Josip Juraj Strossmayer University of Osijek Faculty of Food Technology Osijek



LEARNING OUTCOMES of the university specialist study programme Nutrition

Osijek, 2024.

### LEARNING OUTCMES AT THE LEVEL OF STUDY PROGRAMME

| Category         | Learning outcomes  |
|------------------|--|
| Knowledge and    | - explain basic characteristics of balanced diet throughout the lifecycle                      |
| comprehension    | - explain characteristics of a proper diet for person with diagnosed specific                  |
|                  | health issues  |
|                  | <ul> <li>explain basic study types used in dietary habits survey</li> </ul>                    |
|                  | <ul> <li>explain processes in the body followed by the consumption of a certain</li> </ul>     |
|                  | food/nutrient  |
|                  | <ul> <li>explain processes in the food during the processing</li> </ul>                        |
| Application      | <ul> <li>choose foods that enable balanced dietary intake by respecting</li> </ul>             |
| (analysis,       | individual preferences of a user   |
| synthesis and    | <ul> <li>interpret pros (benefits) and cons (risk) of a certain food consumption to</li> </ul> |
| evaluation)      | a user   |
|                  | <ul> <li>compile dietary guidelines/plan for the intended user</li> </ul>                      |
|                  | <ul> <li>design its own study in the field of nutrition</li> </ul>                             |
| Communication    | <ul> <li>successfully communicate with peers from the same profession</li> </ul>               |
| and presentation | <ul> <li>successfully communicate with work colleagues</li> </ul>                              |
| skills           | <ul> <li>successfully communicate with users in oral and in written</li> </ul>                 |
|                  | <ul> <li>successfully present professional topics to general public</li> </ul>                 |
| Learning skills  | <ul> <li>develop skills for lifelong learning</li> </ul>                                       |
|                  | <ul> <li>critically follow new professional and scientific publications</li> </ul>             |
|                  | <ul> <li>individually and continuously gain knowledge and skills needed for the</li> </ul>     |
|                  | specific workplace   |
|                  | <ul> <li>apply gained knowledge and skills in future professional and scientific</li> </ul>    |
|                  | education  |

# JOSIP JURAJ STROSSMAYER UNIVERSITY OF OSIJEK Faculty of Food Technology



# **REPORT ON THE COURSES**

postgraduate studies

# NUTRITION

Osijek, 2010.

# 1. INTRODUCTION

Nutrition is one of the most important factors in human life and society and as an exogenous factor it influences human health. Due to our modern life style, which includes nutrition and (in)activity, there is a worldwide pandemia of nutrition disorder and chronic non-infective diseases (obesity, cardiovascular diseases, diabetes type II and some types of carcinoma).

Therefore, by promoting proper nutrition it is possible to directly influence population health, which in the long run results in the future cost reduction of medical treatments caused by food-born diseases. In addition to that, physical activities become an important factor in health promotion, which combined with proper nutrition, significantly contribute to a better health status.

Postgraduate Specialist Study of Nutrition, proposed by the Faculty of Food Technology, is aimed at providing knowledge based on the latest, scientific findings, technologies and ethical norms in the field of human nutrition.

The Faculty of Food Technology in Osijek is one of the oldest faculties of the Josip Juraj Strossmayer University in Osijek and has a long tradition of postgraduate scientific studies, both masters' study, which started first, and doctoral studies, in the field of biotechnical sciences, launched later.

Starting from the academic year 2005/2006 a new postgraduate specialist study Food Safety and Quality was launched at the Faculty of Food Technology, having so far 44 students enrolled.

Postgraduate Specialist Study of Nutrition is a logical continuation of scientific, professional and teaching activities at the Faculty of Food Technology (FFT), scientific branch Nutrition, scientific field Food Technology. Faculty of Food Technology has had the study of Food Technology and Process Engineering since the academic year 2001/2002. In addition to that, some professors have taken part in the doctoral study of Nutrition at the Faculty of Food-Biotechnology at the Zagreb University.

While launching this study of Nutrition, The Faculty of Food Technology has simultaneously informed all potential candidates who might find this study useful and interesting, including food technology engineers, teachers, professors and doctors. They should all be interested in lifelong learning, aimed at permanent education and prevention of non-infective diseases, which are proved to be connected with nutrition. So far there have been various inquiries of potential students with regard to enrolment possibility, which leads us to conclusion that there will be a sufficient number of interested candidates.

Postgraduate Specialist Study of Nutrition has been designed in accordance with the demands and regulations related to such type of studies in Croatia opening the possibility for students' mobility via enrollment in adequate courses at other type of studies. Furthermore, students of other postgraduate studies can choose certain contents of this study or carry out some parts of their research.

### 2. GENERAL PART

#### 2.1. Justification study of the teaching program

For many years there have been undergraduate, graduate and doctoral studies in the scientific branch of nutrition in Croatia. However, the specialist study does not exist at any of the higher education institutions. Europe in general and Croatia, as well, tend to be a knowledge-based society with an impact on economy, cultural and social life of individuals and society as a whole. Each individual has an obligation of lifelong learning and it is the duty of society to make it possible and to invest in such education. Namely, there are rapid and imminent changes in professions and society which cannot be stopped and we should be prepared for them. This Specialist Study of Nutrition is closely related to contemporary time, namely, by educating experts in the field of Nutrition, human resource capital is created to disseminate knowledge and reduce chronic non-infective diseases (cardiovascular diseases, osteoporosis, some types of carcinoma, obesity) and thus contribute to national health condition. Healthier people will reduce costs for medical treatments and contribute to a more efficient economy.

The specialist study creates possibility for forging stronger partnerships and cooperation with colleagues outside higher-education institutions, improving prosperity of individuals and society in general. Such partnerships provide a better insight into new demands for trainings and education.

To sum up, there is a big interest in the Specialist Study of Nutrition which provides knowledge and skills in the area of nutrition science based on the latest scientific and research findings.

# 2.2. Compatibility of the study program with strategic goals of the Faculty of Food Technology

Faculty of Food Technology has been educating engineers of food technology for 40 years. Postgraduate studies for the master's degree started in 1997 and in 2002 the doctoral study was launched. Faculty of Food Technology, as a higher education institution, has curriculum compatible to similar European study programs and it has successfully implemented the Bologna process in one undergraduate study (Food Technology), in three graduate studies (Food Engineering, Process Engineering and Science of Food and Nutrition, in the postgraduate doctoral study of Food Engineering, and in the postgraduate specialist studies Food Safety and Quality and Technologies of Traditional Meat Products. Since there is a good interest in lifelong learning, acquisition of new knowledge and skills, postgraduate studies, in particular specialist studies, offer such professional specializations in specific branches and fields of food technology. This has become one of the potential ways of development for the Faculty of Food Technology. The study is based on the Faculty's long experience of undergraduate, graduate and postgraduate studies, scientific projects, both national and international, overall scientific and professional expertise and current tendencies in scientific fields (covered by biotechnical sciences). Specific conditions and needs of Slavonia, Barania and Croatia are also considered by this Study program, along with the role of science and profession in the regional and national development. The proposed study is an upgrade of the existing

undergraduate and graduate studies carried out at the Faculty of Food Technology or at similar type of studies at higher education institutions.

### 2.3. Comparison of the study programs with other similar programs in the EU

1.Wageningen University, Wageningen, the Niederland, MSc Programme: Nutrition and Health: 7 specializations: Nutrition in Health and Disease, Public Health Nutrition, Nutritional and Public Health Epidemiology, Food Toxicology, Nutritional Physiology, Molecular Nutrition, Sensory Science.

2. University of Copenhagen, Department of Human Nutrition, Copenhagen, MSc Programme: Human Nutrition, Clinical Nutrition.

3. Stockholm University & Department of Biosciences and Nutrition at Karolinska Institute, Stockholm, MSc Programme: Nutrition

# 2.4. Compatibility of learning outcomes with demands of professional associations and workforce market

The content of the Specialist Study of Nutrition has been designed to enable students, who finish either graduate or undergraduate study of Nutrition, to acquire new knowledge and skills. At the same time, the choice of 11 elective courses makes this study accessible to students of other graduate or undergraduate studies (e.g. food engineering, medicine, biology, pharmacy, agriculture). In this way the idea of lifelong learning can spread among different experts, which is beneficial for an individual and society in general.

Students who finish this specialist study will acquire additional skills for better performance at their work places, for obtaining new ideas and for starting their own counseling centers related to proper nutrition.

In addition to that, they will be welcomed as experts in high quality catering firms, especially in the continental tourism.

## 2.5. Academic title acquired by finishing the study

Specialist Master (degree acquired during the graduate study), University Nutrition Specialist.

### 2.6. Study title, scientific area, field, and branch

Title of the study program: Postgraduate Specialist Study of Nutrition. The program study is made in accordance with the Act on scientific and artistic areas, fields and branches (NN 76/2005) and it fits in the scientific area 4 **Biotechnical Sciences**, scientific field 4.05. **Food Technology**, scientific branch 4.05.04. **Nutrition**.

### 2.7. Study holder and performer of the study program

Study holder and performer is Josip Juraj Strossmayer University of Osijek, Faculty of Food Technology.

#### 2.8. Study duration

Lectures last for two semesters (one academic year). Study completion is to be done in five semesters.

#### 2.9. Enrolment conditions

Candidates entitled to enrolment in the postgraduate Specialist Study of Nutrition at the Faculty of Food Technology are those who have completed undergraduate or graduate studies at the Faculty of Food Technology in Osijek, Faculty of Food and Biotechnology in Zagreb or related Faculties in the country and abroad.

Candidates who have completed either undergraduate or graduate studies at the Faculty of Medicine, Pharmaceutical-Biochemical Faculty, Faculty of Agronomy or Agriculture, Department of Biology in Osijek, Teacher-Training College in Osijek (BSc in biology and chemistry) could enroll if the Faculty staff gives consent (based on the proposal of the Commission for specialist studies). All potential candidates might be asked to pass some additional exams, after thorough examination of their undergraduate or graduate curriculum, which is necessary for attending the lectures at the postgraduate Specialist Study of Nutrition. The final decision is made by the Faculty Council based on the proposal of the Commission for specialist studies. Additional exams are to be passed prior to passing any exams at the postgraduate specialist studies.

Candidates who have graduated at the undergraduate or graduate studies with the average grade 3.0 are entitled to enrolment. An exception is made for the students with the lower average grade, provided they obtain two recommendations by their university professors who have lectured at their undergraduate or graduate studies. The final decision of enrolment is made by the Faculty Council at the Faculty of Food Technology, based on the proposal of the Commission for specialist studies.

#### 2.10. Competences acquired by students on finishing the studies

Students who complete the postgraduate Specialist Study of Nutrition will be qualified for jobs related to evaluation of food quality or giving advice on quality improvement, aimed at health maintenance and disease prevention.

### 3. STUDY PROGRAM DESCRIPTION

### **3.1. Content of the study program and ECTS**

| Godina/  | Oznaka   | Naziv predmeta                                      | Ukupno   | Р  | S  | V  | ECTS   |
|----------|----------|---|----------|----|----|----|--------|
| Semestar | predmeta |   | sati     |    | _  |    | bodovi |
| 1/I      | N101*    | Integrative physiology and                          | 30       | 20 | 0  | 10 | 7      |
|          |          | nutritional biochemistry                            |          |    |    |    |        |
| 1/I      | N102*    | Nutrition specifics through                         | 30       | 15 | 15 | 0  | 8      |
|          |          | lifespan  |          |    |    |    |        |
| 1/I      | N103*    | Medical nutrition therapy                           | 20       | 15 | 5  | 0  | 6      |
| 1/I      | N104     | Weight reduction and                                | 10       | 7  | 3  | 0  | 3      |
|          |          | personalized diets                                  |          |    |    |    |        |
| 1/I      | N105     | Consumer and ethic in nutrition                     | 20       | 15 | 5  | 0  | 6      |
| 1/I      | N106     | Fundamentals of psychology and                      | 20       | 10 | 5  | 5  | 6      |
|          |          | counselling   | -        | _  | _  | _  | _      |
| 1/I      | Ukupno p | otrebno upisati ECTS bodova                         | u semest | ru |    |    | 30     |
|          |          | -   |          | -  | -  |    |        |
| 1/11     | N201     | Selected themes of the                              | 15       | 10 | 5  | 0  | 5      |
|          |          | nutritional epidemiology                            |          |    |    |    |        |
| 1/11     | N202     | Selected themes of functional foods and supplements | 15       | 10 | 5  | 0  | 5      |
| 1/11     | N203     | Lifestyle and health                                | 15       | 10 | 5  | 0  | 5      |
| 1/11     | N204     | Sports Nutrition                                    | 15       | 10 | 5  | 0  | 5      |
| 1/11     | N205     | Nutritional aspects of food preparation             | 15       | 10 | 5  | 0  | 5      |
| 1/II     | N206     | Modelling and Optimization of                       | 15       | 10 | 5  | 0  | 5      |
|          |          | Nutrition   |          |    |    |    |        |
| 1/II     | N207     | Food-drug interactions                              | 15       | 10 | 5  | 0  | 5      |
| 1/II     | N208     | Nutritionists and new 15 10                         |          | 10 | 5  | 0  | 5      |
|          |          | technologies  |          |    |    |    |        |
| 1/II     | N300*    | Specialist thesis                                   | 200      | -  | -  | -  | 20     |
| 1/II     | Ukupno p | otrebno ECTS bodova u seme                          | stru     |    |    |    | 30     |

\* Compulsory courses

It is necessary to achieve 60 ECTS credits via enrolled courses.

ECTS credits for courses have been calculated according to the real workload of students which includes obligations in the teaching program, along with the time needed for collecting data or making preparations for seminars and exams.

### **3.2. Course description**

Course description is given in Attachment 1.

# 3.3. Study structure, length and students' obligations. Enrolment conditions in the next semester and preconditions for enrolment in specific courses

Teaching program at the Specialist Study of Nutrition is organized through lectures, seminars, consultations, and practical work and lasts for two semesters. Mentors help students in choosing courses and guide them during the studies.

There are no preconditions for enrolling in any specific course except for the additional exams as specified in the point 2.4.

# 3.4. List of courses or modules and other study programs that students can choose at other postgraduate studies

Implementation of the ECTS starts from the principles accepted in Europe, which specify the necessary 60 ECTS for successful completion of the academic year. Students of the postgraduate Specialist Study of Nutrition get 35 ECTS by attending lectures and passing exams at the Faculty of Food Technology, the maximum 5ECTS credits are obtained for enrolling in other courses at Josip Juraj Strossmayer University and other universities in Croatia, and 20 ECTS for the final specialist thesis.

