

*Zhevlakova A.Yu. Innovative Model of Data Processing as a Tool to Improve the Effectiveness of Customs Control*

The research advisers: Stasheuskaya M. P., lecturer; Tochilina A. K., senior lecturer

The modern world is a sort of a big race, and those who can easily adapt and go in pace with the times, win in this race. This affirmation can be applied not only to people, but also to all the states, where these people live. Our world is developing at an incredible speed: every day we hear that in different corners of the world scientists have invented something new and this thing can completely change our view at the phenomenon that they have been researching. Scientific progress has now become part of all spheres of society, it has changed people's thinking and it requires from them new knowledge in a wide variety of areas. What concerns the states today, the solution of two problems is the most significant for the creation of favorable living conditions of citizens: the one is security and the other is increase in incomes. The key role in solving these problems belongs to the customs service in general, and the customs control as its tool, in particular.

According to the Customs Code of the Eurasian Economic Union(hereinafter EAEU), the customs control is a set of actions that customs authorities perform and that are aimed at the control and(or) the enforcement of international treaties and acts in the sphere of customs regulation and the Member States legislation on customs regulation. With the help of customs control customs authorities influence the process of moving goods and vehicles across the customs border in order to ensure compliance with the customs legislation.

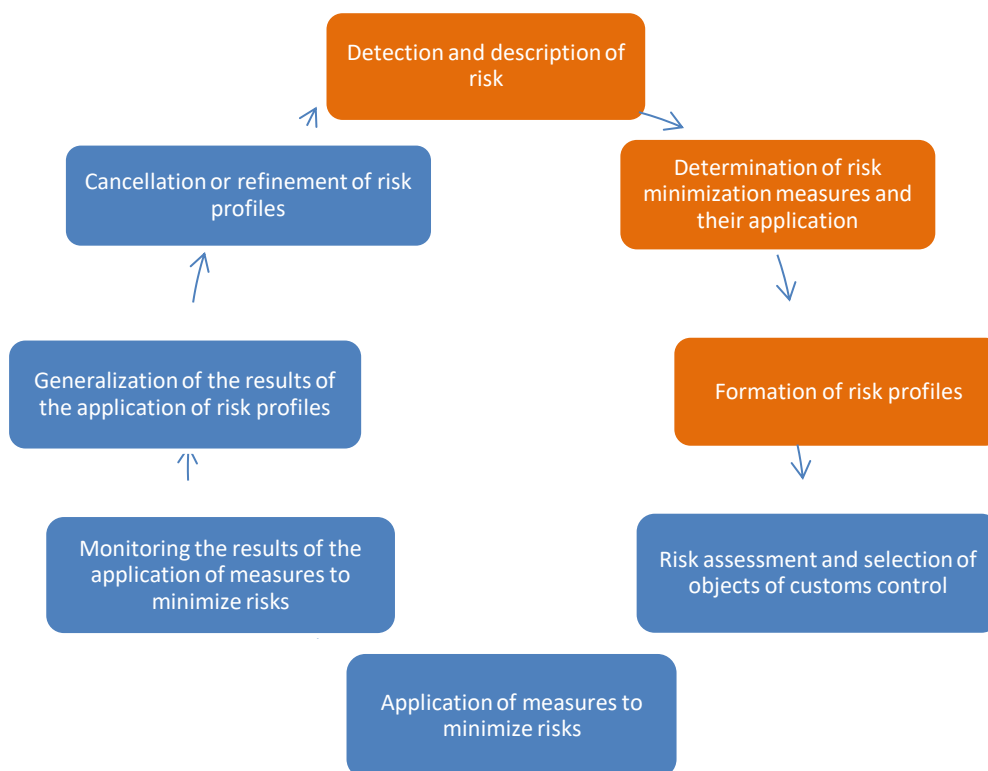
One of the first and the most important stage of customs control is the customs control at the moment when goods arrive at the customs territory or leave this territory. The customs authorities are responsible for carrying out customs control, as well as other types of control, such as phytosanitary, veterinary, automobile and other types. Granting customs authorities the appropriate powers is mainly directed to the simplification of customs control procedures in the places of crossing the customs border.

Customs control, conducted at the moment when goods are placed on the border for a particular customs procedure, plays an important role. This type of control is based on the risk management system. The application of the risk management system allows the customs authorities to identify the objects of customs control and the necessary degree of their examination, and, consequently, forms of customs control.

The main purposes of using it are:

- ensuring the effectiveness of the customs control;
- focusing on the high-risk areas and ensuring the efficient use of customs resources;
- creation of conditions for acceleration and simplification of the movement of goods, for which there was no need to apply measures to minimize risks, across the customs border of the EAEU<sup>21</sup>.

The risk management process is a set of action, which are aimed at minimizing the risk of an adverse event and optimal use of personnel, technical, informational, material, financial and other resources of customs authorities. In the risk management process we can identify two interrelated stages, which, in their turn, comprise a number of activities (Img. 1).



