

## **Treatment of other gainful activities and marketing costs according to various FADN regulations**

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### **Abstract**

FADN accounting system is specific because it covers not only regular activities in agricultural production but also other gainful activities (OGA) and some technical indicators. The goal of this paper is to present recording of OGA throughout different FADN regulations. Besides, the goal is to present recording of marketing (sales) costs in FADN methodology (related not only to agricultural products but also to products gained through processing activities). To clarify the issue, authors compared methodological approaches presented in the following EU regulations – 868/2008, 385/2012 and 2015/220. It has been determined that there are not significant differences between given regulations in terms of recording marketing costs, whereas in newer regulations much more attention is paid to OGA. New research should be directed to a more detailed analysis of costs related to OGA. Comparing to an average farm in the EU, farms in Serbia should increase participation of OGA in total output.

*Key words:* Other gainful activities, Processing, Marketing, Costs, FADN

### **Introduction**

Farm Accountancy Data Network (FADN) has been established in the European Union in 1965 and it is obligatory in all EU member states. The FADN system has been formed with a goal to unify methodology regulating data collection and accountancy on agricultural holdings in all countries which are members of the EU (Njegovan and Nastić, 2011). Introduction of FADN system in Serbia has started in 2011 as a technical assistance project supported by the EU. The goal of FADN introduction is to enable gathering of data (from all types of holdings – family farms and agricultural enterprises in Serbia) applying the same methodological principles that

are applied in the EU. Having in mind significance of these data, introduction of FADN system is one of preconditions for Serbian accession to the EU (Ivkov et. al., 2013). In the EU, Farm Accountancy Data Network represents the primary and the only source of microeconomic data from agricultural holdings which are consistent and comparable on the level of the entire EU (European Commission, 2010).

Before the introduction of FADN system there was an absence of permanent and systematic monitoring of accountancy data on family farms in Serbia (Vasiljević et. al., 2012). Because of the importance of FADN system, many institutions in the Republic of Serbia are involved in its development, such as Ministry of Agriculture, Forestry and Water Management, academic institutions, Agricultural Extension Service, Statistical office of the Republic of Serbia among others (<https://www.fadn.rs/fadn-u-srbiji/organizaciona-struktura/>). Having in mind significance of FADN system, there are number of research conducted in Serbia related to the use of FADN and comparison of Serbia and the EU (Vasiljević, 2011; Figurek and Vukoje, 2011; Cvijanović et al., 2014; Bojčevski et al., 2015; Bojčevski et al., 2016; Nastić et al., 2017; Nastić et al., 2017; Ivanović, 2018; Ivanović et al., 2018).

Introduction of FADN system enabled monitoring of large number of parameters regarding commercial family holdings operation and, among others, data regarding other gainful activities. Besides that, determining and monitoring of data regarding different marketing costs is also enabled, regardless of whether they are costs of agricultural products or products of processing activity. Being familiar with these costs is of special importance, because selling of agricultural products (as well as products of processing activity) is becoming an increasing challenge for small agricultural producers which dominate in agricultural structure of the Republic of Serbia, especially when the process of accession to the EU is taken into consideration.

During the last decade, three important regulations defining FADN methodology have been adopted in the EU (Commission Regulation No 868/2008 of 3 September 2008, Commission Implementing Regulation No 385/2012 of 30 April 2012 and Commission Implementing Regulation 2015/220 of 3 February 2015). The goal of this paper is to describe how FADN system (according to various regulations) records data on other gainful activities and marketing costs (related not only to the most important crop and livestock products, but also to products of processing activity).

## **Discussion**

Other gainful activities directly related to the holding are not agricultural activities but other activities performed on the holding. Such activities (regulation 2015/220) use products of the holding or resources of the holding (buildings, machinery etc.). In other words, according to regulation 385/2012 “Other gainful activities (OGA) directly related to the holding refer to the non-agricultural activities having an economic impact on the holding and which are using the agricultural resources (means of production or products) of the holding”.

Other gainful activities assume active work (use of labour) while activities which do not require work are not considered to be other gainful activities. Therefore, pure financial investments or renting out resources of the farm (without involvement of farmer in further activities) is assumed to be regular activity of the holding. Other gainful activities are usually related to processing of agricultural products, “regardless of whether the raw material is produced on the holding or bought from outside” (regulation 385/2012). It should be taken into consideration that there are certain exceptions which are clearly defined in appropriate regulations. For example, wine production is considered as regular agricultural activity, not other gainful activity.

