



# Shaping Buying Behavior with Regard to Food Selection and Consumption

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## Abstract

Changing trends in food choices, cooking methods, and consumption are essential in today's evolving economic environment. The above significantly impacts the formation of food supply in the market. This research attempts to determine the relationship between the transformation of purchasing behavior with respect to food choices and formed purchasing habits using the example of food choices of plant and animal origin. The research presents the results of a marketing study conducted in the form of interviews in Russian cities. Moreover, the research highlights the main factors that guide consumers' food choices, considering environmental influences, and focuses on food preparation and consumption processes. The authors determine the vectors of development based on the regularity of several characteristics in relation to the formation of the model of purchasing behavior of end consumers of food products depending on their age and social status. Additionally, the authors reveal the relationship between income levels and purchasing preferences for food choices, as well as the formation of purchasing habits in relation to the entire life cycle of the product. The main conclusions regarding the definition of significant characteristics that guide the consumer in the choice of food of plant and animal origin are presented.

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## Keywords

Consumer preferences · Food demand · Market research · Buying behavior · Food market

## JEL Classifications

Q1 · Q11 · Q13

## 1 Introduction

Currently, the development of several priority sectors of agriculture is a significant task of the country, where the main goal is undoubtedly to ensure its food security. However, at the present development stage, consumers play an important role in shaping the market offer, particularly the transformation of consumer preferences and formed habits regarding the choice and consumption of food. Due to severe import restrictions on some products and production means, technology organizations are forming new development strategies, which should be built considering the development vectors of consumer behavior in relation to food choices (Ashmarina et al., 2021; Paptsov, 2018). This approach will allow manufacturers to build a new level of quality model of marketing relations with consumers and, consequently, increase their competitiveness (Biryukova & Ashmarina, 2021). The aspects mentioned above point to the importance of this research, which is based on the analysis of purchasing behavior in relation to the entire process of decision-making on the purchase of food of plant and animal origin (Boer et al., 2004; Grashorn & Serini, 2006; Grunert, 2006).

## 2 Materials and Methods

This research aims to identify factors and trends in the choice of food of plant and animal origin, considering the formation of purchasing behavior during the entire life cycle

of the product (selection, preparation, and storage). Based on this goal, the following tasks were identified:

- To identify major trends in plant- and animal-based food choices, considering environmental influences;
- To characterize the main trends in the development of food habits in different target groups of consumers;
- To determine the constants of the consumer's food behavior model that guide their food choices of plant and animal origin (Biryukova et al., 2023; Chutchev et al., 2019).

The information basis of this research includes the results of market research conducted in the panel form in December 2022 in Moscow and Krasnodar.

### 3 Results

In accordance with the goal and objectives of this research, the authors conducted marketing research in the panel form among different groups of consumers. In the research sample, 71% are women, and 29% are men. The respondents' age composition is as follows:

- 37%—between the ages of 36 and 44;
- 24%—between the ages of 45 and 54;
- 19%—between the ages of 55 and 64;
- 11%—between the ages of 25 and 35;
- 9%—younger than 24.

The level of education among those surveyed corresponded to the following values:

- 1.7% do not have a complete secondary education;
- 19.2% have a high school education;
- 33.8% have secondary vocational education;
- 42.3% have higher education.

Of all those surveyed, there were those who did not answer this question and about 7.5% of those who had a scientific degree.

The majority of the respondents surveyed live in a family of two (38%), households of three persons (25%), and households of four or more persons (22%). The remaining respondents live alone (15%).

