

# Harmonizing the Valuation Standards of the EEU Agricultural Companies

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**Abstract:** *One of the goals of the Eurasian Economic Union creation was to strengthen the national economies and boost the opportunities of the member countries on international markets by introducing the rule of “four freedoms” – of the movement of goods, services, finances and the workforce. However, the most pressing issues in the formation and development of the valuation business in the countries are the absence of developed markets, of modern digital information infrastructure, a smoothly working operational system of statistics accumulation and as a consequence, market indicators. The goal of our research is to offer recommendations on how to harmonize valuation standards for EEU agricultural companies’ assets based on the current valuation standards taking into account international experience of developed countries and looking into the future of their further improvement. Our research into the current EEU valuation standards by criteria allowed us to assess the current standards with a large degree of certainty and reveal the negative influence factors. For better effect, we have suggested an algorithm of a unified valuation standard, which combines the best practices of the EEU states and the international professional community. The suggested concept of unified standards of asset valuation is not exhaustive, it can be augmented depending on the special features of agricultural companies.*

**Index Terms:** *agricultural companies, valuation activities, IFRS, industry standards, standardization, emerging countries’ economies.*

## I. INTRODUCTION

As economic ties grow international and assets move around freely, a better harmonization of asset valuation of industrial, retail and agricultural companies from emerging states is necessary to boost the effectiveness of deals with their assets. This is why the development of an integration way for the appraisers’ activities and a consequent harmonization of valuation standards for the countries comprising the EEU (the Republic of Armenia, the Republic

of Belarus, the Republic of Kazakhstan, the Republic of Kyrgyzstan, the Russian Federation and the Republic of Moldova with an observer status) is reasonable. At that, the countries have the key national law covering the appraisal business or temporary requirements, basing on which asset valuation standards are accepted. Practical research by Grigoriev [1] focuses on the current legal acts and norms, which standardize appraisal activities in the EEU countries. At that, the Russian Federation and the Republic of Belarus have the most developed legislative and regulatory base for the appraisal business, they cover a large number of possible property subjects, various types of assets. At the same time, the Republic of Kazakhstan has a standard of asset valuation similar to some federal appraisal standards of the Russian Federation. They include current valuation standards The Project Value of Intellectual Property and Intangible Assets, The Value of Real Estate and The Value of Movables. The Republic of Kyrgyzstan has Temporary Rules of Appraisers and Appraisal Organizations Activities. According to Kasyanenko [2], this fact slows Kyrgyzstan down in the development of the appraiser business as compared with the other EEU states, making the process of appraisal standard harmonization for the states difficult. At the same time, formation of the legislative base for the appraiser business in the Republic of Kyrgyzstan is going on actively. We should note the imperfections of the appraiser business standardization in the Republic of Armenia, where a law and a standard regulate only valuation of property. According to Trifonov [3], this fact is insufficient for effective regulation of the appraisal activities in the country.

On the whole, conditions of establishment of the appraisal activities in the emerging EEU countries are conspicuous for the absence of developed markets (industrial, wholesale, agricultural), of a modern digital information infrastructure, of an operational system of statistics accumulation and as a consequence, the absence of market indicators. Such conditions mean that appraisals can only be subjective based on appraisers’ judgement. According to Bartley [4], it is only a developed market, information infrastructure and a system of statistics accumulation that make the appraisal activities an objective process of statistical observation, which become a good basis for a proper valuation of assets.

We should note that since market relations started forming on the Eurasian space at the end of the XXth century, the appraisal activity was not attached to any special type of assets, but developed as a universal kind of economic measurement.

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This was dictated by the need to cover many economic phenomena – for privatization deals, for deals with state municipal assets, appraisals for accounting and taxation purposes, for publicly traded securities. Such multifaceted targets mean a wide range of appraised property [5]. Besides, appraisers' standards and temporary rules may contain or not chapters devoted to industry specifics, for example, assets of agricultural companies. For instance, Alborov [6] notes that agricultural organizations have various specific features, which have to be included in valuations, because specific industries have objects typical only of specific activities. At that, agricultural companies can be represented by a wide range of activities, which appraisers should take into consideration while making professional judgement and making decisions, for example, crop farms, dairy farms, forestries, cattle farms, fish farms, pastures and other specialized types of operations. Different conditions of operations, industry specifics translate into the need to consider valuation of agricultural companies not like other firms. But according to Christopher [7], some discrepancies in the EEU appraisal business standardization legislation mean there is a need for harmonization of both appraisal legislation and the standards for asset valuation. An effective harmonization form for asset valuation standards is development and introduction of a system of unified standards for the member states. At that, harmonization of asset valuation standards of the countries will help us achieve functional balance of enactments in the appraisal business, ensure the level of balancing, which will help the legislative system in this area in all the EEU countries to function and develop in one direction. In the opinion of Valencia [8], a system of unified standards for the Eurasian Economic Union asset valuation should have a clear hierarchic structure, including for agricultural companies. This is why the key goal of our research is to provide recommendations on how to harmonize asset valuation standards for agricultural companies of the EEU taking analysis of the current appraisal standards as the basis and incorporating in it international expertise of developed nations as well as researching the way of their further improvement.