Commission for the Specialist studies makes a final decision regarding ECTS allocation after comparing ECTS for courses at the Faculty of Food Technology and at other Faculties where certain courses are chosen.

# 3.5. Criteria and conditions for ECTS credit transfer – ECTS allocation to courses chosen at other Faculties of Josip Juraj Strossmayer University or at other types of studies

ECTS credits will be recognized to students, achieved at other postgraduate studies, in accordance with the decision of the Commission for Specialist studies.

# **3.6.** Conditions for study continuation upon study cessation or after losing right to study

Students with study cessation can continue the study if the cessation does not exceed three years.

# 3.7. Conditions for being entitled to a certificate about partial completion of study program, as a part of lifelong learning

Students can obtain a certificate in any stage of the study program about completed activities or acquired ECTS credits.

# 3.8. Study completion, conditions for obtaining a specialist thesis and procedure for evaluation and defense

A mentor is given to every postgraduate student at the beginning of the study program, in accordance with student's wishes and research area. Mentor takes care of student's involvement in professional and scientific work, choice of courses and a specialist thesis.

Regardless of extensive study areas of certain courses in the study program, topic of the specialist thesis must be closely related to knowledge and skills in nutrition. Notification of a specialist thesis is done in a prescribed form (title, exposition, literature) after having scored a minimum of 10 ECTS credits.

When Commission for Specialist Studies has accepted the thesis and proposed Committee for evaluation and defense of the thesis, the final decision is made by the Faculty Council. Committee members is composed of teachers who are assistant professors, associate or full professors in the research area of the specialist thesis. It is not inevitable that mentor of the specialist thesis is involved in the teaching program at the postgraduate Specialist Study of Nutrition.

#### 3.9. Maximum time for starting and ending the study program

Maximum time allowed for finishing the study is five semesters, starting from the enrolment. Candidates who do not finish the study in prescribed time, must pay for each additional year 20% of the total fee amount defined for the enrolment in that academic year.

# 4. CONDITIONS OF THE STUDY

### 4.1. Proof of location for performance study

Faculty of Food Technology Osijek, F. Kuhača 20, 31000 Osijek

### 4.2. Proof of space and equipment for performance of study

For the study will use existing facilities and equipment at the University of Osijek, Faculty of Food Technology in Osijek, F. Kuhača 18 and 20.

Space in the PTF for the performance study consists of 6 classrooms, 16 research laboratories, and a lot of students' laboratories, library with reading room, offices for teachers, cafeteria and space for student organizations FISEC, Council Hall, Dean of the supporting services and communications, and sanitary space.

| Space                   | Surface (m <sup>2</sup> ) |
|-------------------------|---------------------------|
| LECTURE HALLS           | 207.65                    |
| Lecture hall I          | <b>397,65</b>             |
| Lecture hall II         | 86,00                     |
| Lecture hall III        | 76,90                     |
| Lecture hall IV         | 64,90                     |
|                         | 71,00                     |
| Lecture hall V          | 49,90                     |
| Lecture hall VI         | 48,95                     |
| Laboratories            | 1815,94                   |
| Scientific laboratories | 1306,14                   |
| Laboratory I            | 42,50                     |
| Laboratory II           | 31,40                     |
| Laboratory III          | 30,20                     |
| Laboratory IV           | 29,70                     |
| Laboratory V            | 39,52                     |
| Laboratory VI           | 50,68                     |
| Laboratory VII          | 22,75                     |
| Laboratory VIII         | 26,36                     |
| Laboratory IX           | 22,75                     |
| Laboratory X            | 26,18                     |
| Laboratory XI           | 15,08                     |
| Laboratory XII          | 53,51                     |
| Laboratory XIII         | 36,98                     |
| Laboratory XIV          | 25,80                     |
| Laboratory XV           | 27,70                     |
| Laboratory XVI          | 28,69                     |

# INFORMATION OF THE SURFACE AREA FOR PERFORMANCE STUDIES

| Laboratories for students                       | 509,80   |
|---|----------|
| Laboratory for Food Technologies                | 73,33    |
| Laboratory for Food Quality Control             | 108,16   |
| Laboratory for Instrumental Methods Of Analysis | 118,16   |
| Laboratory for Engineering Thermodynamics       | 98,08    |
| Laboratory for Food Microbiology                | 48,49    |
| Laboratory for Organic Chemistry                | 65,00    |
| Laboratory for General And Analytical Chemistry | 65,00    |
| Laboratory for Water Technology And Wastewater  | 65,00    |
| Treatment                                       |          |
| Laboratory for Physical Chemistry               | 65,00    |
| Laboratory for Transfer Phenomena               | 65,00    |
| Laboratory for Ecology                          | 65,00    |
| Library   | 300,00   |
| Professors's offices                            | 485,37   |
| Cafeteria                                       | 200,00   |
| Dean's office                                   | 250,00   |
| Sanitation facilities                           | 800,00   |
| Center for meat quality                         | 135,00   |
| Laboratory for meat quality                     | 135,00   |
| Veterinary institute                            | 213,39   |
| Laboratory for Food Analytical Chemistry        | 130,00   |
| Laboratory for Food Microbiology                | 83,39    |
| TOTAL   | 4,248.00 |

#### LIBRARY FOND

| Total library found | 5,444 titles       |
|---------------------|--------------------|
| Books and Textbooks | 2.030              |
| Journals            | 128 titles, 10     |
|                     | currently periodic |

From the year 1996./1997 academy staff of the Republic of Croatia, so the Faculty of Food Technology, too, has the access to the commercial base with the whole text (in total cca 15,000 title of the journals).

## LIST OF THE LABORATORY EQUIPMENT

- body analyser MC-180MA, Tanita
- Electrophoresis system, Amersham Biosciences
- HPLC 2 ternarne pumpe, UV-Vis, PDA, Fluorescentni i RI detectors, Varian
- LC/MS/MS API 2000, Applied Biosystems
- Equipment for body fat measuring, BF-306, Omron
- Scale, Seca
- Callipers
- Spectrofluorimeter Cary Eclipse, Varian
- Spectrofotometer Specord 200, Analytik Jena
- system for microwave digestion, CEM
- Laminarij 1200 FLV, Asalair

- SPE Vacuum Manifold Visiprep, Supelco
- Evaporation System, Romer Labs

# 4.3. List of teachers and associates who will participate in the performance of the course

| Course<br>code | Course title  | Teachers and associates                       | Num<br>ber |
|----------------|---|---|------------|
| N101*          | Integrative physiology and nutritional biochemistry | Dr. sc. Tomislav Klapec, red. prof.           | 1          |
| N102*          | Nutrition specifics through lifespan                | Dr. sc. Daniela Čačić Kenjerić,<br>izv. prof. | 0          |
| N103*          | Medical nutrition therapy                           | Dr. sc Milena Mandić, red. prof.              | 0          |
| N104           | Weight reduction and personalized diets             | Dr. sc. Tomislav Klapec, red. prof.           | 2          |
| N105           | Consumer and ethic in nutrition                     | Dr. sc. Irena Colić-Barić, red. prof.         | 0          |
| N106           | Fundamentals of psychology and counselling          | Dr. sc. Gorka Vuletić Mavrinac,<br>doc.       | 0          |
| N201           | Selected themes of the nutritiona epidemiology      | Dr. sc. Antonija Perl Pirički, izv.<br>prof.  | 1          |
| N202           | Selected themes of functional foods and supplements | Dr. sc. Milena Mandić, red. prof.             | 0          |
| N203           | Lifestyle and health                                | Dr. sc. Maja Miškulin, doc.                   | 0          |
| N204           | Sports Nutrition                                    | Dr. sc. Daniela Čačić Kenjerić,<br>izv. prof. | 0          |
| N205           | Nutritional aspects of food preparation             | Dr. sc. Tomislav Klapec, red. prof.           | 0          |
| N206           | Modelling and Optimization of Nutrition             | Dr. sc. Damir Magdić, izv.prof.               | 0          |
| N207           | Food-drug interactions                              | Dr. sc. Tomislav Klapec, red. prof.           | 0          |
| N208           | Nutritionists and new technologies                  | Akademkinja Vlasta Piližota                   | 1          |

### 4.4. Data of all included teachers

Tables with all included teachers there are in the Appendix 2.

## 4.5. Concluded contracts with scientific and teaching staff

For teaching at the study has signed contracts with eight permanently employed teachers with appropriate academic titles that will run 75.7% or 445 hours of standard proposed program of study and 3 of the contract with teaching staff who are employed in other institutions and will run 24.3% or 142.5 hours of standard proposed program of study.

# 4.6. List of associates, consultants of study, mentor or leader of the final paper

All the teachers of the Faculty of Food Technology Osijek and teaching staff who are employed in other institutions, but are included in the courses, as well as the other stuffs elected in the scientific or teaching position, with the agreement of the Faculty Council.

# 4.7. Optimal number of students that can enroll with respect to the space, equipment and number of teachers.

Optimal number of participants is 15, or according the resolution of the Faculty Counsel.

## 4.8. Cost assessment per student

Price per study participant is 25,000 HR kn

## 4.9. Method of monitoring the quality and performance performance study

Quality of the study program will be monitored for program evaluation by the study participants (the structure of the study and teachers) and through the Commission for the specialist study that will appoint a special committee to monitor the quality of studies, study design and the teachers. In this committee will be representatives of producers and producer associations. About all that the Commission stated the Commission for a specialist study report annually.

Appendix 1

# **Course description**

|  | N101   |   | Compulsory  |  |
|--|--|---|---|--|
| Common and   | -  | Commente al al anti-  | Compusory   |  |
| Course code  |  | Course status   |   |  |
| Study programme  |  |   |   |  |
|  | Nutrition  |   |   |  |
| •  | ivuuruon   |   |   |  |
| Semester   |  |   |   |  |
| Course lecturer  | Tomislav Klapec, prof.   |   |   |  |
| Course associates<br>Course content                                    | Ivica Strelec, assistant p   | rot.  |   |  |
| Course content   | biomolecules – amino a<br>and coenzymes.<br>Basics of inheritance and<br>Basics of anatomy and to<br>of food intake, digestion<br>interaction between food<br>and nervous. Basics of<br>oxidative stress and the<br>nutrition.<br>Laboratory:<br>Determination of HDL ar | acids and proteins, lipids<br>d biochemical individuali<br>function of digestive trac<br>and absorption. Energy<br>d and bodily systems: of<br>carcinogenesis and cho<br>role of antioxidants. Bio<br>nd LDL cholesterol levels<br>acted genetic polymor<br>ct to susceptibility to foo | t. Hormonal and neural regulation<br>metabolism. Biochemical bases of<br>cardiovascular, immune, endocrine<br>emopreventive nutrition. Basics of<br>ochemistry of aging and the role of<br>s in serum.<br>phisms (IL-6, GPX1, etc.) and<br>d triggered disorders. |  |
| General and<br>specific knowledge<br>acquired in course<br>(objective) | Basic understanding of biochemistry and molecular biology. Understanding of the role of nutritive and nonnutritive food components in health promotion by explaning their action at the cellular level.  |   |   |  |
| Teaching method  | Lectures   | Seminars  | Labs  |  |
| (hrs/week)   | -  | -   | -   |  |
| (total)  | 20   | 0   | 10  |  |
| Examination<br>method  | Oral   |   |   |  |
| Credits  | 7  | Language  | Croatian  |  |
| Compulsory   | Klapec T, Strelec I: Prehrambena biokemija, Interna skripta, Prehrambeno-  |   |   |  |
| reading  | tehnološki fakultet, Osijek, 2012.   |   |   |  |
|  | Berg JM, Tymoczko JL, Stryer L: <i>Biochemistry</i> , W.H. Freeman & Co, 2002.   |   |   |  |
| Recommended reading  | Brody T: Nutritional Bioc  | hemistry, Academic Pre  | ss, 2003.   |  |

| Course title  | NUTRITION SPE  | CIFICS THROUG                 | GH LIFESPAN |
|---|--|-------------------------------|-------------|
| Course code   | N102   | Course status                 | Compulsory  |
| Study programme   | Nutrition  |                               |             |
| Semester  | l  |                               |             |
| Course lecturer   | Daniela Čačić Kenjerić,  | Ph.D., asc. prof.             |             |
| Course associates                                       | -  |                               |             |
| Course content  | Lectures:<br>Introduction to Lifespan Nutrition<br>Basic Reasons and Overview of Variation in Energy and Nutrient Needs<br>Nutrition in Pregnancy<br>Lactation, Breast-Feeding and Nutrition<br>Nutrition During Infancy.<br>Nutrition of Preschool Child<br>Nutrition of School Child<br>Nutrition During Adolescence<br>Adulthood and Nutrition<br>Elderly Nutrition<br>Special Concerns of Nutrition in Different Gender, Socioeconomic, Ethical, Etnical<br>and Religion based Groups<br>Seminar:<br>Special Concerns of Nutrition in the Population of Students Choice<br>Students will know nutritional needs and specific demands of different age groups |                               |             |
| specific knowledge<br>acquired in course<br>(objective) |  |                               |             |
| Teaching method   | Lectures   | Seminars                      | Labs        |
| (hrs/week)  | -  | -                             | -           |
| (total)   | 15   | 15                            | 0           |
| Examination<br>method                                   | Oral exam  |                               |             |
| Credits   | 8  | Language                      | Croatian    |
| Compulsory<br>reading                                   | <ul> <li>M.K. Mitchell: Nutrition Across the Life Span, Second edition. Saunders, 2002. (607 pp)</li> <li>S. Langley-Evans: Nutrition: A Lifespan Approach. Wiley-Blackwell, 2009. (300 pp)</li> </ul>   |                               |             |
| Recommended reading                                     | Review articles from the   | e field of lifespan nutrition | n           |

