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## NEW CHALLENGES FOR THE PRODUCERS AND THE CONSUMERS OF PIG MEAT

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### ABSTRACT

Modern studies show a need to develop a new concept of balanced development of the pig farming, which is not entirely aimed at reducing production costs. This plan must correspond with the principles of sustainable development, welfare and events, related to the environment. The aim of this study is to analyze the results of the implementation of the new EU requirements, related to the type of farming of pigs (in force since 1st January 2013) and the costs for local producers and consumers. This will allow effectively to priorities of the activities in the production of high quality and safe pig meat.

**Key words:** production costs, pig farming, customers, pig meat, agricultural policy

### INTRODUCTION

Pig farming, as a part of one of main sector of Bulgarian economy – Agriculture, Agriculture, forestry and fishery (1) develops in conditions of our country's EC membership and according to the requirements and mechanisms of European legislation and the Common Agricultural Policy (CAP). Well-developed agriculture, and pig farming in particular, is important to guarantee food security at both regional and worldwide scale. Pig farmers, however, face substantially increasing risks of different nature and reduced profits due to growing costs of inputs. That is why the European Parliament (EP) deems necessary to continue with the support of producers, with obligatory improvement of risk management instruments with regard to adequate and purposeful response in critical circumstances.

Recent studies demonstrate that pig farming needs a novel, balanced concept of development,

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which is not entirely focused on reduction of production costs. It should always correspond to the principles of sustainable development, animal welfare and measures aimed to environmental protection. This is entailed by the fact that the expectations of the modern consumer are rightly aimed at satisfying the primary needs of farm animals: good feed, good housing conditions and proper health care (2).

**The purpose** of the present study was to analyse the results from the implementation of the new EC requirements for pig farming (into force from 1 January 2013) and accompanying costs upon local producers and consumers of pig meat.

**Subject** of the study is pig farming as economic activity producing pig meat, and **the focus** – the new EC requirements and their economic impact.

The thesis of the report is that the new EC requirements related to pig farming and respective accompanying costs could form a different (specific) attitude in pork producers and consumers in the different areas (regions).

## 1. Prerequisites for a new concept in pig farming development

For pig producers, the revolution in biotechnology (from cloning to production of genetically modified foods) is a definite and real threat and a means providing unlimited potential. At the same time, organisations have appeared (People for the Ethical Treatment of Animals, PETA), fighting against the use and implementation of unnatural means of production on the background of alternative possibilities for production of animals with good health and better relationship between production systems and environmental protection.

Within the business community, a pain problem to pig welfare is the housing of pregnant sows. The Council Regulation (3) bans their keeping in individual stalls as of 1 January 2013 with regard to better welfare standards and warranting humane housing rules at farms (4). To 1 January 2013, only 10 countries adhere to the EC legislation regarding animal welfare (Austria, Bulgaria, the Great Britain, Estonia, Lithuania, Latvia, Luxembourg, Romania, Slovakia and Sweden); for the others, the implementation rate varies between 58 and 99%.

It is anticipated that after the new animal welfare rules come into force, the number of pigs in the EC could decrease by up to 10%, and the price of pork would rise considerably.

## 2. Pig welfare in Bulgaria

According to the Association of pig farmers in Bulgaria, pig farms are in compliance with the EC animal welfare requirements. Many farms

have invested in technological equipment update, including provision of free floor area not less than 10% over the minimum standard and provision of 11 hours artificial lighting (by 3 hours more than the standard requires).

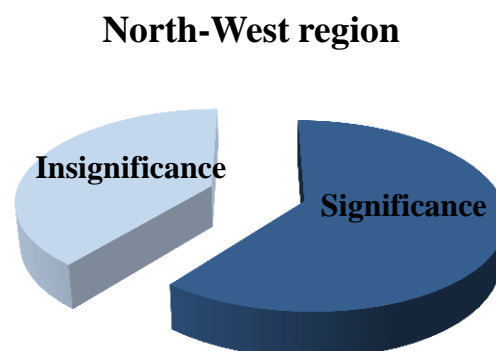
The new EC requirements to pig farming reflect on producers' costs and hence, on the price for consumers. With this regard, by the end of 2012, a survey was conducted in three of the six NSI statistical regions at the NURS 2 level (5) – Northwestern, Southeastern and Central Southern, where, as per 31 December 2012 lives 46% of Bulgarian population (6).

