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**STATE GENOMIC REGISTRATION AND LEGAL REGULATION  
OF THE INTERESTS OF ITS PARTICIPANTS**

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**Abstract**

A breakthrough in the decoding of the genome of Homo Sapiens marked the transition of the society to a new level of life quality. Civilization has acquired an instrument allowing finding the hereditary characteristics of particular persons with a high degree of probability, to learn about their race, physiological and intellectual characteristics using a minimum amount of biological material. The identification capabilities of genetics have predetermined the formation and active development of a new branch of forensic medical expertise, which is widely in demand in law enforcement practice. At present, the molecular genetic study of tissue particles and secretions left at the sites of accidents allows experts to identify a living person or the metric data of a corpse. The possibilities of DNA analysis greatly facilitate the establishment of kinship in the event of conflict situations in family relationships. However, against the background of the achievements of genetic fingerprinting there emerged an important necessity of state registration of the genetic profiles obtained by experts in order to counteract crimes. The tendency to expand the number of persons subject to mandatory genomic registration can lead to a number of serious consequences associated with an attack on the dignity of the individual, as well as discrimination against people on genetic grounds. While using the achievements of genetics it is important to avoid misbalance between law enforcement interests of the state and the interests of individuals or the society as a whole.

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## 1. Introduction

In the middle of the 80-s of the twentieth century, the identification capabilities of genetics formed the basis for a new and very promising branch of forensic medical examination aimed at establishing identity of persons and their biological kinship. Now genetic fingerprinting occupies a leading position in a number of popular forensic studies. Especially impressive is the effectiveness of DNA analysis, which over time competes more and more efficiently with other well-known methods of biometric identification. The minimal number of traces of biological origin found at the scenes of accidents and formed by particles of human tissues and secretions allows modern specialists of molecular genetic laboratories to obtain an impressive amount of unique information about the alleged criminals, victims or other participants in conflict situations. The method of genomic identification introduced into the practice of the law enforcement bodies contributes to the successful completion of the most complicated investigations, often becoming the only way of identifying the target individual.

## 2. Problem Statement

The Federal Database of Genomic Information (FDGI) of the Ministry of Internal Affairs of Russia is a key component of the infrastructure that provides storage, integration and analysis of personal data including the encoded information about certain fragments of human DNA, including that of an unidentified corpse. The compiled genetic profiles are recorded on information cards that are subject to electronic accounting in a uniform automated system. The development of DNA profiling and the genomic database make a great contribution to combatting crime. According to the data of the Forensic Expert Center of the Ministry of Internal Affairs of the Russian Federation, the results of genetic examinations and research annually contribute to the detection of more than 100 thousand serious and especially serious crimes.

At present, the FDGI covering about 0.6 % of the country's population is not very impressive. This is largely because in accordance with Article 7 of Federal Law No. 242-FZ of December 3, 2008 "On State Genomic Registration in the Russian Federation" a limited number of subjects and objects are subject to mandatory state genomic registration. These include: persons convicted and serving sentences for committing serious or especially serious crimes, as well as for all categories of crimes against sexual integrity and sexual freedom of individual; unidentified persons whose biological material was found during the investigative actions; unidentified corpses. Many state and public figures, forensic scholars and law enforcement officials consider this list to be unreasonably short and needing revision. Similar proposals are often voiced in the media and in research works. However, one important circumstance is sometimes overlooked. The unintelligent enthusiasm for increasing the scale of the genomic information database threatens with a number of serious consequences related to violation of the dignity of individuals, their privacy, defaming of good names of the deceased, the interests of individual ethnic groups and nationalities, as well as discrimination of people on genetic grounds. The above does not indicate the need to completely curtail or limit the existing automated registration of genetic profiles. At the same time, total genomic registration of citizens is unacceptable. A modern database of human DNA fragments must meet the requirements of social acceptability, which implies the establishment of a

balance between the law enforcement interests of the state, the interests of individuals and the society as a whole. This task determines the topicality of this study and its key issues.

### **3. Research Questions**

The study involves the discussion of the following problems:

- a) determining the purpose of the state genomic registration;
- b) classification of varieties of the state genomic registration;
- c) substantiation of the material and legal basis for mandatory state registration;
- b) specifying the subjects who have the right to remove their personal genetic code from the FDGI.

### **4. Purpose of the Study**

The purpose of the study is to substantiate the range of mandatory genomic registration subjects, whose DNA profiles' registration for law enforcement purposes does not contradict legal guarantees of respect for the dignity of individuals, preservation of their privacy, interests of individual ethnic groups and nationalities, and their protection from discrimination.

### **5. Research Methods**

The methodology of this work is based on the dialectical method. It allowed reflecting the unity and internal contradictions of the law enforcement interests of the state with the interests of individuals and the entire society in the sphere of implementation of the project on mandatory genomic registration. Discourse and dogmatic (formal and legal) analyses were used as private research methods. The method of discourse analysis allowed evaluating the consistency of arguments concerning the directions of mandatory genomic registration optimization. With the help of the dogmatic (formal and legal) analyses of criminal legislation, the material basis for mandatory genomic registration was justified. This method ensured the systematic character of the study and arranging its internal structure.

