criminal proceedings); F. Dzhavadov <sup>7</sup> (identified the main elements characterizing forensic science activity, in particular, object general forensic science theory); O. Dufeniuk <sup>8</sup> (proposed criteria for classification of forensic science objects o); N. Klymenko <sup>9</sup> (found out nature forensic science objects); O. Moisieiev <sup>10</sup> (detailed the object of expert forensic

- 4 Головченко Л. М., Лозовий А. І., Сімакова-Єфремян Е. Б. та ін. Основи судової експертизи: навчальний посібник для фахівців, які мають намір отримати або підтвердити кваліфікацію судового експерта. Харків, 2016. С. 70—73.
- 5 Бондаренко О. О. Об'єкт і предмет судової експертизи у кримінальному судочинстві. *Вісник Харківського національного університету ім. В. Н. Каразіна*. № 1082. Серія «Право». 2013. Вип. 16. С. 216—218. URL: <https://dspace.univd.edu.ua/xmlui/handle/123456789/2480?locale-attribute=uk> (date accessed: 01.02.2023).
- 6 Щербаківський М. Г. Проведення та використання судових експертиз у кримінальному провадженні : монографія. Харків, 2015. С. 98—132. URL: <https://dspace.univd.edu.ua/xmlui/handle/123456789/6020> (date accessed: 01.02.2023).
- 7 Джавадов Ф. М. огли. Концептуальні основи розвитку судової експертизи в сучасних умовах : автореф. дис.... канд. юрид. наук. Київ, 2000. 30 с. URL: <https://dspace.nlu.edu.ua/handle/123456789/16795> (date accessed: 01.02.2023).
- 8 Дүфенюк О. М. Експертиза у кримінальному провадженні за законодавством України та Польщі: порівняльне дослідження : монографія. Львів, 2018. С. 33—38. URL: <https://dspace.lvduvs.edu.ua/bitstream/1234567890/3601/1/%D0%9C%D0%BE%D0%BD%D0%BE%D0%B3%D1%80%D0%B0%D1%84%D1%96%D1%8F%20%D0%94%D1%83%D1%84%D0%B5%D0%BD%D1%8E%D0%BA%20%D0%BC%D0%B0%D0%BA%D0%B5%D1%82%20%D0%925-28.10.pdf> (date accessed: 01.02.2023).
- 9 Клименко Н. І. Природа об'єктів судової експертизи. *Актуальні питання кримінального процесу, криміналістики та судової експертизи* : мат-ли міжвідом. наук-практ. конф. (Київ, 24.11.2017). У 2 ч. Київ, 2017. Ч. 1. С. 309—312. URL: [https://www.naiiu.kiev.ua/files/naukova-diyalnist/naukovi-zaxodi/zbirniki/2017/materialy\\_1\\_24112017.pdf](https://www.naiiu.kiev.ua/files/naukova-diyalnist/naukovi-zaxodi/zbirniki/2017/materialy_1_24112017.pdf) (date accessed: 01.02.2023).
- 10 Моїсєєв О. М. Експертна технологія та предмет, об'єкт, задачі судової експертизи. *Право і Безпека*. 2005. № 4/2. С. 27.

technology); M. Sehai<sup>11</sup> (defined the forensic science object as a science); E. Simakova-Yefremian<sup>12</sup> (substantiated legal object status of multidisciplinary forensic research); V. Khomutenko and A. Khomutenko<sup>13</sup> (revealed relationships between categorical concepts *object and topic of knowledge* in the context of cognitive process in forensic science system).

Many scientists paid attention to the definition issues, classification and characteristics of objects of various types of forensic examinations: O. Hrosheva<sup>14</sup> defined objects of multidisciplinary forensic

biological and trace evidence examination; S. Yevdokymenko<sup>15</sup> outlined the object of forensic economics; A. Krupka and co-authors<sup>16</sup> found out object of forensic aviation examination; O. Mieshkov<sup>17</sup> investigated object of forensic engineering of accidents related to electrocution; H. Prokhorov-Lukin<sup>18</sup> detailed the object of forensic examination of intellectual property; V. Sezonov<sup>19</sup> characterized vehicles and accompanying documents as objects of forensic investigation; S. Stratonov<sup>20</sup> singled out the object of forensic examination to establish document antiquity; V. Fedorenko and

- 11 Сегай М. Я. Судебная экспертология: объект, предмет, природа и система науки. *Теорія та практика судової експертизи і криміналістики*. 2003. Вип. 3. С. 25–32.
- 12 Сімакова-Єфреміан Е. Б. Теоретико-правові та методологічні засади комплексних судово-експертних досліджень : дис. ... д-ра юрид. наук. Харків, 2017. 516 с.
- 13 Хомутенко В., Хомутенко А. Дуалістична природа судової експертизи. *Юридичний вісник*. 2022. № 2. С. 139–147. DOI: [10.32837/yuv.v0i2.2332](https://doi.org/10.32837/yuv.v0i2.2332) (date accessed: 01.02.2023).
- 14 Грошева О. Ю. Організаційно-правові, загально-методичні засади комплексної судової біолого-трасологічної експертизи та її оцінка судом : дис. ... д-ра філос. за спец. 081 «Право». Харків, 2021. С. 65–84.
- 15 Євдокименко С. В. Судово-економічна експертиза: теоретико-методологічні засади і практика реалізації : автореф. дис. ... д-ра юрид. наук. Харків, 2017. 44 с. URL: [https://dspace.univd.edu.ua/xmlui/bitstream/handle/123456789/2585/aref\\_yev\\_2017.pdf?sequence=2&isAllowed=y](https://dspace.univd.edu.ua/xmlui/bitstream/handle/123456789/2585/aref_yev_2017.pdf?sequence=2&isAllowed=y) (date accessed: 01.02.2023).
- 16 Крупка А. А., Дузь Л. Є., Кралюк М. О., Крупка Я. А., Яковлева Є. О. Теоретичний базис судового експертного дослідження надзвичайних подій на повітряному транспорті. *Вісник Національного технічного університету України «Київський політехнічний інститут»*. Політологія. Соціологія. Право. 2021. № 1 (49). С. 121–127. DOI: [10.20535/2308-5053.2021.1\(49\).233054](https://doi.org/10.20535/2308-5053.2021.1(49).233054) (date accessed: 01.06.2023).
- 17 Мешков О. О. Об'єкт, предмет і завдання судової інженерно-технічної експертизи нещасних випадків, пов'язаних з електротравмуванням. *Теорія та практика судової експертизи і криміналістики*. 2019. Вип. 19. С. 367–378. DOI: [10.32353/khrife.1.2019.028](https://doi.org/10.32353/khrife.1.2019.028) (date accessed: 01.02.2023).
- 18 Прохоров-Лукін Г. Судова експертиза: поняття та види об'єктів інтелектуальної власності. *Теорія і практика інтелектуальної власності*. 2016. № 6. С. 17–24. URL: <https://drive.google.com/file/d/1rMcpBdvvF6Wq29fhuu1IJ5DTiV6dHDax/view?pli=1> (date accessed: 01.02.2023).
- 19 Сеzonov В. С. Комплексне експертно-криміналістичне дослідження транспортних засобів : автореф. дис. ... канд. юрид. наук. Харків, 2018. 23 с. URL: [https://dspace.univd.edu.ua/xmlui/bitstream/handle/123456789/5880/aref\\_Sezonov%20V%20S\\_2018.pdf?sequence=1&isAllowed=y](https://dspace.univd.edu.ua/xmlui/bitstream/handle/123456789/5880/aref_Sezonov%20V%20S_2018.pdf?sequence=1&isAllowed=y) (date accessed: 01.02.2023).
- 20 Стратонов С. Ю. Теоретичні та методичні основи експертизи встановлення давності документа : дис. ... канд. юрид. наук. Київ, 2020. С. 38–52. URL: [http://elar.naiu.kiev.ua/bitstream/123456789/17598/4/dys\\_stratonov\\_.pdf](http://elar.naiu.kiev.ua/bitstream/123456789/17598/4/dys_stratonov_.pdf) (date accessed: 01.02.2023).

co-authors <sup>21</sup> singled out the object of copyright in forensic examination of literary works of a scientific nature; S. Chvankin <sup>22</sup> outlined the object of computer forensic science.

Best practices of foreign and domestic scientists have improved certain theoretical provisions of forensic science, enriched forensic science and streamlined certain types of forensic science objects. Instead, up to date, forensic veterinary examination objects have not been singled out and characterized (as a basic concept in theory of this class of forensic examination). Consequently, this issue has theoretical and practical significance and is relevant for both jurisprudence and forensic veterinary science.

### Article Purpose

Formulate author's definition of *objects of forensic veterinary research* as a fundamental concept of one of the types of forensic examination, as well as to characterize such objects for the needs of forensic expert practice.

### Research methods

For achieving the goal, general scientific and special scientific methods were applied: analysis, synthesis, analogy;

formal and logical; comparative legal; logical and grammatical; legal analysis; systemic and structural; sociological; statistical; modeling; comparative legal ones.

### Main Content Presentation

One of the most complex and at the same time the most basic categories of forensic science in general and forensic veterinary science in particular is the topic and objects of research. It is important to determine content of these definitions to clarify forensic veterinary examination essence and improve its theoretical aspects and methodological foundations to solve practical forensic issues. Forensic examination object is a marker of the type of forensic research, information source about facts (events) and specific expertise of forensic expert; it is the object determining the tasks solved by examination and the relationship with research topic, outlines limits of forensic expert competence (in in default of the object, it is impossible to conduct forensic research, correctly and assess the expert's conclusion) <sup>23</sup>. Therefore, the definition formation of *objects of forensic veterinary science* is of fundamental importance for further development of forensic veterinary science.

21 Федоренко В. Л., Голікова О. В. Літературні твори наукового характеру як об'єкти авторського права: поняття та класифікація. *Криміналістика і судова експертиза*. 2018. Вип. 63. С. 215–223. URL: <https://digest.kndise.gov.ua/wp-content/uploads/2019/03/23-1.pdf> (date accessed: 01.02.2023) ; Федоренко В. Л., Чернеженко О. М., Голікова О. В. Наукові твори як об'єкти судової експертизи з питань інтелектуальної власності: генеза, поняття та кваліфікуючі ознаки. *Експерт: парадигми юридичних наук і державного управління*. 2019. № 4 (6). С. 11–24. DOI: 10.32689/2617-9660-2019-4(6)-11-24 (date accessed: 01.02.2023).

22 Чванкін С. А. Комп'ютерно-технічна експертиза у цивільному судочинстві. *Право та державне управління*. 2021. № 1. С. 45–51. DOI: 10.32840/pdu.2021.1.7 (date accessed: 01.02.2023).

23 Гуменський О. А., Будко Т. В. Місце експертизи спеціальних технічних засобів негласного отримання інформації (СТЗ) в системі судових експертиз. *Криміналістика і судова експертиза*. 2018. Вип. 63 (1). С. 67–80. URL: [http://nbuv.gov.ua/UJRN/krise\\_2018\\_63\(1\)\\_\\_11](http://nbuv.gov.ua/UJRN/krise_2018_63(1)__11) (date accessed: 01.02.2023).

Unfortunately, in forensic expertology, the object issue remains debatable up to date. Noteworthy is V. Sezonov' opinion, according to which obligatory specifics of any kind, type (subspecies) of forensic examination are objects containing the necessary information to solve the subject range of issues to clarify circumstances of the event <sup>24</sup>. In addition, the range of research objects determines generic (species) affiliation of forensic science.

In philosophical sources <sup>25</sup>, cognition object is a topic, phenomenon of material or spiritual world or a sphere of reality, that cognitive activity of the subject is directed to, because it determines characteristics of this object. M. Shcherbakovskiy considers forensic examination object to be an epistemological category <sup>26</sup>.

The object of expert knowledge is a component of the cognitive process characterized as interaction of the object and the subject <sup>27</sup>. For example, if the expert knowledge object is the corpse of an animal which death caused animal by cruelty (hereinafter referred to as AC),

this leads to participation in the cognitive process of forensic veterinary expert who has special veterinary knowledge to research on this corpse and determine actual circumstances of the animal death.

O. Paladiichuk <sup>28</sup> notes that object of forensic examination is the topic(s) that are usually material evidence(s) that are investigated by forensic expert, as well as events, facts, phenomena and other intangible objects studied by examining material carriers of information about them with specific expertise use, in connection with it distinguishes two groups of objects of forensic science: tangible and intangible ones.

