COMPARATIVE EXAMINATION OF THE FINANCIAL DATA OF BIG GAME MANAGEMENT IN THE SOUTH-TRANSDANUBIAN REGION

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ABSTRACT

This article demonstrates the comparative examination of the financial data found in the reports of the game management concerning the counties of the South-Transdanubian Region. The healthiest cost structure was in Tolna County nevertheless the 2003/2004 hunting year showed a deficit. In Somogy and Baranya counties the damage caused by game was so big that the management could not compensate it. Keywords: big game management, balance, expenses, incomes, inflation

INTRODUCTION

The South-Transdanubian region is characteristically a big game territory, where the red deer (*Cervus elaphus*), the fallow deer (*Dama dama*), the roe deer (*Capreolus capreolus*), and the wild boar (*Sus scrofa*) finds suitable habitat and have important stock size. The stock of the red deer, the fallow-deer and the wild boar needs to be reduced. The size of moufflon (*Ovis ammon*) population is insignificant. With the exception of 12 (small game hunting) areas, all the other (more than 150) are big game areas (*Figure 1*) in the examined counties (Baranya, Tolna, Somogy).

Figure 1



Source: Nimród, 1999. 87. 1. 5. p.

Among the big game species, the quality of the red deer and the fallow deer occurring in the region is outstanding internationally, which is the joint result of the excellent genetic background and good habitat.

MATERIAL AND METHODS

The regions prepare annual game management reports (the hunting year endures from year 1st March to next year 28th February), which is transmitted to the Main Department for Game, Fisheries and Water Management. The report contains the number of harvested game, data of the savage agriculture, financial data, and the data of the damages caused by game and fines. From the 2003-2004 hunting year, the resources gained by tenders and subsidies take part in the report too. The financial data are just informative, they were not made for balance or profit and loss account, they apply for hunting and not civil year, and they have cash flow approach.

The financial data of South-Transdanubian Region counties (Somogy County, Baranya County and Tolna County) found in the game management reports were collected from the National Game Management Database's annual mass of facts (*Csányi*, 1999-2010) and were scheduled. The data are available from 1994 to 2009. The data of the 2010-2011 hunting year had to be transmitted until the 20th March, that is why they can not be elaborated.

At first we examined the structure of incomes and expenses in several counties, and the balance's figures from 1994.

We modified the available financial figures according to the inflation's yearly fluctuation (1994=100%). The calculation was disposed leaning on the International Monetary Fund's data (*IMF*, 2011).

RESULTS AND DISCUSSION

The analysis of the income structure

The paid hunting by foreigners and the related services were the half of the revenues, from year to year in all of the three counties (*Figure 2*). In Baranya County the shortage of the revenues due to less paid hunting by foreigners, was compensated by the higher rate of the related services.

The decreasing hunting revenue from foreigners were set off, in the three counties, by the increasing rate of national hunting, which is the biggest in Tolna County, while this county is the second in the revenues of paid hunting by foreigners too. The revenue of live game is not decisive among the incomes, the biggest is in Tolna County with 1.2% in average. The rate of the income from the harvested game fluctuated around 20% in Somogy County, 25% in Baranya County, 20% in Tolna County. The other incomes fluctuated between 11% and 15% in the three county.

The analysis of the cost structure

Considering the expenses (*Figure 3*), the rate of wages is the lowest in Somogy County, an average 15.1%, the biggest in Baranya County, an average 18.4% and in Tolna County it is 17.6%, in average.

Figure 2

The average, max. and min. incomes rate of game management in South-Transdanubian Region counties between 1994 and 2009

