



**“BABEŞ-BOLYAI” UNIVERSITY
CLUJ-NAPOCA
FACULTY OF LAW
DOCTORAL SCHOOL OF LAW**

DOCTORAL THESIS

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2021

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Judicial expertise
SUMMARY OF THE DOCTORAL THESIS

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Choosing "BABEŞ-BOLYAI" University, the doctoral school of law you will not regret it—this is a solid school of life!

Graduate of the Doctoral School of Law, 2021

Olga Cataraga

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Keywords:

Judicial expertise; ruling and performing judicial expertise; judicial expertology; expertise methods; methodical research; scientific processes; the conclusions of the judicial expert; objects of the expertise; ruling algorithm; expertise methodology; complex expertise; integrated expertise; judicial technical expert; judicial expert; forensic expert; expertise experiment; expert report; expertise task; authorizing officer of expertise; the judicial body; the judicial process.

Introduction

Nowadays, **judicial expertise** is not only a type of practical activity, but also a scientific approach. Science, in this case, ensures the process of expertise research, but also the development of new methods, for this purpose.

In recent years, there has been a growing trend in both the ruling and conduct of judicial expertise of all types. It is hard to imagine, at the moment, the settlement of court cases without using the results of expert examinations. Ruling and conducting judicial expertise involves the existence of a solid scientific foundation, capable to provide adequately grounded theoretical hypotheses, professional terminology, well-developed notions, efficient criteria for classifying conceptual categories, modern research methods and means and many other elements, within the context of the fast metamorphoses of the socio-economic relations, respectively, and of the way of committing different delinquencies.

Scientific research in the field of judicial expertise theory needs an advanced, continuous effort, aimed at increasing the ability to cope with the requirements of judicial practice in the fight against antisocial acts. The scientific theses previously elaborated within the judicial expertise field — the science about the judicial expertise, separated from criminology at the beginning of the 70s-80s of the past century, often do not meet certain specific requirements, although up to date, and need to be analysed in order to make generalizations, based on which to develop hypotheses applicable to new types of judicial expertise, including non-judicial.

It is known that the process of scientific research in the field of judicial expertise is closely related to the very practical side of expertise, being interdependent. Due to the fact that the judicial expertise is carried out only based on scientific methodology of expertise research, and this methodology, in a scientific sense, is outlined only as a result of the generalization of the expertise activity in order to increase the effectiveness of judicial expertise; for the elaboration of the methodical literature regarding the ruling and performance of the expertise; in connection with the assessment of expert reports, but also for the elaboration of training programs for experts; conducting scientific research, aimed at developing new methodologies, improving existing ones; classification of expertise by type, gender, class, etc.

Because the main purpose of scientific research in judicial expertise is their putting into practice, their scientific value, including expert methods is reflected in the practical importance of scientific hypotheses developed and methodical provisions based on the first.

We thought it is important to bring forward these reports, in order to repeatedly highlight the importance of scientific research in the field of judicial expertise. The evidence corroborated with the expertise, being, however, the only one with scientific value, little depends on the legislative vector of a certain state, due to the scientific process of data acquisition, based on which the conclusions are formulated by the judicial expert, who represents the scientific truth. The way of conducting scientific research is unique in the world. This fact is confirmed by all researchers in the field, such as Emilian Stancu, for example: "In conducting judicial expertise, the activities must comply with the nature of scientific examination that involves scientific work." The scientific nature of the expert research is rendered first of all by the strict staging of the process, as well as the observance of the sequence of these stages, secondly, the researches must comply with the scientific methodology of each type of expertise, which in turn is based on fundamental scientific methods.

The aim of the thesis is to develop knowledge about the theory of judicial expertise, the most important scientific notions, the forms of organization of expertise, systems of expertise, the concordance of legal provisions with scientific assumptions in this regard, the principles of use of the results of the expertise in the judicial process. At the same time, the research on the status of subjects of expertise, the scientific basis for formulating the requirements needed from the personality of the judicial expert, plays an important role in the paper, given that of all actors in the judicial process, the qualities of the judicial expert influence the most the degree of objectivity of the evidence provided by them.

Nowadays, when we see the competition between lawyers and judicial experts, on the one hand, and the criminal world, on the other, when criminals are the ones enjoying the most the benefits of a system that wants to be democratic, many questions keep arising on the training of judicial experts and magistrates, prosecutors, prosecuting officers, as well, in the sense of the success of the fight against criminality and criminal proceedings, in general.

The reasons for choosing this topic

Judicial expertise is one of the most effective means of obtaining and collecting information relevant to the case. In the current stage of development of the society, the successful performance of the functions of criminal justice, but also civil justice, is largely associated with the level of use of evidence in investigating cases. The scientific complexity of

some problems currently associated with the settlement by the judiciary authorities is a "mirror" of the complexity of modern social life.

The challenges of using judicial expertise in the investigation of crimes are addressed in the works of well-known criminologists: Constantin Țurair, Dumitru Ceacanica, Iosif Vianu, Tudorel Butoi, Constantin Aioanițoaei, Traian Tandin, Emilian Stancu, Florin Lăzău, Maria Georgeta Stoian and others. The term used in some states (Romania, Poland, Hungary, Germany, France, USA, etc.) is forensic expertise, but also judicial expertise (Republic of Moldova, Ukraine, etc.), but the term always refers to a procedural action consisting in carrying out the research of objects, actions, traces, consequences, etc., in accordance with the provisions established by law, by a person with special knowledge in science, technology, art or crafts, who will also give opinions on the issues raised by to the court, judge, body of the investigation, the person conducting the investigation, the investigator or the prosecutor, in order to establish the circumstances necessary to be proven in a given case.

Scientific Romanian works of Gh. Mateuț, Emilian Stancu, Sorin Alămoreanu, Ioana Vasiiu, Gh. Popa, and others place a special emphasis on the importance of scientific rigour in the activity of judicial expertise. At the same time, we believe that there are still areas that need study and even rethinking the legal activities of judicial expertise, the process of methodological-scientific assurance of the field, clarification of notions, terminology confusions and much more.