O. Bondarenko <sup>29</sup> understands the object of forensic examination as tangible objects, phenomena and processes that are subject to expert research. F. Dzhavadov <sup>30</sup> defines forensic examination object as material carriers of information (material evidence) that are subject to direct examination by forensic experts and proposes to divide these objects into direct (material

24 Сезонов В. С. *Op. cit.* С. 67. URL: [https://dspace.univd.edu.ua/xmlui/bitstream/handle/123456789/5880/aref\\_Sezonov%20V%20S\\_2018.pdf?sequence=1&isAllowed=y](https://dspace.univd.edu.ua/xmlui/bitstream/handle/123456789/5880/aref_Sezonov%20V%20S_2018.pdf?sequence=1&isAllowed=y) (date accessed: 01.02.2023).

25 Основи філософських знань. URL: <https://subject.com.ua/philosophy/osnovi/128.html> (date accessed: 01.02.2023).

26 Щербаковський М. Г. Гносеологічні та правові підстави класифікації об'єктів судової експертизи. *Теорія та практика судової експертизи і криміналістики*. 2010. Вип. 10. С. 177–185. URL: [http://nbuv.gov.ua/UJRN/Трпsek\\_2010\\_10\\_29](http://nbuv.gov.ua/UJRN/Трпsek_2010_10_29) (date accessed: 01.02.2023).

27 Об'єкт / Філософський енциклопедичний словник // редкол.: В. І. Шинкарук (голова) та ін. Київ, 2002. С. 438–439. URL: [https://archive.org/details/filosofskiy\\_entsyklop/page/438/mode/2up](https://archive.org/details/filosofskiy_entsyklop/page/438/mode/2up) (date accessed: 01.02.2023).

28 Паладійчук О. Ю. Значення судової експертизи у вирішенні завдань кримінального провадження. *Науковий вісник Ужгородського національного університету. Серія Право*. 2015. Вип. 34. Т. 3. С. 88. URL: <https://dspace.uzhnu.edu.ua/jspui/bitstream/lib/15056/1/%D0%97%D0%9D%D0%90%D0%A7%D0%95%D0%9D%D0%9D%D0%AF%20%D0%A1%D0%A3%D0%94%D0%9E%D0%92%D0%9E%D0%87%20%D0%95%D0%9A%D0%A1%D0%9F%D0%95%D0%A0-D0%A2%D0%98%D0%97%D0%98.pdf> (date accessed: 01.02.2023).

29 Бондаренко О. О. *Op. cit.* URL: <https://dspace.univd.edu.ua/xmlui/handle/123456789/2480?locale-attribute=uk> (date accessed: 01.02.2023).

30 Джавадов Ф. М. *Op. cit.* URL: <https://dspace.nlu.edu.ua/handle/123456789/16795> (date accessed: 01.02.2023).

carriers that are subject to examination) and auxiliary (phenomena existing or existed in the past and which forensic examination is aimed at establishing). E. Simakova-Yefremian<sup>31</sup>: does not agree with this division: forensic expert does not directly investigate phenomena or processes related to the crime, since they happened in the past. The scientist claims that forensic expert examines tangible and materialized information carriers. We consider this position to be justified and fully share it.

According to H. Prokhorov-Lukin, since the objects of scientific knowledge are understood as the objective world, material existence with its properties and regularities, then *“objects of forensic examination can potentially become any objectively related to the known < ... > an event is material and immaterial (however reflected in material reality) formations and phenomena, <...> their material reflections and mechanisms of creation and reflection of such objects, and these reflections actually contain information about facts and phenomena caused by events that have a legal value”*<sup>32</sup>.

It is noteworthy that V. Khomutenko and A. Khomutenko formulated interpretation of expert knowledge object as a carrier of information, that is subject to the knowledge and practical influence of knowledge subjects in order to acquire and form new knowledge about knowledge object<sup>33</sup>.

M. Scherbakovskiy thus argues feasibility of a narrow understanding of general object of forensic research (as tangible objects and things requiring expert research): *firstly*, if the object is considered to be events, then concepts of object and topic (tasks) of forensic examination are mixed (research objects are provided to forensic expert by forensic examination customer; research on reflection of processes in the objects or identification and evaluation by forensic expert of the signs that are characteristic for this object is a matter of forensic examination topic); *secondly*, of forensic research object is as epistemological as legal concept<sup>34</sup>. Phenomena and processes existing or existed in the past can be known exclusively through the research on tangible objects that have changed under influence of the process, or objects that were in environment where the process took place<sup>35</sup>.

A. Lozovyi and E. E. Simakova-Yefremian interpret the *objects of forensic examination* definition as tangible and materialized carriers of information investigated by forensic expert on the basis of specific expertise application within the topic of forensic research: material evidence, derivative of material evidence, sample, document, body of living person, his psyche state, a human corpse (its parts), animal (its corpse or body fragments), plant (its parts), a substance, object, building, structure,

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31 Сімакова-Єфремян Е. Б. Комплексні судово-експертні дослідження: теорія та практика : монографія. Харків, 2016. 456 с.

32 Прохоров-Лукин Г. Ор. cit. URL: <https://drive.google.com/file/d/1rMcpBdvvF6Wq29fhuu1IJ5D-TiV6dHDax/view?pli=1> (date accessed: 01.02.2023).

33 Хомутенко В., Хомутенко А. Ор. cit. DOI: 10.32837/yuv.v0i2.2332 (date accessed: 01.02.2023).

34 Щербаківський М. Г. Проведення та використання ... . С. 106–107. URL: <https://dspace.uni-ud.edu.ua/xmlui/handle/123456789/6020> (date accessed: 01.02.2023).

35 Ibid.

area, etc., as well as information recorded in the case files and other media <sup>36</sup>.

O. Hrosheva formulated integration object of multidisciplinary forensic biological and trace examination as a systemic tangible (materialized) formation of biological and trace origin, combined with a common research object of its various aspects (properties), for forensic experts to solve issues using specific expertise in the fields of forensic biology and forensic trace evidence analysis <sup>37</sup>.

According to V. Khomutenko and A. Khomutenko, research topic is specific circumstances making possible to obtain information about properties, parties and relations of the objects to be studied. In other words, new circumstances revealed by forensic expert on the basis of specific expertise, because they are research result and are reflected in the forensic expert conclusion. This substantiates the close relationship between the topic and the subject as elements of forensic system <sup>38</sup>.

Summarizing of scientists' opinions, we note that most of them understand research object in forensic examination as a source of factual data, according to which certain facts are established: media of information that need to be investigated and which are of interest to the investigation at the stage of pre-trial offense investigation.

The author of this publication analyzed the concept interpretation of *objects of forensic examination* as in scientific sources as in normative legal acts regulating forensic expert activity. Thus, the Law of Ukraine: *On Judicial Examination* <sup>39</sup> (hereinafter referred to as the *Specialized Law*) does not contain a special definition of the concept of *forensic science object*: only in Art. 1 it is stated that “forensic science is a research based on specific expertise in the field of science, technology, art, craft, etc., **objects** [Emphasis added], phenomena and processes in order to provide an opinion on issues that are or will be the subject of litigation” <sup>40</sup>. However, the *object* term often occurs in the articles of the analyzed Law, which regulate the activities of a forensic expert.

In accordance with Part 1 of Art. 69 of the Criminal Procedure Code of Ukraine <sup>41</sup> forensic expert in criminal proceedings is a person who has scientific, technical or other specific expertise and the right to conduct an examination in accordance with the relevant Law and who is instructed to conduct a research on *objects*, phenomena and processes containing information about the circumstances of the commission of a criminal offense, and to give an opinion on issues that arise during criminal proceedings and relate to the scope of his knowledge <sup>42</sup>.

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36 Лозовий А. І., Сімакова-Єфремян Е. Б. Актуальні питання реформування законодавства у сфері судово-експертної діяльності в Україні. *Теорія та практики судової експертизи і криміналістики*. 2014. Вип. 14. С. 164. URL: [http://nbuv.gov.ua/UJRN/Трsek\\_2014\\_14\\_26](http://nbuv.gov.ua/UJRN/Трsek_2014_14_26) (date accessed: 01.02.2023).

37 Грошева О. Ю. *Op. cit.* С. 19.

38 Хомутенко В., Хомутенко А. *Op. cit.* DOI: 10.32837/yuv.v0i2.2332 (date accessed: 01.02.2023).

39 Про судову експертизу : Закон України від 25.02.1994 р. № 4038-XII (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/4038-12#Text> (date accessed: 01.02.2023).

40 *Ibid.*

41 Кримінальний процесуальний кодекс України від 13.04.2012 р. № 4651-VI (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

42 *Ibid.*



E. Simakova-Yefremian calls shortcoming of the norms of the Specialized Law and the Criminal Procedural Code of Ukraine of mixing the concept of the topic and object of forensic research, because according to them, range of objects of forensic research includes phenomena and processes related to the crime. The scientist justifies her position by the fact that forensic expert does not investigate the very phenomenon associated with the crime, because it has already happened in the past. On the contrary: the forensic expert examines the material, as well as materialized media of information reflected in certain documents. In this regard, E. Simakova-Yefremian recommended in Art. 1 of the Specialized Law and in Part 1 of Art. 69 of Criminal Procedural Code of Ukraine to replace the words *phenomena and processes* with the words *materialized objects* <sup>43</sup>. O. Hrosheva considers such a proposal as a reasonable and proposed new versions of Art. 1 of the Specialized Law and Part 1 of Art. 69 of the Criminal Procedural Code of Ukraine taking into account these changes <sup>44</sup>.

We share the position of E. Simakova-Yefremian <sup>45</sup> and O. Hrosheva <sup>46</sup> on inadmissibility of mixing the concepts of the topic and object of forensic research and expediency of removing the phrase about phenomena and processes associated with the crime from the range of forensic research objects.

In the draft laws relating to forensic expert activity in Ukraine, similar definitions are proposed: “**Forensic**

**examination objects** are tangible and materialized carriers of information that are examined by forensic an expert by means of specific expertise within the scope of expert research topic (material evidence, derivatives of material evidence, samples, documents, the body and mental state of a person, corpses (their parts), animals (their parts), plants (their parts), buildings, constructions, terrain, etc., as well as information recorded in case materials” (project of the Law on Forensic Expert Activity in Ukraine dated March 30, 2017 No. 6264) <sup>47</sup> and “objects of research: tangible and intangible (informational) objects that are examined by forensic expert using special means of scientific knowledge within the scope of the subject of forensic research (physical evidence, derivatives of physical evidence, samples, documents, the body and mental state of a person, corpses (their parts), animals (their parts), plants (their parts), buildings, constructions, terrain, etc., as well as information recorded in the case files, or in the materials provided by the persons at whose request the examination is carried out by an expert” (draft law on forensic examination and self-governance of forensic experts dated on 04/03/2018 № 8223, hereinafter referred to as *draft law №. 8223*) <sup>48</sup>. It is good that analyzed draft laws mention animals as objects of forensic examination (research), however, other objects (feed, feed additives, biological objects of animal origin, etc.) are important for forensic veterinary examination that are also necessary to be taken into account while appointing and conducting forensic examination.

43 Сімакова-Єфремян Е. Б. Комплексні судово-експертні дослідження ... . С. 146–147.

44 Грошева О. Ю. Ор. cit. С. 75–76.

45 Сімакова-Єфремян Е. Б. Комплексні судово-експертні дослідження ... .

46 Грошева О. Ю. Ор. cit.

47 Проект закону про судово-експертну діяльність в Україні від 30.03.2017 р. № 6264. URL: <https://ips.ligazakon.net/document/JH4U000I> (date accessed: 01.12.2022).

48 Проект закону про судову експертизу та самоврядування судових експертів від 03.04.2018 р. № 8223. URL: <https://ips.ligazakon.net/document/JH6CF00A> (date accessed: 01.12.2022).

Procedural legislation of Ukraine uses the terms *object of forensic examination* (research) and *materials and samples*. Thus, according to Part 3 of Art. 69 of the Criminal Procedural Code of Ukraine <sup>49</sup>, Part 6 of Art. 72 of Civil Procedural Code of Ukraine <sup>50</sup>, Part 6 of Art. 69 of Commercial and Procedural Code of Ukraine <sup>51</sup> and part 6 of Art. 68 of Code of Administrative Proceedings of Ukraine <sup>52</sup>, forensic expert has the right to: request provision of additional materials and samples; to be present during execution of procedural actions related to topics and objects of research; ask questions (submit requests to interview case participants and witnesses) related to the topic and objects of research to persons participating in criminal proceedings. According to things. 2 part 4 art. 69 of Criminal Procedural Code of Ukraine <sup>53</sup>, Part 8 of Art. 72 of Civil Procedural Code of Ukraine <sup>54</sup>, Part 8 of Art. 69 Commercial and Procedural Code

of Ukraine <sup>55</sup> and Part 8 of Art. 68 Code of Administrative Proceedings of Ukraine <sup>56</sup>, forensic expert may refuse to provide conclusion if *materials* provided to him are insufficient to fulfill the duties assigned to him, and at the same time, he does not have the right to collect *materials* for forensic examination on his own initiative (Article 1, Part 4, Article 69 of Criminal Procedural Code of Ukraine <sup>57</sup>, Part 2 Article 107 of Civil Procedural Code of Ukraine <sup>58</sup>, Part 2 of Article 102 of Commercial and Procedural Code of Ukraine <sup>59</sup> and Part 2 of Article 105 Code of Administrative Proceedings of Ukraine <sup>60</sup>).