## II. PROPOSED METHODOLOGY

### A. A research of specifics of international regulation of appraisal activities

We should discuss international experience of the appraisal business regulation to assess the current appraisal standards in the EEU countries. The current international and European appraisal standards are a product of globalization. Specialists Alnodel [9], Trifonov [3], Ekimova [10] note that the standards were developed taking experience of national appraisal standards, primarily American and British, as the basis. In particular, the methodological basis of appraisal activities standardization in the world are the International Valuation Standards, which are developed and issued by the International Valuation Standards Council (henceforth IVSC), which unites public organizations of appraisers of Europe and America (according to IVSC's data for 2018 it consists of 74 members from 54 states). The professional valuation business in developed countries was founded in the

1940s, while the International Valuation Standards Committee was set up in 1981. Globalization of international business is one of the main pillars of consolidation of valuation activities of appraisers from different states and creation of a system of unified valuation standards. At that, the International Valuation Standards Council unites several leading international valuation experts. In particular, the current activities of the council are supported by BNP Paribas, Deloitte, Duff & Phelps, Ernst&Young, Grant Thornton, Houlihan Lokey, KPMG, the Appraisers Association of America, founded by the Appraisal Foundation, the Chinese Appraisers' Society, etc.

At that, the International Valuation Standards Council has a lot of weight with the international political elite. Thus, in 2011, the Big Twenty included the council into the target group to prepare a report on economic stability on international capital markets, which *focused on harmonization of international financial reporting, audit, valuation, insurance, corporate management* [11]. *We should note that the new edition of International Valuation Standards, according to Ryska* [12], *paid more attention to procedural issues of doing valuation (procedural standards), than methodological issues (methodological standards).*

Along with the International Valuation Standards Council we can mention the European Group of Valuers' Associations (henceforth TEGOVA), which, according to 2018 information, consists of 72 valuers' associations from 37 countries representing over 70 000 appraisers in Europe (including the Russian Federation). Creation of this European Group of Valuers' Associations was mainly preconditioned by integration in Europe and foundation of the European Union. We agree with Carnevale [13] that now is the time when similar integration processes in another region triggered creation of the Eurasian Economic Union and naturally financial integration, including integration in valuation activities on the common space. At that, the European Group of Valuers' Associations issues European valuation standards. The standards are meant for appraisers and their clients and are a guidance setting the lowest allowed quality of appraisals. The standards are not obligatory, they are recommendations. They are used to develop national valuation standards of the European Union member states. The contents and structure of the European valuation standards differ from the contents and structure of International Valuation Standards – they are more detailed and sizable [14]. If there are situations during practical appraisals, which are not covered by the European valuation standards (for instance, valuation with the aim of taxation or valuation during forced sale), general valuation principles described in the standards are applied. Besides, valuation standards can be used for legal protection of appraisers [9]. The refusal to use the standards in some cases are justified by special circumstances, which are mentioned in valuation agreements and reports about valuations. At the same time, the European valuation standards have the following specific features:



- variety of valuation standards. One standard, like the eighth standard, deals with valuation of investment in securities on the one hand, and on the other with valuers' qualifications (we suppose that qualification issues should be deliberated in one professional standard, which should be regularly improved);

- duplication of material in different standards and methodical recommendations, for example, the requirements for a valuation report are presented both in the fourth and the ninth valuation standard (we believe that variety of some valuation standards and duplication of the same material in different standards make their use difficult in practical appraisal).

We should note that apart from international and European valuation standards, the U.S. valuation standards are most important internationally. Practice of valuation business in the U.S. uses the appraisal standards issued by the American Society of Appraisers (henceforth ASA) widely. At that, the key function of the ASA is the development, publication, clarification and amendment of the Uniform Standards of Professional Appraisal (USPAP) aimed at practicing appraisers and consumers of valuation services. The standards are also used by the federal and regional governments and private organizations. The valuation fund amends and clarifies the standards on an annual basis. The standards are obligatory for practicing appraisers in the U.S. The valuation fund publishes the standards on an annual basis tracking all the changes introduced in the year. Additionally, to make information full and consistent, this edition contains Consultant's Conclusions adopted by the Valuation Fund as well as a subject index. These information materials create Other Information provided by the Valuation Fund only as a general guidance and do not make part of the USPAP.

At the same time, along with the Uniform Standards of Professional Appraisal approved by the Valuation Fund, the U.S. has other valuation standards approved by various public professional organizations of appraisers. The American valuation standards are conspicuous for a certain degree of duplication (for example, in valuation of a business). It is legislation of each state that regulate valuation activity, and it differs from state to state. According to Halonen [15], this fact makes asset appraisers' work and deals between different American states more difficult.

Along with the U.S. valuation standards, the British valuation standards are internationally acknowledged. Britain regulates valuation activities basing on the standards developed by the Royal Institution of Chartered Surveyors (this is an association of property specialists). Our research revealed that the valuation standards mainly cover procedural issues. They practically omit methodological questions because this is an area, where responsibility lies fully on professional valuers. We think it is important to note that Britain has no state regulation of the appraisal business. Any specialist, who is a member of a public valuers' organization, can do valuations, unlike in the auditors' and architectural

business, where activities are licensed by the government [16]. Appraisers' work is successfully regulated by professional communities with the key society being the Royal Institution of Chartered Surveyors (RICS). We should note that the use of the standards is obligatory for British appraisers. An appraiser can sometimes deviate from the standards, but only rarely, in very special cases, when they cannot be followed. If experts believe that arguments for deviating from the standards in a valuation report are weak, the appraiser will bear disciplinary penalties, including withdrawal of membership in the professional community. In some cases, when a client insists on the deviations, such a report can be used only for inner consumption, but cannot be published openly or presented at court [2].