The challenge of the theoretical clarification of the notions of "judicial expert", "judicial expertise", as well as of the aspects regarding what personality traits a judicial expert needs, the types of judicial expertise, the technologies of the expertise process are currently studied insufficiently in Romania, they are often treated as such, without the need for analysis.

Taking into account these aspects of the documentary work during the doctoral studies but also through the synthesis of personal practice, we find it necessary from a scientific point of view to promote the correct perspective on "judicial/forensic expert" and "judicial/forensic expertise", which would serve to guide practitioners towards a new approach to expert technologies, in order to solve non-traditional problems, sent to forensic experts/criminologists, as well as the importance of forensic activity in the process of administering justice.

Our aim was the theoretical research of the essential notions from judicial expertise, applicable in the judicial process, regardless of the state, as an important chapter of the doctoral

thesis that focuses on the categories "judicial expert", "judicial expertise", "personality of the expert" "and" training of judicial experts ".

A current issue in the entire field of justice, very often raised by researchers in criminal procedure, but also pointed out by expert practitioners, is related to the training of judicial experts. Scientific opinions on this are almost absent. Specialists, like many theorists, speak about this topic tangentially, without proposing solutions or scientifically-based criteria. From our point of view, the problem requires a fundamental study and the elaboration of scientific theses and proposals to be put into practice.

The integration of scientific knowledge in the theory and practice of judicial expertise is one of the dominant trends of our times. There is already an urgent need for a forensic expert to deal with a large amount of constantly updated information. On the one hand, we notice a certain "specialization trend" — some states even limiting the areas of competence of an expert to one or possibly two fields, if they are related — e.g. traceology and dactyloscopy; graphic and document expertise, video and digital photography, etc. This leads to the differentiation of the activity of experts: experts with a single specialty cannot master the entire arsenal of knowledge and specialize in certain narrow fields. The process of conducting forensic examinations requires not only the differentiation, but also the integration of knowledge, which means that under such circumstances, the examinations will be performed by a group of experts in related specialties or the same specialty, but with different directions of investigation, sometimes resulting in seemingly divergent opinions.

One of the first steps towards the integration of several experts in the activity of judicial expertise is conducting complex judicial expertise. In these cases, the judicial experts from several specialties / directions carry out intermediate investigations within the requested expertise, in order to solve the task received. Many authorizing officers (i.e. judicial bodies and other beneficiaries of expert services) ask for forensic expertise to solve problems that require special knowledge, arising from the investigation of cases, but without asking for a complex expertise. We are not partisans of the theory supporting the idea of "universal expert" who "knows and does everything, in all fields", but we believe along with other theoreticians and practitioners that due to the unprecedented expansion of the complexity of the scientific world and technical means, but also of the required problems to be clarified in judicial cases through judicial expertise, "the degree of training of the forensic expert must be very high, with the

capacity to understand things globally, on several levels / specialized horizons, that would ensure an adequate logical-cognitive foundation".

Practice shows that in 50% of the requests for judicial expertise (analysis for 2016-2020) in the field of graphoscopy and document technique, in the National Center of Judicial Expertise of the Republic of Moldova, the tasks sent are meant to establish how old the evidences or documents are. The beneficiaries designate this type of expertise as graphoscopic or technical expertise of the documents. In reality, however, to solve such questions, integrated knowledge is needed, both in the field designated in the act that asks for an expertise, and in the examination of the materials of documents and writing, which sometimes requires knowledge in the chemistry of materials and substances.

Similar trends are observed in the case of product expertise, technical engineering expertise and many others, which even if they are not directly part of the forensics field, problem solving requires the same sense and complex professional training.

We believe that the process of conducting an integrated expertise requires taking into account several criteria:

- the vision about the matter of expertise (the material competence of the expert);
- its purpose (the proof of evidence that imposed it);
- the type of object of study (nature of the material evidence or actions to be investigated)
- appropriate research methods.

We believe that it is necessary *to ask* the forensic expert a wider range of questions, as this leads to increasing the possibilities of forensic expertise, theoretical developments and the ability to solve a large number of practical problems related to forensic activity (including by conducting integrated and complex expertise).

Performing integrated and complex expertises enables the extraction of extensive evidentiary information and leads to the widening of the circle of scientific research tasks, thus increasing the scientific level of forensic examinations. As for the theory of complex and integrated judicial expertise, it approaches the technology of the respective process differently, which leads in practice to create a situation of confusion. In the absence of clear provisions in this regard, both methodologically and procedurally, very often even they obtain valuable

results, judicial experts can not put them in the "format" of evidence, i.e. in a special form necessary for the judicial process, conceived and easy to understand by the judiciary. Thus, the judicial process cannot benefit from integrated conclusions, having only separate opinions regarding the objects under investigation, which they cannot use adequately in order to solve the case.

In this sense, both theoretically and practically, clarifications are needed on the position of these types of judicial expertise, their particularities in relation to the provisions of the methodology of expert examinations and specific procedural requirements, etc., which can be offered only as a result of fundamental research, with the application of logical reasoning in a scientific spirit.

We believe that the issue of the authorising officer's interaction with the judicial expert is of major importance in achieving truly valuable results in the process of conducting the expertise. In this context, we developed an action algorithm, based on theoretical provisions, but also on observations and findings from our own experience, derived from more than 29 years of activity as a judicial expert and trainer in various specialized fields of expertise.

The importance of the topic and its place in the context of scientific research

The evolution of science and technology and the expansion of potentially litigious human relations have led to an increase in the number of expertise and the expansion of forensic expertise as an examination tool in almost all areas. The importance of the expertise is underlined by the fact that there is a legal obligation to perform it in certain situations. At the same time, we see the need to rely on expertise, only in those situations, when in order to solve certain problems, specialized knowledge is required, which the judicial body does not possess. In situations where the judicial body might have some knowledge, it is, however, mandatory to use expertise in order to obtain a scientific opinion from the expert.

Thus, in jurisprudence, the opinions of judicial experts are seen as "scientific opinion," and, respectively, given their scientific basis, expertise is, however, a means of proof of great importance. In this context, we believe that the study of the situation using judicial expertise in the world, namely from the perspective of the purpose of the paper, in the absence of a scientifically-based approach of the main notions, the training of judicial experts, methodological and scientific approach of the field, the classification of the different fields of judicial expertise, the provisions referring to the technological process of conducting judicial

expertise, etc. these processes take place sporadically, outside any system and consequently the whole process of obtaining and evaluating evidence by scientific methods in jurisprudence will suffer.