| Course title  | MEDICAL NUTR   | ITION THERAPY   | 7  |
|---|--|---|--|
|   | N103   |   | Compulsory   |
| Course code   |  | Course status   |  |
| Study programme   |  |   |  |
| , , , , , , , , , , , , , , , , , , ,                     | Nutrition  |   |  |
| -   | INUUTUOII  |   |  |
| Semester  |  |   |  |
| Course lecturer   | Milena Mandić, Ph.D., pr   | ot.   |  |
| Course associates<br>Course content                       | Lectures:  |   |  |
| General and<br>specific knowledge<br>acquired in course   | Nutritional status of the h<br>Energy and nutritional re<br>Enteral and parenteral<br>specific quality according<br>Medical nutrition therapy<br>diseases<br>Medical nutrition therapy<br>Medical nutrition therapy<br>Medical nutrition therapy<br>News in the medical nutr<br><b>Seminar:</b><br>Special concerns of nutri<br>Students will know nee | quirement according the<br>nutrition (indications for<br>g the age and diseases)<br>by of the stomach, bo<br>of the diabetes mellitus<br>of the hypertension, ca<br>of the anorexia nervosa<br>rition therapy | use, formulas, contraindications,<br>owl, pancreas, kidney, and bone<br>rdiovascular diseases, and cancer<br>a and bulimia nervosa |
| (objective)   |  |   |  |
| Teaching method   | Lectures   | Seminars  | Labs   |
| (hrs/week)  |  |   |  |
|   |  | _   | ^  |
| (total)   | 15<br>Oral or written oxom in (  | 5   | 0  |
| Examination   | Oral or written exam, in a   | -   | 0<br>rticipants, or depending of the   |
| Examination<br>method                                     |  | -   | rticipants, or depending of the  |
| Examination   | Oral or written exam, in a participants 'number  | -   | v  |
| Examination<br>method<br>Credits<br>Compulsory            | Oral or written exam, in a participants 'number  | arrangement with the pa   | rticipants, or depending of the  |
| Examination<br>method<br>Credits                          | Oral or written exam, in a participants 'number<br>1. ppt prezenta   | Language  | rticipants, or depending of the<br>Croatian  |
| Examination<br>method<br>Credits<br>Compulsory            | Oral or written exam, in a<br>participants 'number<br>1. ppt prezenta<br>2. R. Živković:<br>3. L. K. Mahar   | Language<br>Icija<br>Dijetetika, Medicinska n<br>n, S. Escott-Stump, J.   | rticipants, or depending of the<br>Croatian<br>aklada, Zagreb, 2002.<br>L. Raymond: <i>Krause's Food and</i>                       |
| Examination<br>method<br>Credits<br>Compulsory            | Oral or written exam, in a<br>participants 'number<br>1. ppt prezenta<br>2. R. Živković:<br>3. L. K. Mahar<br>Nutrition Car  | Language<br>Dijetetika, Medicinska n  | rticipants, or depending of the<br>Croatian<br>aklada, Zagreb, 2002.<br>L. Raymond: <i>Krause's Food and</i><br>12.                |
| Examination<br>method<br>Credits<br>Compulsory<br>reading | Oral or written exam, in a<br>participants 'number<br>1. ppt prezenta<br>2. R. Živković:<br>3. L. K. Mahar<br><i>Nutrition Ca</i><br>1. Review artic   | Language<br>Dijetetika, Medicinska n<br>n, S. Escott-Stump, J.<br><i>re Process</i> , Elsevier, 20<br>le connected to the subj<br>tump: <i>Nutrition and b</i>  | rticipants, or depending of the<br>Croatian<br>aklada, Zagreb, 2002.<br>L. Raymond: <i>Krause's Food and</i><br>12.                |

| Course title   | WEIGHT REDU   | CTION AND PERS   | SONALIZED DIETS  |
|--|---|--|--|
|  | N104  |  | Elective   |
| Course code  |   | Course status  |  |
| Study programme  |   |  |  |
|  | Nutrition   |  |  |
| Semester   | 1   |  |  |
| Course lecturer  | Tomislav Klapec, prof.  |  |  |
| Course associates Course content                                       | Daniela Čačić Kenjerić,<br>Ivica Strelec, assistant                             |  |  |
|  | meat diet, Herbalife, etc<br>Physiology of weight re<br>Nutrient mimetics (Oles | c.). Nutritional regimens a<br>duction diets (changes in<br>tra, sweeteners). Compe-<br>similar nonscientific approximitation of the<br>similar nonscientific approximation. | diet, ketogenic diet, BestLife diet,<br>and evidence of efficiency.<br>In the organism and potential risks).<br>ensation of energy intake.<br>oaches to nutrition. |
| General and<br>specific knowledge<br>acquired in course<br>(objective) | grounded information o  | n efficacy and biochemic   | on the organism and scientifically-<br>cal and physiological background of<br>amiliarization with the concept of   |
| Teaching method  | Lectures  | Seminars   | Labs   |
| (hrs/week)   | -   | -  | -  |
| (total)  | 7   | 3  | 0  |
| Examination<br>method  | Oral  |  |  |
| Credits  | 3   | Language   | Croatian   |
| Compulsory reading   | PowerPoint presentatio  | 00   |  |
| Recommended reading  | Kok F, Bouwman L, De  | siere F: Personalized Nu   | utrition, CRC Press, 2008.   |

| Course code         N105         Elective           Study programme         Nutrition         Elective           Semester         I.         Introduction         Introduction         Introduction         Introduction         Introduction         Supply and food availability. What determined human food choic International and national food policy as result of consumer's food behavior; Bas principals in consumer perception of safety in the agri-food chain. A short introduction of food ethics; Ethic and food in modern society; Ethical issue in food and agriculture, The ethics of sustainable intensification, Genetica modified organisms, consumers, food safety and the environment; Foor authorities: ethical responsibility in the food chain.           General and         The course will provide an overview of the current understanding of the consumer |
|---|
| Study programme       Nutrition         Semester       I.         Course lecturer       Irena Colić Barić, Ph.D., full professor         Course associates       Introduction. Supply and food availability. What determined human food choice         Course content       Introduction. Supply and food availability. What determined human food choice         International and national food policy as result of consumer's food behavior; Base principals in consumer perception of safety in the agri-food chain.         A short introduction of food ethics; Ethic and food in modern society; Ethical issue in food and agriculture, The ethics of sustainable intensification, Genetica modified organisms, consumers, food safety and the environment; Foor authorities: ethical responsibility in the food chain.  |
| Study programme       Nutrition         Semester       I.         Course lecturer       Irena Colić Barić, Ph.D., full professor         Course associates       Introduction. Supply and food availability. What determined human food choice         Course content       Introduction. Supply and food availability. What determined human food choice         International and national food policy as result of consumer's food behavior; Base principals in consumer perception of safety in the agri-food chain.         A short introduction of food ethics; Ethic and food in modern society; Ethical issue in food and agriculture, The ethics of sustainable intensification, Genetica modified organisms, consumers, food safety and the environment; Foor authorities: ethical responsibility in the food chain.  |
| Nutrition         Semester       I.         Course lecturer       Irena Colić Barić, Ph.D., full professor         Course associates       Introduction. Supply and food availability. What determined human food choice International and national food policy as result of consumer's food behavior; Bass principals in consumer perception of safety in the agri-food chain.<br>A short introduction of food ethics; Ethic and food in modern society; Ethical issue in food and agriculture, The ethics of sustainable intensification, Genetica modified organisms, consumers, food safety and the environment; Food authorities: ethical responsibility in the food chain.  |
| Semester       I.         Course lecturer       Irena Colić Barić, Ph.D., full professor         Course associates       Introduction. Supply and food availability. What determined human food choic         International and national food policy as result of consumer's food behavior; Bas         principals in consumer perception of safety in the agri-food chain.         A short introduction of food ethics; Ethic and food in modern society; Ethical issue         in food and agriculture, The ethics of sustainable intensification, Genetica         modified organisms, consumers, food safety and the environment; Foor         authorities: ethical responsibility in the food chain.   |
| Semester       I.         Course lecturer       Irena Colić Barić, Ph.D., full professor         Course associates       Introduction. Supply and food availability. What determined human food choic         International and national food policy as result of consumer's food behavior; Bas         principals in consumer perception of safety in the agri-food chain.         A short introduction of food ethics; Ethic and food in modern society; Ethical issue         in food and agriculture, The ethics of sustainable intensification, Genetica         modified organisms, consumers, food safety and the environment; Foor         authorities: ethical responsibility in the food chain.   |
| Course lecturer         Irena Colić Barić, Ph.D., full professor           Course associates         Introduction. Supply and food availability. What determined human food choic International and national food policy as result of consumer's food behavior; Bas principals in consumer perception of safety in the agri-food chain. A short introduction of food ethics; Ethic and food in modern society; Ethical issue in food and agriculture, The ethics of sustainable intensification, Genetica modified organisms, consumers, food safety and the environment; Foo authorities: ethical responsibility in the food chain.  |
| Course associates           Course content           Introduction. Supply and food availability. What determined human food choic<br>International and national food policy as result of consumer's food behavior; Bas<br>principals in consumer perception of safety in the agri-food chain.<br>A short introduction of food ethics; Ethic and food in modern society; Ethical issue<br>in food and agriculture, The ethics of sustainable intensification, Genetica<br>modified organisms, consumers, food safety and the environment; Foo<br>authorities: ethical responsibility in the food chain.  |
| <b>Course content</b><br>Introduction. Supply and food availability. What determined human food choic<br>International and national food policy as result of consumer's food behavior; Bas<br>principals in consumer perception of safety in the agri-food chain.<br>A short introduction of food ethics; Ethic and food in modern society; Ethical issue<br>in food and agriculture, The ethics of sustainable intensification, Genetica<br>modified organisms, consumers, food safety and the environment; Foo<br>authorities: ethical responsibility in the food chain.  |
| International and national food policy as result of consumer's food behavior; Bas<br>principals in consumer perception of safety in the agri-food chain.<br>A short introduction of food ethics; Ethic and food in modern society; Ethical issue<br>in food and agriculture, The ethics of sustainable intensification, Genetica<br>modified organisms, consumers, food safety and the environment; Foo<br>authorities: ethical responsibility in the food chain.   |
| General and The course will provide an overview of the current understanding of the consum  |
|   |
| <b>specific knowledge</b> food choice by exploring factors that influence consumers' perception of food   |
| acquired in course Influences of some food quality parameters as well as process of acquisitio  |
| (objective) preparation, cooking etc. will be specially presented on the consumers' for   |
| choice.   |
| The course will provide information about food ethics and discussed about foo   |
| ethic role for environment, producers and consumers as well as public health.   |
| Teaching method         Lectures         Seminars         Labs           (hrs/week)   <   |
| (total) 15 5 0  |
| Examination Seminar and written exam  |
| method  |
| Credits 6 Croatian  |
|   |
| Language  |
| Compulsory 4. Lectures  |
| reading 5. Luning P.A., Devlieghere F., Verhe R.: Safety in the agri-food chai  |
| Wageningen Academic Publishers, The Netherlands, 2006.  |
| 6. <u>www.fao.org/ethics</u>  |
| Recommended 1. The Psychology of Food Choice Ed. R. Shepherd, U. Raats 2006   |
| reading 2. <u>www.foodethicscouncil.org</u>   |
| 3. Current scientific papers and books  |
| Osposobljenost Students will be informed about major determined of human food choice ar   |
| (Learning current food ethic important for food safety and management.  |
|   |
| <b>Europska</b><br><b>dimenzija</b><br>Food is one of the largest product sectors of trade. The European Union engege<br>in trade on a large scale with third countries. On the global level the World Trade  |
| (European Organisation (WTO) tries to remove barriers from the internal market. This course   |
| <b>Dimension</b> ) will give important information about consumer's behavior and food ethic most  |
| concern about food safety and human health on international level.  |
|   |

| Course title   | Fundamentals of p  | sychology and cou   | nseling   |  |
|--|--|---|---|--|
|  | N106   | sychology and cod   | Elective  |  |
| Course code  |  | Course status   |   |  |
|  |  | course status   |   |  |
| Study programme  |  |   |   |  |
|  | Nutrition  |   |   |  |
| Semester   |  |   |   |  |
| Course lecturer  | Associate professor Gor  | ka Vuletić, clinical psycl  | nologist  |  |
| Course associates  |  |   |   |  |
| Course content   | those components, biops<br>and extrinsic motivation,<br>Psychology of learning (I<br>Communication with cliel<br>other staff in health settir<br>Counselling psychology,<br>Assumptions of effective   | sychosocial model). Cog<br>assessment of motivati<br>learning behaviour), ass<br>nts, communication with<br>ngs.<br>principles of counsellin<br>counselling, counsellin | naviour and interaction between<br>gnitive assessment theory, intrinsic<br>on and motivating process.<br>sessment and change of behaviour.<br>In patients, health workers and<br>g for children, adults and elderly.<br>g process. Strategies and<br>ethods of group counselling. |  |
| General and<br>specific knowledge<br>acquired in course<br>(objective) | The aim of this subject is to acquire basic knowledge of psychology, ways of working with clients. For nutritionist, this will enable effective information acquisition, better approach to clients in counselling which was important element in nutritionist's work. |   |   |  |
| Teaching method  | Lectures   | Seminars  | Labs  |  |
| (hrs/week)   |  |   |   |  |
| (total)  | 10   | 5   | 5   |  |
| Examination  | written exam   |   |   |  |
| method   |  |   | 0 1   |  |
| Credits  | 5  | Language  | Croatian  |  |
| Compulsory<br>reading  | Meb, D.J., M<br>Naklada Sla<br>8. Corey, G.<br><i>psihoterapije</i><br>9. Aronson, E.<br>Zagreb: Mat   | Maren, S. (2007) Atkir<br>p, Jastrebarsko.<br>(2004) <i>Teorija i pra</i><br>e. Naklada Slap, Jastrek<br>, Wilson., T.D., Akert,<br>e.                                  | R.M. (2004). Socijalna psihologija.   |  |
| Recommended  |  | nanstveni i stručni   | radovi iz područja primijenjene   |  |
| reading  | psihologije.   |   |   |  |