Term 'other gainful activity' is closely related to terms 'diversification' and 'pluriactivity'. Similarities and differences among these terms according to number of researches were discussed by Blad (2010). According to EU standards (Augère-Granier, 2016), creation of gainful activities on the farm is considered to be diversification, while pluriactivity is discussed at the level of the farmer. Schuh et al. (2019) stated that pluriactivity and farm diversification “has been on the rise in many of the case study regions (including Campania, Aragon, South-west Oltenia, and Southern and Eastern Ireland), and is seen as an important development targeted by various local institutional actors”. Presence of other gainful activities is a useful tool for the description of type of rural areas so that Vidal et al. (2001) used indicators such as percent of farmers with other gainful activities, percent of young farmers and percent of old farmers with other gainful activities. Besides, Longhitano et al. (2012) used other gainful activities as one of the indicators for evaluation of farm sustainability.

Analysing presence of other gainful activities across EU – 27 countries Krakowiak-Bal (2009) determined that five clusters comprised of countries with similar level of farm diversification could be formed. Authors also confirmed “big differences of types and scale of other gainful activity across the EU”, while “the highest percentage of households with another gainful activity” is present in Germany, Luxemburg and Austria. Research conducted by Buchta and

Federičova (2009) in Slovak Republic revealed that diversification of activities on agricultural holdings depends on level of development of region where the farm is situated. In more productive regions the most common diversification activities are processing of farm products, contractual work and sale of agricultural products for energy production. On the other hand, the less productive regions are characterized by agro tourism and rural tourism, as well as wood processing. Authors also concluded that enterprises dominated in all diversification activities over family farms, except for handicraft.

Turtoi et al (2013) discussed orientation of smallholders in Romania regarding other gainful activities as a way to reduce dependence on agriculture as a sole income source. It was determined that small farms are more oriented towards processing of agricultural products, while bigger farms are more directed towards contractual work. Similar analysis conducted by Thomson (2019) revealed that in 2013 only 5.2% of the EU farms had some type of other gainful activities, while the same farms produced 18.9% of the EU agricultural output. It was also determined that bigger farms, farms specialized for livestock production as well as farms situated near cities were more oriented towards other gainful activities. Busck et al. (2006) also found out that peri-urban area (around Copenhagen) is characterised by the decline of number of farms, but at the same time by increasing farm size as well as increasing involvement of farmers in other gainful activities.

#### Treatment of other gainful activities in FADN regulations

In the oldest analyzed regulation (868/2008) other gainful activities are not mentioned directly (that term was not used), but there are appropriate elements within category – production. Apart from crops and animal products, forestry is also mentioned (sales of felled timber and standing timber, other forestry products) as well as other products. In latter directives forestry and other products are referred together as other gainful activities. At the same time, costs related to other gainful activities are not separately recorded according to this regulation.

The next important regulation, which regulates FADN system, paid special attention to this kind of output (regulation 385/2012). In this regulation, holdings are classified in three classes, depending on share of other gainful activities in the total output of the holding. According to this classification (and regulation 2015/220), the division could be:

- Minor (share of other gainful activities is from 0% to 10%),
- Moderate (share of other gainful activities is higher than 10%, but below 50%),
- Significant (share of other gainful activities is higher than 50%).

Other gainful activities directly related to the holding are presented in these regulations via large number of elements, such as:

