

# QUALITY SCHEMES - A EUROPEAN TOOL FOR GUARANTEEING THE QUALITY AND SAFETY OF FOOD PRODUCTS

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## Abstract

Certification of quality schemes known as PDO (Protected Designation of Origin), PGI (Protected Geographical Indication) and TSG (Traditional Speciality Guaranteed) is one of the European Commission's instrument for protecting products whose reputation extends beyond their geographical area of production. The work aims to achieve an analysis of implementation and certification of the three quality schemes according to the European legislation, of the product classes included in these systems as well of the interest shown by the producers and authorities of the European Union. Methodologically, the information collected from the "DOOR" database for the period 1996-2019 was analyzed, processed, summarized and prioritized. The results obtained show that during the analyzed period, the producers from the EU countries certified and registered 1424 products, of which 630 PDO (44.2 %), 731 PGI (5.3 %), and 63 TSG (4.4 %). The first place in the top of the classes of products is held by "Fruits and Vegetables" with 24% of the total. Regarding the interest of the EU countries to implement the quality schemes, we note that the first place is held by Italy (299 products); Romania ranks penultimate (5 products). As a result of the analysis, the work proposes a set of recommendations in order to improve the existing situation both at European and national level.

**Key words:** quality schemes, Protected Designation of Origin, Protected Geographical Indication, food products

## INTRODUCTION

The European Commission aims to assure a high level of food safety and animal & plant health within the EU through coherent farm-to-table measures and adequate monitoring, while ensuring an effective internal market [6]. Consumers want food to be affordable and good value for money. But consumers and traders have many other demands on the value and quality of the products they buy, apart from price. The most significant issues in the EU are hygiene and food safety (a 'non-negotiable must'), health and nutritional value, and societal demands. Moreover, consumers increasingly pay attention to the contribution

made by farming on sustainability, climate change, food security and development, biodiversity, animal welfare, and water scarcity. As the pre-eminent user of land, farming is a key factor in the territorial development of regions, landscapes and valuable environmental areas. Last but not least, consumers with growing disposable income – in many parts of the world – are demanding taste, tradition and authenticity in their food as well as the application of higher animal welfare standards [1].

In order to guarantee the quality and safety of food products, the European Commission has developed an integrated policy based on a series of measures and instruments such as: The Rapid Alert System for Food and Feed (RASFF) - a key tool to ensure the flow of information to enabling swift reaction when risks to public health are detected in the food chain [6]; Trade Control

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and Expert System (TRACES) - an online management tool to trace and manage agricultural, food products imported to the EU and traded within the EU; Certification on quality schemes known as PDO (Protected Designation of Origin), PGI (Protected Geographical Indication) and TSG (Traditional Speciality Guaranteed) - tools that guarantee the authenticity of the products [2]; Appropriate labeling and standardization of information on: ingredients, additives, supplements, improvement agents, nutrition and health, new food products (novel food) [9]; Health and safety - measure concerns the control of the use of pesticides and herbicides, the occurrence of contaminants in food, resistance to antibiotics, food-borne diseases and genetically modified organisms (GMO); Food Contact Materials (FCMs) [8]; Fraud, monitoring and control - this measure includes information on: food fraud, audits and analysis, official controls and enforcement [13]; Regional and international agreements.

EU Commission Communication entitled "Europe 2020: A European strategy for smart, sustainable and inclusive growth" promotes the concept according to which Agricultural product quality policy should provide producers with the appropriate tools to identify and promote products with specific traits, also protecting them against unfair practices [3]. In this context, for the protection of products whose reputation extends beyond their geographical area of production have been created specific quality schemes commonly known as PDO, PGI and TSG (which is one of the European Commission's instruments mentioned above). Thus, purchasing a product labelled with the symbols of the European quality (PDO, PGI, TSG), in addition to the guarantee of quality and safety, the buyers are also guaranteed the authenticity of the products.

The protection granted to the geographical indications at international level is considerably improved by the TRIPS Agreement (The Agreement on Trade-Related Aspects of Intellectual Property Rights) managed by the OMC, but the system requires further support and strengthen by all those involved [14].

The work aims to execute an analysis of the use of the three food quality schemes under European law in the period 1996-2019, of classes of products included in these schemes, as well as the interest in this approach by the producers and the authorities of the European Union countries.

## MATERIALS AND METHODS

The information obtained from the study of "DOOR" database ("Database of Origin & Registration") were processed, analysed and synthesized, database that is administered by the European Commission, Directorate for Quality Policies. "DOOR" database includes product names for the PDO, PGI and TSG registered food products as well as the product names required for registration. For each product can be identified the file number, country of origin, type of request (PDO, PGI, TSG), the status (stage) of application (filed, published or recorded) and the specific calendar dates of each phase [4].