Random questioning in retail stores located in settlements with different population density, education and purchasing power, the consumers' opinion was investigated on the following issues:

1. The priorities in pig farming when choosing a product;
2. The share of costs for providing humane conditions to pigs;
3. The possibility that consumers take a part of costs related to pig welfare.

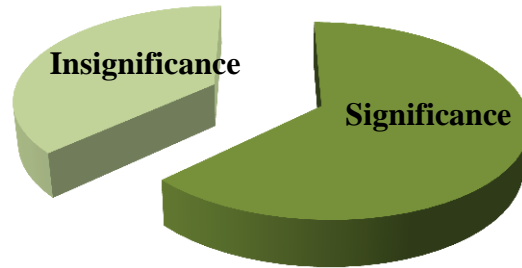
After statistical analysis of data, the following results were obtained:

According to 39% of pork consumers in the Northwestern region, the information about the housing of pigs was not of significance, although 61% answered that they had an opinion on the issue and it could influence their preferences for a specific product vs another as well as for its amount (**Figure 1**). A similar pattern of opinions was observed in Central Southern (37% : 63%) (**Figure 2**) and Southeastern (40% : 60%) (**Figure 3**) regions.



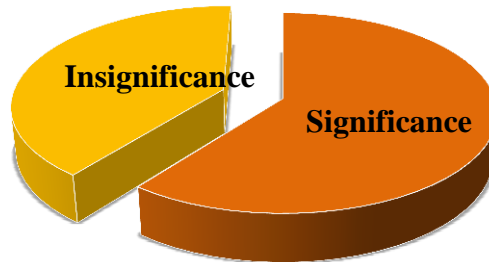
**Figure 1.** Structure of the consumers' opinion in the North-West region towards the significance of the methods of breeding pigs

### South Central region



**Figure 2.** Structure of the consumers' opinion in the South-Central region towards the significance of the methods of breeding pigs

### South-East region

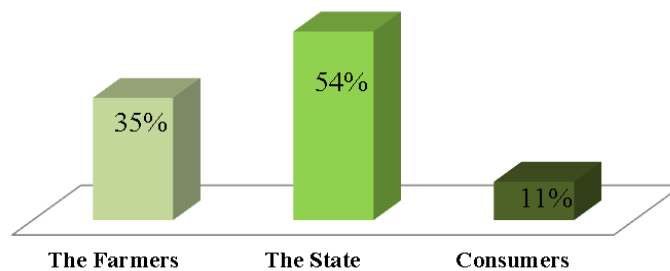


**Figure 3.** Structure of the consumers' opinion in the South-East region towards the significance of the methods of breeding pigs

Who should pay the pig welfare costs?  
 In the Northwestern region, 54% of respondents affirmed that costs should be paid by the state through state mechanisms and programmes; 35%

believed that costs should be paid by farmers and only 11% considered that increased costs should be on the account of consumers (**Figure 4**).

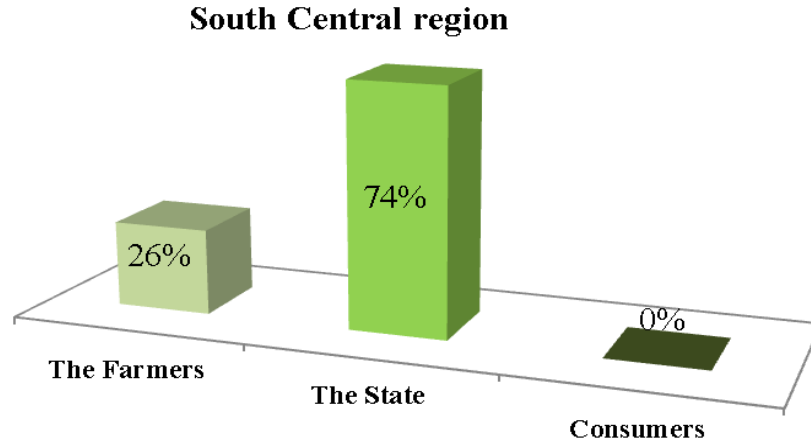
### North-West region



**Figure 4.** Structure of consumers in the North-West region costs for the provision of conditions for the welfare of pigs