### **6. Findings**

During the determination of the range of persons subject to state genomic registration, it is important to assume that it is carried out both on voluntary and compulsory bases. In the first case, which presupposes an independent and free choice, there are no social grounds for limiting a person's desire to deposit their personal DNA data. Currently, the necessary conditions for the voluntary state genomic registration of the Russian and foreign citizens, stateless persons, minors, incapacitated persons or people with diminished capability are regulated in detail by the law. At the same time, the motivation for making a positive decision on the problem under study can be diverse. People are mainly motivated to deposit their personal DNA data by the desire to find missing relatives, including those who perished during wars and armed conflicts, as a result of large-scale disasters or terrorist acts, and also those who developed mental disorders accompanied by amnesia and disorientation in space. A person can be also guided by the desire to preserve the genetic profile for descendants, who take interest in their hereditary line. The

intention of individuals to exercise their right to posthumous rehabilitation or protection of their good names from possible posthumous charges of involvement in crimes is not excluded. Regardless of the internal motivation of those, who demonstrate the corresponding free expression of will, law should guarantee voluntary genomic registration to everyone without exception.

The situation is different when the state intends to use a compulsory resource in the field of genomic registration. With this approach, tension inevitably arises between the interests of the public authorities and those of other members of the society. This tension requires close attention from the point of view of respect for the natural rights and freedoms of individuals and social groups. The situation is particularly acute due to the actively promoted idea of a significant increase in the number of persons subject to mandatory genomic registration. In its implementation, many researchers see a threat associated with the emergence of the phenomenon of discrimination of people on genetic grounds (Brown, 2019; Caenazzo et al., 2020; Wickenheiser, 2019; Williams & Wienroth, 2017). All of the above-mentioned problems make it necessary to analyze the reasonableness of compulsory registration.

The initiator of the relevant legislative innovations was the Government of the Russian Federation, which proposed to extend the provision on mandatory genomic registration to all those convicted and serving sentences for committing crimes, and to those who are suspected or accused of committing crimes, or subjected to administrative arrest. The main argument in favor of this initiative is that “the expansion of the list of persons subject to mandatory genomic registration will lead to an increase in the information array of the FDGI and a more effective use of genomic information obtained during the expertise, detection and investigation of crimes including those committed during past years” (Draft Law No. 1048800-7 “On Amendments to Certain Legislative Acts of the Russian Federation on State Genomic Registration”). Many scholars and law enforcement practitioners are inspired by similar ideas (Bednyakov & Kubanov, 2017; Kubitovich, 2018; Popova & Sergeev, 2017).

Meanwhile, in the proposed variant of the use of the resources of genetic science for counteracting crime, there is a clear tendency in favor of the law enforcement interests of the state. It should not be forgotten that any procedure aimed at registration of potentially dangerous and criminally minded persons should have a material basis that allows justifying the selection among the general population such people, who are of greater interest for law enforcement agencies. It is logical to recognize the public danger of a person, who by his behavior demonstrates desire to meet his own needs at the expense of criminal encroachment on the interests of others, to be the only material basis for mandatory genomic registration today. The very meaning of the phrase “public danger” presupposes not only the infliction of certain harm to the protected object, but also a certain threat to the protected interests emanating from the wrongdoer. Based on the logic of the Russian criminal law, the source and at the same time the carrier of danger to the material order can only be a sane individual, who reached the age of criminal responsibility and ignores the obligation to refrain from committing crimes. A legal fact, that is the basis for the recognition of a public danger, should be considered a crime confirmed by court sentence that has entered into force.

It is important to realize that the threat to society posed by the criminal has certain time limits. Having satisfied his or her criminal motives and having gained practical experience in committing a crime, a person is dangerous to others only for a certain time. According to the opinion of the legislator, a

criminal is a potential source of a new significant harm to the object of criminal legal protection at the time when he or she is in the status of a convicted person. According to Article 86 of the Criminal Code of the Russian Federation, a person found guilty of committing a crime is considered convicted from the date of entry of the court's conviction into force until the moment of cancellation or removal of the criminal record. The cancellation or removal of a criminal record cancels all criminal legal consequences associated with the criminal record. On the basis of this legislative provision, it is possible to come to a logical conclusion that after the repayment or removal of a criminal record, a person formally is no more dangerous to the material order existing in society (Gerasimov, 2020).

## 7. Conclusion

Everything stated about the source and carrier of danger to the society in this paper allows presenting a number of theses regarding the mandatory genomic registration.

1. At present only a person's public danger legally confirmed by a court sentence, which entered into force can be regarded as a material and legal basis for compulsory genomic registration. The Constitution of the Russian Federation and international legislation make it possible to restrict the right of criminals to express freely their will regarding the registration of their personal DNA information in order to protect rights and freedoms of other people, the interests of the society and the state, peace and security of humankind. The state has the right to subject any convicted person to mandatory genomic registration. It is important to take into account that according to the Russian criminal law criminal record is closely related to the implementation of the institution of punishment. However, some criminal law scenarios involve the release of a person from criminal liability. If a person is released from criminal liability, then from the legal point of view he or she is considered not convicted. In this case, there is a problem with determining the time limits of the threat to the material order coming from the perpetrator. On the one hand, exemption from criminal liability is not a form of acquittal of the guilty person. The committed malicious act ascertained by the court in accordance with the procedure provided for by law, retains its socially negative essence. On the other hand, exemption from criminal liability is based on finding by the court of an extremely low or even zero degree of public danger of the committed act, indicating the absence of further threat to the material order on the part of the person. In the context of the above, it can be concluded that when the institution of exemption from criminal liability is implemented, there is no material basis for mandatory genomic registration of the relevant persons.