Most of forensic veterinary examination objects after their removal at the scene, during forensic veterinary examination and after it require special conditions and treatment: for example, live animals under examination should be kept in an animal shelter or in another specially designated institution, a corpse the animal

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- 49 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).
- 50 Цивільний процесуальний кодекс України від 18.03.2004 р. № 1618-IV (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).
- 51 Господарський процесуальний кодекс України від 06.11.1991 р. № 1798-XII (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).
- 52 Кодекс адміністративного судочинства України від 06.07.2005 р. № 2747-IV (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).
- 53 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).
- 54 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).
- 55 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).
- 56 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).
- 57 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).
- 58 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).
- 59 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).
- 60 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).

should be in a refrigerator to prevent it from rotting<sup>61</sup>, and feed and feed additives should be placed in clean glass containers and stored in the refrigerator. After conducting a comprehensive research, forensic veterinary examination objects return to the subject the purpose of this examination (forensic expert recruitment). Taking into account specificity of the objects of forensic veterinary examination, scientists of the Kharkiv Scientific School of Forensic Veterinary Experts (for the first time in forensic practice) detailed procedure for storing and issuing animal corpses in the *Rules for forensic veterinary determination of the degree of severity of damage caused to the health of an animal (guidelines)*<sup>62</sup> (hereinafter referred to as “Rules ... for determining the severity of damage”) that should have a positive effect on preservation and handling of forensic veterinary examination objects.

Forensic expert authority in relation to research objects is provided for by the Instruction on appointment and conducting

forensic examinations and researches<sup>63</sup> (hereinafter referred to as *Instruction № 1*) and (to a lesser extent) by the Instruction on Peculiarities of the Implementation of Forensic Expert Activity by Certified Forensic Experts Not Working in State Specialized Expert Agencies institutions<sup>64</sup> (hereinafter referred to as *Instruction № 2*), in particular, forensic expert has the right, with the permission of forensic examination customer, to be present during the execution of procedural, executive actions and to ask questions to the participants of the process concerning the subject or object of the examination (par. 5, clause 2.1 Chapter II of Instruction № 1<sup>65</sup> and Clause 3 of Clause 1 of Chapter II of Instruction № 2<sup>66</sup>) is obliged to ensure preservation of forensic examination objects (paragraph 7 of Clause 2.2 of Chapter II of Instruction № 1<sup>67</sup> and Clause II of Instruction № 2<sup>68</sup>). instead, he is prohibited from storing case files and objects of expert research outside official premises (paragraph 7, paragraph 2.3, chapter II of Instruction № 1<sup>69</sup> and

61 Яценко І. В. Гносеологічна характеристика та процесуальне значення етапів і стадій призначення та проведення судово-ветеринарної експертизи. *Теорія та практика судової експертизи і криміналістики*. 2023. Вип. 1 (30). С. 83–84. DOI: 10.32353/khrife.1.2023.05 (date accessed: 01.06.2023).

62 Яценко І. В., Парилівський О. І. Правила судово-ветеринарного визначення ступеня тяжкості шкоди, заподіяної здоров'ю тварини (методичні рекомендації). Харків, 2022. 47 с.

63 Інструкція про призначення та проведення судових експертиз та експертних досліджень : затв. наказом Мін'юсту України від 08.10.1998 р. № 53/5 (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

64 Інструкція про особливості здійснення судово-експертної діяльності атестованими судовими експертами, що не працюють у державних спеціалізованих експертних установах : затв. наказом Мін'юсту України від 12.12.2011 р. № 3505/5 (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/z1431-11#Text> (date accessed: 01.06.2023).

65 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

66 Інструкція про особливості здійснення ... . URL: <https://zakon.rada.gov.ua/laws/show/z1431-11#Text> (date accessed: 01.06.2023).

67 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

68 Інструкція про особливості здійснення ... . URL: <https://zakon.rada.gov.ua/laws/show/z1431-11#Text> (date accessed: 01.06.2023).

69 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

paragraph 5, paragraph 4, chapter II Instruction № 2<sup>70</sup>). The Codes of Ukraine, Specialized Law and Instructions № 1 and 2 contain other powers of the expert related to the research objects.

We believe that powers and duties of forensic experts should not depend on the form of ownership of the institution where they work, so we consider it necessary to improve Instruction № 2<sup>71</sup> to the level of Instruction № 1<sup>72</sup>.

Considerable attention in the legislation of Ukraine is paid to the treatment of research object. Thus, in accordance with clause 1.8 of Section I of Instruction № 1<sup>73</sup> basis for forensic examination is a procedural document, that should indicate *the objects* to be examined. In procedural document on the appointment of a forensic veterinary examination, the subject of its appointment (forensic expert involvement) should indicate the exact name of forensic examination objects (for any object), their number (for corpses of animals and live animals), weight and batch number (for feed and feed additives), number of sheets (for veterinary documents and other materials), as well as other information that is relevant for conducting forensic examination.

Compliance with the *maximum preservation of objects* requirement is one of the cornerstones of forensic activity in Ukraine: at the legislator request during forensic examinations, the objects of research are allowed to be damaged or spent only to the extent necessary for the study (see, for example, paragraph 3 of Part 5 of Article 69 of Criminal Procedural Code of Ukraine<sup>74</sup>, Part 3 of Article 108 of the Civil Procedural Code of Ukraine<sup>75</sup>, Article 5 of Specialized Law<sup>76</sup>, paragraph 1 of paragraph 4.11 of Section IV of Instructions № 1<sup>77</sup> etc.).

Application to forensic examination objects of methods that destroy or damage this object or change its properties is allowed with the written permission of appointment subject of forensic examination (forensic expert involvement) and reasonable grounds to argue that it is impossible to use other methods for conducting forensic research (see paragraph 3 of Part 5 of Article 69 of the Criminal Procedural Code of Ukraine<sup>78</sup>, paragraph 7 of paragraph 2.2 of Section II and paragraph 2 of clause 4.11 of section IV of Instruction № 1<sup>79</sup>).

In clause 4.11 of section IV of Instruction № 1 provides for the requirement to make

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70 Інструкція про особливості здійснення ... . URL: <https://zakon.rada.gov.ua/laws/show/z1431-11#Text> (date accessed: 01.06.2023).

71 Ibid.

72 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

73 Ibid.

74 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

75 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (дата звернення: 01.02.2023).

76 Про судову експертизу : Закон ... . URL: <https://zakon.rada.gov.ua/laws/show/4038-12#Text> (date accessed: 01.02.2023).

77 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

78 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

79 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

an appropriate entry in the conclusion of the forensic expert in case of damage or destruction of the object during research (paragraph 3), on the need to return to the customer of forensic examination of objects or their remains damaged during research (paragraphs 3 and 1), as well as (after marking with appropriate stamps) documentary materials and samples provided for comparative research on samples (paragraph 4)<sup>80</sup>.

The Codes of Ukraine, in addition to the Criminal Procedural Code of Ukraine, do not contain explicit prohibition to store the materials of proceedings (cases) and objects of examination outside workplace of forensic expert (specially designated storage sites), in connection with which the author of this work proposed to coordinate this issue in the codes, Specialized Law and Instructions № 1 and 2<sup>81</sup>.

Unhindered access to research object and ensuring the customer's examination of the proper working conditions of the forensic expert is provided for in Article 6 of the relevant Law<sup>82</sup> and paragraph 3.9 of Section III of Instruction № 1<sup>83</sup>. Regardless of the type of legal proceedings, the forensic expert has the right to file a petition for provision of additional materials (in

particular, research objects, see paragraph 1 of Part 1 of Article 13 of Specialized Law<sup>84</sup>).

We consider the proposal in Part 4 of Art. 25 of draft law № 8223<sup>85</sup>, the norm according to which objects, in which respect the State has established restrictions on circulation and use (for example, animals listed in the Red Data Book of Ukraine) are examined exclusively by state specialized forensic science institutions.

The *forensic examination object* term can be found in legal regulations that regulate the categories of examinations: primary, additional and repeated (clause 1.2.14, clause 1.2, chapter I of Instruction № 1<sup>86</sup>) and in the requirements for the expert's conclusion: in the introductory part specify, in particular, the list of objects subject to research; method of delivery and type of packaging of the researched objects, indicating (if necessary) information about whether the method of packaging affected their preservation; compliance of materials and objects received by forensic expert institution (expert) with the materials specified in the document on forensic expert involvement (forensic expert recruitment), para. 7, 9 and 10 clauses 4.12 ch. IV of Instructions № 1<sup>87</sup>, and in the research part: information about the state of

80 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

81 Яценко І. Правовий статус судово-ветеринарного експерта як суб'єкта судово-експертної діяльності у контексті новітнього законодавства України. *Теорія та практика судової експертизи і криміналістики*. 2022. Вип. 4 (29). С. 102–103. DOI: 10.32353/khrife.4.2022.04 (date accessed: 01.02.2023).

82 Про судову експертизу : Закон ... . URL: <https://zakon.rada.gov.ua/laws/show/4038-12#Text> (date accessed: 01.02.2023).

83 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

84 Про судову експертизу : Закон ... . URL: <https://zakon.rada.gov.ua/laws/show/4038-12#Text> (date accessed: 01.02.2023).

85 Проект закону ... № 8223. URL: <https://ips.ligazakon.net/document/JH6CF00A> (date accessed: 01.12.2022).

86 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

87 Ibid.

research objects (paragraph 3, clause 4.13, chapter IV of Instructions № 1) <sup>88</sup>.

In legal acts regulating the activities of expert units of the Ministry of Internal Affairs of Ukraine, the *research objects term* means “any material carriers of information (traces or their copies, documents, substances, images, raw data, etc.) and/or information about them and comparative material received by SSRFC, SRFC for the research purpose during forensic examination or expert research” <sup>89</sup>.

Thus, the above indicates that forensic examination objects in general and forensic in veterinary examination in particular are tangible and materialized carriers of information. Usually, tangible objects of forensic veterinary examination are physical evidence, documents, animals, animal corpses, their remains, samples for comparative research, the scene.

Analyzed current legal acts and departmental documents and draft laws make it possible to assert that the basis of the professional activity of a forensic expert is the forensic research of objects provided by forensic examination customer (forensic expert recruitment). The powers of forensic expert in relation to the forensic examination objects should not go beyond the legally regulated requirements <sup>90</sup>. In case of a violation of this prohibition, conditions are created for recognizing forensic expert

conclusion as inadmissible evidence (Article 89 of the Criminal Procedural Code of Ukraine <sup>91</sup>) that cannot be used to make procedural decisions (it cannot be referred to by investigating officer or inquirer when drawing up indictment and a court while passing court decision).

The *forensic examination object* concept (tangible objects) is used in forensic legislation of foreign countries. For example, in the Law of the Republic of Azerbaijan: *On Forensic Expert Activity* the *forensic examination* term is interpreted as “research carried out on the basis of specific expertise about tangible objects, events and processes that carry information about the facts of the case in progress body of inquiry, preliminary investigation or court (judge)” <sup>92</sup>.

According to Law of the Republic of Kazakhstan: *On Forensic Expert Activity*, the concept of *forensic examination objects* should be understood as “material evidence, documents, human body, state of human psyche, corpses, animals, samples, as well as information belonging to the forensic examination topic, contained in the materials of the case for which the forensic examination is carried out” <sup>93</sup>.

The Law of the Kyrgyz Republic: *On Forensic Expert Activity* does not contain definition of *examination object* or *research object*, but these phrases are present in the

88 Інструкція про призначення та проведення ... . URL: <https://zakon.rada.gov.ua/laws/show/z0705-98#Text> (date accessed: 01.06.2023).

89 Інструкція з організації проведення та оформлення експертних проваджень у підрозділах Експертної служби Міністерства внутрішніх справ України : затв. наказом МВС України від 17.07.2017 р. № 591. URL: <https://zakon.rada.gov.ua/laws/show/z1024-17#Text> (date accessed: 01.02.2023).

90 Яценко І. В. Предмет судово-ветеринарної експертизи ... . DOI: 10.24144/2307-3322.2022.73.55 (date accessed: 01.06.2023).

91 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

92 О судебно-экспертной деятельности : Закон Азербайджанской Республики от 18.11.1999 г. № 758-IQ (с изм. и доп.). URL: [https://online.zakon.kz/document/?doc\\_id=30602371](https://online.zakon.kz/document/?doc_id=30602371) (date accessed: 01.06.2023).