| Course title   | SEI ECTED THE   | MES OF THE NU | TRITIONA |  |
|--|---|---------------|----------|--|
|  | EPIDEMIOLOGY  |               |          |  |
|  | N201  | <b>_</b>      | Elective |  |
| Course code  | 11201   | Course status |          |  |
|  |   | course status |          |  |
| Study programme  |   |               |          |  |
|  | Nutrition   |               |          |  |
| Semester   | II.   |               |          |  |
| Course lecturer  | Antonija Perl Pirički, Ph   |               |          |  |
| Course associates  | Maja Miškulin, Ph.D., a   |               |          |  |
| Course content   | Overview of the nutritional epidemiology, Studies in the nutritional epidemiology;<br>nature of the nutrient variations; methods of the nutrition assessment (22-hour<br>dietary recall, food record methods, food frequency methods, duplicate diet<br>method); reproducibility and validity of the food frequency questionnaires;<br>surrogate source of dietary information; biochemical indicators of dietary intake<br>and their implementation in the validation of the methods; implications of the total<br>energy intake for epidemiologic analysis; correction for the effects of the<br>measurement error; statistical presentation of the results |               |          |  |
| General and<br>specific knowledge<br>acquired in course<br>(objective) | Through the course students will gain knowledge on the selecting and conducting of specific method in the nutritional epidemiology  |               |          |  |
| Teaching method  | Lectures  | Seminars      | Labs     |  |
| (hrs/week)   |   |               |          |  |
| (total)  | 10  | 5             | 0        |  |
| Examination<br>method  |   |               |          |  |
| Credits  | 5   |               | Croatian |  |
|  |   | Language      |          |  |
| Compulsory<br>reading  | 1. W. Willet: <i>Nutritional Epidemiology</i> . Oxford University Press, New York, 1998.  |               |          |  |
| Recommended reading  | 1. B.M. Margetts, M. Nelson: <i>Design Concepts in Nutritional Epidemiology</i> .<br>Oxford University Press, New York, 2003.   |               |          |  |
|  | 2. S. Selvin: <i>Statistical Analysis of Epidemiologic Data</i> . Oxford University Press, New York, 1996.  |               |          |  |
|  | 3. N. Slimani, G. Deharveng, I. Unwin, J. Vignat, G. Skeie, S. Salvini, A. Møller, J. Ireland, W. Becker, D.A.T. Southgate: Standardisation of an European end-user nutrient database for nutritional epidemiology: what can we learn from the EPIC Nutrient Database (ENDB) Project? <i>Trends in Food Science and Technology</i> 18, 407-419, 2007.   |               |          |  |

| Course title   | SEI ECTED THE  | MES OF FUNCTI              | ONAL ECODS AND                   |
|--|--|----------------------------|----------------------------------|
|  | SELECTED THEMES OF FUNCTIONAL FOODS AND  |                            |                                  |
|  | SUPPLEMENTS  |                            |                                  |
|  | N 202  |                            | Elective                         |
| Course code  |  | Course status              |                                  |
| Study programme  |  |                            |                                  |
|  | Nutrition  |                            |                                  |
| Semester   | II.  |                            |                                  |
| Course lecturer  | Milena Mandić, Ph.D., p  | orof.                      |                                  |
| Course associates<br>Course content                                    |  |                            |                                  |
|  | Lectures:<br>Functional foods (FF) and health: gastrointestinal tract, cardiovascular diseases,<br>cancer, acute infections<br>Functional/bioactive ingredients: antioxidants, vitamins, minerals, dietary fibre, fatty<br>acids, fitosterols, inulin)<br>Overview and the role of the selected supplements<br>Legislations and FF<br>Seminar:<br>According the undergraduate and graduate studies of the students, the themes of<br>the seminars will be selected |                            |                                  |
| General and<br>specific knowledge<br>acquired in course<br>(objective) | During the course the participants will be get acquainted with the importance of the functional foods selection, as well as their influence on the wellbeing to the individuals and society; the students will understand the importance of the FF producing as well as the critical attitude about the intake of the supplements  |                            |                                  |
| Teaching method  | Lectures   | Seminars                   | Labs                             |
| (hrs/week)   |  |                            |                                  |
| (total)  | 10   | 5                          | 0                                |
| Examination  |  | arrangement with the pa    | articipants, or depending of the |
| method   | participants number  |                            |                                  |
| Credits  | 5  |                            | Croatian                         |
|  |  | Language                   |                                  |
| Compulsory   | 10. ppt present  |                            |                                  |
| reading  |  |                            | oduct, ed. M. Saarela, Woodhead  |
|  |  | Oxford, 2011.              |                                  |
| Recommended  | 4. Review artic  | cles from the field of fun | ctional foods, and supplements   |
| reading  |  |                            |                                  |

| Course title   | LIFESTYLE ANI   | ) HEALTH   |                                      |
|--|---|--|--------------------------------------|
|  | N203  |  | Elective                             |
| Course code  |   | Course status  |                                      |
| Study programme  |   |  |                                      |
|  | Nutrition   |  |                                      |
| Semester   | .   |  |                                      |
| Course lecturer  |   | laja Miškulin, MD, PhD                               | )                                    |
| Course associates  | -   |  |                                      |
| Course content<br>General and<br>specific knowledge<br>acquired in course<br>(objective) | Environment and Health. Stress and health. Alcohol and Health. Smoking<br>and Health. Physical activity and health. Impact of lifestyle habits on the<br>incidence and prognosis of respiratory diseases. Impact of lifestyle habits on<br>the incidence and prognosis of cardiovascular diseases. Impact of lifestyle<br>habits on the incidence and development of diabetes mellitus type II. Impact<br>of lifestyle habits on the incidence and development of malignant diseases.<br>Possibilities of prevention of chronic non-communicable diseases by<br>changing lifestyle habits and the immediate environment.<br>The aim of this course is to familiarize students with the most significant<br>impacts of different lifestyle habits and environment on individual and<br>population health as well as their role in the development of many chronic<br>non-communicable diseases as the leading cause of morbidity and mortality<br>in Croatia and abroad. Acquiring the knowledge required for observing the<br>health of individuals and populations, depending on the totality of the impact<br>of environmental factors and lifestyle habits with particular emphasis on the<br>factors that are most important for the Croatian population. Acquiring<br>knowledge and skills necessary for understanding the dependence of health<br>and disease on factors related to the immediate living environment and<br>living habits and training of students for the assessment of adverse effects of<br>environment and lifestyle on health. The ultimate goal of the course is to<br>encourage the construction of attitudes about the benefits and importance of |  |                                      |
| Teaching method  |   | improve population he<br>Seminars                    | Labs                                 |
| (hrs/week)   |   | Jennindis  |                                      |
| (total)  | 10  | 5  | 0                                    |
| Examination  |   | ination, depending on                                | the number of the course             |
| method   | participants.   |  |                                      |
| Credits  | 5   | Language   | Croatian                             |
| Compulsory<br>reading  | <ol> <li>12. Vorko-Jović A, Strnad M, Rudan I. Epidemiologija kroničnih<br/>nezaraznih bolesti. Medicinska naklada, Zagreb, 2010.</li> <li>13. Puntarić D, Miškulin M, Bošnir J. Zdravstvena ekologija. Medicinska<br/>naklada, Zagreb, 2012.</li> </ol>  |  |                                      |
| Recommended<br>reading   |   | opies of the scientific art<br>ble from the website. | icles from the primary publications. |

| Course title |
|--------------|
|--------------|

|   | N204  |                   | Elective |  |
|---|---|-------------------|----------|--|
| Course code   |   | Course status     |          |  |
| Study programme   |   |                   |          |  |
|   | Nutrition   |                   |          |  |
| Semester  | И.  |                   |          |  |
| Course lecturer   | Daniela Čačić Kenjerić,   | Ph.D., asc. prof. |          |  |
| Course associates   | -   |                   |          |  |
| Course content<br>General and<br>specific knowledge<br>acquired in course | Lectures:<br>Basic Principles of Sports Nutrition<br>Energy Requirements<br>Carbohydrates Intake: Timing and Choices of Carbohydrates in Different Sport<br>Types<br>Effects of Exercise on Protein Needs<br>Fats as Energy-Yielding Nutrients<br>Nutritional Aspects of Micronutrients in Sport<br>Fluids - Dehydration and Rehydration<br>Fluids - Dehydration and Rehydration<br>Fluids – Electrolyte Balance<br>Sports Nutrition and Supplements<br>Dietary Habits in Sports<br><b>Seminars:</b><br>From Theory to Practice: Diet in Specific Sports by Students Choice<br>Students will gain knowledge on the importance of macro and micronutrients in<br>sports nutrition. They will also be able to explain the role of balanced nutrition in |                   |          |  |
| (objective)   | sport achievements.   |                   |          |  |
| Teaching method   | Lectures  | Seminars          | Labs     |  |
| (hrs/week)  | -   | -                 | -        |  |
| (total)<br>Examination  | 10  | 5                 | 0        |  |
| method  | Oral exam   |                   |          |  |
| Credits   | 5   |                   | Croatian |  |
|   |   | Language          |          |  |
| Compulsory<br>reading   | <ol> <li>F. Brouns: <i>Essentials of Sports Nutrition</i> – 2nd ed. John Wiley and Sons,<br/>Chirchester. England. 2002. (227 pp.)</li> <li>C. Williams, J. T. Devlin (eds.): <i>Foods, Nutrition and Sports Performance</i>.<br/>Chapman &amp; Hall, 1992. (194 pp.)</li> </ol>  |                   |          |  |
| Recommended reading   | <ol> <li>J. A. Driskell (ed.): Sports Nutrition: Fats and Proteins. CRC Press, Boca Raton, 2007.</li> <li>R. J. Maughan (ed.): Nutrition in Sport. Vol. 7 of the Encyclopaedia of sports medicine. Blackwell Science, 2000.</li> </ol>  |                   |          |  |

| Course title  | NUTRITIONAL A  | SPECTS OF FOO          | DD PREPARATION  |
|---|--|------------------------|---|
|   | N205   |                        | Elective  |
| Course code   |  | Course status          |   |
| Study programme   |  |                        |   |
|   | Nutrition  |                        |   |
| Semester  |  |                        |   |
| Course lecturer   | Tomislav Klapec, prof.   |                        |   |
| Course associates<br>Course content                     |  |                        |   |
| General and   | Lectures:<br>Positive nutritive changes during food preparation:<br>Increased digestibility of proteins, inactivation and/or removal of antinutrients<br>(avidin, phytates, tannins, oxalates, protease inhibitors, etc.), formation of aroma<br>substances, reduction of pesticide residues, nitrates, etc.<br>Negative changes during food preparation:<br>Formation of Maillard reaction products (HAA, AGE, ALE, furan, acrylamide, etc.),<br>PAH, products of autooxidation and thermal processing of lipids, chloropropanols,<br>amino acid derivates, etc.<br>Procedures to prevent formation of harmful byproducts.<br>Seminars:<br>Analysis of selected articles dealing with changes in nutritive quality over the<br>course of food preparation and processing. |                        |   |
| specific knowledge<br>acquired in course<br>(objective) |  | udes specialized proce | ons which affect its nutritive quality.<br>dures of food preparation aimed at<br>a value. |
| Teaching method   | Lectures   | Seminars               | Labs  |
| (hrs/week)  | -  | -                      | -   |
| (total)   | 10   | 5                      | 0   |
| Examination<br>method                                   | Oral   |                        |   |
| Credits   | 5  | T                      | Croatian  |
|   |  | Language               |   |
| Compulsory<br>reading                                   | Klapec T, Šarkanj B: <i>Opasnosti vezane uz hranu. Kemijske i fizikalne opasnosti.</i><br>Interna skripta, Prehrambeno-tehnološki fakultet, Osijek, 2010.  |                        |   |
|   | Klapec T, Šarkanj B: <i>Promjene hranjive vrijednosti namirnica tijekom pripreme</i> .<br>Interna skripta, Prehrambeno-tehnološki fakultet, Osijek, 2012.  |                        |   |
| Recommended reading                                     | Review articles.   |                        |   |