The major part of consumers in the Central Southern region (74%) assumed that costs

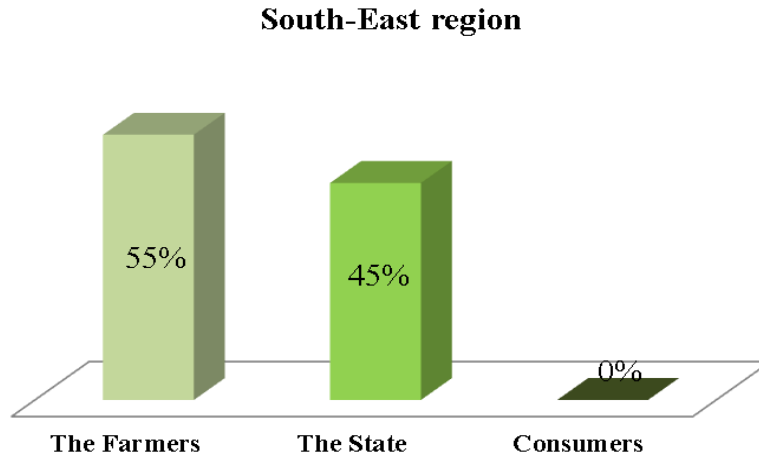
should be borne by the state and the other 36% - by farmers (**Figure 5**).



**Figure 5.** Structure of consumers in the South Cental region costs for the provision of conditions for the welfare of pigs

In the Southeastern regions, 55% of respondents believed that costs should be paid by producers whereas 45% - by the state. In the complex

process of providing pig welfare, the consumers from this region attributed a minor role to the state (**Figure 6**).



**Figure 6.** Structure of consumers in the South-East region costs for the provision of conditions for the welfare of pigs

The European policy in the field of agriculture aims to support the revenue of agricultural producers and at the same time, to encourage the production of high-quality products required by the market and to try to find environmental-friendly alternatives for development. The state protectionism policy of the EC is one of the main

features of the pig industry. It is closely associated to internal market regulation, and focused on increased competitiveness, restriction of import and support of export. The analysis of state subsidy systems for pig farming allowed classifying the directions and the frequency of their utilisation (**Table 1**):

**Table 1.** State support of pig farming

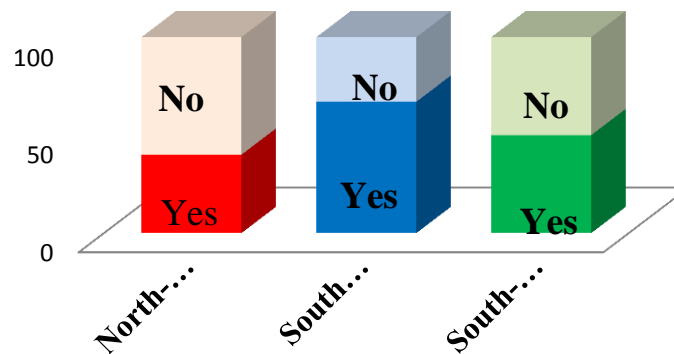
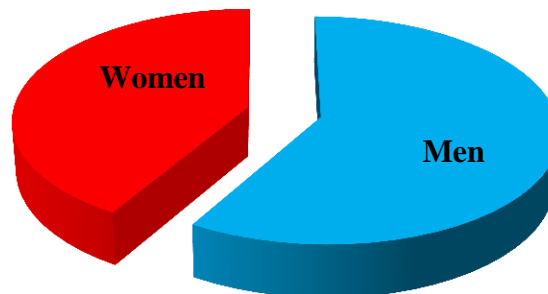
	Directions and means:	Country:
1.	Grants, interest subsidy, research project funding	USA, Canada, New Zealand, Germany Belgium, Romania, Hungary, Estonia
2.	Insurance, loan subsidy	Estonia, The Czech Republic, Slovakia, Canada, USA, New Zealand
3.	Compensation of material and production costs	Hungary, Romania
4.	Price control	Romania, Slovenia, Hungary
5.	Bonuses	Romania