93 О судебно-экспертной деятельности : Закон Республики Казахстан от 10.02.2017 г. № 44-VI (с изм. и доп.). URL: [https://online.zakon.kz/Document/?doc\\_id=37215312&pos=3;-106#pos=3;-106](https://online.zakon.kz/Document/?doc_id=37215312&pos=3;-106#pos=3;-106) (date accessed: 01.06.2023).

definition of other basic concepts of this Law: *forensic expert conclusion, additional forensic examination, damage to research object, forensic expert specialization, forensic research* <sup>94</sup>.

Forensic examination objects in the Law of the Republic of Tajikistan: *On State Forensic Examination* are called “*material evidence, samples for examination, documents, objects, animals, corpses and their parts, as well as materials of the case for which a state forensic examination is conducted*” <sup>95</sup>, and samples for conducting an examination: “*objects reflecting personal characteristics, corpse, animal, object, material or substance, environment of the scene, comparative samples and other things necessary for forensic expert to conduct an examination and provide a conclusion*” <sup>96</sup>.

Law of Turkmenistan: *On Forensic Expert Activity* contains the concept definition of *forensic examination objects*: it is “*material evidence, documents, body and mental state of a person, corpses, animals and other samples intended for expert research, as well as information that belong to the subject of the forensic examination and are contained in case files*

*which forensic examination is conducted for*” <sup>97</sup>.

In accordance with Law of the Republic of Uzbekistan: *On Forensic Examination*, the of research objects are named: “*material evidence, samples for research, other material objects, corpses and their parts, documents, as well as materials of the case for which forensic examination is being conducted for*” <sup>98</sup>.

Law of Republic of Moldova: *On Forensic Examination, Scientific-Technical and Forensic-Medical Researches* <sup>99</sup> states that “*objects of expert research can be material evidence, corpses and their parts, living persons, documents, objects, samples and other case materials, according to which forensic examination, a forensic technical and medical research is prescribed*” <sup>100</sup>.

Analysis of current legislation on forensic expert activity in different countries has shown a certain similarity in legal status of forensic examination objects in these States and in Ukraine.

Close attention in researches of foreign scientists to individual objects of forensic and veterinary research contributes to development of this direction of forensic expert activity <sup>101</sup>. Researchers are most

94 О судебно-экспертной деятельности : Закон Кыргызской Республики от 24.06.2013 г. № 100 (с изм. и доп.). URL: <http://cbd.minjust.gov.kg/act/view/ru-ru/203908/10?mode=tekst> (date accessed: 01.02.2023).

95 О государственной судебной экспертизе : Закон Республики Таджикистан от 25.07.2005 г. № 102 (с изм. и доп.). URL: [https://base.spininform.ru/show\\_doc.fwx?rgn=9038](https://base.spininform.ru/show_doc.fwx?rgn=9038) (date accessed: 01.02.2023).

96 Ibid.

97 О судебно-экспертной деятельности : Закон Туркменистана от 08.11.2014 г. № 137-V (с изм. и доп.). URL: [https://base.spininform.ru/show\\_doc.fwx?rgn=71160](https://base.spininform.ru/show_doc.fwx?rgn=71160) (date accessed: 01.02.2023).

98 О судебной экспертизе : Закон Республики Узбекистан от 01.06.2010 г. № ЗРУ-249 (с изм. и доп.). URL: <https://lex.uz/ru/docs/1633100> (date accessed: 01.02.2023).

99 О судебной экспертизе, научно-технических и судебно-медицинских исследованиях : Закон Республики Молдова от 23.06.2000 г. № 1086-XIV (с изм. и доп.). URL: [https://www.legis.md/cautare/getResults?doc\\_id=65637&lang=ru](https://www.legis.md/cautare/getResults?doc_id=65637&lang=ru) (date accessed: 01.06.2023).

100 Ibid.

101 Munro R., Ressel L., Gröne A., Hetzel U., Jensen H. E., Paciello O., Kipar A. European Forensic Veterinary Pathology Comes of Age. *Journal of Comparative Pathology*. 2020. Vol. 179. Pp. 83–88. DOI: [10.1016/j.jcpa.2020.08.003](https://doi.org/10.1016/j.jcpa.2020.08.003) (date accessed: 01.06.2023) ; McDonough S. P., McEwen B. J. Op. cit. DOI: [10.1177/0300985816647450](https://doi.org/10.1177/0300985816647450) (date accessed: 01.06.2023).

interested in the corpses of animals with signs of violent death<sup>102</sup> or live animals affected by AC, for example, domestic dogs<sup>103</sup>, domestic cats<sup>104</sup>, domestic pigs<sup>105</sup>, roe deer<sup>106</sup>, deer<sup>107</sup>, otters<sup>108</sup>, eagles<sup>109</sup>, birds of prey<sup>110</sup>, flamingos<sup>111</sup>, foxes<sup>112</sup>, whales<sup>113</sup>,

- 102 Wolf C., Gerst K., Gerst S., Priemer G. Post-mortem clinical pathology in cattle — an additional tool for the veterinary pathologist. *Tierarztl Prax Ausg G Grosstiere Nutztiere*. 2021. Vol. 49. Is. 6. Pp. 403–412. DOI: [10.1055/a-1593-6948](https://doi.org/10.1055/a-1593-6948) (date accessed: 01.06.2023).
- 103 Gottlieb D. L., Prittie J., Buriko Y., Lamb K. E. Evaluation of acute traumatic coagulopathy in dogs and cats following blunt force trauma. *Journal of Veterinary Emergency and Critical Care (San Antonio)*. 2016. Vol. 27. Is. 1. Pp. 35–43. DOI: [10.1111/vec.12525](https://doi.org/10.1111/vec.12525) (date accessed: 01.06.2023); Listos P., Gryzinska M., Batkowska J., Grela M., Jakubczak A. Algorithm for establishing the time of death of a dog based on temperature measurements in selected sites of the body during the early post-mortem period. *Forensic Science International*. 2018. Vol. 289. Pp. 124–129. DOI: [10.1016/j.forsciint.2018.05.004](https://doi.org/10.1016/j.forsciint.2018.05.004) (date accessed: 01.06.2023).
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- 105 Hill M. A., Pokines J. T. Comparative analysis of fetal pig decomposition processes in burials of variable depths and wrapping. *Journal of Forensic Sciences*. 2022. Vol. 67. Is. 6. Pp. 2192–2202. DOI: [10.1111/1556-4029.15120](https://doi.org/10.1111/1556-4029.15120) (date accessed: 01.02.2023).
- 106 Fucci N., Campobasso C. P., Mastrogiuseppe L., Puccinelli C., Marcheggiani S., Mancini L., Marino L., Pascali V. L. Diatoms in drowning cases in forensic veterinary context: a preliminary study. *International Journal of Legal Medicine*. 2017. Vol. 131. Is. 6. Pp. 1573–1580. DOI: [10.1007/s00414-017-1565-y](https://doi.org/10.1007/s00414-017-1565-y) (date accessed: 01.02.2023).
- 107 Uvira M., Marecová K., Dokoupil M., Dvořáček I., Handlos P. Fatal deer attack in a rutting season. *Forensic Science, Medicine and Pathology*. 2019. Vol. 15. Is. 1. Pp. 93–96. DOI: [10.1007/s12024-018-0048-x](https://doi.org/10.1007/s12024-018-0048-x) (date accessed: 01.06.2023).
- 108 Gaydos J. K., Delaney M. A., Raverty S. Causes of Mortality in a Population of Marine-Foraging River Otters (*Lontra canadensis*). *Journal of Wildlife Diseases*. 2020. Vol. 56. Is. 4. Pp. 941–946. DOI: [10.7589/JWD-D-20-00031](https://doi.org/10.7589/JWD-D-20-00031) (date accessed: 01.06.2023).
- 109 Viner T. C., Hamlin B. C., McClure P. J., Yates B. C. Integrating the Forensic Sciences in Wildlife Case Investigations: A Case Report of Pentobarbital and Phenytoin Toxicosis in a Bald Eagle (*Haliaeetus leucocephalus*). *Veterinary Pathology*. 2016. Vol. 53. Is. 5. Pp. 1103–1106. DOI: [10.1177/0300985816641176](https://doi.org/10.1177/0300985816641176) (date accessed: 01.06.2023).
- 110 Valverde I., Espín S., María-Mojica P., García-Fernández A. J. Protocol to classify the stages of carcass decomposition and estimate the time of death in small-size raptors. *European Journal of Wildlife Research*. 2020. Vol. 66. Art. 93. DOI: [10.1007/s10344-020-01429-3](https://doi.org/10.1007/s10344-020-01429-3) (date accessed: 01.02.2023).
- 111 Rubini S., Barbieri S., Gaudio R. M., Govoni G., Berna G. R., Fico R., Lorenzini R., Fontana M. C., Taddei R., Tassinari M., Frisoni P., Guidi E., Bergamini M. Veterinary forensic sciences to solve a fatal case of predation on flamingos (*Phoenicopterus roseus*). *Veterinaria Italiana*. 2018. Vol. 54. Is. 2. Pp. 175–180. DOI: [10.12834/VetIt.1360.7488.1](https://doi.org/10.12834/VetIt.1360.7488.1) (date accessed: 01.02.2023).
- 112 Franckenberg S., Kern F., Vogt M., Thali M. J., Flach P. M. Fatal gunshot to a fox: The Virtopsy approach in a forensic veterinary case. *Journal of Forensic Radiology and Imaging*. 2015. Vol. 3. Is. 1. Pp. 72–75. DOI: [10.1016/j.jofri.2014.11.001](https://doi.org/10.1016/j.jofri.2014.11.001) (date accessed: 01.02.2023).
- 113 Díaz-Delgado J., Fernández A., Sierra E., Sacchini S., Andrada M., Vela A. I., Quesada-Canales Ó., Paz Ya., Zucca D., Groch K., Arbelo M. Pathologic findings and causes of death of stranded cetaceans in the Canary Islands (2006–2012). *PLOS ONE*. 2018. Vol. 13. Is. 10:e0204444. DOI: [10.1371/journal.pone.0204444](https://doi.org/10.1371/journal.pone.0204444) (date accessed: 01.02.2023).



dolphins <sup>114</sup>, macaques <sup>115</sup>, horses <sup>116</sup>, cattle <sup>117</sup>, rabbits <sup>118</sup>, bees <sup>119</sup>, fish <sup>120</sup>, etc.

All the above mentioned objects are a source of information, by which means of forensic veterinarian finds out facts and circumstances that constitute examination topic. Let us emphasize that forensic veterinary examination object makes possible to single out terminology, methodology, information content in a broad subject area and ensures systemic unity, and using specific expertise, conclude an expert's conclusion with answers to those questions that were not even asked before forensic examination solution.

System unity of forensic veterinary examination object, for its part, makes possible to study the system of its properties thanks to the outlined specific signs. While choosing the of forensic veterinary research methods; it is important to correctly compile algorithm of such research for objective solution of forensic expert tasks

in a categorical form and in compliance with principle of maximum preservation of objects. For example, during autopsy of animal corpse and making a forensic veterinary diagnosis, forensic expert in a clear sequence first conducts an external and then an its internal examination. During external examination, architecture and postmortem changes, visible mucous membranes, skin and its derivatives are first evaluated, then a sectional examination of the eyes, nose, auricles, condition of the neck, abdomen, thoracic and pelvic limbs, mammary glands, external genitalia, and scrotal opening is performed. Internal examination of the animal carcass involves first evaluating the subcutaneous tissue and skeletal muscles and then the somatic lymph nodes, oral cavity, salivary glands, tongue, pharynx, esophagus, larynx, trachea, thyroid gland, parathyroid gland, chest cavity, pleura, lungs, heart, abdominal cavity, peritoneum, foreign contents in the