| Course title   | Modelling and Opt   | imization of Nutri   | tion  |
|--|---|--|---|
|  | N206  |  | Elective  |
| Course code  | ·   | Course status  |   |
| Study programme  |   |  |   |
|  | Nutrition   |  |   |
| Semester   | П.  |  |   |
| Course lecturer  | Damir Magdić, PhD, asso   | oc.prof.   |   |
| Course associates  |   |  |   |
| Course content   |   | -  | optimization of nutrition.  |
|  | Mathematical methods  |  |   |
|  |   |  | nd menus optimization.  |
|  | Computer programs for   | r optimizing the menu  |   |
|  | Creating databases and  | tables with the compo  | osition of foods.   |
|  | Creating different types  | s of menus.  |   |
|  | Design of menus as the  | final product.   |   |
|  | Menu presentation in d  | -  | n.  |
|  | Creating catalogs and c   | 0 1  |   |
| General and  |   |  | hodology for optimizing   |
| specific knowledge   |   |  | particularities of certain types  |
| acquired in course   | of food, work with data   | -  | particularities of certain types  |
| (objective)  | ,   |  | the and committee are shown to  |
|  |   |  | thm and computer program to   |
|  | •   | id presentation of digi  | tal and printed menus, catalog  |
|  | and database of menus.  | <u> </u>   |   |
| Teaching method  | Lectures  | Seminars   | Labs  |
| (hrs/week)<br>(total)  | 10  | 5  | 0   |
| Examination  | Oral exam   | 5  | 0   |
| method   | Orarexam  |  |   |
|  |   |  |   |
| Credits  | 5   |  | Croatian  |
| Credits  |   |  | Croatian  |
|  |   | Language   | Croatian  |
| Compulsory   |   | Language   |   |
|  | 1. M. Mandić: Znanost o   | Language<br>prehrani. PTF, Osijek, 2   | 2007.   |
| Compulsory   | 1. M. Mandić: <i>Znanost o</i><br>2. D. Magdić <i>: Numeri</i> čke  | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2   | 2007.<br>001.   |
| Compulsory   | 1. M. Mandić: <i>Znanost o</i><br>2. D. Magdić <i>: Numeričke</i><br>3. G. Mateljan: <i>Najzdravi</i>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla  | 2007.<br>001.<br>netopija, Zagreb, 2008.  |
| Compulsory   | 1. M. Mandić: <i>Znanost o</i><br>2. D. Magdić <i>: Numeričke</i><br>3. G. Mateljan: <i>Najzdravi</i>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na   | 2007.<br>001.   |
| Compulsory<br>reading  | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravi<br/>4. A. Kaić-Rak, K. Antoni</li> </ol>  | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na   | 2007.<br>001.<br>netopija, Zagreb, 2008.  |
| Compulsory<br>reading<br>Recommended   | 1. M. Mandić: <i>Znanost o</i><br>2. D. Magdić <i>: Numeričke</i><br>3. G. Mateljan: <i>Najzdravi</i><br>4. A. Kaić-Rak, K. Antoni<br>zdravlja SR Hrvatske, Za  | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.  | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu   |
| Compulsory<br>reading  | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravi</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> </ol>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>pija, Naprijed, Zagreb, 1   | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.   |
| Compulsory<br>reading<br>Recommended   | 1. M. Mandić: <i>Znanost o</i><br>2. D. Magdić <i>: Numeričke</i><br>3. G. Mateljan: <i>Najzdravi</i><br>4. A. Kaić-Rak, K. Antoni<br>zdravlja SR Hrvatske, Za  | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>pija, Naprijed, Zagreb, 1   | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.   |
| Compulsory<br>reading<br>Recommended<br>reading                                  | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravi</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetetika,</li> </ol>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>pija, Naprijed, Zagreb, 1<br>Medicinska naklada, Za   | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.<br>agreb, 2002.   |
| Compulsory<br>reading<br>Recommended   | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravij</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetetika,<br/></li> <li>Students will use variou</li> </ol>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>bija, Naprijed, Zagreb, 1<br>Medicinska naklada, Za   | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.<br>agreb, 2002.   |
| Compulsory<br>reading<br>Recommended<br>reading                                  | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravi</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetetika,</li> <li>Students will use variot<br/>menu tailored to the ne</li> </ol>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>bija, Naprijed, Zagreb, 1<br>Medicinska naklada, Za<br>us computer programs<br>eds of the client or tar   | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.<br>agreb, 2002.   |
| Compulsory<br>reading<br>Recommended<br>reading<br>Learning outcomes             | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravij</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetetika,</li> <li>Students will use varion<br/>menu tailored to the ne<br/>modify it to fit lifestyle</li> </ol>   | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>bija, Naprijed, Zagreb, 1<br>Medicinska naklada, Za<br>us computer programs<br>eds of the client or tar   | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.<br>agreb, 2002.<br>and databases and create a<br>get group and subsequently   |
| Compulsory<br>reading<br>Recommended<br>reading<br>Learning outcomes<br>European | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravij</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetetika,</li> <li></li> <li>Students will use varion<br/>menu tailored to the ne<br/>modify it to fit lifestyle</li> <li>Using the databases of</li> </ol> | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu na<br>greb, 1990.<br>ojja, Naprijed, Zagreb, 1<br>Medicinska naklada, Za<br>us computer programs<br>eds of the client or tar<br>es.<br>foods and dietary hab                             | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.<br>agreb, 2002.<br>and databases and create a<br>get group and subsequently<br>its of the population of Europe,                                     |
| Compulsory<br>reading<br>Recommended<br>reading<br>Learning outcomes             | <ol> <li>M. Mandić: Znanost o</li> <li>D. Magdić: Numeričke</li> <li>G. Mateljan: Najzdravij</li> <li>A. Kaić-Rak, K. Antoni<br/>zdravlja SR Hrvatske, Za</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetoteraj</li> <li>R. Živković: Dijetetika,</li> <li></li> <li>Students will use varion<br/>menu tailored to the ne<br/>modify it to fit lifestyle</li> <li>Using the databases of</li> </ol> | Language<br>prehrani. PTF, Osijek, 2<br>metode. PTF, Osijek, 2<br>je namirnice svijeta, Pla<br>ć: Tablice o sastavu nat<br>greb, 1990.<br>bija, Naprijed, Zagreb, 1<br>Medicinska naklada, Za<br>us computer programs<br>eds of the client or tar<br>es.<br>foods and dietary hab<br>plicable to a wider are | 2007.<br>001.<br>netopija, Zagreb, 2008.<br><i>mirnica i pića,</i> Zavod za zaštitu<br>994.<br>agreb, 2002.<br>5 and databases and create a<br>get group and subsequently<br>its of the population of Europe,<br>ea which will enable student's |

| Course title   | FOOD-DRUG INT   | ERACTIONS               |   |
|--|---|-------------------------|---|
|  | N207  |                         | Elective  |
| Course code  | 1   | Course status           |   |
| Study programme  |   |                         |   |
|  | Nutrition   |                         |   |
| Semester   |   |                         |   |
| Course lecturer  | Tomislav Klapec, prof.  |                         |   |
| Course associates  |   |                         |   |
| Course content   | Lectures and seminars:<br>Influence of food and drink components on absorption, distribution,<br>biotransformation and excretion of drugs.<br>Metabolic enzymes of phase I and II – induction and inhibition by food<br>constituents.<br>P-glycoproteins and other transport proteins.<br>Acid-base balance and influence on drug excretion.<br>Interactions between food components and nonprescription drugs.<br>Interactions between drugs and constituents of herbal and dietary supplements.<br>Counselling to prevent untoward interactions or adjustments of nutrition to achieve<br>synergism between drugs and food. |                         |   |
| General and<br>specific knowledge<br>acquired in course<br>(objective) |   | tential of adverse (and | cal fate of drugs and nutrients.<br>d desirable) interactions between<br>t (or promote) them. |
| Teaching method  | Lectures  | Seminars                | Labs  |
| (hrs/week)   | -   | -                       | -   |
| (total)  | 10  | 5                       | 0   |
| Examination<br>method  | Oral  |                         |   |
| Credits  | 5   |                         | Croatian  |
|  |   | Language                |   |
| Compulsory   | PowerPoint presentations  | s of lectures.          |   |
| reading  | McCabe BJ, Wolfe JJ, Frankel EH (ur.): <i>Handbook of Food-Drug Interactions</i> , CRC Press, 2003.   |                         |   |
| Recommended reading  | Review articles.  |                         |   |

| Course title                     | NUTRITIONISTS  | AND NEW TEC   | HN(   | DLOGIES   |
|----------------------------------|--|---|---|---|
|                                  | N208   |   | Elec  | tive  |
| Course code                      |  | Course status   |   |   |
| Study programme                  |  |   |   |   |
|                                  | Nutrition  |   |   |   |
| Semester                         | 11   |   |   |   |
| Course lecturer                  | Academian Vlasta Piližo  | ta  |   |   |
| Course associates                | -  |   |   |   |
| Course content                   | <i>Learning Topics</i><br>New technologies in food processing. Advantages and possible risks from use of new technologies. Combination of traditional (conventional) and novel technologies. Innovations in food processing (application of high pressure food processing, pulsed electric field, pulsed light technology, ultraviolet light, ultrasound, microvawe sterilization, ohmic heating, nanotechnology, extruzion, edible coatings, etc.). Consumers and new technologies. |   |   |   |
|                                  | Writing presentation   |   |   |   |
| General and                      |  | nain knowledge and ana  | alytica                                     | al approach towards new food  |
| specific knowledge               | processing technologies  | and get a broad knowl   | ledge                                       | of the characteristics and the  |
| acquired in course               | most important facts abo   | out new technologies.   |   |   |
| (objective)                      |  | 1   |   |   |
| Teaching method                  | Lectures   | Seminars  |   | Labs  |
| (hrs/week)                       | 10   | 5   |   | -   |
| (total)                          | 15   |   |   | -   |
| Examination<br>method            | Oral exam.   |   |   |   |
|                                  |  |   |   |   |
| Credits                          | 5  |   | Cros  | atian and English   |
| Credits                          | 5  | Languaga  | Croa  | atian and English   |
| Credits                          |  | Language  | Croa  | atian and English   |
| Credits<br>Compulsory<br>reading | <ol> <li>Barbosa-Canovas, G.<br/>Preservation of Foods</li> <li>Barbosa-Canovas, G.<br/>Food Processing: Fun<br/>Publishing, 2001.</li> <li>Barbosa-Canovas, G.<br/>Processing, CRC Pres</li> <li>Huang, Q. (Ed.<br/>beverage and nu</li> </ol>  | V., Pothakamury, U. R<br>s, Marcel Dekker, 1998.<br>V., and Zhang, H. Q. (e<br>damental Aspects and<br>V., and Gould, G. W. (e<br>ss, 2000.<br>.): Nanotechnolo<br>atraceutical<br>odhead Publish<br>logy and   | a., Pal<br>eds.):<br><i>Appli</i><br>eds.): | ou E. (eds.): <i>Nonthermal</i><br><i>Pulsed Electric Fields in</i><br><i>cations</i> , Woodhead<br><i>Innovations in Food</i><br><i>in the food</i> ,                    |
| Compulsory                       | <ol> <li>Barbosa-Canovas, G.<br/>Preservation of Foods</li> <li>Barbosa-Canovas, G.<br/>Food Processing: Fur<br/>Publishing, 2001.</li> <li>Barbosa-Canovas, G.<br/>Processing, CRC Pres</li> <li>Huang, Q. (Ed.<br/>beverage and nu<br/>Industries, Wo<br/>Science, Technol</li> </ol>  | V., Pothakamury, U. R<br>s, Marcel Dekker, 1998.<br>V., and Zhang, H. Q. (e<br><i>idamental Aspects and</i><br>V., and Gould, G. W. (e<br>ss, 2000.<br>.): <i>Nanotechnolo</i><br><i>itraceutical</i><br>odhead Publish<br>logy and<br>218, 2012.<br>articles | ads.):<br><i>Appli</i> eds.):<br>ogy        | ou E. (eds.): <i>Nonthermal</i><br><i>Pulsed Electric Fields in</i><br><i>cations</i> , Woodhead<br><i>Innovations in Food</i><br><i>in the food,</i><br>g Series in Food |

Appendix 2

**Biography of teachers** 

NAME AND SURNAME

#### Irena Colić Barić

AFFILIATION

Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

E-MAIL ADDRESS

icolic@pbf.hr

#### TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

Full Professor, April 2007. (biotechnical sciences, food technology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

BSc, Faculty of Food Technology and Biotechnology, University of Zagreb, Biotechnical science, 1984.

MSc, Faculty of Food Technology and Biotechnology, University of Zagreb, Biotechnical science / Nutrition), 1987.

PhD, Faculty of Food Technology and Biotechnology, University of Zagreb, Biotechnical science / Nutrition), 1996.

WORK EXPERIENCE year to year, institution, location

November 1984 - now - Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

June-November 1984. – Podravka, d.o.o., Food Industry, Koprivnica, Croatia

POSITIONS year to year, position held, institution

1998-2000 i od 2003-2007 Head of the Department of Food Quality Control

2009-now - Chairman of Laboratory for Nutrition Science, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2008-now - Member of the EFSA Expert working Group on Food Consumption Data, Parma, Italy Member of working group for

2007-now - President of Scientific Panel on dietetic products, nutrition and allergenic in Croatian Food Agency

2007-now- Leader of PhD and graduate study Nutrition Science, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2006- now - Vice chairmen of Department of Food Quality Control and Nutrition, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2006-now – Member of Scientific board, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2005-now – Leader of undergraduate study Nutrition Science, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2005-2007- Vice President of Scientific panel on dietetic products, nutrition and allergenic, Croatian Food Agency.

2005-now – Member of Committee for postgraduate studies, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2005-now – Member of working groups for Croatia/EU chapter 12. - Food Safety, Veterinary and Phytosanitary Policy - *Food labelling* and *Food for particular nutritional uses* 

2005-now - Member of Biotechnical Field Council, University of Zagreb

2003-2007- Member of Committee for quality control and assurance in teaching, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2003-2005 – Member of working group on development of new curricula's for Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2001-2006 - Chairman of Department of Food Quality Control and Nutrition, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

2000-2002 – Leader of Committee for evaluation textbooks and other publication, Ministry for education and sport, Zagreb

1998-2005 – Member of Committee for promotion, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

1996-2001 - Vice chairmen of Department of Food Quality Control, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

1996-now – Member of Committee for international collaboration, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

1995–now – Member of Committee for education, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

1994-2009 - Chairman of Laboratory for Food Chemistry and Nutrition, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb

RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

Research projects

2007-now - *Diet, homocysteine and bone quality (058-0222411-28209)*, Croatian Ministry of Science, Education and Sports; main researcher

2007-now - *Early indicators of the development of allergic diseases in children;* Croatian Ministry of Science, Education and Sports; researcher

2006-2009 - Freshly Baked Breads with Improvement of Nutritional Quality and Low Energy Demanding for the Benefit Of the Consumer and of the Environment (FP 6) Project no. 036302; Associate in one of the working packages

2003-2006 - *Dietary risks for osteoporosis in omnivore and vegetarians (0058028);* Croatian Ministry of Science, Education and Sports; main researcher

2001 – Assessment of the condition and the proposed changes in organised nutrition for students on national level, Croatian Ministry of Science, Education and Sports; main researcher

#### Organisation of meeting

2008 - 4<sup>th</sup> Central European Congress on Food and 6<sup>th</sup> Croatia Congress of Food Technologists, Biotechnologists and Nutritionist, Cavtat, Croatia. Member of organization and scientific committees.

2004 - 5<sup>th</sup> Croatian Congress of Food Technologists, Biotechnologists and Nutritionists", Opatija, Croatia. Member of scientific committee.

2001 - 4<sup>th</sup> Croatian Congress of Food Technologists, Biotechnologists and Nutritionists", Opatija, Croatia. Member of scientific and organization committees.

Editorial board

2009 - now - Food Technology and Biotechnology, member

2008-now - Journal of Human Biology, member

2002 – now- Croatian Journal of Food Technology, Biotechnology and Nutrition, member

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

#### Professional projects

2009-2012 - Improving Academia – Industry Links In Food Safety And Quality. Llieda, Spain. (TEMPUS projects), founded by EU, associate

2005-2008 - Agribusiness Higher EducAtion Development, University of Debrecen, Hungary. (TEMPUS projects), founded by EU, associate

2005-2008 - Gestion technico-économique de la qualité des produits alimentaires AGRENA, France. (TEMPUS projects), founded by EU, associate

2002-2004 - Creation centre de transfert coatie en Biotechnique et Economie appliqee per SE AGRENA, France, (TEMPUS projects), founded by EU, associate

#### Professional organisations

2005-now – Croatian Osteoporosis Society 1999-2002 – Croatian Society for Coeliac Disease 1996-now – Croatian Diabetes Association 1996-now - Croatian Society of Food Technologists, Biotechnologists and Nutritionists; lead Nutritionis section

1996-now - Croatian Dairy Society 1996-now - European Nutrition Leadership Programme 1990-1993 - Food Technology Society

#### Editorial board

2007-2010 - *Mlijeko i ja*, member 1998-danas - *Diabtes, slatki život,* memeber

TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution

Institution: Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb Undergraduate study Nutrition Science: Introduction in the profession nutritionist, Nutrition Science I, Nutrition Science II, Basic of Diet therapy, Nutrition in elderly, Nutrition for athletes and solders, Obesity and other eating disorders, Phythochemicals and health

*Graduate study Nutrition Science:* Methods in nutrition assessment, Consumers, food and nutrition, Traditional nutrition

Postgraduate study Food Safety: Consumers science, Food Ethics

PhD study Nutrition Science : Nutrition and nutritive value of food, Achievements in nutrition science, Nutritional standards and recommendation, Recent advances in the nutrition science

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/pretrazivanje\_rezultat?lang=EN

QUALIFYING PUBLICATIONS list a maximum of 10 articles, scientific meeting participations, mentorships, etc.

