

RESEARCH ON THE DYNAMICS OF AGRICULTURE IN TIMIȘ COUNTY

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Abstract.

Agriculture represents an activity that is very different from other economic activities, due to the fact that, on the one hand, agricultural activity is conditioned by the biological evolution of plants and animals, and on the other hand, it provides food for the population. Therefore, we can say that agriculture plays an important role for the economy of the studied area, due to the land it owns and which represents the main source of natural resources, therefore, agriculture will remain the most valuable branch of production. The research in this article provides a clear picture of the existing agricultural potential in Timiș County. Therefore, in the following, we will present the evolution of the land fund, vegetable agricultural productions and agricultural holdings by categories and size classes.

Keywords: *Timiș County, agriculture, agricultural area, agricultural production, land fund*

INTRODUCTION

Agriculture represents a sector with considerable potential, occupying, by tradition, an important place in the structure of the Romanian economy. This represents an important factor of social stability and the maintenance of ecological balance; it is the branch that provides food for the population and important quantities of raw materials for food and other non-food industries.

For the farmer, agriculture must be, not only the place of work with material gains of subsistence, but the place where the farmer can find peace of mind, financial fulfillment and pride as an agricultural producer.

The agricultural sector offers real investment opportunities in Timiș county, due to the large areas of agricultural land it has, the high productions recorded in some crops and the large share of the employed population working in this sector.

Even though Timiș County has an agricultural potential above the average of most agricultural regions in Romania, the context of the economic and social changes recorded in Romanian society after 1989 determined the passage of a winding stage of redefinition, determined by a series of socio-economic processes such as: re-appropriation, restructuring of the economy, rural-urban migratory movement, external migration, intensive development of localities located near large cities or depopulation of isolated localities.

All these phenomena have left their mark on the level of productivity and profitability of this sector with conditions of very good climatic favorability, lands with a natural fertility superior to other regions and a tradition regarding the cultivation of plants.

Located in the west of the country, Timiș county borders Serbia and Hungary in the west, Hunedoara county in the east, Caraș-Severin county in the southeast, and Arad county in the north.

Timiș County is the largest county of Romania, with an area of 8,697 square km, of which 702,398 ha agricultural lands, represented in proportion of over two thirds, crossed by the Timiș,

Bega and Bârzava rivers, and to the east the Plain rose gently among the hills covered by the lives and the lives. .

MATERIALS AND METHODS

The research in this article is located in the West Region, more precisely in Timiș County. The data used to carry out this study were provided by the Agency for Payments and Interventions in Agriculture, the National Institute of Statistics, field investigations in the area and various bibliographic sources. With the help of the obtained data, we were able to observe and compare the evolution over time of vegetable agricultural productions and the structure of agricultural holdings in Timiș County.

RESULTS AND DISCUSSIONS

In Timiș county, the agricultural sector offers real investment opportunities due to the large areas of agricultural land at its disposal, the good results recorded in some crops and the important share of the employed population. Added to these are a series of important aspects such as the high demand for organic products and their high added value, non-refundable financing for agriculture and the advantages of entering the community markets.

Timiș County has a total area of 869,665 ha and owns 3.65% of Romania's territory, occupying the first place in the country in terms of extent. Also, Timiș County is the most important agricultural county in the country, both in terms of cultivated area and volume of production.

The main factor of production in agriculture and forestry is represented by land. In the following, we will analyze the existing land fund by use category in Timiș county, in the period 2015-2019, as can be seen in table 1.

Table 1.

The total area of the land fund according to the mode of use, in the period 2015-2019

Specification	2015	2016	2017	2018	2019
Total area	869665	869665	869665	869665	869665
Agricultural area dc:	643332	642446	641526	629108	628473
Arable	542354	542243	543068	531451	530653
GRASSLAND	93182	92418	92075	89589	89487
Vineyards and wine nurseries	2391	2413	443	8068	8334
Fruit orchards and nurseries	5404	5372	5940		
Mixed	0.49	0.49	0.49	-	-

Source:Statistical summary of Timiș county, APIA, 2016-2019

From the analysis of the data entered in table 1, it appears that Timiș county has a total area of 869,665 ha, with a relatively stable structure during the five years of analysis. The agricultural area, at the level of 2019, is 628473ha, of which:

- arable land -530653 Ha
- pastures –89487Ha,
- vineyards and orchards – 8334 ha.

Timiș County has a wine-growing heritage, not only extensive, but also a reputation that makes the wines produced in the Receaș and Silagiu wine-growing centers recognized, not only on the national wine market, but also on the European one, even on the world one.

The evolution of the value of agricultural production is shown in table 2, from which it can be seen that the vegetable production sector is predominant, followed by the animal production sector, with agricultural services in last place.

Table 2.

The value of agricultural production in Timiș County

Timis county	2015		2016		2017		2018		2019	
	THOUS ANDRON	%	THOUS ANDRON	%	THOUSA NDRON	%	THOUS ANDRON	%	THOUSA NDRON	%
Prod. Agr, total dc:	3,206,735	100	3,104,853	100	3,768,731	100	4,437,213	100	5,145,757	100
vegetable	2,065,277	64.40	1,979,954	63.77	2,449,660	65.0	3,173,939	71.53	3,596,060	69.88
animated	1,113,408	34.72	1,092,906	35.20	1,275,264	33.84	1,213,387	27.35	1,488,017	28.91
Agricultural services	28,050	0.87	31,993	1.03	43,807	1.16	49,887	1.12	61,680	1.21

Source: Processing according to INS, 2016-2019

We will analyze the figures for 2019. At the level of this year, the global agricultural production calculated in lei at current prices was 5,145,757 thousand ron. From this total, the global vegetable production represented 3,596,060 thousand ron, which meant 69.88% of the total, and the global animal production was 1,488,017 thousand ron, respectively 28.91%. The difference up to 100% is represented by the value of the various services provided by the holdings with an agricultural profile.