- 114 Sun X., Guo L., Luo D., Yu R.-Q., Yu X., Liang Yu., Liu Zh., Wu Yu. Long-term increase in mortality of Indo-Pacific humpback dolphins (*Sousa chinensis*) in the Pearl River Estuary following anthropic activities: Evidence from the stranded dolphin mortality analysis from 2003 to 2017. *Environmental Pollution*. 2022. Vol. 307. Art. 119526. DOI: [10.1016/j.envpol.2022.119526](https://doi.org/10.1016/j.envpol.2022.119526) (date accessed: 01.02.2023).
- 115 Doelling Ch. R., Cronin K. A., Ross St. R., Hopper L. M. The relationship between personality, season, and wounding receipt in zoo-housed Japanese macaques (*Macaca fuscata*): A multi-institutional study. *American Journal of Primatology*. 2021. Vol. 83. Is. 12. E23332. DOI: [10.1002/ajp.23332](https://doi.org/10.1002/ajp.23332) (date accessed: 01.02.2023).
- 116 Sprayberry K. A., Barrett E. J. Thoracic trauma in horses. *The Veterinary Clinics of North America. Equine Practice*. 2015. Vol. 31. Is. 1. Pp. 199–219. DOI: [10.1016/j.cveq.2014.12.001](https://doi.org/10.1016/j.cveq.2014.12.001) (date accessed: 01.02.2023).
- 117 Wolf C., Gerst K., Gerst S., Priemer G. Op. cit. DOI: [10.1055/a-1593-6948](https://doi.org/10.1055/a-1593-6948) (date accessed: 01.06.2023).
- 118 Dautartas A., Kenyhercz M. W., Vidoli G. M., Jantz L. M., Mundorff A., Steadman D. W. Differential Decomposition Among Pig, Rabbit, and Human Remains. *Journal of Forensic Sciences*. 2018. Vol. 63. Is. 6. Pp. 1673–1683. DOI: [10.1111/1556-4029.13784](https://doi.org/10.1111/1556-4029.13784) (date accessed: 01.06.2023).
- 119 Abay Z., Bezabeh A., Gela A., Tassew A. Evaluating the Impact of Commonly Used Pesticides on Honeybees (*Apis mellifera*) in North Gonder of Amhara Region, Ethiopia. *Journal of Toxicology*. 2023. Art. 2634158. DOI: [10.1155/2023/2634158](https://doi.org/10.1155/2023/2634158) (date accessed: 01.06.2023).
- 120 Benayache N.-Ya., Afri-Mehennaoui F.-Z., Kherief-Nacereddine S., Vo-Quoc B., Hushchyna K., Nguyen-Quang T., Bouaïcha N. Massive fish death associated with the toxic cyanobacterial Planktothrix sp. bloom in the Béni-Haroun Reservoir (Algeria). *Environmental Science and Pollution Research International*. 2022. Vol. 29. Is. 53. Pp. 80849–80859. DOI: [10.1007/s11356-022-21538-7](https://doi.org/10.1007/s11356-022-21538-7) (date accessed: 01.06.2023).

peritoneal cavity, spleen, liver, gall bladder, pancreas, kidneys, adrenal glands, ureters, bladder, stomach, intestines, genitals, head and brain, spinal column and spinal cord, bones of the skeleton, joints.

Compliance with established order of forensic veterinary examination of animal corpse under forensic examination will make possible to assess condition of body cavities, each organ separately and in their relationship, as well as body parts. Since autopsy is accompanied by destruction of integrity, during research on each organ, its shape, color, size, consistency is first evaluated, their appearance is photographed and only then organs are dissected and signs of the internal structure are evaluated, pathological changes are detected and internal appearance is photographed. In case of sequence violation of corpse autopsy, it is possible to lose certain valuable signs from expert's point of view.

While learning, forensic veterinarian carries out a comprehensive analysis of research object, applying specific expertise in the field of forensic veterinary science. Holistic view of complex object of forensic veterinary examination enables forensic expert to reach a new, higher level of knowledge.

Quality of forensic veterinarian conclusion (as evidence in the case) based on the results of research on materials submitted for forensic examination is largely determined by accurate and conscientious compliance by the person (body) who appointed forensic

examination (engaged forensic expert), rules of handling research objects. Thus, perishable objects of forensic veterinary research (for example, animal carcass) are immediately examined and examined by forensic expert, as well as photographed and videotaped. After inspection, they are returned to the person (body) from whom they were received.

In order to guarantee authenticity of the case files provided for conducting a forensic veterinary examination, in order to prevent damage or changes in properties of objects, if their dimensions and properties allow it, they are handed over to forensic expert in a packaged and sealed form. Otherwise, the subject of appointment of a forensic veterinary examination (expert involvement) should ensure expert unhindered access to the location of research objects, guarantee the propriety, reliability and admissibility of the evidence of expert examination (in particular, physical evidence, such as a corpse animals or examinee live animal, fodder, feed additives, etc.).

Forensic expert conclusion is *proper evidence* if the object contains information about proof topic (Part 1 of Article 85 of Criminal Procedural Code of Ukraine <sup>121</sup>; Part 1 of Article 77 of Civil Procedural Code of Ukraine <sup>122</sup>; Part 1 of Article 76 of Commercial and Procedural Code of Ukraine <sup>123</sup>, Part 1 of Article 73 of Code of Administrative Proceedings of Ukraine <sup>124</sup>). For example, if it was seriously injured as a result of animal cruelty, then the subject of proof will be the damage

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121 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

122 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).

123 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).

124 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).

caused to animal health<sup>125</sup>. Forensic veterinarian conducts clinical forensic veterinary examination of the subject animal, establishes a forensic veterinary diagnosis and referring to the “Rules ... for determining the severity of damage”<sup>126</sup>, determines the severity of bodily injuries. Objects that do not relate to the subject of evidence, that is, circumstances and facts that are not important for a forensic veterinary examination, forensic expert does not examine and does not refer to them in the conclusion. Legal violation consequence of requirements for evidence propriety is recognition of the conclusion of forensic expert as improper evidence and its rejection for consideration by the court (Article 85 of Criminal Procedural Code of Ukraine<sup>127</sup>, Part 4 of Article 77 of Civil Procedural Code of Ukraine<sup>128</sup>, Part 1 of Article 76 of Commercial and Procedural Code of Ukraine<sup>129</sup>, Part 4 of Article 73 of the Criminal Procedure Code<sup>130</sup>).

Forensic expert's conclusion is admissible evidence, if the rules for

collecting, providing and researching objects of research are observed; they are obtained in accordance with the procedure stipulated by legislation (Part 1 of Article 86 of Criminal Procedural Code of Ukraine<sup>131</sup>, Part 1 of Article 78 of Civil Procedural Code of Ukraine<sup>132</sup>, Part 2 of Article 77 of Commercial and Procedural Code of Ukraine<sup>133</sup>). For example, the AC caused serious bodily injuries incompatible with life, as a result of which the animal died. In this case, law enforcement authorities should carry out procedural measures aimed at opening criminal proceedings, inspecting the scene of the incident, removing the animal corpse by authorized person conducting investigation, concluding a resolution on the appointment of forensic veterinary examination, delivering the corpse to a specialized forensic science institution for forensic veterinary examination<sup>134</sup>. Legal violation consequence of such an order is recognition of forensic expert conclusion

- 125 Яценко І. В. Предмет судово-ветеринарної експертизи ... . DOI: 10.24144/2307-3322.2022.73.55 (date accessed: 01.02.2023).
- 126 Яценко І. В., Парилівський О. І. Правила судово-ветеринарного визначення ... .
- 127 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).
- 128 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).
- 129 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).
- 130 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).
- 131 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).
- 132 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).
- 133 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).
- 134 Яценко І. В., Казанцев Р. Г. Порядок проведення судово-ветеринарної експертизи трупів тварин в секційній залі спеціалізованої експертної установи. *Ветеринарія, технології тваринництва та природокористування*. 2021. № 7. С. 179–191. DOI: 10.31890/vttp.2021.07.28 (date accessed: 01.06.2023); Yatsenko I. Theoretical justification and praxeological significance of the stages of expert research of a living animal. *Law. Human. Environment*. 2023. Vol. 14. No. 1. Pp. 107–131. DOI: 10.31548/law/1.2023.107 (date accessed: 01.06.2023); Яценко І. В. Гносеологічна характеристика ... . С. 70–111. DOI: 10.32353/khrife.1.2023.05 (date accessed: 01.06.2023).

as improper evidence and rejection of it for consideration by the court (Part 1 of Article 86 of the Criminal Procedural Code of Ukraine <sup>135</sup>, Part 1 of Article 78 of Civil Procedural Code of Ukraine <sup>136</sup>, Part 2 of Article 77 of Commercial and Procedural Code of Ukraine <sup>137</sup>, Part 1 of Article 74 of Code of Administrative Proceedings of Ukraine <sup>138</sup>).

Forensic expert conclusion is reliable evidence if it can be used to establish the actual case circumstances (Article 79 of Civil Procedural Code of Ukraine <sup>139</sup>, Article 75 Code of Administrative Proceedings of Ukraine <sup>140</sup>) and if it (as evidence in the case) was created (obtained) in the absence of influence aimed at forming a false impression of the circumstances cases that are important for the case (Part 1 of Article 78 of Commercial and Procedural Code of Ukraine <sup>141</sup>). For example: based on the results of forensic veterinary examination of an animal's corpse, nature and localization of the injury was established,

mechanism and age of the injury was determined, object that caused the injury was determined, cause-effect relation between the injury and the animal death was proven, etc. Therefore, the corpse of animal subject to expert examination is a material object that has retained traces of an offense used as evidence of the fact or circumstances of offense. In other words, it is material evidence in accordance with Part 1 of Art. 98 Criminal Procedural Code of Ukraine <sup>142</sup>.

Forensic expert conclusion is sufficient evidence if it allows to reach a conclusion about availability or lack of case circumstances belonging to topic proof (Part 1 of Article 80 of Civil Procedural Code of Ukraine <sup>143</sup>, Part 1 of Article 76 Code of Administrative Proceedings of Ukraine <sup>144</sup>).

Let us sum up intermediate results. Since forensic veterinary examination object is knowledge object (epistemological category), it is advisable to divide all objects of forensic veterinary examination into tangible and materialized ones (*q.v.* Fig. 1).

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135 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

136 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).

137 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).

138 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).

139 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).

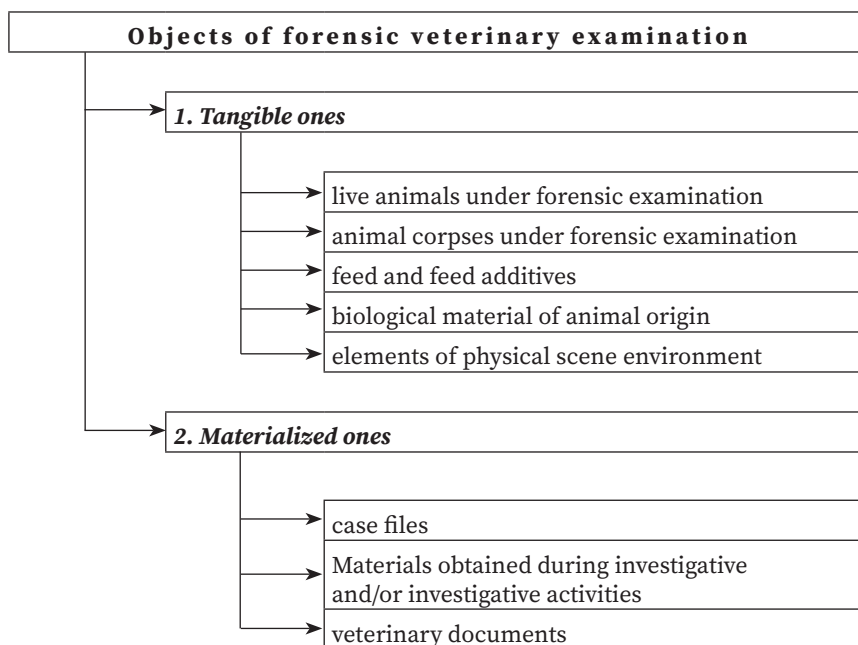
140 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).

141 Господарський процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1798-12#Text> (date accessed: 01.06.2023).

142 Кримінальний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/4651-17#Text> (date accessed: 01.02.2023).

143 Цивільний процесуальний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/1618-15#Text> (date accessed: 01.02.2022).

144 Кодекс адміністративного судочинства України ... . URL: <https://zakon.rada.gov.ua/laws/show/2747-15#Text> (date accessed: 01.06.2023).



**Fig. 1** Objects of forensic veterinary examination

We will single out the Specifics of forensic veterinary examination object:

- material nature, informational role;
- connection of established facts with the event under research;
- thing, reality fragment;
- close relation between object and subject of forensic knowledge;
- object reproduction in mind of the subject;
- procedural status (ability to use information received by forensic expert as evidence in legal proceedings).

As for other types of forensic examination, we distinguish three

independent groups of objects in forensic veterinary science:

- 1) basic ones (material evidence as objects of material world, containing information about circumstances that are relevant to the case (proceedings)): live animals, animal corpses, feed, etc.;
- 2) samples for comparative research;
- 3) reference materials (handbooks, atlases, national standards, instructions, guidelines, etc.).

According to the analysis results of objects of forensic veterinary examinations performed at National Scientific Center «Hon. Prof. M. S. Bokarius Forensic Science Institute» during 2019–2022, we compiled Table 1.