- Mentor doctoral thesis: Ranilović Jasmine: Importance of nutrition labelling and developing acceptable formats for consumers in Croatia: Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb: 23<sup>rd</sup> December. 2008.
- 2. Ranilović, Jasmina; Markovina, Jerko; Žnidar, Krešimir; Colić Barić, Irena. Attitudes to healthy eating among a representative sampling of Croatian adults: A comparison with Mediterranean countries. *International Journal of Food Sciences and Nutrition*. 60 (2009), 7 (S.I.); 11-29
- Lambert, Jean Louis; Le-Bail, Alain; Zuniga, Ruben; Van-Haesendonck, İngrid; Vnzeveren, E.; Petit, C.; Rosell, M.Cristina; Collar, Concha; Ćurić, Duška; Colić-Barić, Irena; Šikora, Marek; Ziobro, R. The attitudes of European consumers toward innovation in bread ; interest of the consumers toward selected quality attributes. *Journal of Sensory Studies*. 24 (2009), 2; 204-219
- 4. Colić-Barić, Irena; Kajfež, Romana; Šatalić, Zvonimir; Cvijetić, Selma. Comparison of dietary habits in the urban and rural Croatian schoolchildren. *European Journal of Nutrition*. 43 (2004), 3; 169-174
- 5. Čolić Barić, Irena; Šatalić, Zvonimir; Giljević, Zlatko; Škreb, Franjo; Koren-Kesner, Inga. Does a patient's knowledge about osteoporosis have an influence on calcium intake?. *Mljekarstvo*. 54 (2004), 2; 119-128
- 6. Colić Barić, Irena.A comparison of nutrition knowledge, attitudes and dairy consumption of school children according to age and gender. *Mljekarstvo*. 51 (2001), 1; 3-14
- Cvijetić, Selma; Colić-Barić, Irena; Šarić, Marija; Cecić, Ivana; Blanuša, Maja; Ilich, Jasminka Z. Nutritional and life-style factors associated with bone status in older Croatian women. Abstracts of the 28th Annual Meeting of the American Society for Bone and Mineral Research; u: Journal of Bone and Mineral Research ISSN 0884-0431) 21 (2006) (S1). 2006. S169-S169.
- Colić Barić, Irena; Šatalić, Zvonimir; Keser, Irena; Cecić, Ivana. Public perception of light food products. Book of Abstracts. Nantes, France, 2006. 1579-1580.

NAME AND SURNAME

# Daniela Čačić Kenjerić

AFFILIATION

#### Faculty of Food Technology Osijek, University of Osijek

E-MAIL ADDRESS

daniela.kenjeric@ptfos.hr

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

Associate professor, 29 May 2009. (Biotechnical sciences, Food technology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

BSc, Faculty of Food Technology Osijek, University of Osijek, Osijek, Biotechnical sciences, 2000 PhD, Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb, Biotechnical sciences, 2004

WORK EXPERIENCE year to year, institution, location

2000. – Faculty of Food Technology Osijek, University of Osijek

POSITIONS year to year, position held, institution

2004. – Chair of Subdepartment of Nutrition, Faculty of Food Technology Osijek

RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

#### Research projects

- 2007- Nutrition and lifestyle in health protection, Ministry of Science, Education and Sports, researcher
- 2005-2007 Identification of botanical origin and analysis of chemical parameters of honey from Croatia and Macedonia, Ministry of Science, Education and Sports, researcher
- 2002-2007 Quality and safety of food and nutrition, Ministry of Science, Education and Sports, researcher
- 2000-2002 Nutritional research and hygienic propriety of food, Ministry of Science and Technology, researcher
- 2000-2002 Quality control and nutritional and toxic aspects of food, Ministry of Science and Technology, researcher

#### Awards

• 2009- Award to the Young Scientist "Vera Johanides", Croatian Academy of Engineering

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

#### Professional projects

- 2008: Development of a questionnaire for dietary habits estimation in Croatia, *Croatian Food Agency*, researcher
- 2003-2005 VIP project: Botanical Origin and Quality of Mediterranean Honeys, *Ministry of Agriculture, Fisheries and Rural Development*, researcher
- 2002-2006 Technological project TP-02/0113-07: Investigation of methods for unequivocal identification of honey, *Ministry of Science, Education and Sports*, researcher

#### Professional organisations

Society of Chemists and Engineers, Osijek

**TEACHING ACTIVITIES** list **current** teaching activities: subjects, study program, institution

| •        | <b>Ecology</b> , Undergraduate study programme <i>Food Technology</i> , Faculty of Food Technology Osijek  |
|----------|--|
| •        | Functional Foods and Supplements, Undergraduate study programme Food Technology, Faculty of Food Technology Osijek   |
| •        | Instrumental Analysis I, Graduate study programme Food Science and Nutrition, Faculty of Food Technology Osijek  |
| •        | <b>Nutrition Throughout the Life Cycle</b> , Graduate study programme <i>Food Science and Nutrition</i> , Faculty of Food Technology Osijek  |
| •        | <b>Nutrition Science</b> , Postgraduate specialist study <i>Food Safety and Quality</i> , Faculty of Food Technology Osijek  |
| •        | <b>Nutritional Science</b> , Undergraduate study programme <i>Food Technology</i> , Faculty of Agriculture and Food Technology, University of Mostar   |
| LINK T   | OBIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr  |
| http://b | ib.irb.hr/lista-radova?autor=235380  |
| QUALI    | FYING PUBLICATIONS list a maximum of 10 articles, scientific meeting participations, mentorships, etc.   |
| 1.       | Mandic Z.; Perl Pirički, D.; <b>Kenjerić, D.</b> ; Haničar, D.; Tanasić, I. (2010) Breast vs bottle: differences in the growth of Croatian infants. <i>Maternal and Child Nutrition.</i> – accepted for publication  |
| 2.       |  |
| 3.       | Mandić, M.L.; Primorac, Lj.; <b>Kenjerić, D.</b> ; Mandić-Puljek, M.; Perl, A. (2008) Intake of some vitamins among clinically healthy adults from continental part of Croatia estimated by 24-hours recall. <i>Intl J Food Sci Nutr. 59</i> :457-464.   |
| 4.       | Mandić-Puljek, M.; Mandić, M.L.; Perl, A.; <b>Kenjerić, D.</b> (2005): Calcium intake, food sources and seasonal variations in eastern Croatia. <i>Coll.Antropol.</i> 29:503-507.  |
| 5.       | Perl Pirički, A.; <b>Kenjerić, D.</b> ; Mandić, M.L. Cereals as source of vitamins and minerals, In: Proceedings of 4 <sup>th</sup> International Congress FLOUR – BREAD `07. 6 <sup>th</sup> Croatian Congress of Cereal Technologists, Ed. Ugarčić-Hardi, Ž.; Osijek, Croatia, 2008.; pp. 466-470.   |
| 6.       | Perl, A., Mandić, M.L., Primorac, Lj.; <b>Kenjerić, D</b> .; Adam Perl, M. Dietary fibres and their food sources in the nutrition of student population, In: Proceedings of 3 <sup>rd</sup> International Congress FLOUR – BREAD `05. 5 <sup>th</sup> Croatian Congress of Cereal Technologists, Ed.   |
| 7.       | Ugarčić-Hardi, Ž.; Osijek, Croatia, 2006.; pp. 215-221.<br>Primorac, Lj.; Mandić, M.L.; Perl, A.; <b>Kenjerić, D.</b> Quality Evaluation of Honey from Osijek<br>Market, In: Proceedings of the 2 <sup>nd</sup> Central European Meeting, 5 <sup>th</sup> Croatian Congress of<br>Food Technologists, Biotechnologists and Nutritionists, Ed. Karlović, D.; Zagreb, Croatia,<br>2005.; pp.270-274. |
| 8.       |  |

NAME AND SURNAME

#### **Tomislav Klapec**

AFFILIATION

Faculty of Food Technology Osijek

E-MAIL ADDRESS

<u>tomi@ptfos.hr</u>

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

Full professor, June 10, 2009 (biotechnical sciences, food technology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

BSc, Faculty of Food Technology, Osijek, biotechnical sciences, 1994

MSc, Faculty of Food Technology, Zagreb, biotechnical sciences, 1997

PhD, Faculty of Food Technology, Osijek, biotechnical sciences, 2001

WORK EXPERIENCE year to year, institution, location

from 1994 - Faculty of Food Technology, Osijek

POSITIONS year to year, position held, institution

from 2004 – Head of Subdepartment of Toxicology and Nutritional Biochemistry (from 2011: Subdepartment of Biochemistry and Toxicology), PTF Osijek

**RESEARCH ACTIVITIES** list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

#### Research projects

from 2007- Synergistic mixtures in antifungal and antimycotoxigenic food protection, MZOŠ manager

from 2007- Bioactive substances: isolation, characteristaion, and biological effects, MZOŠ, collaborator

2002-2007 Quality and safety of food and nutrition, MZOŠ, collaborator

1998-2002 Selenium provision in the population of Eastern Slavonia, MZT, manager

1997-2002 Nutritive and toxic aspects of food and nutrition, MZOŠ, collaborator

Awards

1998- National award for science, category: young investigator, Croatian government

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

Professional projects

2008-2010 VIP project: Possibilities for increased productivity of ecologically farmed sheep, MPRR, collaborator

2005-2007 Technological project TP-04/0113-08: Formulations of feeds resistant to fungal growth and mycotoxin synthesis, MZOŠ, manager

2004-2006 VIP project Advancement of quality of ecological goat products, MPRR, collaborator 2003-2005 Technological project TP-01/0113-03: Investigation of malting procedures for domestic wheat varieties, MZOŠ, collaborator

2002-2005 Technological project TP-02/0113-07: Investigation of methods for unequivocal identification of honey, collaborator

Professional organisations

Society of chemists and technologists, member, Osijek

TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution

Food Toxicology, Undergraduate study of Food Technology, PTF Osijek

Nutritional Biochemistry, Graduate study of Food and Nutrition Science, PTF Osijek

Foodborne hazards, Graduate study of Food and Nutrition Science and graduate study of Food Engineering, PTF Osijek

Occupational Toxicology, Graduate study of Food and Nutrition Science, PTF Osijek Selected Chapters in Food Toxicology, Doctoral study of Food Engineering, PTF Osijek Toxicology of Foods, University interdisciplinary scientific study 'Protection of Nature and Environment', University J. J. Strossmayer, Osijek

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=240361

- 1. Ćavar S, Bošnjak Z., **Klapec T.** et al. (2010): Blood selenium, glutathione peroxidase activity and antioxidant supplementation of subjects exposed to arsenic via drinking water. *Environ Toxicol Pharmacol* 29, 138-143.
- 2. Bošnjak Z., Ćavar S., **Klapec T.** et al. (2008): Selected markers of cardiovascular disease in a population exposed to arsenic from drinking water. *Environ Toxicol Pharmacol* 26, 181-186.
- 3. Klapec T. et al. (2008): Selenium in placenta predicts birth weight in normal but not intrauterine growth restriction pregnancy. *J Trace Elem Med Biol* 22, 54-58.
- 4. Ćavar S., **Klapec T.**, et al. (2005): High exposure to arsenic from drinking water at several localities in eastern Croatia. *Sci Total Environ* 339, 277-282.
- 5. **Klapec T.**, et al. (2004): Selenium in selected foods grown or purchased in eastern Croatia. *Food Chem* 85, 445-452.
- 6. Perl A., Primorac Lj., Mandić M.L., **Klapec T.**, et al. (2003): Dietary fibre intake in eastern Croatia as determined by an enzymatic-gravimetric method in duplicated portions. *Eur Food Res Technol* 217, 207-210.
- 7. Primorac Lj., Mandić M.L., **Klapec T.**, et al. (2003): Fat and fatty acids intake of adults in eastern Croatia. *Nutr Res* 23, 1453-1461.
- Antunović Z., Steiner Z., Senčić Đ., Mandić M.L., Klapec T. (2001): Changes in ewe milk composition depending on lactation stage and feeding season. *Czech J Anim Sci* 46, 75-82.
- 9. Primorac Lj., Mandić M.L., **Klapec T.**, et al. (2000): Adequacy of a food composition database to estimate fat and fatty acid intake. *Int J Food Sci Nutr* 51, 25-32.
- 10. Glavaš-Obrovac Lj., **Klapec T.**, et al. (2000): Anticancer effect of selenium compounds on human colonic carcinoma cells. *Acta Aliment* 29, 295-306.

Mirela Kopjar

AFFILIATION

Faculty of Food Technology Osijek

E-MAIL ADDRESS

Mirela.Kopjar@ptfos.hr

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

assistant professor, December, 2008 (biotechnical sciences, food technology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

BSc, Faculty of Food Technology, Osijek, biotechnical science, 2002

PhD, Faculty of Food Technology, Osijek, biotechnical science, 2007

 $\ensuremath{\textbf{WORK}}\xspace$  EXPERIENCE year to year, institution, location

2002 - Faculty of Food Technology, Osijek,

**POSITIONS** year to year, position held, institution

**RESEARCH ACTIVITIES** list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

### Research projects

2007- Development of processes for high quality food products, MZOŠ collaborator 2006-2007 Influence of trehalose addition on aroma of strawberry puree, MZOŠ, collaborator 2002-2006 Development of processes for high value food products, MZT, collaborator *Awards* 

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

Professional projects

2005-2007 Technological project TP-01/0113-02: Improvement of food freezing, MZOŠ, collaborator

Professional organisations

Association of chemists and technologists, Osijek

**TEACHING ACTIVITIES** list **current** teaching activities: subjects, study program, institution

Food chemistry, Undergraduate study Food Technology, PTF Osijek

Food product development, Graduate study Food Technology, PTF Osijek

Technology of preservation and conservation of fruits and vegetables, Graduate study Food Technology, PTF Osijek

Chemistry and technology of fruits and vegetables, Graduate study Food Technology, PTF Osijek Minimally processed food, Graduate study Food Technology, PTF Osijek

Food preparation processes, Graduate study Food Technology, PTF Osijek

Food chemistry, Undergraduate study Food Technology, Faculty of Agronomy and Food Technology, University in Mostar

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=250632

**QUALIFYING PUBLICATIONS** list a maximum of 10 articles, scientific meeting participations, mentorships, etc.

• M. Kopjar, V. Piližota, N. Nedić Tiban, D. Šubarić, J. Babić, Đ. Ačkar: Effect of different

pectin addition and its concentration on colour and texture of raspberry jam. *Deutsche Lebensmittel-Rundschau*, 103 (4), 164-168 (2007).

