

Land Consolidation, Valuation and Cadastre

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ABSTRACT

In this paper, valuation studies in land consolidation, land and agricultural reform implementations which constitute rural land arrangement in Turkey will be explained. And also appraisal in rural areas will be considered by the aspect of cadastre.

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1. INTRODUCTION

Valuation of urban real estates generally has been performed with comparison and cost approaches, while income approach especially has been used for real estates used for agricultural purposes. However, grade of soil is also used for valuation of real estates in rural areas.

The rural areas arrangement is practiced with land consolidation, land and agricultural reform and expropriation. All procedure mentioned above consists of land valuation. In other words, it is required that property valuation for this aims.

In our county, valuation procedures of rural land arrangements have been performed related to legal base of applications.

2. VALUATION APPLICATIONS IN RURAL LAND ARRANGEMENT

2.1 The Law of Getting Farmer to be Land Owner , no. 4753 (1945-1973)

This law aimed to give to farmers who have not insufficient lands. It was envisaged that the lands of the foundations, municipalities, real persons and artificial persons could be expropriated to obtain lands to be distributed. The valuations of the land to be expropriated had been dependent on real values since 1971's. Then, it was applied related to tax declaration values which were submitted in municipalities from real estates owners for every 5 year (Demirel, 1999).

Although the expropriation law has been used for many years, it does not consist of real values concept of real estate. For that reason, it has made troubles between the sides for determination of expropriation values.

2.2 Land and Agricultural Reform Law, no. 1757 (1973-1978)

Land and agricultural reform law was aimed for removing imbalance of income and land distribution in rural areas, for creating new employment areas, for protecting of ownership. According to the law, lands in obtained distributed norms were expropriated. Furthermore, tax declaration values were used until 1977. Afterwards, real values of lands were used.

2.3 Agricultural Reform Law Related to Land Arrangement in Irrigation Areas, no. 3083 (1984-continued).

This law is for agricultural reform studies and consists of agricultural reform precautions. In this law, it is envisaged that making a landowner of farmers who have not land or sufficient

land, expropriation of lands of landowners who have more lands than obtained land norm. The real estate valuation practices related to the law are reviewed as follows:

2.3.1 Valuation Practices Regarding the Expropriation Law:

The real estates which have land that exceeds distributions norms, if the areas, that exceeds participation share (10%) in order to establish the governmental facilities; can not be covered from Treasury Lands; expropriation need to be done. Praises of expropriated real estates are determined regarding the real value.

2.3.2 Valuation Practices Related to Application Instructions of the Law:

With using ranking practices according to the instructions of the law, the farmers are being landowners. Watery and dry farmlands are distributed by using the size of watery and dry farmlands, norms of the allocation, the area to be remained to the owner of it and coefficients of transformation. The land is ranked between the intervals of I-VIII. Four degrees are evaluated between each other with coefficients of transformation given in Table 1. The degrees lies between V-VIII are not subject to the evaluating.

Table 1. Coefficients of transformation

Degree of Soil	Coefficients of transformation Lands of degree of III to the other degrees
I	0.707
II	0.816
III	1.000
IV	1.414

It is not known that whether there is a mathematical relation between the coefficients lie in the interval of 0.707-1.414. Furthermore, it is not known what fundamentals are used in the evaluating process. The agricultural holdings gross income (AEGI) is obtained by the mean values of last four years. Moreover, AEGI related to the 10 decares of the holdings is used to obtain the size of the watery and dry farmland in the lands of degrees of III. When the agricultural holdings income; which can be found by detecting the indispensable expenses except the land debt services and workmanship from gross holdings income; divided into average agricultural holdings income for watery and dry conditions per each 10 decares land piece; watery and dry agricultural lands' size would be found and this figure is accepted as 1.000 (Takka,1993).

2.3.3 Valuation Practices Related To Expropriation, Consolidation, Reallocation Technical Instruction

This technical instruction arranges land consolidation made independently from land reform. For ranking process of application of land consolidation, all parcels in project areas are marked related to market value indexes and soil indexes.

Land index is obtained as follows:

$$I = A * B * C * X , \quad (1)$$

where A is the group of soil profile, B is the soil structure, C is the slope of the land, X is the other qualifications.