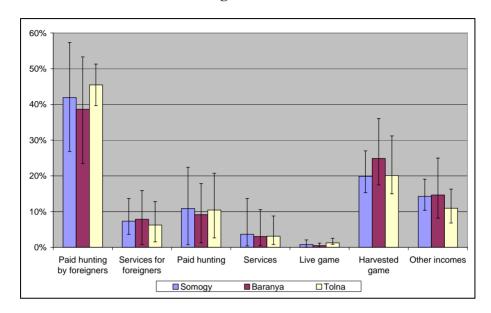
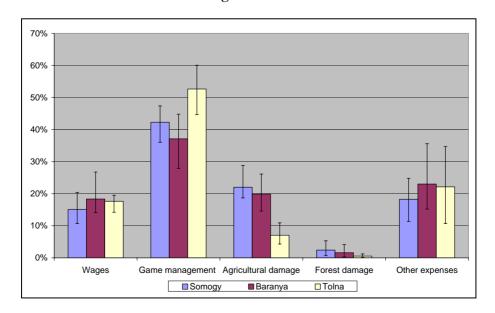


Figure 3

The average, max. and min. expenses rate of game management in South-Transdanubian Region counties between 1994 and 2009



Among the expenses, game management cost was the biggest, with 42% in Somogy County, in average 37% in Baranya County, in Tolna County it was the highest, in average 53%.

The rate of the agricultural damages caused by game is 22% in Somogy County in average, 20% in Baranya County, and in Tolna County it is much smaller - only 7%! The agricultural damage is caused by big game. Tolna County is better off because just a part of its territory is lived by big game (12 small game hunting areas), while the whole part of Somogy and Baranya County is game management division with big games.

In average, the forest damage was 2.4% in Somogy County, 1.6% in Baranya County and only 0.5% in Tolna County. The average of the other expenses was 18% in Somogy County, 23% in Baranya County and 22% in Tolna County.

The examination of the economic result on current price and considering the inflation

From the distinction of the aggregated income and the aggregated expense the sector's economic result can be adjudged (*Figure 4*). Somogy County was firstly near by the deficit in 1997, and since 1999 it has been showing a deficit in every year, but in 2007 the loss was significantly lower. Although in a decreasing degree, Baranya County was profitable till 1999. Firstly it showed a deficit in 2000, after a profitable year, it showed a deficit in 2002, 2003 and 2004 (*without subsidies*); while it became profitable again in 2005, in the years between 2006 and 2009 the companies produced loss, except of 2007. If considering also the subsidies received, the hunting companies of Baranya turns to be profitable in three additional years: 2004, 2006 and 2008.

Tolna County's situation is the best, although its profit decreased until 2001; its hunting activity showed a deficit only in 2003 and 2006, and became profitable again in 2003 due to subsidies.

The losses in 2006 are explained by the expiry of the game management and hunting period of ten year. It was the last year of the earlier signed land rent contracts, and thus the companies tried to make the best out of their opportunities.

The figure of the incomes and expenses (*Figure 5*) shows well, that Somogy County's incomes and expenses are much higher than in the other two counties of the South-Transdanubian Region. In Baranya County, both the revenues and the expenses have been declining year by year since 2001, only in Tolna County the revenues tend to increase.

Considering the inflation it is apparent that Somogy County could not follow it in its revenues (*Figure 6*), opposite to Baranya and Tolna County. The rise of the revenue's trend is the biggest in Baranya County and in Tolna County it is low, while in Somogy County it is strongly decreasing (*Table 1*).

The increase of the expenses exceeds the inflation in the three counties. In Somogy County the costs increased at a smaller rate than in Tolna County. The increase of costs is mostly favours to Baranya County.

The rise of the balances' trend-lines is negative everywhere. The decline is the smallest in Tolna county, while it is the biggest in Somogy County, while in case of Baranya County it is slightly declining.

Figure 4

The game management balances

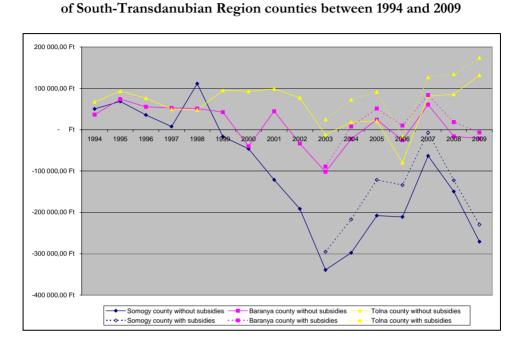


Figure 5

The summarized game management incomes and expenses of South-Transdanubian Region counties in current prices between 1994-2009