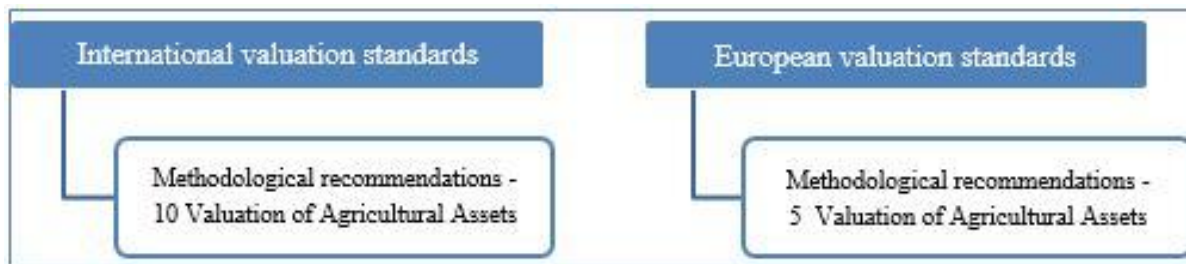
Thus, we can state that international regulation of the appraiser business varies. However, the widely acknowledged valuation standards should become similar now or in the future in their contents and in structure thanks to economic globalization.

### B. Algorithm

Our research is not aimed at doing a comparative study of the structure of international, European or other valuation standards acknowledged internationally, but, we should note that some valuation standards include the standards or methodological recommendations on the most widely used objects. For instance, property, investment in securities, valuation for the purposes of financial reporting's, historical buildings as well as agricultural companies. The facilities used by the agricultural business for production of food and consumer goods are a valuable economic asset, and sometimes the only economic basis for some regions. For valuation purposes, we can break agricultural companies into the following large categories:

- plant growing farms;
- vegetable farms;
- dairy farms;
- poultry farms;
- fish farms;
- race horse breeding farms;
- other specialized animal breeding plants;
- seed farms;
- forestry' s or timberlands;
- cattle breeding pasture farms;
- other specialized agricultural categories, including their combinations.

This is why the assets and structure of agricultural organizations can vary and be difficult to value. Apart from being a commercial enterprise, agricultural organizations can have a strategic importance in provision of food to the country and the regions. Difficulties in approaching the task, special terminology explain the existence of special chapters for evaluation of agricultural companies (Fig. 1).



**Fig. 1: Special features of regulation of agricultural companies valuation in valuers' standards (compiled using the data of the current International Valuation Standards and European Valuation Standards)**

Thus, our review of the current international, European, American and British asset valuation standards allows us to formulate the following:

1. international valuation practice in developed states is based on the International Valuation Standards Council (IVSC), which can be the guidance for creation of asset valuation standards in the EEU states;
2. appraisal activities under international valuation standards is seen as professional activity in public interest rather than entrepreneurial activity in personal interest;
3. important feature of the development and introduction of valuation standards is their comprehensive discussion by the professional valuation community. This, in its turn, will help accept high quality valuation standards, which will not be questioned and accepted by all the appraisers voluntarily;
4. international and European standards carry methodological recommendations on special features of valuation of agricultural companies, which should be taken into account when creating asset valuation standards in the EEU member states.

### **C. Research of EEU regulations of the asset valuation business**

As mid-term economic relations between the EEU member states are formed, they need uniform mechanisms for the valuation business as well as legislation synchronization. Since the appraiser business historically recovered under the influence of the British-American asset valuation methodology, which dominated internationally, the IVSC key notions and methodology were reflected in the regulatory basis. At that, the valuation business has not existed for long in the EEU member states. However, Russia, Belarus and Kazakhstan can now boast a wide basis, which is modified and amended depending on the internal and external situation in the country. At that, Armenia and Kyrgyzstan have a smaller legislative valuation basis, which can be a positive factor since it allows the government to create new legislative acts for the valuation business, which would meet the requirements of the EEU common market. We should note that the Russian methodology of appraisals for agriculture is regulated by different directly applicable documents, including the Land Code of the Russian Federation and the Forest Code of the Russian Federation, which regulate relations in the area of valuation of land plots and the cadastral value. The Tax Code regulates the valuation business for taxation purposes, while the Administrative and Criminal Codes of the Russian Federation regulate the responsibility of the appraisers. At the same time, the current

Russian asset valuation system is contradictory, and has to be systematized in the sphere of federal standards, their compatibility between themselves and the current legal and normative documents as well as harmonization with the standards of the other EEU states. Apart from legislation, which regulates the appraisal business, valuers pay special attention to the legislation regulating the property right and other real rights for some assets. The core of such legislation is the Civil Code of the Russian Federation, other legislative and normative acts, including those covering privatization, bankruptcy, rent, collateral, mortgage, etc. Appraisers should be guided by the standards of appraisal. Along with the valuation standards approved by orders of the Ministry of Economic Development and Trade, Russian appraisers can be guided by international and European valuation standards in the situations, which are not covered by the Russian valuation standards. At the same time, further research of the mid-term future of valuation activities standardization should be aimed at increasing the number as well as at improving the quality of asset valuation standards. This is why we see priority in the improvement of the legal and normative framework for setting and contesting of the cadastral asset value as the state entities setting the property cadaster are established taking into account international experience and the needs of the Russian agricultural market as it integrates into the regional EEU economy. In its turn, the legal basis of asset valuation standardization in the Republic of Armenia is regulated by a law, which regulates valuation of buildings and constructions, of land and residential real estate. Property valuation in the Republic of Armenia is also regulated by the Civil Code, the Land Code, which regulates land valuation. Besides the aforementioned real estate valuation standard, there are no other valuation standards, which slows down the development of this industry in the country and represents a significant drawback of Armenia's appraisal legislation. We should note that the legal basis of valuation activity standardization in Belarus is set by presidential decree On the Appraisal Activities in the Republic of Belarus, which says that the president of the Republic of Belarus sets the state policy in the appraisal business in the country. It also defines the authority of the State Property Committee and other government entities, which regulate appraisal activities.

