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# **Maintaining Cadastral Valuation for the Effective Use of Agricultural Lands of the Fergana Region**

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**ABSTRACT:** Cadastral stages valuation of agricultural land. Cadastral valuation of agricultural land involves the calculation of integral indicators for soil fertility, technological properties and location to determine on their basis the estimated rental income and cadastral value of agricultural lands. The location of the appraisal object is characterized by an equivalent distance indicator, determined taking into account the distance from the points of sale of agricultural products and supply bases with material and technical resources, as well as transport conditions of freighting.

**KEYWORDS:** Cadastre, land and cadastral (registration) book, land fund, land balance, objects of assessment, arable land, haymaking, pasture, fallow, field agricultural land.

## **I. INTRODUCTION**

The main land-cadastral document of the district is the state land-cadastral book. The reporting document of the land cadastral is the land balance of the district, which covers the whole land fund, including the lands of cities of district subordination and towns of urban type. The annual final balance shows the availability and distribution of the area 's agricultural land by land category, land user and land.[1]

First fall, quality accounting and cadastral land assessment are carried out to:

- Determination of land use efficiency taking into account the intended purpose;
- Determining the price of the land plot (payment for the sale of the right to lease on the land plot) when selling them to private ownership;
- Taxation;
- Determination by the court of the purchase price and the amount of payments in case of forced seizure of the land plot for state needs and in case of requisition.

Information on the quality of land and its cadastral valuation is reflected in the land and cadastral book for each land plot. [1]

The state land and cadastral book is kept in all administrative regions and also in the cities of regional, regional and republican value. First, all land-use areas of the area, areas with total land-use areas and land uses are recorded. Land granted for secondary use is not subject to registration. Second, all land, as well as irrigated and drained land used by farm inter-farm enterprises and State reserve land, are taken into account by type of land.

Changes in the composition of the lands and their subspecies, the degree of irrigation and drainage of the lands should be detected in a timely manner on the ground, reflected on the land-accounting map and entered in the state land-cadastral book of the district. To this end, ongoing changes need to be continuously graphically recorded and monitored in each area. Graphical land accounting consists in systematic identification and reflection on the planning and mapping material of all changes in land use boundaries, in the size and content of contours. In the state of irrigated and drained land, so that these changes are taken into account in the next entries in the state land and cadastral book of the area and in the preparation of a quarterly and annual report on the availability and distribution of the land fund of the area by land category, land user and land.



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## II. RELATED WORK

Cadastral assessment of agricultural land is carried out according to a uniform method in order to ensure comparability of the results of the assessment in the territory of the Fergana region and unification of methodological approaches to the assessment of different categories of land. Outside urban and rural settlements and forest lands, State cadastral valuation of agricultural land is based on the capitalization of estimated rental income.

Cadastral valuation of agricultural land is necessary to justify the land tax, rent and other purposes established by law of the Republic of Uzbekistan.

As object of assessment agricultural grounds in borders of subjects of the Fergana region, administrative regions, land tenure act (land use) of legal entities and individuals.

The agricultural ground is understood as the territory which is systematically used for definite purposes and having concrete natural-historical properties. As a part of agricultural grounds distinguish an arable land, long-term plantings, haymakings, pastures and a deposit.

**Arable land** – an agricultural ground which is systematically used under sowings of agricultural crops, including crops of long-term herbs and also pure vapors.

**Haymaking** – an agricultural ground which is systematically used under mowing.

**Pasture** – an agricultural ground which is systematically used for a pasture of animals and also the land plots suitable for pasturage of the cattle which aren't used on the haymaking's eve and not being a deposit.

**The deposit** - the land plot which was used under an arable land earlier and more than one year isn't used including under steam.

## III. TEXT INPAINTING

Stages of cadastral assessment of farmlands. At the first interregional stage territorial, the cadastral cost of 1 hectare of agricultural land and basic standards (estimated efficiency and expenses) for evaluating in subjects are presented to bodies of subjects of the Fergana region. The second stage cadastral assessment of agricultural grounds in subjects on administrative regions and land tenure. [2]

At the first interregional evaluation stage of farmlands the following basic indicators were defined: estimated efficiency, estimated expenses, price of production of gross output, settlement investment income and cadastral cost.