All respondents live in the city. About 74% of respondents have lived in the city for more than 15 years, 21% have lived in the city for about 7–10 years, and the rest have lived in the city for more than 2–5 years. About 83% of respondents are working people, of whom 46% work in executive positions and 17% are housewives. Regarding the differentiation of consumers by target group, it is necessary

to determine the level of income. The study found that most respondents have an income per family member ranging from 46 to 65 thousand rubles (37%) and from 21 to 45 thousand rubles (32%). The number of respondents with an income of less than 20 thousand rubles was about 18%. As a rule, this group of respondents included households of four or more people (64%). An important criterion for selecting respondents was their interest in the research purpose, which was reflected in their responses to questions about determining aspects of product quality, price, attitudes toward healthy lifestyles, and approaches to handling the product throughout its lifecycle. The questions in the study were grouped relative to three vectors: food choice, preparation, and consumption and disposal of leftovers (Marwa et al., 2012; Sergeyeva, 2020). During the analysis, the authors managed to establish the main criteria for food selection. The distribution of responses regarding the choice of product criteria is presented in Table 1. It is necessary to note the high orientation of respondents with regard to the definition of significant characteristics and the choice of certain categories of products. According to the majority of respondents (73%), the main criteria for choosing a product are related to the way of eating the product and the speed of its preparation. The majority of respondents associate the cooking stage with a routine process, for which they strive to reduce the time spent (Biryukova et al., 2021). This is why there is a great preference for semi-finished products, as well as products that require less effort to prepare them for cooking.

As a rule, the choice of product, in particular meat and meat products, is seriously connected with the brand's positioning, which is indicated by 81% of respondents. Respondents associated this indicator with other criteria, such as price, variety of assortment, and product safety. In their opinion, the brand is the standard of product quality. If a well-known brand introduces new products in the range, about 62% of respondents are willing to try them. Product freshness (78%) and taste (77%) are equal factors in the choice of meat and meat products, with product freshness sometimes being compared with shelf life and appearance in respondents' answers. These answers indicate the transformation of these concepts in the choice of semi-finished products, which the respondent evaluates depending on the choice of semi-finished product and the way it is packaged. The respondents considered the product's taste in the totality of the cooked dish, where about 34% importantly highlighted the presence of sauce or seasoning used during cooking or consumption of the food. About 57% agreed that eating meat and meat products is the basis of a complete diet. About 23% believe buying meat as a stand-alone product that requires additional preparation costs becomes a holiday meal or a product to prepare dishes or semi-finished products on weekends. This state of affairs is due to the amount of time required to prepare meat. Most respondents agreed that

**Table 1** Distribution of respondents' answers regarding the product choice model

Criteria for evaluating purchase factors	Distribution of respondents' answers regarding the priority of criteria selection (out of 211 interviewees)
<i>Meat and meat products</i>	
Brand	169
Product freshness	165
Flavor qualities	164
Cooking time	147
Nutritional benefits	128
Package size	122
Variety of assortment	101
Cost	94
Product safety	37
<i>Vegetables</i>	
Appearance	210
Freshness	179
Health benefits of healthy eating	143
Variation in cooking	139
Time needed for cooking	116
Price	105
Package size	102
Manufacturer	78

Source Compiled by the authors based on research conducted

this process is mostly done by women (89%); the dishes to be prepared are discussed by all family members. That is why great attention is paid to the range of products offered to consumers (48%). Health benefits are no less important criteria for product selection (61%). It should be noted that women and men rated this parameter equally high. The respondents noted the high quality of processed meat products on the market, which, in their opinion, mostly include semi-finished products prepared by major brands from raw meat. According to the respondents, usefulness is characterized by such criteria as the amount of fat in the product (78%), the category of meat used in the product (63%), and possible cooking methods (45%). However, we should also note the high interest of respondents in factors related to production processes. Thus, 18% of respondents said that the conditions of animal breeding and the use of growth stimulants and hormones in production are significant for them. These factors mainly interested people with higher education and a scientific degree. In their opinion, these criteria characterize the product's safety and are fundamental when choosing meat products. The quality of animal fattening is significant for 11% of those surveyed. About 4% would like

to be able to observe the process of raising animals, in particular, to attend tours of the company or follow production processes online.