The law sets the objects of civil rights liable for valuation, valuation methods, the appraisal basis, the list of documents, which are to be presented to the client after valuation, the requirements to the documents, the rights and obligations of the valuer, liabilities of the appraiser for the losses incurred during valuation as well as requirements to valuers.

In its turn, the legal basis of valuation activities standardization in Kazakhstan is set by law On the Valuation Activities in the Republic of Kazakhstan, which mainly aims at regulating the relations occurring while doing appraisals with the aim of defining market or other asset value as well as at setting the rights and obligations of valuation subjects and other relations. Later the rules setting the appraisal requirements, its approaches and methods, content and form used for valuations were approved. At the same time, Kazakhstan as well as Russia is conspicuous for its mixture of 'the appraiser' notion. For instance, the law says that an appraiser can be both a company and a person. In most countries of the world, an appraiser is a company. However, law allows a company to participate in one Chamber of Appraisers, while a person, who works in the appraising company, can be a member of another chamber. Thus, control over the quality of valuation can be done by both Chambers of Appraisers. There are also other legal controversies calling for improvement of its current form taking international experience into account.

At the same time, a research of content and procedure of standards approval in the EEU states allows us to state the following with a high degree of probability:

1. a lot of controversial positions, which made appraisers' work more difficult and thus require improvement were introduced due to the lack of a wide public discussion of draft standards and deviation from proposals put forward by valuers;

2. the absence of a state concept of a unified standardization system as well as a strategic plan of its implementation.

For example, the legal basis of valuation activities standardization on the Republic of Kyrgyzstan is characterized by the absence of a regulating law. Temporary provisions for appraisers' and appraiser organizations' activities, which give definitions of the terms of valuers' activities, the terms and order of doing valuations, the rights and obligations of a valuer as well as cases when independent valuation is prohibited, have been in force since 2003. The rules set appraisers' and appraiser organizations' responsibility as well as the order of appraisers' and appraiser organizations registration on the territory of the country.

It should be noted that many EEU states also make part of the Commonwealth of Independent States (further the CIS). An international technical standardization committee Appraiser Activities (ITSC 520) was created from the members of the Council of the CIS Appraisers as a mechanism to create regional valuation standards. After the international organization was renamed into the Council of the Eurasian Appraisers in 2011 a final name of the standards it developed was accepted – the Eurasian Valuation Standards (EVS). The first and only edition of the Eurasian Valuation Standards was presented in June 2014 during an International

Appraisers of Eurasia in the Belovezha forest. According to many specialists, including Trifonov [3], the standards are of a unified character and have a purely framework character. At that, the standards only have three chapters:

1. the Ethics Code based on professional ethics of a valuer of the Council for International Valuation Standards;

2. the kind of value and valuation carried out under the standard requirements (it should be done by honest and competent professional valuers free from bias or self-interest, the final documents should be transparent, not misleading and should reveal the aspects important for due understanding of valuation;

3. the final valuation document.

Thus, the research of the valuation objects standardization in the EEU member states allows us to note that the standards are only of a framework character for the key basic characteristics of the valuation process, in particular, the types of value and the order of compilation of the final appraiser's document. The structure and content of the standards do not enable us to speak of unified approaches not only to the basic characteristics, but also of special features of the asset valuation industry. Thus, at the very beginning of the EEU asset value standardization harmonization a question arises which approach to the description of standards should be chosen – a framework or detailed approach. Since the framework approach means only standardization of the framework (the basic parameters of the key objects, things and processes of asset valuation). In its turn, a detailed approach, apart from the key valuation parameters, includes standardization of a wide range of other parameters, like all asset types, industry specifics, the specifics of their valuation, different kinds of valuation, a wide range of asset value types, etc.

At the same time practical asset valuation experience presupposes, in our view, that a framework description should be done at the very beginning of asset valuation standards harmonization, which should be ensued by detailed description in the Methodological Description and Comments. As years go by, the EEU appraisers will begin working under the framework standards, and, most important, master the asset valuation methods. Consequently, taking the E.C. states' experience into account, we can go into deeper detail of the framework standards and introduce a detailed approach towards asset valuation standardization [17].

We should note that the appraiser activity, while being an integral part of the modern EEU states' market, is of a special importance for its participants. Since valuations of an asset can be used very widely (from the purchase and sales contracts to taxation of an asset depending on its cadaster value), it is important that the EEU forms a legislative basis, which would allow its member states to improve transparency and the process of valuation, which results in an asset valuation. Consequently, all the EEU states should form a unified legal basis of asset valuation. The outstanding economic and legal problems in asset valuation standard harmonization among the EEU states include the following:

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1. different macroeconomic environment;
2. different levels of elaboration of the legal basis, which regulates the appraiser business, different valuation standards, their different numbers;
3. definition differences;
4. differing views of specialists on the approaches towards harmonization of valuation standards.

### III. RESULT ANALYSIS

The state regulating valuation documents or the temporary rules of the EEU states, the latest edition of the Eurasian valuation standards lack some standards or methodological recommendations on the specifics of agricultural companies' valuation. Nevertheless, professional communities, such as, for instance, the Russian Appraisers' Society, has defined the valuation standards for agricultural property. It has developed a corpus of valuation standards (further CVS) and methodological recommendations (further MR), which can be used both on the territory of the Russian Federation and in the EEU member states. The CVS standards were worked out in full compliance with the Federal valuation standards of the Russian Federation and contain both the order of federal standards and the methodological recommendations for individual industries. In particular, MR – 10 is Valuation of agricultural property. On the whole, MR-10 has recommendations on valuation of individual types of assets, which can be classified as follows:

- land;
- structural improvements;
- machines and equipment attached to the land;
- machines and equipment not attached to the land;
- biological assets attached to the land;
- biological assets not attached to the land.