The data entered and processed in this study aimed the entire period for which records exist (1996-2019) and refers to: the determination of the number of products registered under the PDO, PGI and TSG quality and safety schemes; the highlight the total number of registered products in each class; the rank of the top five countries with the most registered products or for the last five countries with the fewest registered products; the analysis addresses also the status of implementation of these schemes at European and national level according to specific legislation. These data were sorted, merged, compared, ranked and presented in various tables and graphs; the expression of results was done in absolute and relative values to be compared, analysed and interpreted more easily.

The interpretation of the data was completed with an analysis of the causes that slow down the implementation process of the European systems of quality and a presentation of the different actions that the Integrated Food Safety Policy involves in the EU. The hereby analysis led to some conclusions and recommendations for both entrepreneurs and institutions and authorities involved in the field.

## RESULTS AND DISCUSSIONS

Ensuring the quality, safety and protection of some of the representative products from a particular country or region, emerged as a necessity given that the globalization tends to diminish the regional or national identity. The European Quality System currently protects over 1300 names used to designate traditional agricultural and food products. The product registered at position number 1000 (on 15th February 2011) is called "Piacentinu Ennese" and refers to a variety of sheep's cheese flavoured with saffron, produced by Italy. From the moment the business name of the food product is registered under one of the three schemes of quality, the EU will pursue and ensure that the same protected name shall not be used by other manufacturers [5]. Managing these quality schemes at European level is ensured by specific regulations whose implementation is monitored by the designated authorities [10],[11],[12].

The study shows that in the European Union, 26 states have at least one product registered under one of the quality schemes, the total registrations up to date (on March 2019) being of 1424 products. Malta has no registered product and Estonia has filed a request for registration for a product with PGI from 21.11.2018.

The first place, with the most products registered under the European quality schemes is Italy's (299 products, of which, 167 PDO, 130 PGI and two TSG), followed by France (with 249 products, of which 104 DOP, 144 PGI and one TSG registered product) and Spain (with 196 items, of which 102 PDO, 90 PGI, and 4 TSG); the fourth and fifth places are Portugal's (with 139 registered products, of which 64 PDO, 74 PGI and one TSG) and Greece's (with 107 registered products, of which 76 PDO and 31 PGI).

The countries with the lowest recorded products (on the last positions) are Bulgaria, Danemarca, Ireland, Lithuania (each with 7 registered products), Latvia (with 6 products registered), Cyprus and Romania (each with 5 products registered) and Luxembourg, which occupies the last position with only

four products registered according to the European quality schemes (Table 1).

Table 1 The products registered by EU countries according to the European quality schemes

Country	PDO <sup>1)</sup>	PGI <sup>2)</sup>	TSG <sup>3)</sup>	Total
1. Austria	10	5	1	16
2. Belgium	3	11	5	19
3. Bulgaria	-	2	5	7
4. Cyprus	1	4	-	5
5. Czech Republic	6	23	5	34
6. Germany	12	79	-	91
7. Denmark	-	7	-	7
8. Greece	76	31	-	107
9. Spain	102	90	4	196
10. Finland	5	2	3	10
11. France	104	144	1	249
12. Croatia	11	10	-	21
13. Hungary	6	8	1	15
14. Ireland	3	4	-	7
15. Italy	167	130	2	299
16. Lithuania	1	4	2	7
17. Luxembourg	2	2	-	4
18. Latvia	1	2	3	6
19. Netherlands	6	5	4	15
20. Poland	8	23	10	41
21. Portugal	64	74	1	139
22. Romania	1	4	-	5
23. Sweden	3	3	2	8
24. Slovenia	9	13	3	25
25. Slovakia	2	10	7	19
26. United Kingdom	27	41	4	72
<b>Total</b>	<b>630</b>	<b>731</b>	<b>63</b>	<b>1424</b>

<sup>1)</sup>DOP - Protected Designation of Origin;

<sup>2)</sup>IGP - Protected Geographical Indication;

<sup>3)</sup>STG - Traditional Speciality Guaranteed

Source: Own calculation on the basis of data from DOOR online data base 1996-2019

Of the 5 products registered by Romania, 4 are registered PGI ("Magiun de Prune Topoloveni", "Salam de Sibiu", "Novac afumat din Tara Barsei" and "Scrumbie de Dunare afumata") and one PDO ("Telemea de Ibanesti"). It is also important to mention

that Romania has filed applications for PGI registration for the products: "Carnati de Plescoi" on 4<sup>th</sup> July, 2016, "Cascaval de Saveni" on 27<sup>th</sup> April 2017, "Telemea de Sibiu" on 6<sup>th</sup> June 2018, and "Salata cu icre de Stiuca de Tulcea" dated 7<sup>th</sup> July, 2018.