Starting from the generally accepted opinion that the term “judicial expertise” is a scientific and practical activity and the research carried out within this field must be “methodical”. This means that judicial experts cannot do research at will, but only in accordance with the expertise methodology.

At the same time, in day-to-day practice, the terms “methods” and “methodology” are very often used interchangeably, including in the normative acts in the field. This is due to a simplistic understanding by the legislator of the respective terms (using only the Romanian dictionary), which from a professional point of view is inadmissible, as a true professional is identified by being able to grasp the subtleties, not the general-applicable terms. In the paper we will study extensively this problem and we will come up with solutions. The solutions are based both on the practice of other states and on our own reasoning, which we will try to prove scientifically.

Emphasizing the importance of judicial expertise, however, it should be noted that the expert’s opinion does not have absolute force of evidence, but only helps the judiciary or the partners to shape their own opinion in order to make a fair decision. The decision is subject to the free discretion of the judicial body which is not obliged to base its decision solely on the opinion of the expert.

The judicial expert must limit their competence to their field, in the judicial field the court being fully competent. The right to judge and decide is the exclusive attribute of the court based on the fundamental principle of the intimate conviction of the judge. The topic discussed represents a field of research based on the scientific approach of the essential notions from the theory and practice of judicial expertise, applicable in the judicial process, regardless of the state. It has a multidisciplinary character and is part of the national and international policy regarding the field of activity, due to the clarification of the meaning of the main notions within the theory of forensic expertise, the systematization of actions carried out by the judicial expert, related to conducting the expertise, using and implementing the latest achievements of expertology, with the aim of obtaining efficient solutions for the judicial process, so that the

scientifically acquired evidence is credible, truthful and, respectively, acceptable at national and international level.

Here are some of the most essential reasons, which were the motivation for choosing this research topic, along with the need to conduct the study on issues in the field of theory of judicial expertise: promoting the correct, scientific concept of "judicial expert" and "judicial expertise" and to guide practitioners towards a new approach to expert technologies, in order to solve non-traditional problems, sent to judicial experts, as well as the role of judicial activity in the administration of justice, the premises dictated by the need to develop theses intended to strengthen in the theory of judicial expertise the teaching of judicial expertise, complex and frequent, as well as to initiate a discussion on the new type of judicial expertise recently emerged within expertology as a new direction, on which researchers think that it is a kind of summation into a whole of certain elements. This expertise has been called "integrated" (from the lat. Integratio) and is seen as the next step in the process of interpenetration and interweaving of scientific knowledge after the complex expertise. An example of integrated expertise would be the video recording expertise meant to identify the person.

In this case, technical methods close to phonoscopic, photographic, portrait and biomechanical expertise are used. The same thing happens in the activity of car experts, who lately have as research objects video recordings of traffic accidents.

A problem studied in the doctoral thesis stems from a need identified by the author regarding the acceptance of evidence with judicial expertise at international level. In this direction, the last years in the national systems of judicial expertise have witnessed the tendencies to implement international standards, adequate to the activity of judicial expertise. The lack of a scientific approach to the relationship: procedural action - scientific research - standard requirement - judicial process, is challenging for both accreditation bodies and judicial expertise institutions to understand and apply the requirements of standards in accordance with legal and methodological provisions of the activity of judicial expertise, given the extension of this process to far too large limits, than those of forensic expertise, for which there are certain solutions.

Main objectives of the paper

1. Starting with the first chapter, a comparative analysis of the basic terms in the theory of judicial expertise is made, included in the legal provisions from several states and Eastern

and Western scientific sources. Our aim was to offer in this paper well-documented scientific definitions, in an acceptable form at national as well as international level. The conclusion is a contribution to the definition of essential concepts in the practice of judicial expertise, establishing a connection between judicial expert, forensic expert, judicial technical expert, medical-legal expert, respectively: judicial expertise, forensic expertise, judicial technical expertise, medical-legal expertise.

2. At the same time, again by comparison, we have a study analysing the historical situation, as well as of the current theoretical and practical concepts related to the requirements sent to judicial experts. Particular attention is paid, in this sense, to the personality traits of the judicial expert, scientifically arguing the stated requirements, in view of the functional activities characteristic of the profession, given that there is little research on this problem and the respective scientific hypotheses are not systemic, coherent.

3. The aim of the second chapter is to reveal the evolution of the given terms both historically and during the modern stage of jurisprudence development, bringing a comparative analysis of the procedural legislation with reference to using the terms "judicial expertise" and "judicial expert", and the specific characteristics of the forensic expertise are identified, as type of activity in jurisprudence. Summarizing the material investigated, the paper presents opinions about the scientific essence of the terms mentioned, the importance of understanding and using them correctly, in the jurisprudential sense.

4. The classification of expertise systems and structures has an utmost scientific importance in highlighting the legitimacy of the development of the field, for the future improvement of the organization of the judicial activity, as well as for the prevention of related risks.

5. Initiating certain discussions, formulating and arguing our points of view regarding the organization of judicial expertise in different states and legal systems based on the comparative analysis of the historical and current situation, identifying the factors that influenced the consolidation of certain systems and structures, their premises both traditionally and from the perspective of the hypotheses of science at that time, with our contribution to the identification of strengths and weaknesses, in order to broaden knowledge on the sector.

6. Identifying and comparing the problems related to the status of official (public) VS private experts in several states, and analysing the scientific opinions expressed by different

researchers, as well as arguing our point of view, through the analysis of national and international legislative framework, but also international practice, and offering solutions to change the legislative framework in Romania in this regard.

7. Elaboration of the minimum technical and methodological requirements for the private experts in order to ensure the development of the expertise field, according to the logic of their equivalence with those specific to an official laboratory. However, it is not possible to carry out an expertise without special technical means of examination and scientific methodologies intended for the field, regardless of the way in which they carry out their activity: private or official laboratory.