In our opinion, the range of agricultural objects is not full and does not provide for many specific objects, the professional judgement on which can be controversial.

When presenting professional valuation opinion one should keep in mind the goal of valuation. It can be valuation for collateral purposes, taxation or other ends. International valuation practice singles out valuation for the purpose of financial reporting, for example, under International Financial Reporting Standards (further IFRS) into an individual direction. Thus we can observe a trend of narrowing the gap between valuation standards and valuation for the purpose of IFRS reporting. This valuation direction is one of the newest and undeveloped in the EEU states [18], while in the EC states valuation for the purpose of financial reporting is everyday practice. At that, it is important to note that on the one hand, an IFRS report is not meant to value the reporting company [19]. At the same time, an IFRS report contains information helping the existing and potential investors and other creditors value the reporting company and its parts.

Thus, agricultural assets for the purpose of valuation when compiling a financial report under International Financial Reporting Standards should be identified and classified correctly. At the same time, unification of approaches towards classification of specific agricultural objects guarantees similarity of their identification in financial reporting, but is no guarantee of similarity of their valuation. Consequently,

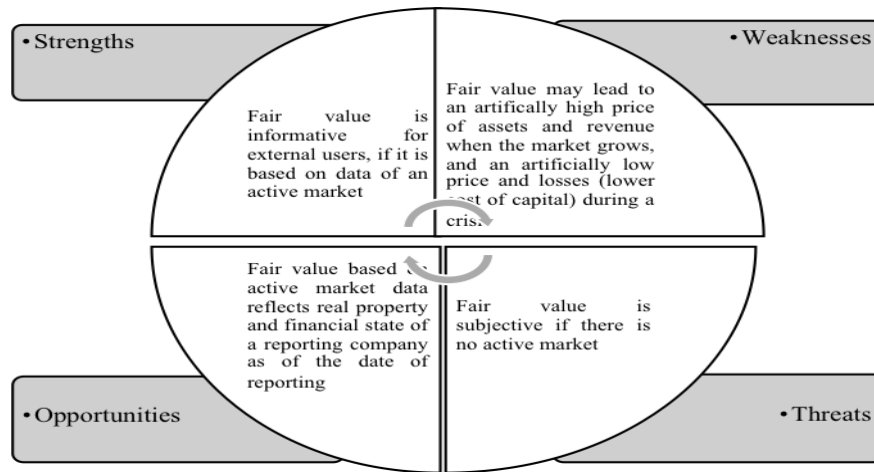
identification of the valuation object is of the utmost importance for an appraiser, because different classifications require different valuation models. In particular, agricultural lands can be identified as fixed assets or as investment property. In this case, the valuation model should be chosen in accordance with IFRS 16 Fixed Assets or IFRS 40 Investment Property. Orchard crops can also be classified as fixed assets, but the produce of such crops at the moment of harvesting will become agricultural goods and is to be valued in accordance with IFRS 41 Agriculture. Valuation of non-material assets connected with agricultural activities of the producer should be done under model IFRS 38 Non-Material Assets.

We should note that special valuation objects typical of agricultural operations are biological assets (excluding orchard crops) during harvesting, whose valuation is regulated by IFRS 41 Agriculture. Since biological assets and agricultural products are assets, their valuation as such is only possible if they meet recognition criteria. This means that the objects are received as a result of past events and are controlled by the company, which expects to derive an economic profit from, while a fair value or an initial value of the asset can be valued reliably.

One should take agricultural assets' specifics into account while valuing them. First of all, biological assets can change (they can be transformed biologically). At that, management of the changes include creation and maintenance of necessary conditions for normal biological changes. In fact, management of the changes, which facilitate biotransformation, is the conspicuous feature of agricultural operations.

Various valuations are used depending on classification of an object and the valuation model in the accounting policies (if the choice can vary) to value assets for the purpose of presenting information in financial reporting. One of the common valuation types is valuation by fair value (for agricultural goods received from biological assets at the moment of harvesting and biological assets at their initial recognition and as of the date of the end of each reporting period – fair value less sales costs). Under the Continuously Contemporary Accounting methods, according to Chambers [20], the generalized exit price measured by the prices of an organized market, a fair value became one of the most disputed issues. Setting the fair value has been tested in practice, which triggered further development of the concept, from the moment international reporting standards appeared in 1973. At that, British scientists S. Fearnley and S. Sunder noted the drawbacks of the fair value model during a crisis and high inflation time [21]. In the interpretation of 2011, the fair value definition is also criticized by hierarchy and the use of observed and unobserved information Cantrell [22]. In his turn, Bozzolan [23] in his research discusses the order of classification and valuation of biological and fixed assets, while Lapointe-Antunes [18] turns to the practical use of these assets valuation in his works. In particular, Zack (2011) noted multiple possibilities of fair value manipulation. Our SWOT analysis of the current use of fair value is presented in Figure 2.