Regarding the number of products registered under each quality scheme, of the analysis conducted shows that most products are PGI registered (731 entries representing 51.3 % of the total of registrations), followed by products with PDO (630 or 44.2 % of total records) and TSG registered products at a very large distance (63 or 4.4 % of total).

The food products for which registration is requested are included in certain "classes of

products" set by the European Commission for each of the three schemes of quality [8]. In the top classes of food products with the most entries, the first three places are occupied by "the Fruit and Vegetables" class with 24% of the total, followed by "Cheeses" 19 %, and "Fresh meat" 12%. The ranking continues with "Processed meat" 11%, "Oils and Fats" class 9% of the total, "Bakery" 6%, "Other products (spices, etc.)" 5%; the classes of "Fish", "Other Animal Products" and "Other Products", each have 4% of the total registered products. The "Beer" class recorded the fewest products, occupying 2% of the total registered products according to the three quality schemes (Fig. 1).

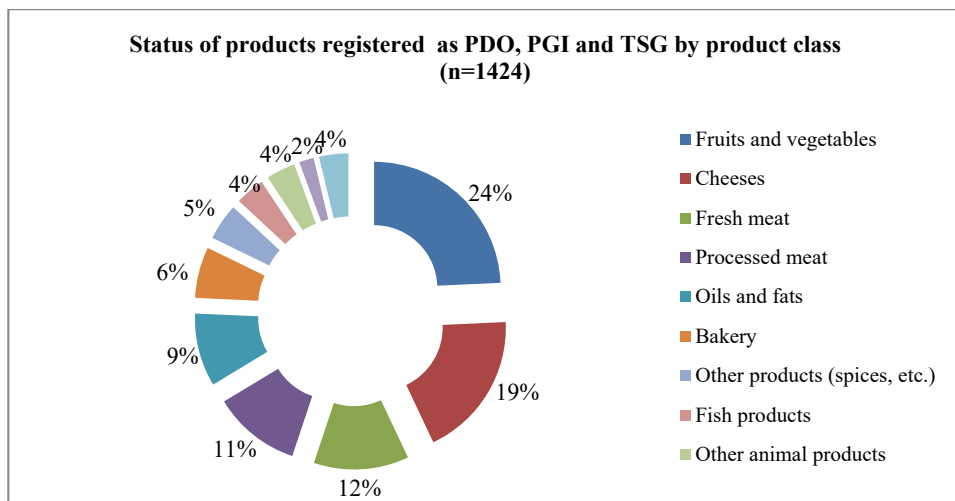


Fig. 1 Status of products registered as PDO, PGI and TSG by product class (n=1424)

## CONCLUSIONS

The implementation of this integrated Food Safety policy in the EU involves various actions, namely: to assure effective control systems and evaluate compliance with EU standards in the food safety and quality, animal health, animal welfare, animal nutrition and plant health sectors within the EU and in third countries in relation to their exports to the EU; to manage international relations with third countries and international organisations concerning food safety, animal health, animal welfare, animal nutrition and plant health; to manage relations with the European Food Safety

Authority (EFSA) and ensure science-based risk management.

By the specific legislation of the quality schemes, the EU protects the product names linked to a particular territory and certain production methods. These schemes identify to consumers products having specific qualities resulting from a particular origin and/or farming method. In order that consumers can be confident that the label claims are justified, compliance with the specification is monitored by public authorities or by a private certifying body. Producer groups producing the genuine products are protected against being undercut

by imitation products sold under the protected names. They should therefore be able to secure a premium price for their additional care and efforts. Since 1992 when these schemes were created (updated and improved in 2006) until now, the producers' interest for them continuously increased; this interest focused particularly on geographical indications, which, as shown in the study currently sums 95,5% of the total registrations. However, we believe that the current procedures for PDO and PGI registration are complex and prolonged. For example, the Romanian products registration procedure has been carried out in some cases over a period of approximately four years: 4<sup>th</sup> March 2009-8<sup>th</sup> April 2011 for "Magiun de prune Topoloveni"; 21<sup>st</sup> November 2014-19<sup>th</sup> February 2016 for "Salam de Sibiu"; 20<sup>th</sup> November 2013-15<sup>th</sup> March 2016 for "Telemea de Ibanesti"; 20<sup>th</sup> November 2013-6<sup>th</sup> April 2017 for "Novac afumat din Tara Barsei"; 26<sup>th</sup> October 2016-3<sup>th</sup> December 2018 pentru "Scrumbie de Dunare afumata". Romania has filed applications for PGI registration for the products: "Carnati de Plescoi" on 4<sup>th</sup> July, 2016, "Cascaval de Saveni" on April 27, 2017, "Telemea de Sibiu" on 6<sup>th</sup> June 2018, and "Salata cu icre de Stiuca de Tulcea" dated 6<sup>th</sup> July, 2018. As such, it would be particularly useful for the authorities involved in the registration activities to identify ways to accelerate the process. We also appreciate that, especially for consumers, there should be a clearer distinction between PDO and PGI. This can be achieved through a global effort (national and EU) of training, information and promotion of these schemes.