The interview also focused on the choice of vegetables offered in the market to better understand the transformation of the model of purchasing behavior in relation to the evaluation of a wholesome meal. Thus, for the majority of respondents (98%), the main criterion for choosing vegetables is the dish they cook. About 74% of those surveyed buy vegetables in the store in advance; the decision to cook the meal is made on the cooking day. As a rule, such responses were given by households of three or more people. For all respondents, a significant characteristic when choosing vegetables is the appearance, by which the majority of respondents mean the size of vegetables, cleanliness, and consistency. The possibility of choosing was a significant aspect for 63% of respondents. In their opinion, it is important to self-assess each vegetable and choose the required amount of products. The product's freshness was characterized by the majority of respondents as a factor of choice, as well as a criterion for making a purchase or refusing a purchase by 85%. Thus, the sluggish appearance of the vegetables, as well as the presence of signs of spoilage, was an undoubted factor in seeking alternatives or refusing to buy. For 39% of those surveyed, product freshness was associated with harvest time. About 94% of the women surveyed believe that adding vegetables to meals is the basis of a healthy diet. Answering the question "What dishes would you refer to a healthy diet," about 72% listed dishes of traditional Russian cuisine, in particular borscht, cabbage soup, solyanka, etc. However, about 53% of the respondents indicated the need to allocate additional time for their preparation.

About 66% believe that the possibility of cooking different dishes is an important factor when choosing vegetables. However, most respondents (about 64%) could not list more than five positions of combined dishes. For 55% of respondents, the important criterion was the time they would spend on cooking a meal, which characterizes the current transformations in the formation of the model of purchasing preferences of urban households.

The survey formulated the main food habits of different target consumer groups. Thus, for most young people under 30, about 20% of those surveyed cited quickness of cooking and eating as the main criterion. Of them, about 35% described cooking as a routine process. In their view, food should be cheap and easy to prepare; the process of eating is a formal need to satisfy hunger. At the same time, about 75% of respondents confirm the importance of nutrition as a factor influencing health and choose products belonging to the healthy food category.

For respondents between the ages of 30 and 40, the quality of the chosen products and the benefits they bring to their

health are significant aspects. However, attitudes toward eating in this group were significantly transformed, with this group of respondents emphasizing the evening meal, when all family members gather around the table, as the main meal of the day. The rest of the meals were not perceived as nutritious and, according to 56% of those surveyed, were snacks on the go. For people over 40, eating habits are comparable and based on the formation of three full meals. However, the trend of reducing the time for cooking and simplifying the meals is also present in these segments.

In recent years, price has become an increasingly important factor in choosing food. However, according to respondents, the quality and taste of the product should not depend on the price. This is believed mostly by respondents with less income per family member. Another important factor in the choice of products of the studied categories is the presence of ongoing promotional events. However, most respondents do not buy products in the presence of promotions in advance.

## 4 Discussion

Thus, the formed criteria for the choice of meat and vegetable products are dictated by the transformation of the model of consumer behavior in relation to the entire life cycle of the product (Biryukova et al., 2023; Grashorn & Serini, 2006). Consumers believe the brand is the primary motivating factor in choosing meat products. When choosing vegetables, the consumer is guided by such criteria as the product's appearance and freshness. The criterion of health benefits is becoming increasingly important despite the simplification of cooking methods and the reduction of full meals. Consumers of all ages increasingly focus on their health, which is a significant aspect of their food choices. However, eating on the go seriously reduces food choices and cooking variations. Most respondents try to cook full meals on weekends or in the evenings. Significant transformations in the choice of food are more characteristic of the choice of meat and meat products, where consumers prefer semi-finished products as a product of everyday cooking.

## 5 Conclusion

Thus, the main established factors that influence consumer behavior when choosing meat and meat products are brand, the product's freshness, taste, cooking time, health benefits, and package size. The main factors influencing purchasing behavior when choosing vegetables are the appearance, freshness, health benefits, variability in preparation, and time spent on preparation.

These significant characteristics show a significant transformation in the development of the model of the purchase decision-making process, considering the further processes of food preparation and consumption. This research is fundamental to developing product policy vectors for organizations operating in this area. Of particular significance is the definition of the vector of the conceptual development of the transformation of food habits in relation to the preparation and consumption of food, which has a considerable impact on consumer demand. We believe it is necessary to continue research in this area and evaluate the process of cooking and eating in depth to determine the influence of factors on the transformation of food habits in different segments. In our opinion, this research should be carried out considering the analysis of the range of products offered and the analysis of the preparation of the main dishes to determine new vectors for the development of assortment categories.

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