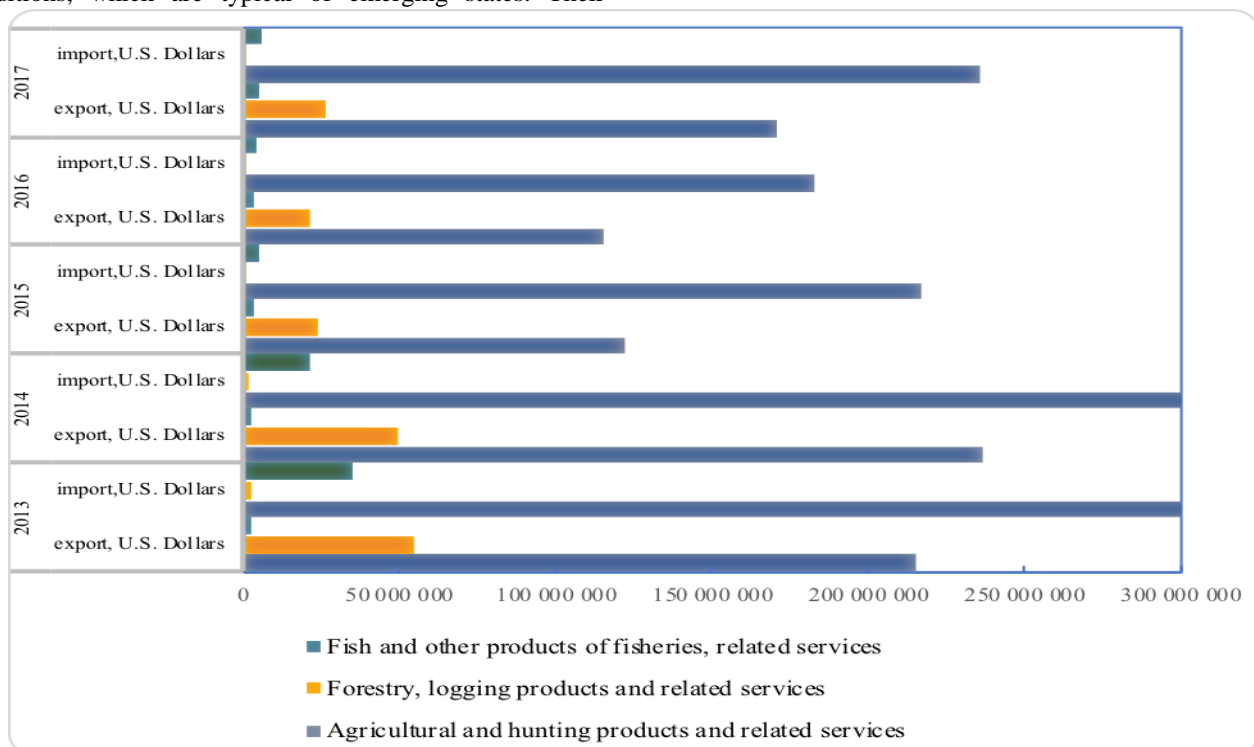




**Fig. 2:** SWOT analysis of the current situation of the fair value use by agricultural companies in the EEU countries (compiled using the data of IFRS reporting provided by the Eurasian Development bank <https://eabr.org/analytics> and analytical information <https://www.e-disclosure.ru>)

To research the principles of choosing the model to assess fair value of biological assets and agricultural goods we have studied a number of leading agricultural enterprises, which operate in the EEU states. We should note that while valuing biological assets and agricultural goods at harvesting, we should base valuation on the observability of feed data. Financial reporting users prefer asset valuation without adjustments to the active market as of the reporting date. However, the EEU countries work in different economic conditions, which are typical of emerging states. Their

economies are especially sensitive to price fluctuations for oil and gas. Taxation, currency and customs legislation of the EEU states is still developing, it changes frequently and can be interpreted differently. The continuing political tensions as well as persisting international sanctions against some companies and people have a negative influence on the market development as a whole. This statement was confirmed by Rosstat statistics on foreign trade between the EEU countries in 2013-2017 (Fig. 3).



**Fig. 3:** Relation between exports/imports of agricultural, forest and fish products to the total volume of trade between the EEU countries

Combination of the factors triggered an economic decline with a fall in all the key groups of agricultural products in trade with third countries. This economic environment, according to Silvio [24], is of a significant impact on the activities and financial standing of agricultural companies of the EEU. At that, the future consequences of the current economic situation are hard to predict, and the expectations and estimates produced with the introduction of a subjective professional judgement [21] can differ from the results. Besides, the risks, which have to be taken into consideration during valuation, are:

1. weather, which influences the yield and the quality of products and objects of biotransformation;
2. the risk of decay of biological assets as a result of an unfavourable epizootic situation.

We should keep in mind that as a rule agricultural companies are insured against their specific risks. According to Besten [25], IFRS 13 Fair Value Estimation covers various valuation methods suitable for different situations, for which data for a fair value estimate is available. It is also allows for the best use of relevant observed feed data and minimizes the use of unobserved feed data. The methods meeting the requirements of one or several approaches can be used for calculating the fair value of a company: a market approach, a cost approach, a revenue approach forming the valuation methodology typical of a company. Our research of the reporting helped us to formulate the following: when calculating a fair value, the agricultural companies develop their own valuation methods, which as a rule include adjustments typical of each company. This statement, according to Hinke [26], is of a key character, because an estimate of a fair value with the use of observed feed data calls for the use of significant judgement of future prices and other assumptions used in a company model. At that, the assumptions, to which the valuation models are especially sensitive and which can lead to significant valuation mistakes with a great degree of probability, are adjusted to:

- the future sales price;
- the expected profit;
- the coefficient of an expected death rate;
- the coefficient of evisceration (the loss of weight at evisceration);
- the coefficient of rejections;
- the coefficient of expected shortfalls, etc.

although there are quotes for many biological assets and agricultural products under estimation, the conditions of functioning of researched agricultural companies require additional steps from professional appraisers. Professional judgement is a significant factor for the valuation methodology in each case and the result occupies a corresponding place in the generalized hierarchy of fair value (Table 1).

