

REMARKS ON THE ECONOMIC-FINANCIAL RATE OF RETURN FOR A LARGE ECOLOGICAL FARM IN SOUTHERN ROMANIA

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Abstract

Ecological agriculture is a developing sector in Romania, the farms' profitability depending directly on their physical and economic size. Large ecological farms are fewer in this sector, but due to their size they succeed in dealing better with high investments costs and in managing more effectively the process of production, animal husbandry or crop cultivation. The methodology used in this paper is based on the data gathered from an agricultural business of 750 hectares in the southern part of Romania and includes calculations specific to economic-financial rate of return, starting from the company's economic outturn account. The analysis performed and presented in this paper contributes to increasing the knowledge and importance of the information provided by this ecological farm's economic-financial rate of return.

Key words: intermediate management balances, economic-financial rates of return

INTRODUCTION

The main objective of conventional agriculture is to maximise economic efficiency, unlike ecological agriculture which monitors each of its components and characteristics considering the ecological, economic or social aspects, which have a balanced ratio [2]. In terms of the ecological aspect, it monitors the quantitative and qualitative potential of the soil, the economic one monitors the material and financial values in use, and the social one monitors the workforce [2].

Most farms involved in ecological agriculture in Romania own small areas of land, ranging between 5 and 50 hectares, and in many cases even less than 5 hectares. But in the southern part of Romania, where there are vast areas of land, with high technological potential, there are ecological farms larger than 50 hectare, some even amounting to 1,000-2,000 hectares. Our endeavour focused on the economic-financial analysis of such a large farm (750 hectares) in order to emphasise the economic-financial behaviour displayed under the economic conditions in the past few years. In this context, we deemed it necessary to

analyse the economic outturn account by applying the indicators which make up the intermediate management balances and the rates of return. Thus, this paper aims at analysing the research into economic-financial rate of return, as well as the diagnostic analysis of the company by means of the rate of return system.

MATERIALS AND METHODS

The technical and financial-accounting data analysed in this paper were collected from the accounting records of the agricultural business S.C. Auger Petrus S.R.L. This is an ecological agricultural business in the Calarasi County, with about 750 hectares of land cultivated with wheat, maize, sunflower, peas and lucerne, etc.

The methodology used in analysing the economic-financial rate of return for the surveyed company involved: the analysis of the profit and loss account through the intermediate management balances: the trade margin; profit and loss for the period; value added; the gross operating surplus; the operating outturn; the profit and loss outturn; the self-financing capacity [1],[4].

The ‘Trade margin’ (TM) is the difference between Sales of goods and Purchases of goods

The ‘Profit and loss for the period (Plp) is the Sold outturn plus Stored outturn plus Fixed outturn

The ‘Value added’ (VA) is made up of the Profit and loss for the period plus the Trade margin minus Consumptions from third parties

The ‘Gross operating surplus’ (GOS) is given by (Value added plus Operating subsidies) minus (Employee expenditure plus Tax expenditures)

The ‘Operating outturn’ (OO) is the Gross operating surplus plus Other operating revenues minus Other operating expenditures

The ‘Profit and loss outturn’ (Plo) is given by the Operating outturn plus Financial and exceptional revenues minus Financial and exceptional expenditures minus Corporate tax

The ‘Self-financing capacity’ (SFC) namely the Gross operating surplus plus Other operating revenues minus Other operating expenditures plus Financial and exceptional revenues minus Financial and exceptional expenditures minus Corporate tax

We also monitored the structural and dynamic evolution of the indicators specific to the company’s diagnostic analysis by means of the rate of return system [1],[4].

The commercial rates of return

The ‘Gross operating margin ratio’ is calculated as the Gross operating surplus divided by the Turnover

The ‘Net operating margin ratio’ is the Operating outturn divided by the Turnover

The ‘Value added margin ratio’ results from the Gross operating surplus divided by the Added Value

The economic rates of return

The ‘Economic rate of return’ (economic asset rate of return) is given by the Economic outturn divided by the Total assets

The ‘Accumulated gross margin ratio’ is calculated as Gross operating surplus divided by the Turnover

The ‘Capital rotation coefficient’ results from the Turnover divided by the Total assets

The ‘Gross economic assets rate or return’ is given by the Gross operating surplus divided by the Total assets

The financial rates of return

The net ‘Financial rate of return’ namely the Net outturn divided by the Equity (without unallocated profit)

The ‘Financial rate of return before tax’ is given by the Outturn before tax divided by the Equity (without unallocated profit)

RESULTS AND DISCUSSIONS

The company’s operation and rate of return are emphasised more eloquently by the information provided in the profit and loss account, by means of which we used the *intermediate management balances method* (Table 1).

The company’s trade margin is important in 2009, when the revenues from the sales of goods accounted for 12.85% of the overall sales. The low value of the margin especially in 2013 reflects the fact that the company promoted a trade policy of high prices, which influenced the decrease in sales.

By analysing this data, we notice that the company recorded a slight increase in the sales of goods compared to the purchasing price, as it targeted the sales of its own products.

Table 1. The intermediate management balances in the interval 2009-2013 (RON)

	2009	2010	2011	2012	2013
Trade margin	167015	0	1874	24425	-451280
Profit and loss for the period	966961	734979	2289982	1724933	2814792
Value added	-237184	-294835	-341550	315236	120460
Gross operating surplus	103129	94648	42432	-37092	353059
Operating outturn	102778	94648	142827	-168126	303251
Profit and loss outturn (Net profit)	50492	17606	117887	-197505	250795
Self-financing capacity	50492	17606	117887	-197505	250795

Source: processed from the annual financial statements of S.C. Auger Petruş S.R.L. 2009-2013

The profit and loss for the period has the highest values in 2011 and 2013, being influenced by the high value of the production sold, stored and used for own needs.