The consumers in the Central Southern and Southeastern regions did not feel concerned with regard to bearing the costs of better pig welfare conditions. If however the question was: Is there an option some part of pig welfare costs to be paid by consumers?, the share of consumers ready to pay more for pork with the intention to create better welfare conditions for farmed pigs, was 40% in the Northwestern region, 67% in the Central Southern region

and 50% in the Southeastern region (**Figure 7**).

According to the analysis of results, men are the major part of pork buyers (59%) compared to women (41%) (**Figure 8**).

More than half of pork buyers (53%) were under 40 years of age, and within the range 51-60 years – 13% (**Figure 9**).

**Figure 7.** Structure of consumers for willingness to pay a higher price for pig meat**Figure 8.** Structure of respondents by sex

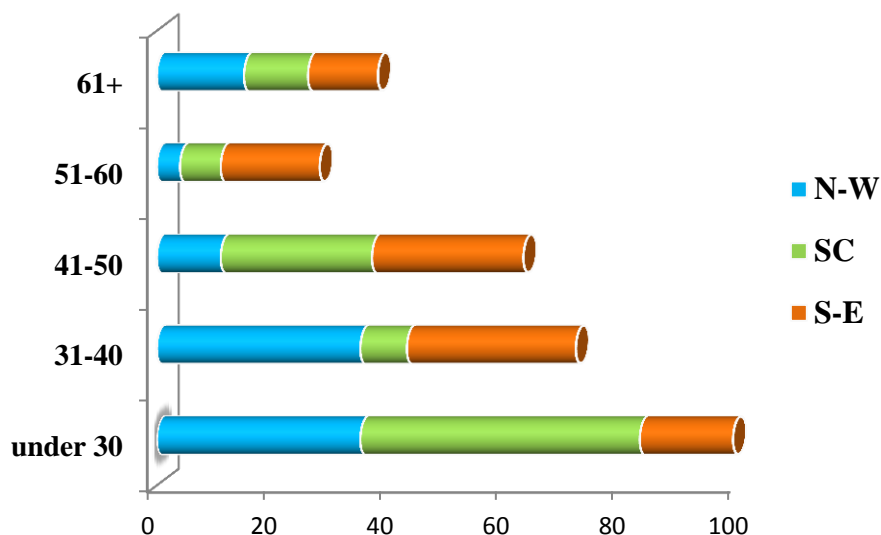


Figure 9. Age structure of respondents

In regional plan, buyers under 40 years of age were predominant in the Southwestern regions (70%), consumers under 30 years of age – in the Central South regions (48%), and those between 31 and 40 years of age – in the Southeastern region (29%)

## CONCLUSION

The performed study allows concluding that:

1. Most pork meat consumers were concerned with animal housing conditions. The results in the surveyed regions were comparable.
2. More than half of pork meat consumers (54%) believed that pig welfare costs should be paid by the state, 43% - by farmers and 3% - by consumers. The regional opinions were different: the role of the state is outlined in the Northwestern and Central Southern regions, whereas that of pig farmers – in the Southeastern region. The consumers were indicated as potential cost payers only in the Northwestern region.
3. More than half of consumers (52%) were ready to pay more for pork in order to create better pig welfare conditions. The opinions differed according to the region – in the Northwestern region such attitude was not declared, in the Central Southern was present, whereas in the Southeastern the opinions were not consistent.

4. The predominant part (59%) of pork meat buyers were men. Of all buyers, 53% under 40 years of age and 13% – over 60 years of age.

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