**Table 1:** Hierarchical distribution of fair value of biological assets and agricultural products under IFRS reporting accepted in the EEU

Types of biological assets	Hierarchic levels of fair
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and agricultural products	value		
	1	2	3
Lake trout and salmon	-	-	+
Pedigree horses	-	-	+
Poultry	-	-	+
Marketable piglets and pigs	-	-	+
Pedigree piglets	-	-	+
Replacements	-	-	+
Breeding sows and male pigs	-	-	+
Cows	-	-	+
Sugar beets	-	+	-
Barley	-	+	-
Sunflower	-	+	-
Corn	-	+	-
Soy beans	-	+	-
Winter crops	-	-	+

*\*compiled with IFRS reporting data provided by the Eurasian Development Bank <https://eabr.org/analytics> and analytical information <https://www.e-disclosure.ru>*

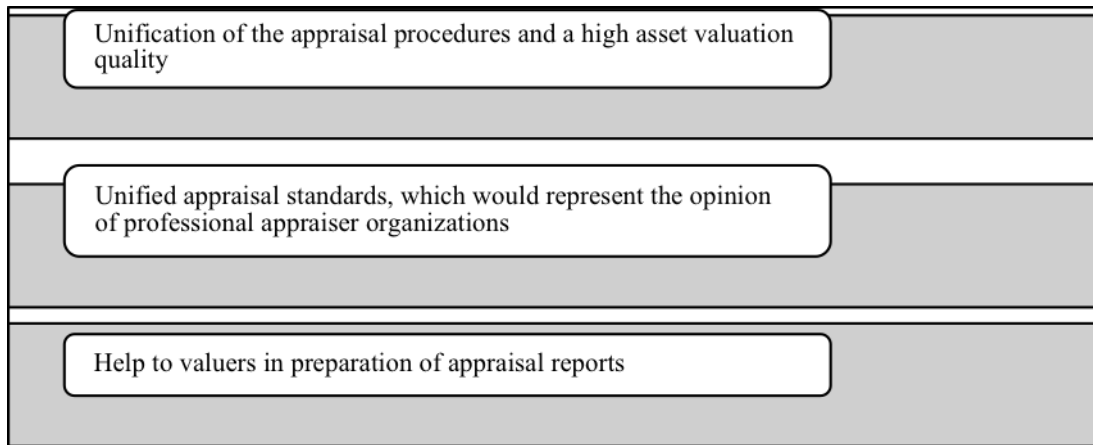
Our research revealed that agricultural companies of the EEU apply different valuation models to the same agricultural products and biological assets, which means that their financial indicators cannot be compared. Consequently, we believe that unified approaches towards valuations and assumptions within an acceptable range should be developed.

## V. CONCLUSION

Our research of the current appraisal standards in the EEU countries by criteria did not allow us to state with due confidence which country standards are the best and the fullest. This is why unified appraisal standards, which would include the best practices of the EEU states as well as the international professional community, should be elaborated for the best effect. Thus, the use of the appraisal standards in the EEU states can become the basis for the development and introduction of a unified Concept of Asset Valuation Standards (further the AVC EEU Concept) for the whole Eurasian space under the following principle (Fig. 4).







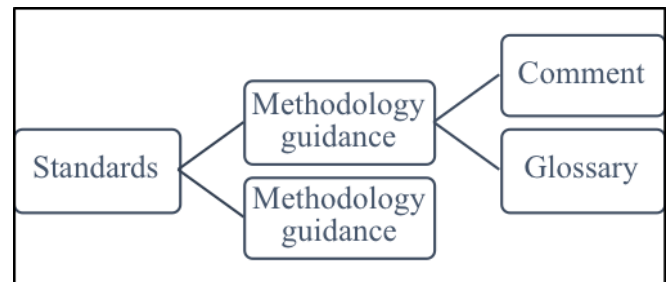
**Fig. 4: The most important strategic goals of the Concept of Asset Valuation Standards of the EEU states**

The key goal of the unified asset valuation standards is to become the methodological basis for elaboration and development of asset appraisal standards in the countries of the Eurasian Economic Union, including the standards of public self-regulated appraiser organizations. The Eurasian appraisal standards are of a theoretical as well as practical value, because they can change, be amended, interpreted, augmented with comment, methodological guidance's, which are meant for the appeasers, the consumers of the appraiser services as well as for the courts and state authorities of the EEU states, which regulate the appraiser services market.

The AVC EEU concept structure we suggest reflects content and interrelations of the appraiser standards. Each appraisal standard has its own goals, aims, the spheres of use and essential provisions modelling this or that area of asset valuation. When deciding on content of each standard, one should be guided by the valuation methodology of the asset, the principles of systemic approach, and the analysis of judgement-based processes results, which are modelled in the standards. At that the social and economic conditions of an EEU state is taken into consideration. At that, the main goal of the Concept is to ensure the quality of asset valuation for the whole of the EEU, which would reflect the goal of the whole valuation system standards. While designing the structure of AVC EEU Concept the following issues are solved:

1. definition of a standardization object;
2. definition of connections between the standards of the system;
3. uncovering the conditions of using the standard;
4. uncovering the conditions of the whole system of the unified standards functioning and development of measures of its improvement.