2. Persons suspected and accused of committing crimes, as well as those subjected to administrative punishment, are not in the number of subjects, whose mandatory genomic registration is obligatory due to social necessity. Private interests of suspects and those accused of committing crimes are ensured by the presumption of innocence, according to which the status of such participants in criminal proceedings is not equated with that of criminals. Their danger to the society is not confirmed by court decision. In order to solve procedural problems, they may be required to undergo a molecular genetic examination, but the resulting genetic profiles cannot be included in the state DNA data bank.

As for persons, who are subjected to administrative punishment, the situation is even more obvious. According to the logic of administrative law, the "amount of harm" from an administrative offense, formally complicating the legal regulation of social relations, does not create any danger to the

material order. This branch of law ensures the deterrence of the doer of the action from acts that have a negative impact not on the essential aspects of socially significant relationships, but on their “legal shell”. Harmfulness of an administrative offense is limited by the scope of its illegality. People who committed an administrative offence do not pose any threat to the actual interests of persons, social groups or the state. Therefore, there is no basis for special criminological attention to them on the part of the state.

3. The recognition of a criminal record as a material and legal basis for the mandatory state registration of an individual presupposes the stipulation of the range of subjects, who must obtain biological material. Based on the content of the by-laws regulating the procedure for conducting mandatory state genomic registration, the authority to take biomaterial from convicted persons is logically assigned to institutions (bodies) that execute criminal penalties or monitor the behavior of the convicted persons. In particular, the heads of penal institutions and bodies can perform such functions in relation to persons actually serving sentences. As for persons sentenced to a fine and actually not serving a criminal sentence (probationers, as well as those with a suspended sentence), a similar procedure can be carried out by the head of the penitentiary inspectorate.

In the process of the implementation of the state genomic registration of persons sentenced to imprisonment, in practice, there are cases of unfair performance of legal obligations by its participants. There are some cases involving the refusal of convicts to undergo the procedure of mandatory genomic registration or failure of correctional institutions' administration to receive biological material from persons who served a criminal sentence. To prevent such cases, it is appropriate to clarify the legal status of the subjects of genomic registration. First, we suggest that a time limit for obtaining biological material at the level of by-laws be fixed. Secondly, genomic registration should begin with explaining to the convicts the purpose of taking the biomaterial, the duties and rights associated with the identification of persons.

4. Every person who was not convicted should be entitled to remove the personal genetic code from the FDGI. We mean a number of people, whose individual sections' DNA information may be available to law enforcement agencies. Such a right should be granted to persons, who made a decision on voluntary genomic registration; victims or witnesses, who underwent molecular genetic examination in order to narrow the circle of suspects; those acquitted by the court; persons released from criminal liability; people whose criminal record was withdrawn or extinguished in accordance with the procedure established by the criminal law.

Based on the tasks of registering genomic information, mainly focused on the formation of a database of potentially dangerous individuals, it is appropriate to be guided by the principle of “tacit refusal” to store relevant information. At the same time, for persons who demonstrate a properly expressed free will, the possibility of preserving their genetic profile in the FDGI should not be excluded.

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## References

- Bednyakov, I. L., & Kubanov, V. V. (2017). Using the results of genomic accounting and registration activities in solving crimes: the current state and prospects for development. *Legal Bulletin of Samara University*, 3(3), 90–93.
- Brown, T. R. (2019). Why We Fear Genetic Informants: Using Genetic Genealogy to Catch Serial Killers. *Columbia Science and Technology Law Review*, 21(1), 114–181.
- Caenazzo, L., Tozzo, P., & Dierickx, K. (2020). New Frontiers and Old Challenges: How to Manage Incidental Findings When Forensic Diagnosis Goes Beyond. *Diagnostics (Basel)*, 10(9), 731.
- Gerasimov, A. M. (2020). *Criminal offense and its elements*. Yurlitinform.
- Kubitovich, S. N. (2018). Biological expertise and registration of genomic information in Russia. *Bulletin of Economic Security*, 1, 72–77.
- Popova, T. V., & Sergeev, A. B. (2017). Federal database of public information in the system of ensuring the balance of private and public interests in criminal proceedings. *Legal science and law-enforcement practice*, 1(39), 132–139.
- Wickenheiser, R. A. (2019). Forensic genealogy, bioethics and the Golden State Killer case. *Forensic Science International: Synergy*, 1, 114–125.
- Williams, R., & Wienroth, M. (2017). Social and ethical aspects of forensic genetics: a critical review. *Forensic Science Review*, 29(2), 145–169.