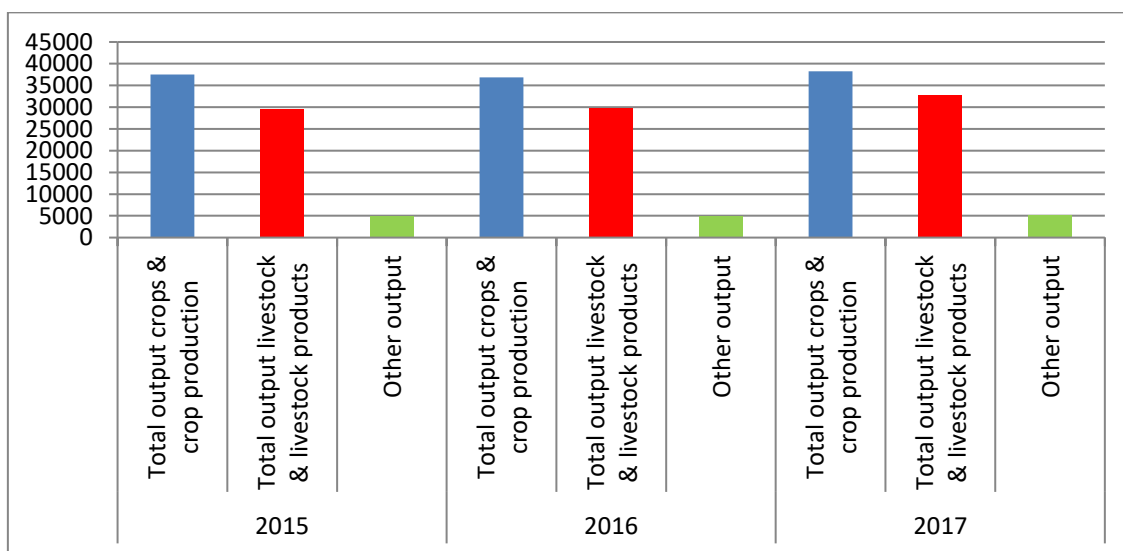
- Analysis of labour - share of work for OGA directly related to the holding, which means – percent of annual time spent working, and percent of Annual Work Unit. The issue of labour analysis by FADN methodology was not dealt with by many authors, and the introduction of other gainful activities broadens the possibilities of these analyses (Ivanović et. al., 2013).
- Analysis of costs related to other gainful activities and
- Analysis of output from other gainful activities.

Other gainful activities usually assume processing of agricultural products, such as processing of milk (cow's milk, sheep's milk, goat's milk), processing of meat and other animal products, processing of crops (it includes production of alcohol, but excludes wine). Nevertheless, other gainful activities also include:

- Forestry and wood processing, Contractual work (using production means of the holding), Tourism, accommodation, catering and other leisure activities,
- Production of renewable energy (includes production of renewable energy for the market such as biogas, bio-fuels or electricity produced by wind turbines; it excludes production of renewable energy only for the holding's own use,)
- Other 'other gainful activities' directly related to the farm, such as production of fur animals, handicraft, aquaculture and similar activities.

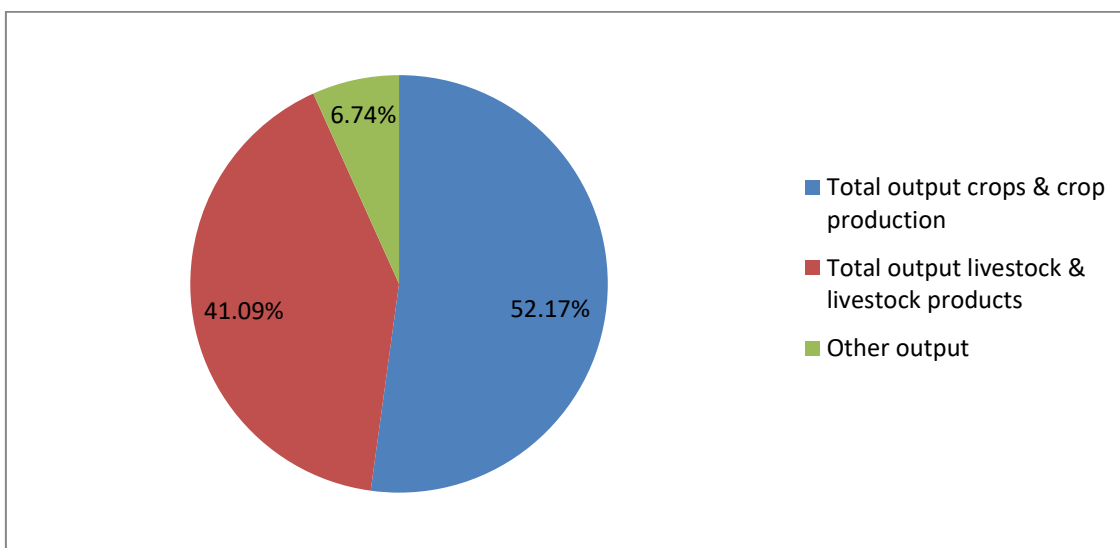
If available data for the period of last three years (the period of 2015-2017) are considered, it is possible to analyze the relation of the total output related to crop production, total output related to livestock and livestock products as well as other output – output related to other gainful activities for all EU countries (graph 1). In all the years observed, the biggest significance was that of output from crop production, while the least important is output related to other gainful activities (in all observed years it is somewhere around 5,000 EUR per farm). On the other hand, in 2015 an average output from other gainful activities in Serbia was 530 EUR. To make comparison between Serbia and the EU authors used data from year 2015 because data for this year are the newest publicly available data for Serbia. Participation of other output in total output in the EU in 2015 (graph 2) was rather low (6.74%), while in Serbia it was only 1.18% (graph 3). This indicator remained at the approximately same level in the EU in the following years, so that it is, by the latest data available for the year 2017, 6.68%. This is an indicator of the fact that (in Serbia) possibilities of agricultural holdings providing additional output through other gainful activities are not used sufficiently. If certain types of