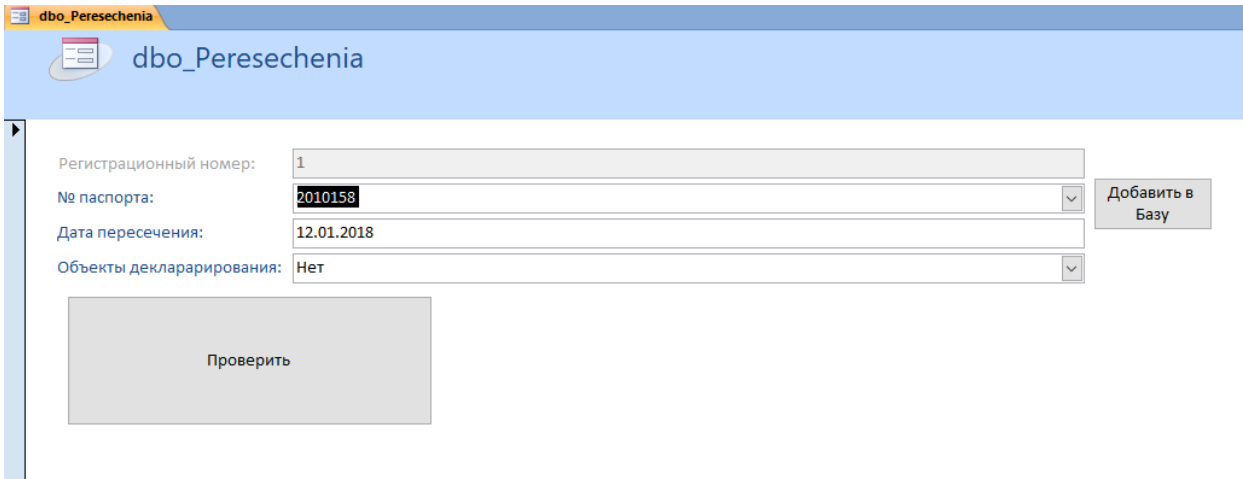
Img. 1. Risk Management Process

The constant increase in international trade turnover, the limited human resources of customs and the desire of foreign economic activities participants to minimize material and time losses calls for the application of modern customs technologies. Today the Unified

<sup>21</sup> Customs Code of the Eurasian Economic Union(Appendix No. 1 to the Agreement on the Customs Code of the Eurasian Economic Union)

Automated Information System operates in the customs authorities of the Republic of Belarus which joins the systems of central and territorial units into a single network.

The following model was created for a more vivid demonstration of the application of the Unified Automated Information System on the example of the operation of the risk management system. SQL Server was chosen as the server and Microsoft Access was chosen as the working environment. This system allows to keep count of the movement of individuals across the customs border, as well as to take an automatic decision in case of necessity for additional control. For this purpose four tables were made up on the Server, and they contain columns to be filled in by customs officials, and also one reference table, data in which had been initially recorded, such as information about offenses and responsibility for them. Through ODBC technology, any user can get connected to the database and operate with it in Access, and all changes made by the users will appear on the server and will be available to other users of the network, but they can't change the structures of the created database or enter some incorrect data. The frequency of movement across the customs border, the availability of committed crimes and objects for declaring was chosen as the criteria for additional control. For examination, just click the Check button in the form (Img. 2) and enter the passport number, if the person is to be checked, his passport number will appear in the results of the request, and if the check column is empty, it means that this person does not fall under the risk profile.



Img. 2. Form of Accounting Movements and Checking Persons

The operation of this database is similar to the risk management system, and the effectiveness of this system and the effectiveness of the use of information technology can be estimated through time and material costs for import and export<sup>22</sup> (Table 1).

Country	Time for export: border and customs control (in hours)	Cost of export: border and customs control (USD)	Time for import: border and customs control (in hours)	Cost of import: border and customs control (USD)
Republic of Belarus	5	108	1	0
Russian Federation	72	665	14	400
Kazakhstan	133	574	2	0
Armenia	39	100	41	100
Kyrgyzstan	20	445	72	512

Table 1. Indicators of Control Effectiveness at the Border of the Countries-participants of theEAEU

Based on the data presented, we can conclude that the Republic of Belarus is the leader among the countries-participants of the EAEU. It is second only to Armenia by the cost of export, but surpasses it in time costs. It is the absolute leader in the cost of import, and the next country is Kazakhstan, which is inferior to Belarus in terms of time.

Thus, it can be said that the use of information technologies significantly increases the efficiency of customs control at the border. The Republic of Belarus has good performance indicators, but it is also a member of the EAEU, therefore, improvement and achievement of the set goals in the field of integration is possible only at an appropriate level of development in other participating countries. That is why the work on the creation, maintenance and development of the integrated information system of the EAEU and a unified risk management system based on efficient and simple data analysis, similar to that implemented in our Database, acquire a special significance today.

<sup>22</sup> Doing Business 2018: Reforming to Create Jobs. URL: <http://www.doingbusiness.org/reports/global-reports/doing-business-2018> (25.01.2018).