*Table 1*

*Dynamics of objects of forensic veterinary researches in 2019–2022*

Research Object	2019		2020		2021		2022	
	Q-ty	%	Q-ty	%	Q-ty	%	Q-ty	%
Total number of forensic veterinary examinations	32	100	35	100	61	100	15	100

Research Object	2019		2020		2021		2022	
	Q-ty	%	Q-ty	%	Q-ty	%	Q-ty	%
Live animals	13	40,6	11	31,4	3	4,9	4	26,7
Animal corpses under forensic examination	19	59,4	24	68,6	58	95,1	11	73,3
Dogs alive	11	31,4	8	22,9	1	1,6	4	26,7
corpses	12	34,4	11	31,4	11	18,0	11	73,3
Cats alive	2	6,25	3	8,6	2	3,3	—	—
corpses	7	21,9	9	25,7	1	1,6	—	—
Common crane, corpses	—	—	—	—	45	73,9	—	—
Wild pigs, corpses	—	—	—	—	1	1,6	—	—
Horses	—	—	—	—	—	—	—	—
Deer, corpses	—	—	3	8,6	—	—	—	—
Deer	—	—	—	—	—	—	—	—
Hares, corpses	—	—	1	—	—	—	—	—
Bees	—	—	*	—	—	—	—	—
Fish and other aquatic organisms	—	—	—	—	—	—	—	—

\* The number of studied bees is not indicated.

Dynamics of objects of forensic veterinary research in 2019–2022 indicates an increase in their number: in 2020 (compared to 2019) by 9.4%, and in 2021 (compared to 2020) by 74.3%. Beginning in 2019 at the initiative of National Scientific Center «Hon. Prof. M. S. Bokarius Forensic Science Institute» of forensic veterinary examination in the system of forensic science institutions of the Ministry of Justice of Ukraine contributed to the rapid development of the theory and praxeology of this type of forensic examination, active development and effective application in practice of basic methods, algorithms and guidelines of forensic veterinary research. As a result of the full-scale war of the Russian Federation against Ukraine in 2022, the number of such examinations decreased sharply: by 24.6% compared to

the previous year and by 46.9% compared to 2019.

Let us characterize tangible and materialized objects of forensic examination type under consideration (in particular, from the standpoint of their legal status) in more detail.

## 1. Tangible objects of forensic veterinary examination

### 1.1. Live animals under forensic examination

Definitions of *animal*, *humane treatment of animals* (hereinafter referred to as *ATG*) and *animal cruelty* in Ukrainian legislation and in professional readings are diverse.

Article 1 of Law of Ukraine: *On the Protection of Animals from Brutal Treatment* (hereinafter referred to as: *Law On Protection of Animals...*) defines the concept of *animals* and distinguishes

their species<sup>145</sup>. According to the Law of Ukraine: On Veterinary Medicine, animals are “*all vertebrate and invertebrate animals, that is, living beings that are different from humans, but endowed with sensitivity*”<sup>146</sup>. O. Hrinenko and M. Miroshnychenko note importance of sensory perception in terms of protection against AC<sup>147</sup>.

In modern Ukrainian legislation, legal responsibility for AC extends only to vertebrate animals (fish, amphibians, reptiles, birds and mammals). Animals are special object of civil rights, which is subject to the legal regime of the thing (Part 1 of Art. 180 of the Civil Code of Ukraine<sup>148</sup>), providing for emergence of such an object ownership<sup>149</sup>.

We share the opinion of O. Ustylenko<sup>150</sup> that animal is a non-consuming, movable, indivisible thing, capable of responding to external stimuli, with certain needs to meet its existence, which has marketable qualities (this property determines the

legal features of the acquisition, exercise, limits of realization and termination of material rights to animals<sup>151</sup>), so V. Turska quite appropriately considers animals to be creatures, not a thing<sup>152</sup>.

At para. 2 Art. 1 of the Law “*On the Protection of Animals...*” states that animals are “*biological objects related to fauna: agricultural, domestic, wild, including domestic and wild poultry, fur, laboratory, zoo, circus*”<sup>153</sup>, allowing distinguish types of animals. Thus, under pets, legislator understands dogs, cats, and other animals that “*for a long historical period have traditionally been kept and bred by humans, as well as animals of species or breeds artificially bred by humans to satisfy aesthetic needs and needs for communication, which <...> do not have viable wild populations, which consist of individuals with similar morphological features and exist for a long time in their natural range*”<sup>154</sup>. European Convention on the Protection of Pets,

145 Про захист тварин від жорсткого поводження : Закон України від 21.02.2006 р. № 3447-IV (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

146 Про ветеринарну медицину : Закон України від 04.02.2021 р. № 1206-IX (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/1206-20#Text> (date accessed: 01.06.2023).

147 Гріненко О. О., Мірошніченко М. П. Формування етичного ставлення до тварин: міжнародно-правовий та внутрішньодержавний аспекти. *Український часопис міжнародного права*. 2013. Спецвипуск: Міжнародно-правові стандарти поводження з тваринами та їх захисту і практика України. С. 12–14.

148 Цивільний кодекс України від 16.01.2003 р. № 435-IV (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/435-15#Text> (date accessed: 01.06.2023).

149 Спектор О. М. Тварина як особливий об'єкт речових прав. *Прикарпатський юридичний вісник*. 2015. Вип. 3 (9). С. 70–76. URL: [http://nbuv.gov.ua/UJRN/Pjvuv\\_2015\\_3\\_15](http://nbuv.gov.ua/UJRN/Pjvuv_2015_3_15) (date accessed: 01.06.2023).

150 Устименко О. А. Щодо можливості сприйняття тварини як суб'єкта цивільних прав: деякі загальнотеоретичні аспекти. *Форум права*. 2014. № 1. С. 497–501. URL: [http://nbuv.gov.ua/UJRN/FP\\_index.htm\\_2014\\_1\\_87](http://nbuv.gov.ua/UJRN/FP_index.htm_2014_1_87) (date accessed: 01.06.2023).

151 Луц Д. М. Тварини як об'єкт цивільних правовідносин : дис. ... канд. юрид. наук. Запоріжжя, 2015. 231 с.

152 Турська В. Зміст та характеристика поняття «права тварин». *Evropský politický a právní diskurz*. 2015. Sv. 2. Vyd. 1. С. 181–187. URL: [http://nbuv.gov.ua/UJRN/evrpol\\_2015\\_2\\_1\\_27](http://nbuv.gov.ua/UJRN/evrpol_2015_2_1_27) (date accessed: 01.06.2023).

153 Про захист тварин від жорсткого поводження ... . URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

154 Ibid.

ratified by Ukraine, contains a slightly different definition: “A pet is any animal kept or intended to be kept by a person, in particular in his home for his own pleasure and companionship”<sup>155</sup>.

Agricultural animals are defined in the Law “On the Protection of Animals...” as animals “that are kept and bred by humans to obtain products and raw materials of animal origin” (paragraph 5 of Article 1)<sup>156</sup>, and wild animals are animals “whose natural habitat is wild nature, including those that are in captivity or semi-free conditions” (paragraph 3 of Article 1)<sup>157</sup>, therefore the norms of Law of Ukraine: On Fauna<sup>158</sup> apply to. In addition, in Art. 3 of this Law details the definition of *wild animals*: “Chordates, including vertebrates (mammals, birds, reptiles, amphibians, fish, and others) and invertebrates (arthropods, mollusks, echinoderms, and others) in all their species and population diversity and on at all stages of development (embryos, eggs, pupae, etc.), which are in a state of natural will, kept in semi-free conditions or in captivity”<sup>159</sup>.

Responsibility for animal cruelty, in particular with homeless (“homeless

animals are pets that have been left without human care or have formed semi-free groups capable of reproducing outside human control” – paragraph 6 of Art. 1 of the Law “On Protection of Animals...”<sup>160</sup>), is provided for in Art. 89 of the Code of Ukraine on Administrative Offenses<sup>161</sup> and Art. 299 of the Criminal Code of Ukraine<sup>162</sup>.

In paragraph 7 of Art. 1 of the Law “On the Protection of Animals...”, another category is distinguished – an experimental animal (“animal used for conducting researches, experiments”)<sup>163</sup>.

Society humanization of led to development and adoption of standards for the humane treatment of animals, in particular, in the Civil Code: Art. 12 (refusal of ownership of an animal); Art. 180 (animals as a special object of civil rights); Art. 340–342 (regulation of legal relations in relation to a neglected pet); Art. 1187 (wild animals, service dogs and dogs of fighting breeds as sources of increased danger)<sup>164</sup>. The basic principles of animal protection from ATG are set out in Article 4 of the Law “On the Protection

155 Європейська конвенція про захист домашніх тварин : ратифік. Законом України від 18.09.2013 р. № 578-VII. URL: <https://zakon.rada.gov.ua/laws/show/578-18#Text> (date accessed: 01.06.2023).

156 Про захист тварин від жорсткого поводження ... . URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

157 Ibid.

158 Про тваринний світ : Закон України від 13.12.2001 р. № 2894-III (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/2894-14#Text> (date accessed: 01.06.2023).

159 Про тваринний світ : Закон України від 13.12.2001 р. № 2894-III (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/2894-14#Text> (date accessed: 01.06.2023).

160 Про захист тварин від жорсткого поводження ... . URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

161 Кодекс України про адміністративні правопорушення від 07.12.1984 р. № 8073-X (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/80731-10#Text> (date accessed: 01.06.2023).

162 Кримінальний кодекс України від 05.04.2001 р. № 2341-III (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/2341-14#Text> (date accessed: 01.06.2023).

163 Про захист тварин від жорсткого поводження ... . URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

164 Цивільний кодекс України ... . URL: <https://zakon.rada.gov.ua/laws/show/435-15#Text> (date accessed: 01.06.2023).



of Animals...”<sup>165</sup>. At the same time, the issues of humane treatment of animals and prevention of causing unjustified suffering or harm to animals for any purpose other than self-defense or survival are extremely relevant up to now<sup>166</sup>.

The issue of the legal understanding of wild life as a sustainable value<sup>167</sup> raised by Ukrainian researchers is gradually being implemented by the legislator in normative and legal acts, because the European vector of Ukraine development requires consolidation of European values (in particular, the conceptual doctrine of animal welfare) at legislative level, and legal status<sup>168</sup> of animals eventually became one of prominent places in the national discourse. Unfortunately, these scientific experiments are not enough to solve the problems of humane treatment of animals and Ukrainian legislation in this sense needs significant changes<sup>169</sup>.

In Art. 1 of the Law “On the Protection of Animals...” provides the main definitions

of actions in treatment of animals (humane and cruel treatment, euthanasia, bodily injury, keeping at home, etc.)<sup>170</sup>. The opposite of humane is cruelty: “abuse of animals, including homeless ones, which caused them to suffer, caused them physical pain, suffering, including causing bodily harm, mutilation or death, harassment of animals to each other and to other animals, committed with hooligan or selfish motives, leaving animals to their own devices, as well as other violations of the rules of keeping, handling and transporting animals” and cruel killing of animals: “killing animals without the use of painkillers that prevent animals from feeling pain and fear” (paragraphs 14 and 9 of Art. 1 of the Law “On the Protection of Animals...” respectively)<sup>171</sup>.

It is worth noting that in legislative acts of Ukraine, the definition of *animal cruelty (AC)*” has already been changed several times. In 2020, we offered our own interpretation: *animal cruelty (AC)*

165 Про захист тварин від жорсткого поводження ... . URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

166 Зубченко Н. И. К вопросу о соотношении понятий «благополучие животных» и «защита животных от жестокого обращения» в международном праве. *Актуальні проблеми політики*. 2014. Вип. 52. С. 135–145. URL: [http://nbuv.gov.ua/UJRN/appol\\_2014\\_52\\_17](http://nbuv.gov.ua/UJRN/appol_2014_52_17) (date accessed: 01.06.2023).

167 Zapara S. I., Fotina N. A., Klochko A. M., Fotina T. I., Yatsenko I. V. Revisiting Legal Understanding of Wild Life as a Sustainable Value. The Case of Ukraine. *Journal of Environmental Management and Tourism*. 2019. Vol. 10. Is. 1 (33). Pp. 14–21. DOI: [10.14505/jemt.v10.1\(33\).02](https://doi.org/10.14505/jemt.v10.1(33).02) (date accessed: 01.06.2023).

168 Yatsenko I. V., Zapara S. I., Zon G. A., Ivanovskaya L. B., Klochko A. M. Animal Rights and Protection against Cruelty in Ukraine. *Ibid.* 2020. Vol. 11. Is. 1 (41). Pp. 91–103. DOI: [10.14505/jemt.11.1\(41\).11](https://doi.org/10.14505/jemt.11.1(41).11) (date accessed: 01.06.2023) ; Яценко І. В., Ключев О. М., Угровецький О. П., Сімакова-Єфремян Е. Б., Дереча Л. М., Смирнов Г. В., Недосеков В. В., Парилівський О. І. Забезпечення благополуччя тварин, що використовуються для наукових цілей, та їх захист від жорсткого поводження в правовому полі Європейського Союзу і України. *German International Journal of Modern Science*. 2021. № 6 (2). С. 57–66. DOI: [10.24412/2701-8369-2021-6-2-57-66](https://doi.org/10.24412/2701-8369-2021-6-2-57-66) (date accessed: 01.06.2023).