- **M. Kopjar**, V. Piližota, J. Hribar, N. Nedić Tiban, D. Šubarić, J. Babić, T. Požrl: Influence of trehalose addition on instrumental textural properties of strawberry pastes. *International Journal of Food Properties*, 11 (3), 646-655 (2008).
- **M. Kopjar**, V. Piližota, J. Hribar, M. Simčič, E. Zlatič, N. Nedić Tiban: Influence of trehalose addition and storage conditions on the quality of strawberry cream filling. *Journal of Food Engineering*, 87 (3), 341-350 (2008).
- M. Kopjar, V. Piližota, N. Nedić Tiban, D. Šubarić, J. Babić, Đ. Ačkar, M. Sajdl: Strawberry jams: Influence of different pectins on colour and textural properties. *Czech Journal of Food Science*, 27 (1), 19-27 (2009).
- T. Požrl, M. Kopjar, I. Kurent, J. Hribar, A. Janeš, M. Simčič: Phytate degradation during breadmaking: The influence of flour type and breadmaking procedure. *Czech Journal of Food Science*, 27 (1), 28-37 (2009).
- M. Kopjar, V. Piližota, J. Hribar, M. Simčič: Total phenol content and antioxidant activity of water solutions of plant extracts. *Croatian Journal of Food Science and Technology*, 1 (1), 1-7 (2009).

**M.** Kopjar, V. Piližota, D. Šubarić, J. Babić: Prevention of thermal degradation of red currant juice anthocyanins by phenolic compounds addition. *Croatian Journal of Food Science and Technology*, 1 (1), 24-30 (2009).

| NAME AND SURNAME   |
|--|
| DAMIR MAGDIĆ   |
| AFFILIATION  |
| University of Osijek Faculty of Food Technology Osijek (UO FFTOS)  |
| E-MAIL ADDRESS   |
| Damir.Magdic@ptfos.hr  |
| TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION  |
| assoc. professor, 12-18-2009 (biotechnical sciences, food technology)  |
| CV   |
| <b>EDUCATION</b> degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year   |
| BSc, UO FFTOS, 1992.   |
| MSc, University of Zagreb, Faculty of Food Technology and Biotechnology Zagreb, 1999.<br>PhD, University of Zagreb, Faculty of Food Technology and Biotechnology Zagreb, 2003.   |
| WORK EXPERIENCE year to year, institution, location  |
| 1993 UO FFTOS  |
| Positions year to year, position held, institution   |
| 20052010. Vice Dean for Education, UO FFTOS  |
| 2005 Chairman of Sub Dept. for Modelling, Optimization and Automation, UO FFTOS  |
| RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project;  |
| organisation of meetings; editorial board memberships; awards, etc. – list a maximum of five from each category!   |
| Research projects  |
| 19962002., Main researcher: Žaneta Ugarčić-Hardi, Improving the production of high-<br>nutrient foods, MSES R.Croatia, Researcher  |
| 20022006., Main researcher: Dragan Kovačević, Modeling and optimization of the process of freezing food, MSES R.Croatia, Researcher  |
| 2007 Main researcher: Damir Magdić, Nondestructive methods in food production and storage, MSES R.Croatia  |
| <b>PROFESSIONAL ACTIVITIES</b> list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – <b>list a maximum of five from each category!</b> |
| Professional projects  |
| 20082009. Main researcher: Sanja Lončar Vicković, A systematic approach to the introduction of learning outcomes in the education of students at the University of Osijek (SUPER UNIOS), MSES R.Croatia, Researcher      |
| 2009. Main researcher: Milena Mandić, Higher Education Learning Partnership, EU, Researcher  |
| Professional organisations   |
| Croatian Society of Chemical Engineers   |
| TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution   |
| undergraduate study - UO FFTOS<br>Informatics (2010./11)<br>Physics (Faculty of Electrical Engineering Osijek, 1992./931994./95.)  |
|  |

Physics 1 (Faculty of Electrical Engineering Osijek, 1992./93.-1994./95.) graduate study - UO FFTOS

Computer aided diet optimization (2005./06.-...)

Modelling and control in the food technology processes (1993./94.-...)

Modelling of operations and processes (1993./94.-...)

Measurement, Control and Automation (1993./94. -1998./99.)

Engineering Thermodynamics (2003./04.)

Technology and computing (2003./04.)

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=209572

- Perl Pirički, Antonija; Magdić, Damir; Adam Perl, Marija; Žihlavski, Irena. Diet optimization for overweight cardiovascular patients by Simplex algorithm. Proc. of Central European Congress of Food Technologists, Biotechnologists and Nutricionists / Ćurić, Duška (ed..), Zagreb : Croatian Chamber of Economy, 2008. 383-390
- 2. Horvat, Daniela; Drezner, Georg; Magdić, Damir; Šimić, Gordana; Dvojković, Krešimir; Lukinac, Jasmina. Effect of an oxidizing improver on dough rheological properties and bread crumb structure in winter wheat cultivars (Triticum aestivum L.) with different gluten strength. *Romanian Agricultural Research*. 26 (2009) ; 35-40
- 3. Horvat, D.; Kurtanjek, Ž.; Drezner, G.; Šimić, G.; **Magdić, D.** Effect of HMW Glutenin Subunits on Wheat Quality Attributes. *Food Technol. Biotechnol.* 47(3), 253-259 (2009)
- Horvat, D.; Kurtanjek, Ž.; Drezner, G.; Šimić, G.; Magdić, D. Effect of HMW Glutenin Subunits on Wheat Quality Attributes. *Food Technol. Biotechnol.* 47(3), 253-259 (2009)
- 5. Kurtanjek, Ž.; Horvat, D.; Magdić, D.; Drezner G. Factor Analysis and Modelling for Rapid Quality Assessment of Croatian Wheat Cultivars with Different Gluten Characteristics, *Food Technol. Biotechnol.* 46(3), 270-277 (2008)
- Magdić D.; Horvat, D.; Jurković, Z.; Sudar, R.; Kurtanjek, Ž. Chemometric Analysis of High Molecular Mass Glutenin Fractions and Image Data of Bread Crumb Structure from Croatian Wheat Cultivars. *Food Technol. Biotechnol.* 40(4), 1-11 (2002)
- 7. Ana Lukić, Optimisation weekly menus for adolescents with polyarthritis, BSc Graduate thesis, December 2009., UO FFTOS
- 8. Kata Mikić, Optimisation weekly menus for patients with diseased pancreas, BSc Graduate thesis, February 2010., UO FFTOS
- 9. Leonard Matijević, Preparation and analysis of menus for bodybuilders using computer programs, BSc Graduate thesis, November 2011., UO FFTOS

NAME AND SURNAME Milena Mandić AFFILIATION Faculty of Food Technology Osijek **E-MAIL ADDRESS** milena.mandic@ptfos.hr **TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION** full professor, for life, December 1999, (biotechnical sciences, food technology, nutrition) CV EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year BSc: Faculty of Pharmacy and Biochemistry, Zagreb, 1972. MSc: Faculty of science, Zagreb PhD: Faculty of Pharmacy and Biochemistry, Zagreb, 1983. WORK EXPERIENCE year to year, institution, location 1982: Institute of Public Health, Osijek 1982-1983. Factory of Milk Powder, Osijek 1983.-today: Faculty of Food Technology, Osijek POSITIONS year to year, position held, institution 1999-2002 vice dean for science 1997-1999: 2002- head of the Department 2002- expert for science programme CORDIS (EE 19982B47393) 2002 TEMPUS expert 2002- Coordinator for the TEMPUS programme 1999- Chair persons of the Committee for the publication, PTF 1999-2001 Committee for the biotechnical science, Ministry of the Science, member 2000-2005 Committee for the publishing of the University, member 2002-2005 2005- University council, member 2008- Chair person of the Ethical Committee of the Faculty RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project; organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category! Research projects 2007- Nutrition and lifestyle in health protection, Ministry of Science, Education and Sports, manager 2002-2007 Quality and safety of food and nutrition nutritional security Ministry of Science, Education and Sports, manager 1997-2002 Dietetic investigation and food safety Ministry of Science, Education and Sports, manager 1996-2002 Nutritionally-toxic aspect of food and diet, Ministry of Science, Education and Sports, manager 1990-1996 Chemical and biological contaminants of food and water on the Slavonia province, Ministry of Science, and Technology, manager Awards 2009- National award for science, for the 2008, Croatian government Organisations of the conferences 2005, 2007, 2009, 2011: Integrated Systems for Agri-Food Production. Temisoara: Editura Orizonturi Universitare 2003: Flower-Bread '03: 2010. 13. Ruzicka Days, Vukovar

2004: 11. Ružičkini dani, Vukovar

2003: 3th Croatian Scientific Conference about Biotechnology, Biotechnology and Food, Zagreb

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

Professional projects

2008: Development of a questionnaire for dietary habits estimation in Croatia, *Croatian Food Agency*, manager

2002-2006 Technological project TP-02/0113-07: Investigation of methods for unequivocal identification of honey, *Ministry of Science, Education and Sports*, manager 2003-2005 VIP project: Botanical Origin and Quality of Mediterranean Honeys, *Ministry of Agriculture, Fisheries and Rural Development*, member

Professional organisations

Society of chemists and technologists, member, president from 2006-2010, Osijek

TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution

Undergraduate study program of Faculty of Food Technology in Osijek: Science of Nutrition, Functional Food and dietary supplements

Graduate study program of Faculty of Food Technology in Osijek-Food Science and Nutrition: Diet Therapy, Antioxidants in Food

Specialist Postgraduate study programs-Food Quality and Safety: Nutrition

PhD study Food Engineering at Faculty of Food Technology in Osijek: Elected themes of Functional Food

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=073571

- 1. **Mandić, M.L**.; Kenjerić, D.; Perl Pirički, A. (2009) Intake of some minerals in healthy adult volunteers from eastern Croatia. *Int J Food Sci Nutr.* **60**, S5; 77-87
- Mandić, M.L.; Primorac, Lj.; Kenjerić, D.; Mandić-Puljek, M.; Perl, A. (2008) Intake of some vitamins among clinically healthy adults from continental part of Croatia estimated by 24-hours recall. *Int J Food Sci Nutr.* 59:457-464.
- Krešić, G; Šimundić, B; Mandić, M L.; Kenđel, G; Pavičić Žeželj, S. (2008) Daily menus can result in suboptimal nutrient intakes, especially calcium, of adolescents living in dormitories. *Nut Research*. 28(3): 156-165
- 4. Mandić-Puljek, M; Mandić, M. L.; Perl, A.; Kenjerić, D. (2005), Calcium intake, food sources and seasonal variations in eastern Croatia. *Coll Antropol.* 29 (2); 503-507
- Klapec, Tomislav; Mandić, M. L.; Grgić, Jerica; Primorac, Ljiljana; Perl, Antonija; Krstanović, Vinko. Selenium in selected foods grown or purchased in eastern Croatia. *Food Chemistry.* 85 (2004), 3; 445-452
- 6. Perl, A.; Primorac, Lj; **Mandić, M. L**.; Klapec, T; Kenjerić, D; Mandić, M. Dietary fibre intake in eastern Croatia as determined by an enzymatic-gravimetric method in duplicated portions. *European Food Research and Technology*. **217** (2003), 3; 207-210
- Primorac, Ljiljana; Mandić, M. L.; Klapec, Tomislav; Folivarski, Koraljka; Perl, Antonija; Kenjerić, Daniela. Fat and fatty acids intake of adults in eastern Croatia. *Nutrition Research.* 23 (2003); 1453-1461
- 8. Glavaš-Obrovac, Ljubica; Klapec, Tomislav; **Mandić, M.L**.; Karner, Ivan. Anticancer effects of selenium compounds on human colonic carcinoma cells. *Acta Alimentaria*. **29** (2000), 3; 295-306
- Primorac, Ljiljana; Mandić, M. L.; Klapec, Tomislav; Folivarski, Koraljka; Perl, Antonija; Sudar, Rezica. Adequacy of a food composition database to estimate fat and fatty acid intake. *International Journal of Food Sciences and Nutrition*. 51 (2000), 1; 25-32
- Adam Perl, Marija; Mandić, M. L.; Primorac, Ljiljana; Klapec, Tomislav; Perl, Antonija. Adolescent acceptance of different foods by obesity status and by sex *Physiology & behavior*. 65 (1998), 2; 241-245

Maja Miškulin

AFFILIATION

Faculty of Medicine, Josip Juraj Strossmayer University of Osijek Institute of Public Health for the Osijek-Baranja County

E-MAIL ADDRESS

miskulin.maja@gmail.com

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

Assistant Professor, November 24 2008, (biomedicine and health, public health and health care)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

Medical Doctor (MD title), Medical School University of Zagreb, Medical Studies in Osijek, 2001.

Philosophy Doctor (PhD title), University of Josip Juraj Strossmayer in Osijek, Faculty of Medicine, 2006.

Specialist of Epidemiology, Ministry of Health and Social Welfare of the Republic of Croatia, Zagreb, 2007.

Subspecialist of Health Ecology (Environmental Medicine), Ministry of Health and Social Welfare of the Republic of Croatia, Zagreb, 2009.

WORK EXPERIENCE year to year, institution, location

2001 - Institute of Public Health for the Osijek-Baranja County

2003 - Faculty of Medicine, Josip Juraj Strossmayer University of Osijek

2009 - Permanent judicial expert in the field of medicine – Epidemiology and Health Ecology for the County Court in Osijek

POSITIONS year to year, position held, institution

2008 – 2010 Vice-president of the non-governmental organisation "Through optimal body mass to health"

RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

### Scientific projects

Investigator at the scientific project entitled: "Investigation of long term consequences of war on human health" (project code:219-1080315-0288; principal investigator and the project leader: Professor Dinko Puntarić, MD, PhD, specialist of epidemiology and health ecology) since March 2007

Investigator at the scientific project entitled: "Injury prevention / safety promotion for pre-school children" (project code: 108-1081871-1895; principal investigator and the project leader: Assistant Professor Aida Mujkić-Klarić, MD, PhD, specialist of paediatrics since February 2008

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

## Professional projects

Associate at the international project entitled: "TEMPUS IV Project 144596. Higher Education Learning Partnerships-HELP" (principal investigator and the project leader: Professor Milena Mandić, PhD) since September 2009

# Professional organisations

Croatian Catholic Medical Society, since 2002 Croatian Medical Association, since 2003 Croatian Epidemiological Society, since 2003 Croatian Society of Environmental Health, since 2004 Croatian Society of Judicial Experts, since 2007

**TEACHING ACTIVITIES** list **current** teaching activities: subjects, study program, institution

Faculty of Medicine, University of Osijek, Integrated undergraduate and graduate medical studies, subject "Health in the community".