Due to the fact that the soils are among the most fertile, with physical, hydrophysical, chemical and biological properties favorable, the main crops are cereals (wheat, barley, corn), which cover 50% of cultivated areas, legumes for grains, oil plants (sunflower, rape) and vegetables (cabbage, early potatoes, eggplants, tomatoes, etc.).

Table 3 shows the data on the evolution of cultivated areas by main groups of crops (cereals for grains, legumes for grains and oleaginous plants).

Table 3.

The structure of cultivated areas in Timiș county, 2015-2019

Specification	2015	2016	2017	2018	2019
Total	445738	434850	501424	507536	500330
Cereals for grains	345406	342970	327388	317600	328376
Wheat and rye	138961	142909	127280	137099	133657
Barley and orzoaica	20072	16552	18048	5658	13601
Oat	3951	3101	3216	3210	3293
Corn kernels	175000	174787	167519	159767	165643
Legumes for grains	728	392	646	1556	807
Bean peas	507	242	597	1363	648
Beans	203	62	49	193	159
Oil plants	64004	59235	124218	139719	115927
Sunflower	46000	46785	73451	80368	78242
Soy beans	7591	3451	25047	31062	21200

Potatoes - total	5469	3309	3010	2918	2866
Vegetables - total	12670	11228	11282	11283	11286
TOMATO	1590	1530	1529	1530	1521
White cabbage	4097	3395	3362	3367	3404

Source: Processing according to the National Institute of Statistics

Regarding the areas affected by different crops, their variation can be observed from year to year, with direct implications on the productions obtained.

The area cultivated with cereals for grains has the largest share in the total cultivated area. Smaller areas are owned by potato, oat and vegetable crops. What can be noted from the data presented above is the phenomenon of continuous growth of the total cultivated area for certain crops, during the analyzed period.

In the following, we will analyze the situation of agricultural holdings according to their legal status in 2019.

Table 4.

The structure of agricultural holdings, depending on the legal state, 2019

Specification	Total agricultural holdings	Agricultural area used	Average surface
	number	HECTARES	HECTARES
Total	17879	509773	28.51
Individual farms	15137	144307	9.53
Units with legal personality, of which:	907	299109	329.78
- Agricultural companies	0	0	-
- Commercial companies	907	299109	329.78
- Public administration units	0	0	-
- Cooperative units	0	0	-
- Other types	1835	66357	194.13

Source: Processing from data obtained from APIA, 2019

The average area falling on an individual agricultural holding, in 2019, was 9.53 hectares, and for units with legal personality it is 329.78 hectares. From table 4, it can be seen that individual agricultural holdings predominate with a share of over 94%, those with legal personality holding a percentage between 1-6%.

Let's not forget that Timiș county ranks first, in terms of the agricultural area used, at regional level, followed by Arad, Caras-Severin and Hunedoara counties.

CONCLUSIONS

Following the results of the research carried out and based on the study of the studied bibliography, we were able to draw some conclusions regarding:

Agriculture has a major contribution to the process of economic growth, being an important source of income and jobs, in different sectors of the economy, such as: tourism, infrastructure, industry, etc.

In Timiș County, the vegetable production sector is predominant, followed by the animal production sector, with agricultural services in last place.

Viable agricultural exploitation can be characterized by the high level of income, due to the perfect regrouping of production factors and the implementation of the achievements of

technical and scientific progress and creates decent living conditions for farmers and is the foundation of sustainable agriculture.

Based on the statistical research undertaken by us, we can see that individual agricultural holdings predominate with a share of over 94%, those with legal personality holding a percentage between 1-6%.

A viable solution for the precarious state in which agricultural holdings are at the moment can be the establishment of certain services for agriculture, both governmental and private.

BIBLIOGRAPHY

- GOOD, JULIANA, Management of production structures in agricultural holdings, ASE Publishing House, Bucharest, 2003.
- IMBREA, F., Optimizing current grain production systems in Banat and the Western Plain, the subject of a public-private interdisciplinary research partnership at USAMVB Timișoara, Agrobuletin Agir, Year III, 2011.
- LĂPUSAN, Al., Agrarian Structures, Bănea Press Publishing House, Bucharest, 2002.
- MUNTEANU V., Production Management, West University Publishing House, Timisoara, 2009.
- POPESCU, M., Economic efficiency in Romanian agriculture - level, trends and gaps compared to the EU-, Center for Economic Information and Documentation, Bucharest, 2005.
- RUSU, R., Organization of the geographical space in Banat, Mirton Publishing House, Timisoara, 2007.
- L ȘMULEAC, SILVICA ONCIA, ANIȘOARA IENCIU, R BERTICI, A ȘMULEAC, V MIHĂIESC, Influence of anthropic activities on ground water in Boldur, Timis County, Romania, Research Journal of Agricultural Science, 46 (2), 2014
- Payments and Intervention Agency for Agriculture (APIA), Romania.
Statistical summary of Timiș county, 2016-2021.
National Institute of Statistics - INS.
The socio-economic development strategy of Timiș county - 2014-2020.
<https://adi-pct.ro/prezentare-judetul-timis/>
<https://apia.org.ro/>
<https://apia.org.ro/planul-national-strategic-2023-2027-pns-al-romaniei/>
<https://apia.org.ro/planul-national-strategic-2023-2027-pns-al-romaniei/interventii-implementate-din-pns/>
https://enciclopediaromaniei.ro/wiki/Jude%C5%A3ul_Timi%C5%9F