Also, the value added has positive values in 2012 and 2013 due to the increase in the value obtained by means of using the factors of production.

The negative values exhibited by this indicator in the interval 2009-2011 reflect the company's inability to add value to the goods sold, as the consumption associated with third parties does not exceed the dynamics of the profit and loss for the period.

The gross operating surplus, decreasing in the interval 2010-2012, reflects the fact that the company did not have the capacity to finance the operating activity and to pay off its equity and loans.

But, beginning with 2013, the increase in this indicator reflects a state of financial equilibrium reinforced by the operating outturn which reaches a maximum of 303.3 thousand lei in 2013.

The net profit and the operation self-financing capacity reached a maximum of only 250.8 thousand lei in 2013.

During this interval, the company was profitable, which is demonstrated by the positive values of the operating outturn and profit and loss outturn. In 2012, the company exhibits inefficiency throughout its entire operation.

The evolution of the rates of return (Figure 1) indicates the fact that the company's commercial activity reached an approximately constant level during the analysed interval.

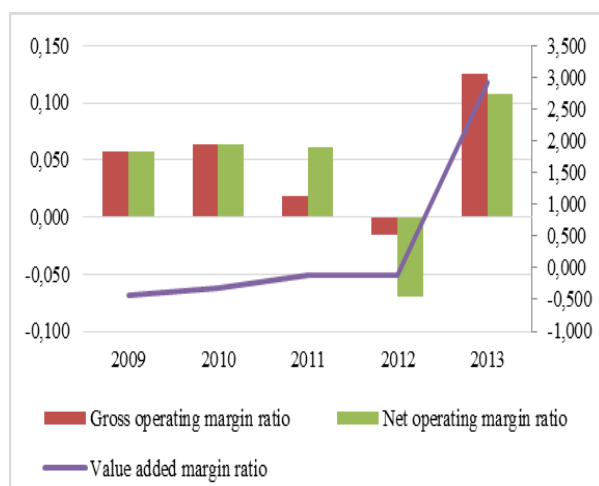


Fig 1. The commercial rates of return in the interval 2009-2013

The negative value obtained in 2012 by the trade margin ratio demonstrates the inefficiency of the operating activity.

Regarding the company's economic rate of return (Figure 2), increasing in 2009, 2011 and 2013, it reflects the efficiency of using the equity allocated to the company's production activity, which is increasing, and it demonstrates that the company had a regular level of financial equilibrium.

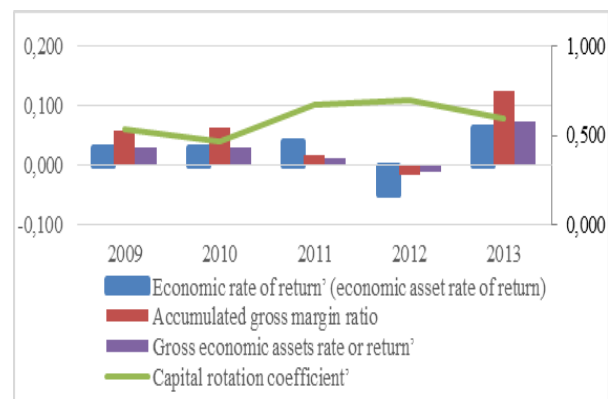


Fig. 2. The economic rates of return in the interval 2009-2013

Under these conditions, the financial rate of return (Figure 3) increased from 0.903 in 2011 to about 1.921 in 2013, which demonstrates the company's capacity to obtain net profit through its equity, while in 2012 the value was negative.

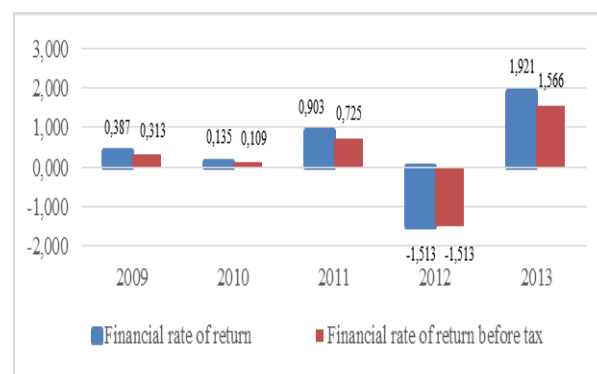


Fig. 3. The financial rates of return in the interval 2009-2013

The rates of return indicate that the company was slightly efficient in the interval 2009-2011.

CONCLUSIONS

The economic-financial analysis (2009-2013) performed for an ecological agricultural business of over 750 hectares allowed us to draw the following conclusions:

-the company managed to secure a higher value added per product as compared to 2009; but it decreased its commercial activity;

-the economic rate of return almost doubled, especially in the context of faster capital rotation;

-the net financial rate of return increased almost five times compared to 2009, reflecting the increase in the equity capacity to yield profit.

In conclusion, the company has a good economic-financial status, with an overall increase in economic and financial rate of return, which directly depends on climatic and environment conditions which can have a negative effect on its market stability (as was the case in 2012).

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