169 Yatsenko I. V., Zapara S. I., Zon G. A., Ivanovskaya L. B., Klochko A. M. Op. cit. DOI: [10.14505/jemt.11.1\(41\).11](https://doi.org/10.14505/jemt.11.1(41).11) (date accessed: 01.06.2023).

170 Про захист тварин від жорсткого поводження ... . URL: <https://zakon.rada.gov.ua/laws/show/3447-15#Text> (date accessed: 01.06.2023).

171 *Ibid.*

is “socially dangerous, illegal, culpable, punishable, intentional act of the subject of the crime, provided for by criminal law, which consists in intentionally encroaching on the established order of keeping and handling animals by mercilessly abusing by an animal using cruel methods or with hooligan motives or bullying animals against each other, committed with hooligan or selfish motives caused injury or other severe health disorder, mutilation or death of animal”<sup>172</sup>. We believe that the definition proposed by us will contribute to development and introduction into forensic practice of methods for determining the severity of damage caused to animal, determining animal mutilation, forensic veterinary examination of animal corpses, which is what we are focusing our current efforts.

Since specifics of legal regulation of public relations regarding animals affect many moral aspects, they should be taken into account in the practice of jurisprudence, because animals are living

beings, have feelings, will, physiological needs, etc.<sup>173</sup>

Unfortunately, AC as an antisocial phenomenon is possible in any sphere of human activity related to animals. For example, O. Turska divides typical forms of human activities according to the fields of human activity: family-domestic, agricultural, research, hunting, entertainment-viewing, communal ones, etc.<sup>174</sup>

Domestic legislator criminalized animal cruelty in 1988<sup>175</sup> when he added to the then Criminal Code of the Ukrainian SSR Art. 207-1<sup>176</sup>, outlining the forms of detection of animal cruelty<sup>177</sup>.

Up to date, the concept of animal cruelty remains debatable. Thus, S. Denysov and V. Makarov<sup>178</sup> consider it a crime against morality, and O. Shumilo calls it criminal cruelty, a type of “aggressive behavior that causes great harm to the victim and is carried out without experiencing feelings of sympathy and pity on the part of the subject of such behavior”<sup>179</sup>.

- 172 Яценко І., Бобрицька О., Парилівський О., Криворотько Р., Ключев О., Сімакова-Єфремян Е., Дереча Л., Запара С. Благополуччя домашніх непродуктивних тварин та їх захист від жорстокого поводження в правовому полі України. *Біобезпека, захист та благополуччя тварин* : зб. тез Міжнар. наук.-практ. конф. (Київ, 27.05.2021). Київ, 2021. С. 133.
- 173 Коробко І. Міжнародно-правові стандарти захисту домашніх тварин від жорстокого поводження. *Український часопис міжнародного права*. 2013. Спецвипуск: *Міжнародно-правові стандарти поводження з тваринами та їх захисту і практика України*. С. 70–74.
- 174 Турська В. О. Поняття «тварини» в українському законодавстві. *Правові та інституційні механізми забезпечення сталого розвитку України* : мат-ли Міжнар. наук.-практ. конф. (Одеса, 15–16.06.2015) : у 2 т. Т. 2. Одеса, 2015. С. 64–66.
- 175 Головка І. А. Кримінальна відповідальність за жорстоке поводження з тваринами : автореф. дис. ... канд. юрид. наук. Київ, 2010. 20 с.
- 176 Про кримінальну відповідальність за жорстоке поводження з тваринами : Указ Президента ВР УРСР від 29.04.1988 р. № 5822-XI (утрат. чин.). URL: <https://zakon.rada.gov.ua/laws/show/5822-11/ed19880429#Text> (date accessed: 01.06.2023) ; Кримінальний кодекс Української Радянської Соціалістичної Республіки від 28.12.1960 р. (утрат. чин.). URL: <https://zakon.rada.gov.ua/laws/show/2002-05/ed19960712#Text> (date accessed: 01.06.2023).
- 177 Александренко В. В. Поняття та способи жорстокого поводження з тваринами. *Юридична наука*. 2015. № 6. С. 116–120. URL: [http://nbuv.gov.ua/UJRN/jnn\\_2015\\_6\\_16](http://nbuv.gov.ua/UJRN/jnn_2015_6_16) (date accessed: 01.06.2023).
- 178 Денисов С. Ф., Макаров В. О. Кримінально-правові санкції та їх застосування за злочини проти моральності : монографія. Чернігів, 2017. 328 с.
- 179 Шуміло О. О. Кримінологічна характеристика та запобігання жорстокому поводженню з тваринами : дис. ... канд. юрид. наук. Харків, 2016. 206 с. URL: [https://dspace.nlu.edu.ua/bitstream/123456789/13754/1/Shymilo\\_diss\\_2016.pdf](https://dspace.nlu.edu.ua/bitstream/123456789/13754/1/Shymilo_diss_2016.pdf) (date accessed: 01.06.2023).

Worthy of attention is the definition of T. Synoverska, according to which animal cruelty is “deliberate, merciless act, or a complex of them directed against an animal and is characterized by such methods of influence on the body, as a result of which harm is caused to the life and health of the animal and which is committed with hooligan or selfish motives”<sup>180</sup>.

Administrative responsibility is provided for animal cruelty that caused physical pain and/or suffering to animals, “but did not result in bodily harm, mutilation or death, leaving animals to fend for themselves, as well as other violations of the rules of keeping and handling animals” (Article 89 of the Code of Administrative Offenses)<sup>181</sup>. If the animal husbandry caused bodily harm, mutilation or even death of the animal, criminal liability arises<sup>182</sup> (Article 299 of the Criminal Code)<sup>183</sup>. Since bodily injuries of different nature cause different harm to the health and life of the animal, we distinguished three degrees of severity of such damage (severe, medium and

light one)<sup>184</sup> and consider it appropriate to determine them according to *Methods of forensic veterinary examination of animal corpses*<sup>185</sup>, developed with participation of the author of this research paper.

Criminal liability for animal cruelty is possible in the presence of one of two signs: the use of cruel methods<sup>186</sup> or a hooligan motive<sup>187</sup>.

In *Scientific and Practical Commentary of the Criminal Code of Ukraine*<sup>188</sup> it is explained that animal cruelty consists in the application of particularly painful torture and torture to animals, in particular: burning alive; dousing with acid or alkali; intentional poisoning; dying of hunger and/or thirst; breaking limbs; stifling; bullying of animals against each other, etc., as a result of which the animal(s) experience significant suffering.

### 1.2. Animal corpses under forensic examination

Carcass is the dead body of an animal. Not every animal carcass is subject to forensic

180 Синоверська Т. І. Міжнародне та національне законодавство у сфері захисту тварин від жорстокого поводження. *Часопис Київського університету права*. 2019. № 1. С. 260. URL: [http://nbuv.gov.ua/UJRN/Chkup\\_2019\\_1\\_56](http://nbuv.gov.ua/UJRN/Chkup_2019_1_56) (date accessed: 01.02.2023).

181 Кодекс України про адміністративні правопорушення ... URL: <https://zakon.rada.gov.ua/laws/show/80731-10#Text> (date accessed: 01.06.2023).

182 Турська В. О. Прогалини у регулюванні адміністративної відповідальності за жорстоке поводження з тваринами. *Правове життя сучасної України* : мат-ли Міжнар. наук. конф. проф.-викл. та аспірант. складу (Одеса, 16–17.05.2014). У 2 т. Т. 1. Одеса, 2014. С. 68–71.

183 Кримінальний кодекс України ... URL: <https://zakon.rada.gov.ua/laws/show/2341-14#Text> (date accessed: 01.06.2023).

184 Яценко І. В., Парилівський О. І. Правила судово-ветеринарного визначення ...

185 Яценко І. В., Казанцев Р. Г. Методика судово-ветеринарної експертизи трупів тварин. Харків, 2022. 336 с.

186 Яценко І. В., Парилівський О. І., Коломоєць Д. К. Обґрунтування питань, що ставляться у хвалі суду та постанові слідчого при призначенні судово-ветеринарної експертизи трупа тварини з ознаками насильницької смерті від жорстокого поводження. *Ветеринарія, технології тваринництва та природокористування*. 2019. № 4. С. 194. DOI: 10.31890/vtp.2019.04.34 (date accessed: 01.06.2023).

187 Калмиков Д. О., Данилевський А. О. Кримінальна та адміністративна відповідальність за жорстоке поводження з тваринами : монографія. Луганськ, 2012. 616 с. ; Александренко В. В. Оп. cit. URL: [http://nbuv.gov.ua/UJRN/jnn\\_2015\\_6\\_16](http://nbuv.gov.ua/UJRN/jnn_2015_6_16) (date accessed: 01.06.2023).

188 Ануфрієв М. І., Дубенко О. І., Золотарьова М. К. та ін. Науково-практичний коментар Кримінального кодексу України / за заг. ред. І. М. Копотуна. Київ, 2023. С. 576–577.

veterinary examination. The object of forensic veterinary examination is the corpses of animals that died violently (in particular, due to animal cruelty or accidental poisoning) or sudden death, under unclear circumstances, as well as the corpses of animals of unknown ownership, parts of animal corpses, exhumed corpses, fish corpses and corpses of bees for their plague<sup>189</sup>. Using forensic veterinary examination of animal corpses (that should be carried out in section hall of a specialized forensic science institution in accordance with *Methods of forensic veterinary examination of animal corpses*<sup>190</sup>), cause of death, age of its occurrence, cause-effect relation between the detected bodily injuries and death are determined animals etc.<sup>191</sup>.

### 1.3. Feed and feed additives

According to Part 1 of Art. 1 of the Law of Ukraine: *On Safety and Hygiene of Feeds* (hereinafter referred to as Law on Feeds), feed is “any substance or product, including feed additives, processed, partially processed or unprocessed, intended for feeding animals” (clause 25)<sup>192</sup> and feed additives are “substances, microorganisms or mixtures, other than feed material or premixes, which are specially added to feed or water for the purpose of performing one or more of the following functions: meeting the nutritional needs of animals, ensuring a favorable effect on the

*characteristics of feed, products of animal origin, ecological consequences of animal husbandry, productivity and well-being of animals, in particular by influencing the gastrointestinal flora and the digestibility of feed or the color of decorative fish and birds, the implementation of coccidiostatic or histomonostatic action”* (para. 29)<sup>193</sup>. In Art. 16 of this Law, feed additives are divided according to their functional purpose and characteristics (technological; sensory; nutritional; zootechnics; coccidiostats and histomonostats) and separated into functional groups<sup>194</sup>.

Feeds and feed additives become objects of forensic (forensic veterinary and/or forensic chemistry, forensic commodity ones) research if necessary:

- find out their dangerousness (in case of violation of manufacturing technology, storage, circulation, sale, marking rules) that can cause health disorders of animals and/or people who consume livestock products. Safety criteria are the presence or absence of: microorganisms (bacteria, viruses, microscopic pathogenic fungi) and their toxins, radionuclides, pesticides, nitrates and nitrites, heavy metals, genetically modified objects, parasites, etc.<sup>195</sup>;
- detect their falsification (deliberate replacement of high-value and

189 Яценко І. В., Казанцев Р. Г. Порядок проведення судово-ветеринарної експертизи ... . DOI: [10.31890/vtpp.2021.07.28](https://doi.org/10.31890/vtpp.2021.07.28) (date accessed: 01.06.2023).

190 Яценко І. В., Казанцев Р. Г. Методика судово-ветеринарної експертизи трупів тварин. Харків, 2022. 336 с.

191 Яценко І. В. Проблеми укладання уповноваженою особою постанови про призначення судово-ветеринарної експертизи та шляхи їх вирішення. *Форум Права*. 2022. Вип. 73. № 2. С. 11–12. DOI: [10.5281/zenodo.6471059](https://doi.org/10.5281/zenodo.6471059) (date accessed: 01.06.2023).

192 Про безпечність та гігієну кормів : Закон України від 21.12.2017 р. № 2264-VIII (зі змін. та допов.). URL: <https://zakon.rada.gov.ua/laws/show/2264-19#Text> (date accessed: 01.06.2023).

193 Ibid.

194 Ibid.

195 Яценко І. В. Проблеми укладання ... . С. 14–15. DOI: [10.5281/zenodo.6471059](https://doi.org/10.5281/zenodo.6471059) (date accessed: 01.06.2023).

highly nutritious feed ingredients with less valuable and low-nutrition ones, or violation of labeling requirements (for example, replacement (in dry or wet feed for non-productive animals) of pork (beef) with poultry meat or meat with soy protein (*quality falsification*), failure to indicate in labeling available third-party components (*information falsification*), etc.)<sup>196</sup>;

- determine their composition to clarify compliance / non-compliance with regulatory documents (recipe)<sup>197</sup>.