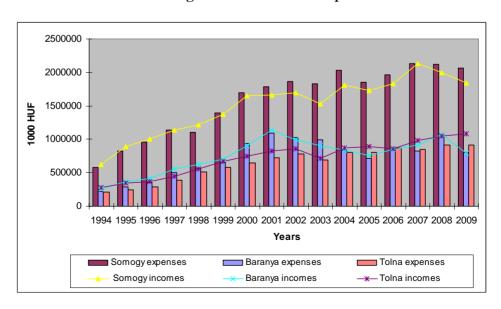


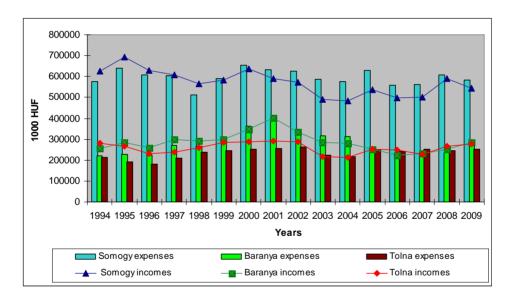
Table 1 The average expected rise of the trend of analysed variables (α =5%)

	Somogy County	Baranya County	Tolna County
Expenses	100672 (a)	42152 (a)	48620 (a,b)
Revenues (incomes)*	83272 (a)	39449 (a)	51652 (a,b)
Game management balances	-17400 (a)	-2703 (b)	3032 (c)
Game management balances considering the inflation	-8080 (a)	-3436 (a)	-4015 (b)

^{*} P<1% significant difference

Figure 6

The summarized game management incomes and expenses of South-Transdanubian Region counties adjusted with inflation between 1994-2009



CONCLUSIONS

The thrift of the game management decreased permanently on national level too; in 2003 the South-Transdanubian Region's three counties as well as nationwide. The sector closed with deficit.

In Somogy and Baranya County sources should been ensured for the preventing and decreasing of the damage caused by game.

In case of the revenues, the offered services should been developed in Tolna and Somogy County, they have unused spares compared to Baranya County.

The sector can not eliminate the effect of inflation. The reason must be found in that the recession in the European Union caused decrease of the solvent demand. For favouring the guests, the prices did not follow the rate of inflation. Another negative effect is the HUF/Euro exchange rate is unfavourably fluctuating.

For exact financial analysis, the balance and result accounts should be collected from the game farmers.

REFERENCES

- Csányi, S. (Ed.)(1999): Hungarian Game Management Database 1994-1998. (In Hung.) [online] < URL: http://www.vvt.gau.hu/adattar/pdf/VA-1994-98.pdf>
- Csányi, S. (Ed.)(2000): Hungarian Game Management Database 1999/2000. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-1999-2000.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2001): Hungarian Game Management Database 2000/2001. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2000-2001.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2002): Hungarian Game Management Database 2001/2002. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2001-2002.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2003): Hungarian Game Management Database 2002/2003. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2002-2003.pdf > [17-03-2011]
- Csányi, S. (Ed.)(2004): Hungarian Game Management Database 2003/2004. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2003-2004.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2005): Hungarian Game Management Database 2004/2005. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2004-05.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2006): Hungarian Game Management Database 2005/2006. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2005-06.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2007): Hungarian Game Management Database 2006/2007. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2006-07.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2008): Hungarian Game Management Database 2007/2008. hunting year. (In Hung.) [online] < URL: http://www.vvt.gau.hu/adattar/pdf/VA-2007-08.pdf> [17-03-2011]
- Csányi, S. (Ed.)(2009): Hungarian Game Management Database 2008/2009. hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2008-09.pdf
- Csányi, S. (Ed.)(2010): Hungarian Game Management Database 2009/2010 hunting year. (In Hung.) [online] <URL: http://www.vvt.gau.hu/adattar/pdf/VA-2009-10.pdf> [17-03-2011]

International Monetary Fund (IMF) (2011): 2011 World Economic Outlook. [online] <URL: http://www.indexmundi.com/hungary/inflation_rate_%28consumer_prices%29.html> [17-03-2011]