8. The scientific-procedural delimitation of the judicial expertise from other research activities, called expertises, by explaining these differences, as well as based on the analyzes of the legal provisions from several states of the world, identification of the common features for this activity (judicial expertise).

9. Outlining a system of requirements, which is translated into a well-developed algorithm of activities necessary to be undertaken by the judicial body (and other authorizing officers), which, provided they are observed, inevitably lead to the successful completion of the process of preparation and ruling the judicial expertise. We believe that our reasoning presented in a logical and consecutive way, will be useful in the theoretical sense and helpful from a practical point of view.

10. Elaboration of practical structures of the action modules of the judicial expert, in the process of performing the expertise, aiming to facilitate these operations, by phasing them and ensuring transparency in the activity of performing the judicial expertise, being fully convinced that only strict and concomitant compliance of procedural and scientific requirements can lead to the avoidance of errors of expertise and ensure the success of reliable conclusions.

11. Inference of scientific requirements from the reporting of the results of judicial expertise, based on the value of this procedural document as evidence.

12. Scientific delimitation of the terms "methods" and "methodology". Classification of judicial methods with clarity, identifying the role of the methodology in conducting the expertise and assessing the judicial report.

13. Opening discussions on challenging topics in judicial theory, for which scientific research is to be initiated to provide solutions and re-submit problems, will only ensure the

continuity of the process of knowledge in the field of judicial expertise and a solid development and expansion of scientific theories in expertology.

Research methodology

The purpose of the scientific research project is to complete the thesis entitled "Judicial Expertise". This is a hot topic and also a significant challenge for national and international judicial scientific research.

The problem was identified by describing the research on the procedural and special legislation from several states regarding the organization of the judicial activity, the procedural status of the judicial expert, but also the theoretical and practical treatment of the central notions: the judicial expertise and the judicial expert, expertise methodology, methodology, classification, legal status, elements of activity organization and others. In the research process we used various scientific research methods: observation, description of processes, phenomena, scientific position, the circumstances and premises of the emergence and development of central terms in the theory of judicial expertise, the action mode in different situations studied, etc. In order to identify some practices in the judicial activity, we used a poll on the Europol platform (epe.europol.europa.eu) and via e-mail (cnej@justice.gov.md). Although we were not convinced that this poll would be successful, the result demonstrated the opposite, and we used its results in identifying the criteria used to evaluate people to be accepted as candidates entering the profession of expert.

The phenomena observed and described were analysed using the method of comparison, vertical and horizontal, and explained by formulating hypotheses. The study of the books and articles in the bibliography played an essential role in collecting information and interpreting the results obtained, following the analysis of data observed and based on my experience as a judicial expert and trainer in this field.

In particular, a study was made on the terms "judicial expertise" and "judicial expert" as a part of the study and description of the most essential theoretical and practical approaches reflected in the scientific literature and procedural legislation in several countries. This study was carried out both in terms of the evolution of the given terms from a historical point of view and of the modern stage of jurisprudence development, bringing a comparative analysis of the procedural legislation with reference to the operation with the terms "judicial expertise" and "expert judicial", as well as how the specific characteristics of the judicial expertise are used in

jurisprudence, as a type of activity. Summarizing the investigated material, we offer our conclusions on the scientific essence of the terms mentioned, the importance of understanding and using them correctly in jurisprudence.

At the same time, the paper sets a scientific-procedural delimitation of judicial expertise from other research activities, called expertise, by explaining these differences, and based on the analysis of legal provisions in several states, we identify common features for this activity (e.g. judicial expertise). Particular attention is paid to the provisions of procedural legislation in different states, regarding the subjects of judicial expertise, as well as the role of the personality of the judicial expert in obtaining evidence on a scientific basis.

In particular, our goal was to scientifically outline the personality of the judicial expert, based on the generally accepted opinion that they are competent professionals, invited in litigious or difficult situations to research and solve a particular question, which requires special knowledge. At the same time, we include in the text of the paper reports on the role of the expert's opinions in the judicial process and the clear delimitation of the competences of the expert and the magistrate in examining and making decisions.

A separate chapter in the paper is dedicated to the study of different systems and structures of judicial expertise. The analysis covered the organizations of the judicial expertise activity from the Republic of Moldova, Romania, Russia, Ukraine, Belarus but also other European states and other continents, exemplifying the similarities and differences in the organization of the expertise activity. At the same time, the contribution of private and public experts to the conduct of judicial expertise in the judicial process in these countries is compared. Based on these studies, we will try to opt for the most appropriate form of field organization, justifying the proposal with scientific reasoning.

In the absence of a systemic approach to the stage of preparation and ruling judicial expertise, we developed, based on a comprehensive analysis of the state of affairs on this segment, a scientific algorithm in this regard, which we believe would be useful for authorizing officers. We considered extremely important to approach the subject from these two perspectives: - the activities carried out by the authorizing officer and those carried out by the expert, highlighting the correlation between them and its contribution to achieving the common goal — obtaining scientific data on the object examined, useful to solve the case successfully. Only in this way is it possible to increase the degree of certainty of the conclusions of the experts,

subject to adequate presentation (correct preparation) of the material for the expertise, as well as to reduce the time needed for carrying out the judicial expertise.

A special role in the paper is assigned to the activities of the judicial expert, which they must carry out from the moment they receive the order and the materials for examination. In this sense, there are many gaps in the understanding of forensic experts, both scientifically and procedurally, respectively the elaboration of precise and grounded provisions on the order and content of activities, including formulas for rendering the course of examinations in the results reporting documents, requirements to formulate conclusions so that they are scientifically and convincingly argued for all actors in the judicial process, not just a small circle of professionals in the respective field of science. Such provisions would be very useful from a practical point of view for executors and would considerably increase the efficiency of the work of judicial experts, who work only on judicial cases, in order to establish the objective truth.

The thematic area in the field of methods and methodology of judicial expertise rightly seen as its scientific support, without which the respective activity is not conceived, plays an essential role in the research carried out within the proposed doctoral thesis.