The second stage of cadastral assessment of agricultural grounds in subjects is carried out on the basis of the basic estimated indicators of efficiency and expenses established at the first stage which provide comparability of results of assessment in all territory of the Fergana Valley.

With natural and economic zonality of the territory of the subject of the Fergana region the basic estimated indicators on efficiency of agricultural grounds and costs of their use calculated on average in the subject at the first stage of cadastral assessment are differentiated on land and estimated areas. Initial information for work is data of soil inspections, materials of the IV round of land and estimated works and intra-economic assessment of lands. Each administrative region in the course of the IV round of land and estimated works was carried to a particular zone. Estimated zones were created on signs of uniformity of views of soils, technologies of cultivation of crops, climatic conditions and level of economic development of the territory.

## IV. EXPERIMENTAL RESULTS

Cadastral assessment of agricultural grounds assumes calculation of integrated indicators for fertility of soils, processing behavior and location for definition on their basis of settlement investment income and cadastral cost of agricultural grounds.

Integrated indicator of fertility of soils is the site class point (cumulative soil point) which is used for calculation of gross output and expenses of an object of assessment. In this table we can compare points of site class of field farmlands of the Fergana region to other areas of the Republic of Uzbekistan from 2018 to 2019 (table 1) [1] of the Attacks, the total number of field farmlands with average number site class.

In this table 1 it is accurately visible that Fergana region on average field farmlands of 56 points from average lands of cadastral group, the VI cadastral classes and a ball of site class of 51-60 points.

The location of an object of assessment is characterized by an index of the equivalent distance defined taking into account remoteness from points of selling of agricultural products and bases of supply with material resources and also transportation terms of cargo transportation.

Settlement investment income with 1 hectare of agricultural grounds consists of two parts - differential and absolute rent income. Differential investment income considers fertility of soils, their processing behavior and location of an object of assessment. In case this income has the negative value, it is accepted equal to zero. The size of absolute investment income was established at the first interregional stage.

The cadastral cost of 1 hectare of agricultural grounds in the subject of the Republic of Uzbekistan is determined by multiplication of settlement investment income for the term of its capitalization by assessment object.

**Table-1. Information of field farmlands of the Republic of Uzbekistan (2018)**

| №            | Areas (valleys) of the republic | Cadastral groups  |            |               |               |                |               |               |               |                |             | Total hectares | GPA 2018y. |
|--------------|---------------------------------|-------------------|------------|---------------|---------------|----------------|---------------|---------------|---------------|----------------|-------------|----------------|------------|
|              |                                 | the poor lands    |            | below average |               | average lands  |               | good lands    |               | the best lands |             |                |            |
|              |                                 | Cadastral classes |            |               |               |                |               |               |               |                |             |                |            |
|              |                                 | I                 | II         | III           | IV            | V              | VI            | VII           | VIII          | IX             | X           |                |            |
|              |                                 | Site class points |            |               |               |                |               |               |               |                |             |                |            |
| 0-10         | 11-20                           | 21-30             | 31-40      | 41-50         | 51-60         | 61-70          | 71-80         | 81-90         | 91-100        |                |             |                |            |
| 1            | Republic Karakalpakstan         |                   | 181        | 25506         | 224917        | 142917         | 39126         | 11860         | 1396          |                |             | 445065         | 41,30      |
| 2            | Andijan                         |                   |            | 844           | 22346         | 51597          | 52837         | 62741         | 36573         | 5857           | 67          | 232862         | 57,50      |
| 3            | Bukhara                         |                   | 263        | 15374         | 48791         | 53826          | 51309         | 46752         | 12714         | 81             |             | 229110         | 51,00      |
| 4            | Jizzakh                         |                   |            | 2132          | 22885         | 144602         | 60894         | 29045         | 10170         | 1347           |             | 271075         | 51,00      |
| 5            | Kashkadarya                     |                   |            | 354           | 40743         | 207262         | 111117        | 67181         | 26402         | 7060           |             | 460118         | 52,50      |
| 6            | Namangan                        |                   |            | 4597          | 41141         | 48808          | 39359         | 46533         | 33581         | 19195          | 1729        | 234943         | 60,00      |
| 7            | Navaiy                          |                   | 59         | 5320          | 20387         | 20619          | 25388         | 22622         | 10603         | 1437           |             | 106435         | 53,20      |
| 8            | Samarkand                       |                   |            | 19            | 10543         | 59999          | 98800         | 84987         | 37801         | 15264          | 171         | 307583         | 59,30      |
| 9            | Surkhandarya                    |                   |            | 3592          | 33964         | 75733          | 79733         | 53376         | 18773         | 5886           |             | 271091         | 56,00      |
| 10           | Sirdarya                        |                   |            | 489           | 26537         | 105386         | 69828         | 58603         | 6542          | 9              |             | 267394         | 53,00      |
| 11           | Tashkent                        |                   | 23         | 2471          | 15115         | 59433          | 96186         | 103023        | 40033         | 9623           | 2           | 325909         | 59,00      |
| 12           | Fergana                         |                   |            | 5557          | 44499         | 76437          | 58661         | 74163         | 29300         | 5268           | 49          | 26934          | 56,00      |
| 13           | Kharezm                         |                   |            | 2837          | 36095         | 45591          | 69981         | 57666         | 8832          | 47             |             | 221049         | 54,00      |
| <b>Total</b> |                                 |                   | <b>526</b> | <b>69093</b>  | <b>587963</b> | <b>1094372</b> | <b>853253</b> | <b>718552</b> | <b>272720</b> | <b>71073</b>   | <b>2018</b> | <b>3669568</b> | <b>55</b>  |