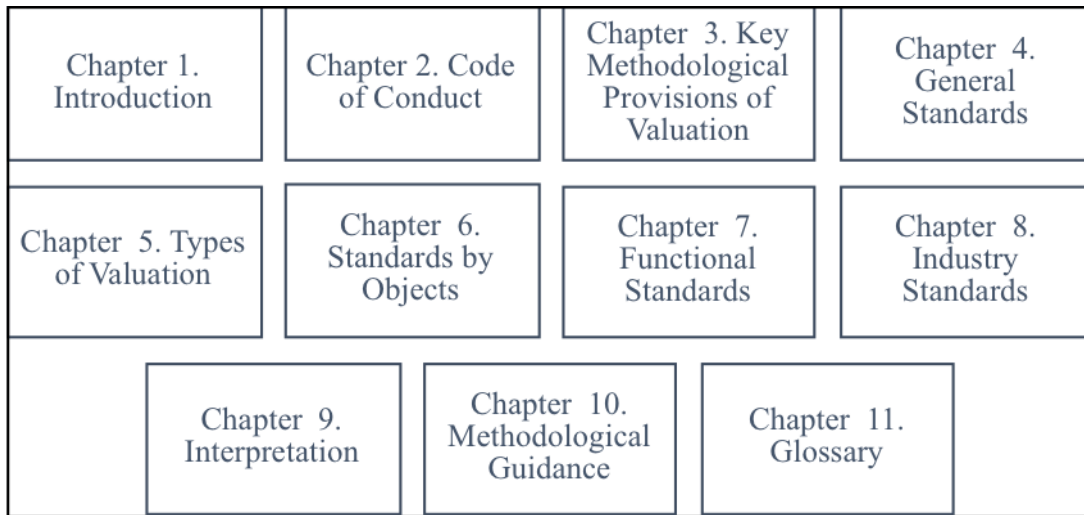
The general algorithm of interaction of the AVC EEU Concept is presented in Fig. 5.



**Fig. 5: Algorithm of interaction of the AVC EEU Concept**

In its turn, the hierarchical structure of the AVC EEU Concept is detailed in the unified standards of asset valuation in the EEU countries in Fig. 6.

## Harmonizing the Valuation Standards of the EEU Agricultural Companies



**Fig. 6:** Hierarchical structure of the AVC EEU Concept

In their turn, provisions of Chapter 8 Industry Standards should contain the following categories for agriculture:

- Valuation of agricultural plots;
- Valuation of productive agricultural lands;
- Valuation of productive fallow lands;
- Valuation of unproductive lands;
- Valuation of land under buildings;
- Valuation of divided property rights for land;
- Valuation of biological assets, including valuation of biological assets for the purpose of financial reporting;
- Valuation of productive and plow cattle;
- Valuation of marketable farm animals;
- Valuation of functional depreciation of dairy herds;
- Valuation of perennial plantings;
- Valuation of plant growing buildings and facilities;
- Valuation of cattle-breeding buildings and facilities;
- Valuation of silo and storage facilities;
- Valuation of grain processing companies, animal feed mills and seed treatment plants;
- Valuation of agricultural warehouses and facilities;
- Valuation of agricultural machines buildings;
- Valuation of agricultural power and telecommunication buildings and facilities;
- The economic lifespan of agricultural assets.

The AVC EEU Concept of unified asset valuation standards is not exhaustive, it can be augmented. Our monitoring shows that the appearance of standards at different times is the result of various factors, for example, an urgent practical need in a standard, attention to the problem from the state, a chance for professional appraisers to formulate and promote a valuation standard. Combination of these and other factors and interests produce new tasks for valuations. Of course, there are cases of international integration between appraisers from different countries. For example, the International Valuation Standards Council and the European Group of Valuers' Association (TEGOVA), which are alliances based on membership in regional public appraisers' organizations declaring the same ethic and professional valuation principles. Their goal is the use of unified standards of appraisers' activities based on a unified methodological

basis of asset valuation and unified requirements of practical appraisal. The key drawback of the associations is that the standards they develop are merely recommendations and the failure to use them does not entail significant punishment, meaning their effect is reduced. This is why we suggest setting up a system of unified valuation standards, which would be recommendations in the first five years, and become obligatory for the use in all the countries of the Eurasia later. The advisory nature of the standards in the first five years will help adopt the standards to local appraiser conditions, including adaptation of local valuation legislation.

Since the EEU develops further, harmonization of legislation, including valuation standards are seen not as a distant future, but as a necessary and imminent reality. The need for integration of the EEU valuers became urgent right after the creation of the union and this integration, as we showed above, is already taking place. However, for the appraisers of different states to speak the same professional language while striking deals on different markets on the territory of the economic union, the EEU country members have to unify their legislation soon.

This is why the development of asset valuation standards on the Eurasian economic space is possible in the mid-term in the following directions:

1. setting the priority development directions for valuation activities on the Eurasian economic space and forming proposals on the issues of regional policy devoted to valuers' operations, including on the basis of international regulation experience in the industry, experience of national and international professional organizations, representatives of science and pedagogues;
2. a faster forming of the methodological basis for the valuers' work on the Eurasian economic space based on unified asset valuation standards taking international experience into account by the national government bodies, which regulate the valuation business;

3. constant analysis of the established practice in applying legislation in standardization of appraiser activities, elaboration of recommendations to improve it as well as changes and amendments of the regulatory basis of the valuation business based on the analysis.
4. widening the standards of industry specific appraisal, including agricultural organizations, and introduction into valuers' practice of interpretations, i.e. how problematic appraisals were solved in practice (as a rule, such appraisals are of industry character).

Thus, unyielding attention and consistent work to standardize the appraising activities on the part of the government bodies and public appraisers' organizations of the EEU countries will help generalize, systematize and disseminate positive asset value experience among the appraisers of the EEU countries helping improve their qualifications and the quality of valuers' services in the industry significantly.

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