The methodology, designating a system of principles and norms for organizing the research, rigorously established through which research methods, procedures and techniques are elaborated, to be used in the judicial expertise. The expertise methodology, that is a system of instructions (categorical or alternative) about the choice and application in a certain sequence and under certain conditions (existing or created) of the methods and means of solving the problems.

Any research method, applied specifically to the performance of judicial examinations, has its specificity, determined by the purpose and tasks of the expert examination. The specificities refer first of all to the methods of basic sciences, part of which are judicial expertise of that kind. But also the general methods of knowledge, used in this field, are characterized by a certain degree of specificity, determined by the particularities of all the structural elements of realization of these methods.

No judicial expert, regardless of their field of specialty and performance, can directly apply their basic knowledge to solve the tasks of expertise mentioned in the order. To this end, they must apply professional knowledge transformed into special knowledge (use in the judicial process). Expertology defines very scientifically, through the methods of expertise, the system

of procedures, techniques and methods for researching the objects of expertise, the sequence of their application and how to argue the conclusions of the judicial expert, the scientific criteria for formulating different types of conclusions, etc.

Thus, the delimitation of these terms, the explanation and the correct use in the activity of judicial expertise, but also in the assessment of the conclusions of the judicial expert in the cases investigated, is strictly necessary for placing the evidence with expertise on the place it deserves in the arsenal of the evidences in question.

The correct approach of the terms enunciated in the practical activity creates possibilities for the development of expert technologies in the direction of the new, thus making real the examination of non-traditional objects, solving new tasks, which are increasingly sent to experts by the judiciary.

In the summary we mention that a set of general and special scientific methods of knowledge was used to achieve the expected objectives. At the beginning, the dialectical method was used, according to which all the issues addressed in this thesis are presented in terms of the unity of their content and legal form. To enrich the conceptual apparatus, the following methods were used: logical-semantic, sociological (by studying official, scientific and bibliographic sources) - in the process of collecting and accumulating scientific information about the object of study; comparative - for establishing the similarities and differences in the legal provisions from several normative acts regarding the object of study as well as for their interpretation; legal logic - when elaborating the proposals for exposing the operational activities, which the authorizing officer must carry out, in the context of the research object.

The research is based on theoretical research, modelling techniques, as well as bibliographic information, which includes works from the country and abroad. Thus, in the work process we achieved the purpose of the research project: which in general consisted in expressing the systemic problems in the theory of judicial expertise and proposing answers, which were outlined in the working hypothesis. At the same time, we initiated discussions on future scientific research in the field of judicial expertise.

The study was carried out at the "Babeş-Bolyai" University of Cluj-Napoca, Faculty of Law, within the doctoral studies.

The terms presented in the thesis were approved during the discussions of research results at scientific-practical conferences and specialized round tables: round table "Problems of

judicial expertise in constructions in the Republic of Moldova" - Chisinau, Moldova 08.06.2018; The Conference of the Union of Liberal Professions in Romania dedicated to the "Day of the Liberal Professions in Romania", 11th edition, Romania, Bucharest, 04-06.11.2018; International conference entitled "Schools of graphic and graphological expertise", Romania, Oradea, 26-30.04.2018; International Scientific-Practical Conference "Scientific Rationale of Judicial Expertise Reports" - Chisinau, Moldova 13-14.04.2018; The International Conference entitled "Current issues in judicial expertise. Past, present and future", dedicated to the 105th anniversary of the founding of the Odessa Institute, Ukraine, Odessa, 14-17.06.2018; The International Conference entitled "Current issues of standardization in the activity of judicial expertise. Development perspectives", Ukraine, Kiev, 03-06.07.2018; International scientific-practical round table "Issues of examining children in technical expertise of documents and graphoscopic" - 05-06.10.2018" – Chisinau, Moldova 05-06.10.2018; International Scientific-Practical Conference "History and topicality of the study of judicial expertise", Belarus, Minsk, 24-27.10.2018; The international scientific-practical conference dedicated to the celebration of the 95th anniversary of the founding of the Institute of Scientific Research and Judicial Expertise in Kharkov "Current Issues of Judicial Expertise and Forensics", Ukraine, Kharkov, 09-13.10.2018; International Scientific-Practical Conference "Forensic Readings in Minsk", Belarus, Minsk, 18-21.12.2018; Jubilee round table "Development of judicial expertise and perspectives", Ukraine, Lvov, 23-28.01.2019; Scientific-practical conference "issues of judicial expertise in the Republic of Moldova and development perspectives" - 12-13.04.2019, Chisinau, Moldova; International Forensic Conference "60 years of Forensic Expertise in the Justice System", Romania, Cluj Napoca, 21-25.05.2019; International Round Table on "Issues and Prospects for the Development of Judicial Expertise", Ukraine, Odessa, 11-13.06.2019; International Conference of PhD students in law, 11th edition organized by the Faculty of Law within the West University of Timișoara - Presentation and publication, Timișoara, Romania, 21.06.2019; International scientific-practical conference "Current topics of the activity of judicial expertise. Problems, trends and perspectives for the development of forensics and forensic expertise" and at the meeting of the working group "Road Accident Analysis "within ENFSI, Republic of Armenia, Yerevan, 24-28.09.2019; International Round Table" Scientific argumentation of the conclusions of the forensic expert", 04.10.2019, Chisinau, Moldova; International Scientific Conference "Current Issues of Expertology, Forensics and the Judicial

Process”, Kiev, Ukraine, Taras Shevchenko University, November 2019; Online scientific-practical conference “Procedural, organizational and scientific-practical tasks to ensure the development of the segment of judicial expertise (experience and achievements of Armenia and other states), 20.12.19, Yerevan; On-line conference “Tactical requirements for conducting judicial expertise and preparation of the forensic report” 02.10.2020 - Chisinau; Online scientific conference "Problems and perspectives for the development of judicial expertise and forensics". Odessa, October 16, 2020; Online scientific conference "Current issues in forensic expertise, criminology, forensics and the judicial process". Kiev, November 2020; Online scientific conference "Current issues in judicial expertise, forensics and the judicial process". Odessa, December 3, 2020; Online scientific conference "Modern trends in the development of technical expertise of documents and portrait expertise". Moscow, November 2020; International Scientific-Practical Conference by Correspondence "Forensic Readings in Minsk", Belarus, Minsk, 10 December 2020; Online scientific-practical conference “Forensic expertise activity in the Security Service of Ukraine: current issues of theory and practice”, 31.03.2021 Kiev, Ukraine; Scientific-practical conference “East-West: partnership in judicial expertise. Current issues of evaluation of the objects of judicial expertise ”, Moscow, online, 16.04.2021; Scientific-practical conference “Current issues in expertology and forensics”, Kharkov, Ukraine, online 15.04.2021; Scientific-practical conference "Possibility of using electronic documents in economic expertise", Dnieper, Ukraine 14.05.2021.