#### 1.4. Biological material of animal origin

Biological objects of animal origin most often become objects of multidisciplinary forensic examinations (for example, forensic veterinary and forensic biological; forensic veterinary, forensic biological and forensic ballistic; forensic veterinary and forensic genetic molecular; forensic veterinary, forensic biological and forensic trace evidence analysis<sup>198</sup>), during which experts examine internal

organs, bones of skeleton, traces of blood, semen, secretions, vomit mass, embryos, dismembered parts of an animal carcass or corpse, skeletonized corpses, ash remains of an animal, derivatives of animal skin origin (hair<sup>199</sup>, feathers, scales, etc.) of live examinee animals, as well as examinee animal corpses.

Extraction and delivery of forensic veterinary examination objects for laboratory research are carried out in accordance with *Procedure for extracting objects of forensic veterinary examination from the carcass of an animal and sending them for laboratory research*<sup>200</sup> (clause 2.4.1 of *Rules of forensic veterinary examination of animal corpses*<sup>201</sup>).

Biological material of animal origin becomes the object of multidisciplinary forensic examination if it is necessary to establish its belonging to a specific animal or animals of a certain zoological species or class<sup>202</sup>, female or male, separate fragments of a whole, as well as blood of an animal of a certain species and to determine the age of the animal (for example, according to the condition of the teeth or bones of the skeleton),<sup>203</sup> etc.

196 Яценко І. В. Проблеми укладання ... . С. 14–15. DOI: 10.5281/zenodo.6471059 (date accessed: 01.06.2023).

197 Ibid.

198 Грошева О. Ю. Оп. cit.

199 Ahmed Ya. A., Ali S., Ghallab A. Hair histology as a tool for forensic identification of some domestic animal species. *EXCLI Journal*. 2018. Vol. 17. Pp. 663–670. DOI: 10.17179/excli2018-1478 (date accessed: 01.02.2023).

200 Яценко І. В., Казанцев Р. Г. Порядок вилучення об'єктів судово-ветеринарної експертизи з трупа тварини і надсилання їх для лабораторних досліджень : метод. рек. Харків, 2021. 55 с.

201 Ibidem. Правила судово-ветеринарної експертизи ... .

202 Яценко І. В., Головкин Н. П., Кириченко В. М., Балинян Т. Є., Богатко Н. М., Букалова Н. В., Сердюков Я. К. Експертний випадок дослідження фрагментів тіла лося європейського (*Alces alces L.*) за матеріалами досудового розслідування кримінального провадження щодо браконієрства. *Проблеми зооінженерії та ветеринарної медицини*. 2017. Вип. 35. Т. 1. Ч. 2. С. 115–126. URL: [http://nbuv.gov.ua/UJRN/pzvm\\_2017\\_35%282.1%29\\_\\_28](http://nbuv.gov.ua/UJRN/pzvm_2017_35%282.1%29__28) (date accessed: 01.02.2023).

203 Абузнайд Карем Р. С. Судово-ветеринарні критерії визначення віку і статі великої рогатої худоби молочного напрямку продуктивності за морфологічними особливостями носомозкового відділу черепа : автореф. дис. ... канд. вет. наук. Харків, 2016. 24 с.

Please note that in accordance with “*Rules of Forensic Veterinary Examination of Animal Corpses*”, biological material removed during a forensic veterinary autopsy can be sent by a forensic veterinarian to an accredited laboratory for microbiological, toxicological, histological, chemical, etc. researches together with an accompanying document<sup>204</sup>.

### *1.5. Elements of physical scene environment*

Elements of the physical scene environment are the corpse of an animal (its parts) or a live injured animal; traces of blood, saliva, wool, hair, brain matter and other traces of biological origin; skin; bone remains; separate internal organs; instruments of injury, etc. To inspect the elements of the physical environment of the scene of the incident and/or the carcass of an animal to assist the person conducting the pre-trial investigation (for the purpose of a consistent, correct and scientifically based inspection of the scene and inspection, removal, packaging and marking of objects, for the oral expression of a preliminary opinion about nature and antiquity of formation of the identified injuries, assumptions about the instruments of injury, as well as other questions of a veterinary nature that arise for the authorized person conducting investigation, as well as for assistance in correctly recording the results of this examination in the protocol), involve a specialist in veterinary medicine (forensic veterinarian)<sup>205</sup>.

Results of such research on of the physical environment elements of

the scene related to an animal allow the person conducting a pre-trial investigation to more thoroughly clarify the offense mechanism, create an idea of the instrument of injury and the method of committing the crime, to take other necessary investigative actions, and later will contribute to offender identification.

## **2. Materialized objects of forensic veterinary examination**

Separate group of forensic veterinary research objects are materialized objects containing information recorded in case files and other information carriers.

### *2.1. Case files*

Case files are the main materialized object of a forensic veterinary examination in the case of its conducting based on the case materials and additional object in case of a forensic veterinary examination of tangible objects (examinee live animal, examinee animal carcass, fodder and feed additives for animals, veterinary medicines, etc.).

### *2.2. Case files obtained during investigative and/or investigative activities*

Case files include the materials obtained during operative and/or investigative activities (reports of inspection of the scene and interrogation of witnesses and victims; diagrams, photo and video documents, video and audio recordings; conclusions of primary forensic examinations). Forensic veterinarian examines either original documents contained in case files or duly certified

204 Яценко І. В., Казанцев Р. Г. Правила судово-ветеринарної експертизи ... .

205 Яценко І. В. Проблеми використання спеціальних ветеринарних знань під час огляду трупа тварини на місці події та шляхи їх вирішення. *Юридичний науковий електронний журнал*. 2023. № 1. С. 485—505. DOI: [10.32782/2524-0374/2023-1/114](https://doi.org/10.32782/2524-0374/2023-1/114) (date accessed: 01.02.2023).

copies of these documents, if they were provided to forensic expert separately without the case (proceedings). Such documents (copies of documents) should be stitched and numbered.

Research on case files, in particular, veterinary documents, will enable forensic veterinarian to correctly assess the items of material evidence during the inspection of the scene or the place where the animal corpse was found; determine mechanism and formation antiquity of bodily injuries, the occurrence of mutilation, occurrence of animal death; make a forensic veterinary diagnosis; answer the question of whether the animal could have suffered specific injuries under conditions and at the time specified in the procedural document on appointment of forensic veterinary examination.

### 2.3. *Veterinary documents*

Veterinary documents are extremely important for conducting forensic veterinary examination, as they contain basic and/or additional information for reasonable and objective establishment of factual data and circumstances relevant to the case (proceedings), in which connection we singled them out as a special group of research objects. Veterinary documents include the protocols of the pathological autopsy of animal corpses; acts of epizootic farm examination ; logs of registration and treatment of sick animals; medical animal history; extract from outpatient card of a sick animal; results of laboratory research on body fluids (blood, urine, bile, feces, gastric juice, etc.); results of laboratory bacteriological, virology, mycology research of biological material and clinical diagnostic studies (for example, conclusion of ultrasound

and protocols of electrocardiography, anatomical pathology, X-ray (tomographic), histological researches, etc.); journal of issuance of veterinary documents; operating permit, etc.

Veterinary documents are materialized objects of a forensic veterinary examination as the main material (in the case of forensic examination based on case files) and an additional research object (in the case of forensic veterinary examination of tangible objects: a live animal under examination, animal corpse under examination) . They help forensic veterinarian correctly and dynamically assess the completeness and timeliness of conducting diagnostic researches, providing veterinary care to sick animals, correctness of organizing health and preventive measures for epizootics (for example, African swine fever, rinderpest, bird flu, etc.).

Forensic veterinarian reaches a conclusion about examination objects based on his inner conviction, based on a comprehensive, complete, objective and direct study of such objects based on a set of research results: clinical (anatomical pathology) and laboratory (biological material: blood, urine, feces, semen, gastric juice, bile, etc.), evaluating each object separately, as well as collectively and in relation (if several objects are submitted for forensic examination). For example, in case of animal death by poisoning, forensic examination objects will be animal corpse, feed and water consumed by examinee animal.

## **Conclusions**

The *forensic examination object* concept is one of fundamental forensic science elements that has the closest connection

with the expert research topic, outlines possibilities of forensic science and affects the choice of methods, methods and means of expert knowledge and the method of drawing up a forensic expert's conclusion. We proposed the author's definition formulation of *forensic examination object* for forensic veterinary research.

Forensic veterinary research objects are tangible and materialized sources of information about offense, recorded in criminal proceedings or case files, that forensic expert comprehensively, completely, objectively and directly examines while forensic veterinary examination on the basis of specific expertise within the topic scope of forensic research, using an interconnected set of methods, methods and means for solving diagnostic and situational expert tasks set in the procedural document on appointment of forensic veterinary examination (forensic expert recruitment).

System unity of the of forensic veterinary examination object makes possible to study the system of its characteristics thanks to determined set of specifics. For determining mechanism of objective solution of expert tasks in a categorical form with maximum preservation of forensic veterinary examination objects, it is important to correctly organize the algorithm of carrying out a specific forensic examination on the basis of proven methods for forensic veterinary research on various groups of its objects: tangible and materialized ones.

Tangible objects of forensic veterinary examination are live animals under examination; examinee animal corpses;

fodder and feed additives; biological material of animal origin (internal organs, skeleton bones, traces of blood, semen, secretions, vomit masses, embryos, dismembered parts of an animal carcass or corpse, skeletonized corpses, animal ash remains, animal skin derivatives (hair, feathers, scales etc.), pieces of fur and skins, etc.); elements of physical scene environment. Materialized objects of forensic veterinary examination include case files; materials obtained during investigative and/or investigative activities (protocols, diagrams, photo and video documents, video and audio recordings); veterinary documents (protocols of autopsy of animal corpses, acts of epizootic inspection, logs of registration and treatment of sick animals, issuance log of veterinary documents, operating permit, etc.).

All objects of forensic veterinary examination are information source, whereby forensic expert finds out the facts and circumstances that make up forensic examination topic. Forensic veterinary examination object makes possible to single out terminology, methodology, informational content in a broad subject area and ensures systemic unity and thanks to specific expertise, conclude a forensic expert's conclusion with answers to those questions which solution was not even attempted before experienced professionals.

We plan to make specifics of application of special veterinary knowledge during investigation of offenses and integration of special veterinary knowledge into multidisciplinary forensic researches the subject of our next scientific investigations and publications based on their results.



## Правовий статус і гносеологічна характеристика об'єктів судово-ветеринарної експертизи

Іван Яценко

Метою праці є розкрити правовий статус і навести гносеологічну характеристику об'єктів судово-ветеринарної експертизи. Для досягнення поставленої мети застосовано загальнонаукові та спеціальні наукові методи. Уперше сформульовано дефініцію «об'єкти судово-ветеринарного дослідження» як матеріальних і матеріалізованих джерел інформації про подію правопорушення, які судовий експерт усебічно, повно, об'єктивно й безпосередньо досліджує під час проведення судово-ветеринарної експертизи на основі спеціальних знань, застосовуючи взаємопов'язаний комплекс методів, способів і засобів для розв'язання діагностичних та ситуаційних експертних завдань, поставлених у процесуальному документі про призначення судово-ветеринарної експертизи (залучення судового експерта). Аргументовано, що матеріальними об'єктами судово-ветеринарної експертизи є живі підекспертні тварини й підекспертні трупи тварин, корми й кормові добавки, біологічний матеріал тваринного походження й елементи речової обстановки місця події, а матеріалізованими — матеріали справи (провадження) і матеріали, отримані під час оперативно-розшукової і/або слідчої діяльності (протокол огляду місця події, схеми, фото- і відеодокументи тощо), ветеринарні документи (протоколи патологоанатомічного розтину трупів тварин, акти епізоотичного обстеження господарства, журнали реєстрації та лікування хворих тварин і видачі ветеринарних документів, історія хвороби та витяг з амбулаторної картки тварини,

результати лабораторних досліджень біологічних рідин організму (крові, сечі, жовчі, калу, шлункового соку тощо) і бактеріологічного, вірусологічного, мікологічного досліджень біологічного матеріалу, клінічних діагностичних досліджень, експлуатаційний дозвіл та ін.).

**Ключові слова:** судово-експертна діяльність; дефініція «об'єкти судово-ветеринарного дослідження»; теорія, правовий статус, гносеологічна характеристика об'єктів судово-ветеринарної експертизи; матеріальні та матеріалізовані об'єкти судово-ветеринарного дослідження.

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The author declares no conflict of interest.

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