Market value index is estimated related to the soil productivity, the variety of production, the features of soil, location, the irrigation condition, the distances to the holdings center, the village and the market, size and shape of the parcel and transportation condition.

The land index and market value index are marked as 100 point. Then, unit value of the parcel (UVP) is computed by the mean values of these indexes. When the parcels that have more than one land index and market value index the UVP is more than one. Thus, with computing the weighted mean values of these indexes, a weighted mean value of the parcels (WMNP) is obtained. After the highest WMNP is accepted as first rank, the parcels in application area are ranked. If there are the approximately same WMNPs in application, the mean values of them are obtained and this is called as rank mean point (RMP). By rating of RMPs with themselves, the equivalency of degrees is provided.

It is not defined how many land's degrees are for these application legally. Therefore, when the WMNPs are closely equal to each other, unjust coefficients of transformation are computed.

However, in real cases, the procedure mentioned above is not performed. Only land index is used for computing of coefficients of transformation. So, it also creates unjust practice in land consolidation projects.

Although there are very much legal forces related to land valuation in the technical instruction, they are not given in this study.

2.4 Land Consolidation Statute (1979- ...)

Parcels which are located in consolidation areas are ranked for computed transformation values. Land index (I) is obtained from as follows:

$$I = 0,70 * SI + P + L \quad (2)$$

Where SI is defined soil index and derived from the soil profile, soil structure, and slopes of the land, salinity of the soil, pH, erosion, microroliyef and other soil qualifications and then marked as 100 point. P is referred productivity of the soil, and marked as 10 points. Where L is the location index of the parcel and marked as 20 points.

According to this law, agricultural lands are grade 10 degrees. Between 1-7 degree lands are arranged in a one group. Between 8-10 degree lands are not evaluated.

Table 2. Soil Degrees

Degree of Soil	Soil Indexes
1	91-100
2	81-90
3	71-80
4	61-70
5	51-60
6	41-50
7	31-40
8	21-30
9	11-20
10	0-10

Unique index value is established depending on the index and areas of the index values which are inside the same degree scale. The ratio of these different degree index values between each other gives the transformation table. If different degree value apart from the participation degree is determined to the holdings; this table can be used for transformation between degree values (Demirel,1999)

Classification boundaries are drawn on 1:5000 scaled map. Also, table that shows the equivalency of the degrees would be established.

In land consolidation process necessary area for the governmental facilities like roads, irrigation and discharging channels and common facilities are covered from the lands which are not registered to title deed or undermined and become available for agriculture by consolidation. In practice, this ratio is kept on approx 5-6% to prevent owner government conflicts so to provide voluntary participation.

3. CADASTRE and VALUE RELATIONSHIP

In Turkish Cadastre, determines the boundaries of the real estates, regarding to cadastral topographical map of country and build the title deed registry while concerning Turkish Civil Law. It answers “who has real estate, where, how many and with which ownership rights” questions. As a result of not having a proper cadastre service which could be the structure for all kinds of projects related with land; information; that belongs to the land maps which is able to provide analytic data like real estate values, physical, chemical and biological properties of land; can not be built up.

While in the Cadastre Law, no: 658 released in 1925 in Turkey; cadastre had been mentioned to build the structure in order to determine cadastral real estate values, In Cadastral Law(1934); it is pointed out that the appraisal of real estates was assigned to The Ministry of Finance and general Directive Income, so no task was a signed to the cadastral organizations.

4. CONCLUSION

The land cuts which are made during land consolidation process in Turkey; are realized for the owner benefit gained from land consolidation-value increment because of consolidation-however, the word “valuation” is not considered as being the determination of the urban land values before and after arrangement. It is accepted that the parcel value (index) by square gives the value. Determination of the value increment which is achieved as a result of consolidation has no legal support.

Land analysis, land degrees and degree boundaries in rural land arrangements in Turkey have been collecting independently from the cadastral data and does not have sensitive resident dimension. Land analysis; which provides production of the main data in rural land arrangements; are very expensive and labored information for long period use of these information; they ought to be protected under the cadastral plan documents which are assured by government.

5. REFERENCES

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