The research results were published in specialized scientific journals and a collection of scientific papers from Romania, the Republic of Moldova, Italy, Armenia, Belarus, Ukraine, Russia, in a volume of 32 scientific articles and theses.

Synthetic presentation of the chapters of the doctoral thesis

Starting with chapter one, we analyse the basic terms from the theory of judicial expertise, included in the legal provisions, in comparison with several states and in scientific sources, offering well-argued scientific definitions in a form acceptable at both national and international level. It ends with a contribution to the definition of the concept of essential terms in the practice of judicial expertise.

At the same time, we study the historical as well as the current situation of the theoretical and practical concepts about the requirements needed from people who can become judicial experts. Particular attention is paid, in this sense, to the personality traits of the judicial expert, arguing scientifically the requirements enunciated, in terms of functional activities characteristic of the profession.

The scientific importance of the topic is underlined in chapter one, and through the research direction – clarification of the scientific and procedural conditions in judicial expertise in several states. In this chapter, a theoretical study is made on the concepts of “judicial expertise” and “judicial expert”, as well as of the “personality of the judicial expert” from the perspective of scientific literature and procedural legislation from several countries.

At the same time, in close connection with the traits of the judicial expert, the issue of the training of the judicial expert is analyzed, given the fact that many opinions, often controversial, currently persist. Based on the analysis carried out in this regard and on our reasoning, we consider that we have managed to scientifically demonstrate the structure of the training process of judicial experts and to propose reliable solutions for a more efficient training process of forensic experts to fully meet current requirements of the judicial system.

Finally, the personality of the judicial expert, starting from the generally accepted opinion, that they are competent professionals, invited in litigious or difficult situations to investigate and solve a certain question, that requires special knowledge, has an activity strictly regulated by procedural law. At the same time, including in the conclusions of the chapter reports on the role of scientific opinions of the expert in the judicial process and the clear delimitation of the competences of the expert and the magistrate in examining and issuing decisions, we demonstrate their (the experts’) independence in choosing research methods, although they need to argue logically and scientifically this choice. Thus, we managed to identify a new formulation of the term forensic expertise and to deduce the specific features of this activity, given the speed

with which judicial expertise enters all areas of the judicial process and no longer meets the requirements, being applied more and more to new areas of sciences, in the service of jurisprudence, to clarify the circumstances in the light of the opinion formulated by the judicial expert.

Chapter one of the thesis is more salient due to the fact that it has been argued from a scientific and procedural point of view that judicial expertise, judicial technical expertise, medical-legal expertise and other types of expertise are attributed to the class of judicial expertise, given that they have all the common features of a judicial examination, differing only in the field of scientific knowledge used to solve the tasks of expertise, even if in some countries, from a procedural point of view, are governed by different legal rules (see Figure No.1):



Legend:

expertiza juridica = judicial expertise

expertiza criminalistica = forensic expertise

expertiza medico-legala = medical-legal expertise

expertiza tehnica judiciara/extrajudiciara = technical judicial/extrajudicial expertise

Figure no.1. Graphic presentation of the connections between the judicial expertise and forensic expertise, medical-legal expertise, technical expertise and extrajudicial expertise.

At the same time, chapter one brings forward a scientific-procedural delimitation of judicial expertise from other research activities, called expertise, by explaining these

differences, and based on the analysis of legal provisions in several countries of the world are identified common features for this activity (that is, judicial expertise). Particular attention is paid to the provisions of procedural legislation in different states, regarding the subjects of judicial expertise, as well as the role of the personality of the judicial expert in obtaining evidence on a scientific basis.

Chapter two reveals the evolution of the specific terms both historically and during the modern stage of development of jurisprudence, bringing a comparative analysis of the procedural legislation with reference to usage of the terms “judicial expertise” and “judicial expert”, as well as the specific characteristics of judicial expertise are approached, as a type of activity in jurisprudence. Summarizing the investigated material, this chapter presents reasonings regarding the scientific essence of the terms used, the importance of understanding and using them correctly in jurisprudence. We performed the comparative analysis of the activity of the forensic expert — the expert report, in different legal systems, identifying common points and differences, exposing our point of view on scientific, non-procedural requirements to report the results of the expert's activity.

Chapter two continues with the comparative and analytical study of systems and structures of expertise. We conducted research on the organization of judicial activity in different states and legal systems, analysing their premises, the factors that influenced the consolidation of certain systems and structures, both historically and from the perspective of the scientific hypotheses at that time. Given the findings, we extracted the strengths and weaknesses, initiating certain discussions and arguing our views on these issues.

In the second chapter, we also analysed the situation of the official (public) VS private experts in several states, finding in this segment a difference both in the scientific opinions presented by different researchers, and arguing our point of view, through the analysis of the national and international legislative framework, but also the current practice in the world on this topic.

Based on the investigations carried out, we also identified in chapter two, in the light of European trends, the minimum technical and methodological requirements for private experts, which we present at the end of the last paragraph of the chapter, following the logic of equivalence with those requested from an official laboratory. However, if the experts, whether private or official, have to provide expertise before a court in the same country or in another

country, according to different procedures, examination conditions, etc. problems may arise with regard to the credibility of their conclusions, as well as with regard to the admissibility in the process. In this chapter we intended to raise the discussion about the most important issues in the organization of judicial activity, to emphasize the similarities in the requirements for people who deal with forensic activity, because we consider them essential for the field. The presentation is a comparison, from the perspective of the development and the premises for consolidating the guidelines in the activity.