production are taken into account in Serbia, farms specialized in poultry production do not perform other gainful activities at all, while farms specialized in crop production have the highest participation of other gainful activities (other output) in total output (2.22%). In other words, output from other gainful activities in 2015 for Serbian farms specialized in crop production was 1,560 EUR.



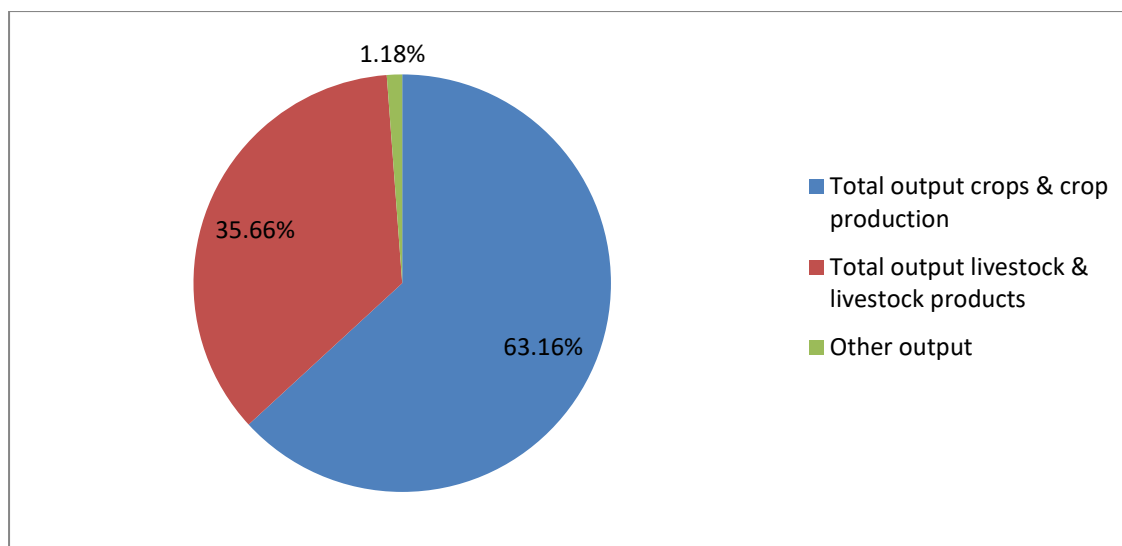
Graph 1. Amount of various types of outputs on the EU level (EUR)

Source: [https://ec.europa.eu/agriculture/rica/database/database\\_en.cfm](https://ec.europa.eu/agriculture/rica/database/database_en.cfm)



Graph 2. Structure of total output on the EU level in 2015 (based on FADN data)

Source: [https://ec.europa.eu/agriculture/rica/database/database\\_en.cfm](https://ec.europa.eu/agriculture/rica/database/database_en.cfm) and authors' calculation



Graph 3. Structure of total output in Serbia for 2015

Source: Farm Return 2015 and authors' calculation

#### Treatment of costs and inputs in FADN regulations

When comparing previously mentioned regulations, it can be seen that, in its structure, table Costs (regulation 868/2008) and its corresponding table Inputs (regulation 385/2012) have the following elements in common: Labour and machinery costs, Specific livestock costs, Specific crop costs and Farming overheads. On the other hand, there are certain differences in the structure of these tables. Therefore, table Costs by regulation 868/2008 has the following elements Land charges and Interest paid. These two elements are excluded from the regulation 385/2012 and Specific costs for other gainful activities are added.