The traditional specialities guaranteed scheme covers only 4.4% of all registered products according to all three quality schemes. Based on these results we can say that the TSG instrument created and made available to farmers is not sufficiently attractive for them, which is why more efforts should be made to strengthen this system. In this regard there should be acted to simplify the procedures and shorten the registration period and other means to stimulate the interest of the producers.

Regarding the ranking of countries according to the number of products registered under the EU quality schemes, the penultimate position occupied by Romania should generate a stronger mobilization of the authorities and groups of producers to increase the number of registered products. Our country has no product registered under the TSG scheme although our traditional cultural "heritage" is well known when it comes to food products. The development, support and promotion of this system could represent for our country the guarantee of protection, preservation and promotion of the traditional production methods that add value to the products.

Considering that the three European quality schemes have as their primary objective the protection of specific product names in order to promote the particular characteristics related to their geographical origin and traditional know-how, we consider that Romania can actively contribute to the implementation of the integrated policy of the EU on Food Quality and Safety by completing the portfolio of certified products.

## REFERENCES

- [1] Commission of the European Communities - „Green Paper on agricultural product quality: product standards, farming requirements and quality schemes”
- [2] European Policy for quality agricultural products - [https://ec.europa.eu/agriculture/publi/fact/quality/2007\\_en.pdf](https://ec.europa.eu/agriculture/publi/fact/quality/2007_en.pdf), Accessed on Feb. 5, 2019
- [3] European Commission - Communication from the Commission „Europe 2020 A European strategy for smart, sustainable and inclusive growth” Brussels. <http://ec.europa.eu/eu2020/pdf/COMPLET%20EN%20BARROSO%20%20%2007%20-%20Europe%202020%20-%20EN%20version.pdf>, Accessed on Feb. 5, 2019
- [4] European Commission - Database Of Origin & Registration, <http://ec.europa.eu/agriculture/quality/door/list.html>, Accessed on Mar. 15, 2019
- [5] Pascal C. 2012, Biotechnology in Food Industry, Publisher “Ion Ionescu de la Brad”, Iași, p. 186 -187.
- [6] Pop Cecilia, Pop M., Mureșan G., 2013, Quality, Safety and the Science of Commodities in Food, Publisher “Casa Cărții de Știință”, Cluj-Napoca, p. 155-158.

[7] Regulation (EC) No 178/2002 of the European Parliament and of the Council of 28 January 2002 laying down the general principles and requirements of food law, establishing the European Food Safety Authority and laying down procedures in matters of food safety. Official Journal of the European Communities, L 31/1, 01.02.2002

[8] Regulation (EC) No 1935/2004 of the European Parliament and of the Council of 27 October 2004 on materials and articles intended to come into contact with food and repealing Directives 80/590/EEC and 89/109/EEC. Official Journal of the European Union, L 338, 13.11.2004.

[9] Regulation (EC) No 1924/2006 of the European Parliament and of the Council of 20 December 2006 on nutrition and health claims made on foods. Official Journal of the European Union, L 404, 30.12.2006

[10] Regulation (EU) No 1151/2012 of the European Parliament and of the Council of 21 November 2012 on quality schemes for agricultural products and foodstuffs. Official Journal of the European Union, L 343/1, 14.12.2012.

[11] Regulation (EU) No 664/2014 of 18 December 2013 supplementing Regulation (EU) No 1151/2012 of the European Parliament and of the Council with regard to the establishment of the Union symbols for protected designations of origin, protected geographical indications and traditional specialities guaranteed and with regard to certain rules on sourcing, certain procedural rules and certain additional transitional rules. Official Journal of the European Union, L 179/17, 19.6.2014.

[12] Regulation (EU) No 668/2014 of 13 June 2014 laying down rules for the application of Regulation (EU) No 1151/2012 of the European Parliament and of the Council on quality schemes for agricultural products and foodstuffs. Official Journal of the European Union, L 179/36, 19.6.2014

[13] Report on the food crisis, fraud in the food chain and the control thereof. European Parliament, Committee on the Environment, Public Health and Food Safety, Plenary sitting, 4.12.2013

[14] World Trade Organization - Agreement on Trade-Related aspects of Intellectual Property Rights pg 328-330, [www.wto.org / english/docs\\_e/legal\\_e/27-trips.pdf](http://www.wto.org/english/docs_e/legal_e/27-trips.pdf).