

досягаються при дотриманні оптимального термічного режиму: температура - 80...85°C, тривалість - 8...10 хв. Стабілізуючий ефект такої температури обумовлено тим, що вона інгібує ферменти плодів, сприяє накопиченню антоціанів за рахунок гідролізу лейкоантоціанів, менше відбивається на деструкції усіх форм флавоноїдів. При тривалості термічної обробки 8...10 хвилин із застосуванням оптимальної температури можна досягти найкращого збереження поліфенолів, тим самим й кольору соусів на основі плодів.

Висновки. Таким чином, отримані дані свідчать про те, що використання усіх обраних добавок разом дозволяє значно зберегти поліфеноли плодів, вміст яких достатньо високий й максимально наближається до вихідної сировини. Усі добавки, що застосовані при розробці нової технології у визначених концентраціях при певних щадних технологічних режимах в комплексі, дозволяють отримати соус з підвищеними якісними показниками за рахунок високого вмісту біологічно активних речовин. Розроблені соуси з плодів вишні та абрикосів мають високі органолептичні показники: смак, колір, запах, аромат, що властиві вихідній сировині.

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42. STUDY OF THE PROPERTIES OF PROTEINS FROM THE SEEDS OF OIL CROP

In order to be healthy, in addition to sports, it is necessary to eat properly. Nutrition is the basis of all life processes of the body, which is necessary for the continuous renewal of cells and tissues, the formation of various regulators of vital activity. Deficiency of proteins in food leads to the breakdown of the body's own proteins. Plant proteins, due to the lack of many essential amino acids in their composition, cannot completely replace animal proteins. But rational nutrition involves a combination of animal and vegetable products, which improves the balance of amino acids. In addition, proteins of vegetable origin have a positive effect on the organoleptic indicators of products (appearance, color, taste, consistency). According to this, the nature of the use of vegetable proteins, the choice of their specific types and the percentage level of use in the product are determined. Summarizing the current data of theoretical and research works of Ukrainian and foreign authors, the possibility of using sunflower seed kernel processing products is given.

Sunflower seeds are a traditional oil crop. Sunflower, which is used as an industrial raw material, is divided into several types. According to the purpose, confectionery and oil types of sunflower are distinguished. A sunflower seed is a cell created by nature for storing vegetable oil and easily digestible protein. The processing of sunflower into oil and fodder meal implements a simplified technology of pressing the seeds together with the husk. Meal contains components that are extremely valuable for human nutrition (primarily easily digestible vegetable protein). Therefore, the direct use of the natural kernel in food allows you to consume biologically active compounds along with oil and protein. Compared to other valuable products, such as various types of nuts and seeds, sunflower kernels have a higher content of some key nutrients: folic acid, vitamin E, and selenium. According to this indicator, sunflower is close to chocolate, but contains less saturated fat and more fiber, iron, zinc and protein. In recent years, scientists and specialists of various countries have directed their efforts to create combined

meat products that have traditional consumer properties and are characterized by the possibility of using whole meat raw materials together with other functional substances of animal and plant origin. It should also be noted that the combination of meat raw materials is envisaged primarily with cheap highly functional drugs obtained from various raw material sources of plant and animal origin, most of which are by-products of processing. In modern conditions, the development of the meat food industry encourages the improvement and introduction of innovative technologies using non-traditional types of raw materials.

Conclusions. Enrichment of meat products with proteins of plant origin is relevant, since in many cases the purpose of using plant raw materials in the technology of meat products production is to increase their nutritional value, regulate the amino acid composition, reduce the consumption of meat raw materials, regulate rheological indicators, expand the assortment, provide ready-made products with preventive and functional properties, as well as the creation of products with new consumer properties and an affordable price. Plant supplements based on the seeds of oilseeds are a promising direction, because thanks to their unique chemical composition and functional properties, they are able to ensure the achievement of the predicted nutritional value of the finished product in accordance with the modern requirements of nutrition.

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43. EXPEDIENCY OF USING OAT FLOUR IN THE PRODUCTION OF CHOPPED MEAT SEMI-FINISHED PRODUCTS FOR RESTAURANT TECHNOLOGIES

Introduction. In recent years, food additives made from natural plant materials have been given great preference in the food industry, as they affect the chemical composition of food, improve the organoleptic, physicochemical, structural and mechanical properties of final products

Relevance of the topic. An effective way to optimize the nutritional value of products and improve the nutritional structure of the population is to develop the production of a wide range of emulsion-type products that use cereal flour, including oat flour.

Oats are one of the most nutritious cereals and are high in protein and fiber. Its grains contain: protein - 12.3...15.8% on average, starch - 40.8%, fat - 4.67%, ash - 4.05%, sugar - 2.35%, vitamins B1, B2. Oats do not contain trans fats, cholesterol, calcium, phosphorus, zinc and other minerals that have the effect of preventing osteoporosis, promoting wound healing, and preventing anemia. Regular consumption of oats is very beneficial for people with diabetes, as it helps to reduce blood glucose and weight loss. Therefore, oats are a high-quality food product and a source of calcium. In terms of its amino acid composition, oat flour is a complete product that is closest to valuable muscle protein. Oatmeal contains a lot of easily digestible carbohydrates, and it also contributes to the formation of serotonin in the body, which is responsible for good mood. Oat flour is characterized by a low starch content and a high content of fat and vegetable dietary fiber. Fiber is of great value (2.75%). Soluble fiber prevents fluctuations in blood sugar and has a tonic effect, while insoluble fiber restores intestinal microflora. Due to the presence of a significant amount of adhesive substances, oat flour has dietary properties [1].

Materials and methods. To improve the consumer properties of chopped semi-finished poultry products, the possibility of using oat flour as a source of dietary fiber and plant-based protein in their formulation was studied [2].

Results and discussion. The results obtained allow us to conclude that the addition of oat flour to