Chapter three of the thesis is dedicated to the analysis and development of criminological hypotheses about the ruling and conducting of judicial expertise, which in the current scientific literature we find poor and lacking in gnoseological systematization. From our point of view, the success of obtaining evidence by scientific methods depends not only on the judicial expert who is investigating but to a large extent it is a direct relationship with the quality of the material made available to the judicial expert by the authorizing officer. However, it is up to the authorizing officer to prepare and present the objects for investigation, they must know very well the possibilities of forensic expertise, in the sense of providing answers to the objects necessary to be solved in the process of solving the case. The judicial body (authorizing officers) have the obligation to clearly establish the quality of the objects: in disputed objects and sample objects, to take procedural measures for their collection, etc.

We believe that our reasoning presented in a logical and sequential way, will be useful in a theoretical sense, shaping itself in a system of requirements that is translated into a well-developed algorithm of activities, which, provided they are carefully observed, inevitably lead to the successful completion of the process of preparation and ruling judicial expertise.

Although apparently the activities of the judicial expert do not seem to raise problems, given that the theory has established views on the research process of expertise, well-defined structure, etc., there are still some confusions, which create certain deficiencies in both correct perception and in the application. We believe that through the research done in this chapter, and the concluding clarifications, we have contributed to the completion of the scientific doctrine in the respective area of action and we offer for executors valuable material, which would lead to increasing the efficiency of judicial experts, handling judicial cases, in order to establish the objective truth.

Our aim was also to develop practical structures of action modules in ruling judicial expertise, but also the activities of the judicial expert, that are next in the process of performing the expertise, with the aim of facilitating these operations, by staging them and ensuring transparency in the ruling and conduct of the judicial examination, being convinced that only a strict concomitant observance of procedural and scientific requirements can lead to the avoidance of errors in expertise and ensure the success of the reliable conclusion.

The research in chapter four of the paper is of major importance, approaching the process of examination of expertise in a scientific sense. The analysis is applicable to all kinds of judicial expertise, a conclusion we reached during the research, by revealing existing theses in the scientific literature, adjusting observations and findings from their own experience, and the experience of colleagues in similar institutions in other states. In this regard, we got considerable help in achieving the research objectives from the practice of scientific activity of the working groups within ENFSI and the consultations on the Europol platform. Likewise, an essential contribution to the accumulation of information and specialized opinions in the research subject played the materials of scientific-practical conferences in which I participated with reports and presentations of research results conducted during doctoral studies, with subsequent publication in powerful scientific journals from Italy, Ukraine, Belarus, Armenia, Russia and last but not least from Romania and Moldova. The experience gained as a judicial expert, together with the research, allowed us to present a comprehensive analysis of the research process conducted by the judicial expert, with its algorithm, providing the scientific tools to evaluate the results of investigations, so as to reduce to a minimum the subjectivism in formulating the conclusions of the judicial expert.

We have made efforts to propose certain criteria for reporting the results of judicial examinations, after a comprehensive analysis of the current situation in this compartment, based on the value of the judicial report as evidence.

What we find it's very important is the fact that we discussed the procedures for evaluating the report of judicial expertise by authorizing officers (court, prosecutor, criminal investigation body) in this regard, bringing examples from judicial practice and scientifically arguing the need for compliance certain steps in the rather difficult process of assessing the evidence with expertise. It should be mentioned that an important role in the success of the achievement of this objective served the CEDO practice, in terms of procedural assessment. We considered it

important to comment on the importance of scientific assessment of the expert report, in terms of the authorizing officer's understanding of the fairness of the activities carried out by the expert and the correct interpretation of the results obtained, when the authorizing officers do not have knowledge of natural sciences used by experts. Knowing the expertise methodology, the types of conclusions, their essence, are factors that make possible the "orientation" of the author in the miracle of science, in order to give an adequate assessment of the evidence with expertise. We believe that our attempts at how to assess the expert report are well structured and clearly set out, so that they can really serve the final process of achieving justice.

Chapter five of the paper outlines the concepts of "methods" and "methodology" from a scientific point of view. We would like to draw attention to the importance of understanding the differences between these terms in order to be able to determine the role of each of them in scientific and practical terms. An in-depth study of the processes of elaboration of expertise methodologies is carried out, not before giving a classification of them from the point of view of the importance and destination of the methodologies. We tried to provide clarity in the sense of the role of the methodology in conducting the expertise and in assessing the forensic report. At the same time, in the last section of chapter five, we opened up discussions on many problematic topics in the theory of judicial expertise, in which scientific research is to be initiated to provide solutions and again to raise problems, only this will ensure the continuity of the knowledge process in judicial expertise and a solid development and extension of scientific theories in expertology.

Conclusions

Thus, in our paper we managed to add to the theory of judicial expertise:

1. Scientific clarification of the meaning of the concepts of “judicial expert”, “judicial expertise”, as well as of the aspects regarding the requirements concerning the personality traits of the judicial expert, offering new information regarding the correlation of the basic terms in the theory of judicial expertise, and I elaborated requirements needed from the personality of the main subject in the judicial expertise — the expert, in the current scientific conditions. Summarizing the material investigated, the paper presents opinions on the scientific essence of the terms stated, the importance of understanding and using them correctly in jurisprudence.

2. A new approach to the issue of training of judicial experts, independent of the specialty of expertise and the legal system for which they are preparing. Thus, contributing essentially to the revision of the existing concepts of training of judicial experts in the sense of elaborating unique criteria for the good development of this process, which will ensure the rallying to the European requirements needed from judicial experts.

3. Identifying and systematizing the specific features of judicial expertise, in terms of purpose and subjects.

4. The presentation of the most problematic aspects in the organization of the judicial expertise activity, emphasising the similarities in the requirements towards the persons who deal professionally with the judicial expertise activity, being essential for the field. The presentation is a comparison, from the perspective of the development and the premises for consolidating the guidelines in the activity.

5. Comparative analysis of the main systems of organization of expertise in the world, with the elucidation of the tendencies of unique approach of the practice of judicial expertise worldwide.

6. Comparative analysis of the requirements for the final product of the judicial expert - the expert report, submitted in Western and Eastern European countries, to draw the attention of decision makers on the value of the expert's work for the progress of the judicial process, in the current conditions of globalization.