For specification and updating of Inventory data:

Owners of the land plots and land users, authorized officials and local executive bodies in the corresponding administrative and territorial units (the aul (village), the settlement, the city of regional value) annually present to authorized body of the city of republican value, the capital, area (city of regional value) according to data on a state and use of lands. Reports on the established form of the happening changes in structure of the lands which are owned and



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land use and also under the authority of the corresponding administrative and territorial units (the aul (village), the settlement, the city of regional and regional value) on a state by reporting year; [3]

The authorized body on the land relations of the city of republican value, the capital, areas (cities of regional value) considers and approves the submitted reports and sends them to the specialized enterprises keeping the Inventory for an importation of the happened changes in the land and cadastral book and the unified state register of lands; [3]

## V. CONCLUSION

In conclusion, authorized bodies on the land relations of the city of republican value, the capital, areas (cities of regional value) make annual reports on existence of lands and their distribution on categories, owners of the land plots, to land users and grounds (balances of lands). And also, data on sale of the land plots in property the state on areas (the cities of regional value), the city of republican value, the capital, the areas of the Republic of Uzbekistan as of December 1 of reporting year in the forms developed by the central authorized body on management of land resources and approved by the central authorized body statistically. [4]

The central authorized body on management of land resources on the basis of these balances of lands, areas, the city of republican value, the capital makes balance of the lands of the Republic of Uzbekistan. [5]

The specialized enterprises keeping the Inventory once in 5 years make reports on a qualitative condition of lands on areas (the cities of regional value), to areas, the city of republican value, the capital and in general on the republic.

According to us, assessment is the type of activity based on accounting of basic concepts of market pricing, assuming a particular operations procedure and procedures of which the objective, professional conclusion about the cost of some object is result. Respectively at earth assessment an object of assessment is the earth, in particular, of the agricultural land.

In the article shown that organizational perfecting of the state cadastral assessment of the agricultural land is necessary. In particular:

- for decrease in load of performers at the second stage to pass upgrading of assessment due to accounting of specifics of municipal districts and reduction of terms of performance of work from the two-level organization of works on three-level;

- it is necessary to oblige to make for improvement of information support of cadastral assessment of the land plots statutorily registration of the price of the transaction for the recorded property rights on the basis of data of the official report of the appraiser and also to expand information filling of the inventory of real estate objects (in the description of the registered land plot to specify all its details necessary for calculation of cadastral cost for the approved technique and in the special software); to include examination of two estimated organizations of the subject of the republic in the report on cadastral assessment;

- to allow the subject of the republic for the tools to update cadastral assessment in terms and in the volumes corresponding to his requirements.

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