

Russian regional scientists project proposals for participation in FP7

THEME 1: Health

[FP7-HEALTH-2010-single-stage](#)

[FP7-HEALTH-2010-two-stage](#)

[2.4. TRANSLATIONAL RESEARCH IN OTHER MAJOR DISEASES](#)

[3.5. SPECIFIC INTERNATIONAL COOPERATION ACTIONS FOR HEALTH SYSTEM RESEARCH](#)

Denis V. Matusovich, research officer

Scientific research department

Organization Name: Kemerovo Institute of Food Science and Technology
E-mail address: intactoffice@yandex.ru
Telephone: +7-3842-744232
Address: Stroiteley boul., 47, 650056, Kemerovo, Russian Federation

Is interested in participation in a project that will be prepared and submitted in the following topics:

Development of food technologies for people who suffer from heritable amino acid metabolic diseases

Short description of the organization:

Kemerovo Institute of Food Science and Technology was founded in 1972. KemIFST is the only Institute that does complex training of specialists for almost all branches of food industry. It has 4 departments: technological, mechanical, economical, of multilevel preparation, multistage professional training of specialists, secondary technical and correspondence one. In the Institute there 2 dissertation councils dealing with defense of doctoral and candidate thesis.

KemIFST possesses the necessary and sufficient scientific, personnel and professional potential to carry out the amount of work planned. The biggest scientific schools in the country were established that are headed by honored science workers; three fourths of the faculty have scientific degrees. More than 50 patents for objects of intellectual property were received, 38 textbooks and manuals was published for the students of main branches of food industry.

Expertise offered:

Purpose of the work is to develop effective biocatalyst technologies of sorption of amino acids from proteins on the basis of integration of properties of bioselective adsorbents in connection with creating food products for people who suffer from heritable amino acid metabolic diseases

The main task of this research work is development of specialized products for people who suffer from heritable amino acid metabolic diseases in order to bring the quality of curative ration closer to ration of healthy people (the exception to this rule, naturally, would only be different content of corresponding amino acids in curative ration)

Research work is presented in the following principals:

- Studying amino acid substance and technological properties of raw stuff;
- Studying the influence of biotechnological processing of raw stuff on the principles of sorption amino acids from proteins by adsorbents
- Assessment of substance, physical-chemical and structural-mechanical properties of the received systems;
- Studying main principles and optimization of process of biocatalyst sorption of amino acids from proteins;
- Using established principles for development of technical documents;
- Development of type schemes of technological processes of food production for people who suffer from heritable amino acid metabolic diseases.
- Studying physical-chemical and biological criteria of quality and safety of the developed production.



<http://www.ric.vsu.ru>

Expected results: Development of principally new technologies of biocatalyst sorption of amino acids from proteins with the help of absorbents in connection with creating food products for people who suffer from heritable amino acid metabolic diseases. The products which can meet competition on external and internal markets.