7. Analytical presentation of the issue of the position of the private expert in relation to the official one, proposals and their scientific argumentation, to change the legal framework in this regard, emphasizing the need to equalize the statutes of these two categories of judicial

experts and proposals on the need to formulate minimum requirements for private experts in terms of technical and methodological conditions for carrying out the expertise activity, which we present at the end of the last paragraph of Chapter Two, following the logic of their equivalence with those needed from an official laboratory, regarding the credibility of their conclusions and admissibility in the judicial process.

8. For the first time, to identify a unique scientific algorithm to approach the stages of conducting a judicial expertise, applicable to all fields of expertise, harmonized with all legal systems, specifying the roles of the judiciary and the expert at each stage, outlining the point of view on the independence of the expert from the judiciary and anyone else, current problematic issues in judicial practice, including on the grounds that they do not have scientific coverage.

9. For the first time, formulating the principles that can be observed when asking questions to the forensic expert and explaining the essence of each principle, as well as providing recommendations regarding the content of the questions to the expert, thus filling the gap in the theory and tactics of judicial expertology.

10. To present guidelines patterns for ruling judicial expertise of different specialties, in order to facilitate the process of their preparation and ruling and proposed algorithms of actions of the expert and the judicial body, in order to solve the most common situations in expertise practice with reference to deficiencies in formulating questions and making available the objects of expertise.

11. In terms of scientific innovation, based on the dynamic analysis of the experience already gained in the area of several states, in the field of digital document expertise, the drafting of a series of recommendations aimed at providing solutions for the admissibility of electronic documents as objects of expertise, in order to be able to meet the current expectations submitted by the judicial bodies to the expertise service.

12. Elaboration of the algorithm for conducting the actual examination by the judicial expert, applicable in all types of expertise (forensic and non-forensic) because the literature provides in particular clear hypotheses and provisions for forensic identification, diagnosis, situational judicial expertise, etc. remaining without scientific coverage.

13. Carrying out the comparative analysis of the laws but also of the scientific provisions and outlining precise criteria compared to the expert's conclusions formulated in all kinds of judicial expertise, highlighting points of view regarding the difference between the refusal to

draw conclusions and the conclusion of impossibility, considered equivalent to to many researchers in the theory of expertise and which are being confusing and contradictory in legislation. Thus, the conclusion of impossibility is always formulated, when expert research has been carried out, and in assessing their results there are situations in which the expert can not rule for scientific reasons with a probable opinion. While the refusal is formulated when the research has not taken place. Both solutions require explanations provided by the expert to the judiciary, prompting him to seek answers to the question by other methods.

14. Elucidation of the main problematic aspects from a scientific and procedural point of view compared to the activity of reporting the results of judicial expertise, to the necessary content elements; we also provided an algorithm of the process of assessing the evidence with expertise.

15. Clarifications regarding the criteria for classifying the judicial expertise, based on the comparative and analytical study presented. In particular, we emphasize the scientific basis for identifying the characteristics of commission and complex expertise, as well as the proposal to include multidisciplinary expertise in the respective classification category.

16. Outlining a very precise and scientifically argued vision on the methods and methodology of judicial expertise from a theoretical and applied point of view in the practice of judicial expertise, but also of the procedural one. We developed principles for classifying expertise methodologies, revealing the essence and role of each of them in theory and practice.

17. Finally, we identified the priority directions in the field of judicial expertise, which are important in the research perspective. Among them we highlighted the problem of unifying the methods of judicial expertise, ensuring the practice of expertise with scientific-methodical support and to present from a scientific point of view the process of admission of the judicial expert, depending on the basic knowledge they possess and the specialty of expertise where it applies, considering the direction given of paramount importance, in the context of the extension of the global process of accreditation of human activities, including that of judicial expertise.

Concluding on the research activities carried out in the doctoral studies with reference to the proposed objectives, we believe that we have managed to shed light and improve the theory of judicial expertise in terms of strengthening the importance of judicial expertise as a means of scientific evidence in the judicial process. The scientific truth, being rightly recognized as one

with a sense of superior objectivity through the character and essence of the acquisition technology.

We believe that the research topic addressed in the paper fully corresponds to the requirements of the current stage of development of the society, the successful performance of criminal and civil justice functions, being largely associated with the level of use of evidence in investigating cases. The efficiency of judicial expertise as a means of obtaining and collecting information relevant to the case is internationally recognized. There is no other activity to be used by the case investigator, the body of the investigation, the person conducting the investigation, the investigator or the prosecutor, at the beginning of the case investigation, including the court in carrying out the act of justice, capable to obtain scientific opinions about objects, traces, phenomena, circumstances, clarification that require specialized knowledge in science, technology, art or crafts, than forensic expertise.

Judicial expertise involves investigations into the circumstances that must be proved in a particular case, which are carried out in the procedural action in accordance with the provisions established by law and are carried out by a person with a clear legal status pre-established by the same rules of procedure.

Although the problems of using judicial expertise in the investigation of crimes are constantly addressed by researchers, there are still many directions in which in-depth theoretical studies are needed, such as: the evolution of legal judicial activities, methodological-scientific field, clarification of notions, the concepts of organizing the expertise activity, terminology issues, classification of forensic expertise in the context of current requirements of the judicial process, technology aspects of the judicial research process, methods and methodology in forensic expertise, and much more.

We opened up discussions on the perspectives of research in the field of judicial expertise, which are outlined in the analysis and reasoning made during the study. Priority is given to research on:

- the development of the scientific doctrine of the type of integrated judicial expertise, as a superior stage of the complex expertise;

- the challenges risen by the unification of the judicial expertise methods, which assumes that the algorithms of expertise of similar objects for solving tasks of the same type, must be

unique, so it will be possible to compare the results of expertise performed in different laboratories;

- clear insights into the interpretation of the requirements of the SM EN ISO / IEC 17025 standards - Requirements for the competence of testing and calibration laboratories; SM EN ISO / IEC 17020 Conformity assessment. Requirements for the functioning of different types of inspection bodies, as well as the training needs for judicial experts, in the light of basic knowledge.

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