Since the costs of other gainful activities were not recorded separately in the previous regulation (868/2008), it is clear that Land charges and Interest paid are now reassigned to other groups of costs, so that there is a different reassignment of costs in regulation 385/2012, which is much more complex than it could seem at the first sight. Detailed analysis of these complex changes was dealt with by Marković et. al. (2014).

As one of the advantages of regulation 385/2012, we can name the precision of differentiating output and costs from other gainful activities (in our practice, these are most commonly processing of agricultural products and contractual work). On the other hand, changes that were made when presenting the costs will make comparing the costs of agricultural holdings by 2014 and after 2014 more difficult. Inclusion of other gainful activities in the regulation 385/2012 clearly shows an increased interest of Common agricultural policy for this segment of agricultural holdings operation. Another, completely new, segment of activities included in the

regulation 385/2012 refers to the environmental protection, and it is conducted by monitoring of quantity (but not the value) of N, P<sub>2</sub>O and K<sub>2</sub>O used in mineral fertilizers. Having in mind that agricultural policy in Serbia is not tightly related to Common agricultural policy yet, it is hard to estimate whether these changes in FADN methodology are going to influence agricultural policy in Serbia. The newest regulation 2015/220 important for FADN system (as well as its latest update from 01/01/2020) mostly corresponds to the regulation 385/2012 regarding all aspects dealing with other gainful activities. Nevertheless, regulation 2015/220 contains rules for determining the size and type of agricultural holdings, which did not exist in the regulation 385/2012.

### Marketing (sales) costs

Marketing costs are present in various places within FADN regulations (in different tables and under different codes or serial numbers), depending on the product which is sold (table 1).

Table 1. Recording of marketing costs

Type of cost	Position in regulation 868/2008	Position in regulations 385/2012 and 2015/220
<u>Marketing of livestock and livestock products:</u> Packing materials for livestock products and supplies for processing of livestock products, costs of storage and market preparation of livestock products of the farm performed outside the farm, cost of marketing the livestock products of the farm, short-term rent of buildings used to house animals or store products in connection therewith.	Table Costs within point 71. Other specific livestock costs (serial number 271)	Table Inputs under code 2090 – Other specific livestock costs
<u>Marketing of crops and crop production:</u> Packing and binding materials, string and rope, supplies for the preservation of crops, storage and market preparation of crops done outside the farm, cost of marketing the crop products of the farm.	Table Costs within point 76. Other specific crop costs (serial number 276)	Table Inputs under code 3090 – Other specific crop costs
<u>Specific costs for other gainful activities:</u> Packaging and marketing costs	-	Table Inputs under codes from 4010 to 4090
<u>Costs related to the use of private cars for farm purposes:</u>	Table Costs within point 62. Motor fuel and lubricants (serial number 262) or point 63. Car expenses (serial number 263)	Table Inputs under code 1040 – Motor fuel and lubricants or code 1050 – Car expenses

Source: Regulations 868/2008, 385/2012, 2015/220 and authors' presentation



If the holding possesses its own fixed assets which are used with the aim of selling agricultural products, the costs of their depreciation are calculated the same way as with other fixed assets at the holding. It should be born in mind that introduction of regulations 385/2012 and 2015/220 significantly changed the way depreciation is calculated (comparing to regulation 868/2008), as well as that these regulations introduced new category named accumulated depreciation.

### **Conclusion**

In order to improve economic effects of agricultural operations, family holdings are increasingly inclining towards other gainful activities (primarily contractual work and agricultural products processing), as well as towards the improvement of sales methods (of primary agricultural products and products of processing activity, as well). It was determined that there was a significant change in newer regulations (number 385/2012 and number 2015/220) comparing to the old one (number 868/2008) regarding recording of output and costs of agricultural products processing, that is to say, additional attention was paid to this segment of holdings' operation. FADN methodology in all the regulations observed (number 868/2008, number 385/2012 and number 2015/220) records the costs of sales (marketing) and the analysis showed that there were not any significant changes of methodology in the regulations observed.

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