Faculty of Medicine, University of Osijek, university-level study of Biomedical Laboratory Technology, subject "Health ecology and hygiene of the working environment".

Faculty of Medicine, University of Osijek, Master Degree in Clinical Epidemiology, subject "General epidemiology".

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=290921

- 1. Miskulin M, Miskulin I, Mujkic A, Lovrincevic N, Puntaric D, Dumic A. Effect of benzoates from soft drinks on hyperactivity among Osijek preschool children. Eur J Public Health. 2009;19(Suppl 1):190.
- Venus M, Puntaric D, Grgic M, Gmajnic R, Miskulin M. The effect of pest control on the incidence of trichinosis in Virovitica-Podravina County, Croatia. Vet Parasitol. 2008;156:226-33.
- 3. Puntarić D, Miškulin M. Javnozdravstveno značenje bolesti cirkulacijskog sustava. Med Vjesn. 2008;40(1-4):53-8.
- 4. Miskulin M, Miskulin I, Puntaric D, Milas J, Dumic A. Use and abuse of alcohol among university students from eastern Croatia. Eur J Public Health. 2007;17(Suppl 2):136.
- 5. Bošnir J, Puntarić D, Šmit Z, Klarić M, Grgić M, Kosanović LM. Organochlorine pesticides in freshwater fish from the Zagreb area, Croatia. Arh Hig Rada Toksikol. 2007;58:187-93.
- Bošnir J, Puntarić D, Galić A, Škes I, Dijanić T, Klarić M, Grgić M, Ćurković M, Šmit Z. Migration of phthalates from plastic containers into soft drinks and mineral water. Food Technol Biotechnol. 2007;45:91-5.
- 7. Klarić M, Puntarić D, Miškulin I, Valek M, Dumić A, Ćavar S, Miškulin I, Grgić M. The role of fruit drinks in daily diet of some Osijek inhabitants, Croatia. Coll Antropol. 2007;31:103-8.
- 8. Polašek O, Kolčić I, Smoljanović A, Stojanović D, Grgić M, Ebling B, Klarić M, Milas J, Puntarić D. Demonstrating reduced environmental and genetic diversity in human isolates by analysis of blood lipid levels. Croat Med J. 2006;47:649-55.
- 9. Valek M, Klarić M, Valek I, Dumić A. A pilot questionnaire survey on eating disorders in Slavonian middle aged women. Eur J Public Health. 2005;15(Suppl 1):132-3.
- 10. Bošnir J, Puntarić D, Klarić M, Šmit Z. Polychlorinated biphenyls in freshwater fish from the Zagreb area. Arh Hig Rada Toksikol. 2005;56:303-9.

# Antonija Perl Pirički

**A**FFILIATION

### Faculty of Food Technology Osijek

E-MAIL ADDRESS

#### antonija.perl@ptfos.hr

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

associate professor, September, 21st 2007. (biotechnical sciences, food technology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

BSc, Faculty of Food Technology, Osijek, biotechnical sciences, 1997 MSc,

PhD, Faculty of Food Technology and Biotechnology, Zagreb, biotechnical sciences, 2002

WORK EXPERIENCE year to year, institution, location

From 1998 – Faculty of Food Technology, Osijek

POSITIONS year to year, position held, institution

From 1994 – Head of Subdepartment of Sensory Analysis, Faculty of Food Technology, Osijek

RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

#### Research projects

2007- Nutrition and lifestyle in health protection, *Ministry of Science, Education and Sports*, researcher

2005-2007 Identification of botanical origin and analysis of chemical parameters of honey from Croatia and Macedonia, Ministry of Science, Education and Sports, researcher

2002-2007 Quality and safety of food and nutrition, *Ministry of Science, Education and Sports*, collaborator

1998-2002 Nutritive and toxic aspects of food and nutrition, *Ministry of Science, Education and Sports*, collaborator

Awards

2002 - National award for science, category: young investigator, Croatian government 2002 – Award of CATS for young scientists "Vera Johanides", CATS

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

#### Professional projects

2008: Development of a questionnaire for dietary habits estimation in Croatia, *Croatian Food Agency*, researcher

2003-2005 VIP project: Botanical Origin and Quality of Mediterranean Honeys, *Ministry of Agriculture, Fisheries and Rural Development*, researcher

2002-2006 Technological project TP-02/0113-07: Investigation of methods for unequivocal identification of honey, collaborator

Professional organisations

Society of chemists and technologists, member, Osijek

**TEACHING ACTIVITIES** list **current** teaching activities: subjects, study program, institution

Sensory Analysis, Undergraduate study of Food Technology, Faculty of Food Technology Osijek Sensory Analysis, Graduate study of Food and Nutrition Science, Faculty of Food Technology Osijek Nutritional Epidemiology, Graduate study of Food and Nutrition Science, Faculty of Food Technology Osijek

Sensory Analysis, Postgraduate specialist study *Food Safety and Quality*, Faculty of Food Technology Osijek

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=232395

- 1. Mandić, M.L.; Kenjerić, D.; **Perl Pirički, A**. (2009) Intake of some minerals in healthy adult volunteers from eastern Croatia. *Int J Food Sci Nutr.* **60**, S5; 77-87
- Mandić, M.L.; Primorac, Lj.; Kenjerić, D.; Mandić-Puljek, M.; Perl, A. (2008) Intake of some vitamins among clinically healthy adults from continental part of Croatia estimated by 24-hours recall. *Int J Food Sci Nutr.* 59:457-464.
- 3. Mandić-Puljek, M; Mandić, M. L.;**Perl, A**.; Kenjerić, D. (2005), Calcium intake, food sources and seasonal variations in eastern Croatia. *Coll Antropol.* 29 (2); 503-507
- 4. Klapec, Tomislav; Mandić, M. L.; Grgić, Jerica; Primorac, Ljiljana; **Perl, Antonija**; Krstanović, Vinko. Selenium in selected foods grown or purchased in eastern Croatia. *Food Chemistry.* **85** (2004), 3; 445-452
- 5. **Perl, A.**; Primorac, Lj; Mandić, M. L.; Klapec, T; Kenjerić, D; Mandić, M. Dietary fibre intake in eastern Croatia as determined by an enzymatic-gravimetric method in duplicated portions. *European Food Research and Technology*. **217** (2003), 3; 207-210
- Primorac, Ljiljana; Mandić, M. L.; Klapec, Tomislav; Folivarski, Koraljka; Perl, Antonija; Kenjerić, Daniela. Fat and fatty acids intake of adults in eastern Croatia. *Nutrition Research.* 23 (2003); 1453-1461
- Primorac, Ljiljana; Mandić, M. L.; Klapec, Tomislav; Folivarski, Koraljka; Perl, Antonija; Sudar, Rezica. Adequacy of a food composition database to estimate fat and fatty acid intake. *International Journal of Food Sciences and Nutrition*. 51 (2000), 1; 25-32
- 8. Adam Perl, Marija; Mandić, M. L.; Primorac, Ljiljana; Klapec, Tomislav; **Perl, Antonija**. Adolescent acceptance of different foods by obesity status and by sex*Physiology & behavior*. **65** (1998), 2; 241-245

### Vlasta Piližota

AFFILIATION

### Faculty of Food Technology Osijek

E-MAIL ADRESS

vlasta.pilizota@ptfos.hr

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

Full professor (for life), June 2000. (Biotechnical Sciences, Food Technology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

B. S., Poljoprivredno-prehrambeno tehnološki fakultet, Sveučilište u Osijeku, Biotehničke znanosti, 1976

M. Sc., Prirodoslovno-matematički fakultet, Zagreb, Prirodne znanosti, 1983

Ph. D., Prehrambeno-biotehnološki fakultet, Zagreb, Biotehničke znanosti, 1985

WORK EXPERIENCE year to year, institution, location

1976-1978 High school Božidar Maslarić and CUO Osijek

2007-2008 European Commission, Brussels, Belgium

1979. till now – Faculty of Food Technology, University in Osijek, Osijek

**POSITIONS** year to year, position held, institution

1990 -1994: Vice dean for education and science

1994 – 1998: Dean

2002 - 2004: Dean

2005 till now: Head of Section for Food Industry of The Scientific Council for Technological Development of the Croatian Academy of Sciences and Arts (HAZU)

2005 - 2007: Head of Department for Food Technologies

2006 – 2007: Member of SCAR-Standing Committee for Agricultural Research, EU Commission, Brussels, Belgium

2007 - 2008: National Seconded Expert in EU Commission

2008 till now: Editor in Chief of the journal *Croatian Journal of Food Science and Tecnology* (Publisher: Faculty of Food Technology, Osijek)

2009 till now Head of Department for Food Technologies

2009 till now: Director of Institute for scientific and artistic work Croatian Academy of Sciences and Arts in Osijek

**RESEARCH ACTIVITIES** list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

Research projects

2007- Razvoj procesa proizvodnje visokokvalitetne hrane (Nacionalni znanstveni projekt), MZOŠ voditelj

2006-2007-Utjecaj dodatka trehaloze na kvalitetu paste od jagoda (Bilateralni: HR-SLO) MZOŠ, voditelj

2002-2006 Razvoj procesa proizvodnje visokokvalitetnih prehrambenih proizvoda, (Nacionalni znanstveni projekt), MZT, voditelj

Editor of the journal

2008 till now - *Croatian Journal of Food Science and Technology*, Editor in Chief (Publisher: Faculty of Food Technology, Osijek)

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

| Professional projects   |
|---|
| 2005-2007 Tehnologijski projekt TP-01/0113-02: Unaprijeđenje procesa zamrzavanja hrane, MZOŠ, voditelj  |
| Professional organisations  |
| Institute of Food Technologists-USA   |
| United Fresh Produce Association-USA  |
| Savez kemijskih inženjera i tehničara Hrvatske  |
| Društvo kemičara i tehnologa, Osijek  |
| Hrvatsko društvo prehrambenih tehnologa, biotehnologa i nutricionista   |
| Redoviti član HAZU  |
| TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution  |
| Technology of processing of raw material of vegetative origin II, Bachelor Study in Food technology, Faculty of Food Technology in Osijek   |
| Raw material of vegetative origin, Bachelor Study in Food technology, Faculty of Food Technology in Osijek  |
| Development of new products in food industry, Master Study in Food Engineering and Nutrition,<br>Faculty of Food Technology in Osijek   |
| Technology of fruit and vegetables processing and preservation, Master Study in Food Engineering, Faculty of Food Technology in Osijek  |
| Chemistry and technology of fruit and vegetables, Master Study in Food Engineering, Faculty of Food Technology in Osijek  |
| Minimum processing food, Master Study in Food Engineering, Faculty of Food Technology in Osijek   |
| Food process preparation, Master Study in Food Engineering, Faculty of Food Technology in Osijek  |
| Advancement in the technology of vegetative origin raw material with basic HACCP II.,<br>Postgraduate Professional Study, Food Safety and Quality, Faculty of Food Technology in Osijek |
| Rapid methods in food analysis, Postgraduate Professional Study, Food Safety and Quality, Faculty of Food Technology in Osijek  |
| New products development, Postgraduate Professional Study, Food Safety and Quality, Faculty of Food Technology in Osijek  |
| Advancement in the technology of fruit and vegetables processing and preservation, Ph.D. Study, Food Engineering, Faculty of Food Technology in Osijek                                  |
| Food Chemistry, Ph.D. Study, Food Engineering, Faculty of Food Technology in Osijek   |
| New products development in food industry, Ph.D. Study, Food Engineering, Faculty of Food   |
| Technology in Osijek<br>Minimally processed fruits and vegetables, Ph.D. Study, Food Engineering, Faculty of Food   |
| Technology in Osijek<br>Management with waste in food industry, Ph.D. Study, Food Engineering, Faculty of Food  |
| Technology in Osijek  |
| LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr  |
| http://bib.irb.hr/lista-radova?autor=090114   |
|   |
| QUALIFYING PUBLICATIONS list a maximum of 10 articles, scientific meeting participations, mentorships, etc.   |
| 1. Vlasta Pilizota and Nela Nedic Tiban (2009): Advances in Honey Adulteration Detection.<br>Food Safety Magazine, August/September 2009, 60-64.  |
| <ol> <li>Vlasta Piližota (2008): Nanotechnology in Food Industry («Nanotechnology: A New Frontier in Food Science»). RAD HAZU 501, Knjiga XIII. Tehničke Znanosti, 53-82.</li> </ol>    |
| <ol> <li>Piližota V. (2008): Serving consumer demands, Consumer needs for affordable food of good quality and diversity, EFFoST - FIRST EUROPEAN FOOD CONGRESS, Food</li> </ol>         |
| Production – Nutrition – Healthy Consumers, Food & Nutrition – From Food to Consumer,   |
| 4-9 November 2008, Ljubljana, Slovenia  |
| 4. Piližota, V.; Nedić Tiban, N.: Honey adulteration detection by differential scanning   |
| calorimetry (DSC). Abstracts of lectures and posters. Rapid Methods Europe 2005,  |

Noordwijk, Nizozemska, 1-1, 2005.

- 5. Piližota, V.; Palmieri, L.; Villari, G.; Dunaj, A.; Babić, J.; Nedić Tiban, N.;
  - Kopjar, M.: Stabilisation of apricot juice by means of high-pressure treatments. *Effost, Food Inovations for an Expanding Europe, Delegate Manual.* N., Claire (ur.), Varšava, Poljska, 1-1, 2004.
- Ukuku, D.O., Pilizota, V., Sapers, G.M.(2004): Effect of Hot Water and Hydrogen Peroxide Treatments on Survival os Salmonella and Microbial Quality of Whole and Fresh- Cu Cantaloupe. J. Food Prot. 67 (3) 432-457.
- Pilizota V., Sapers G.M. (2004): Novel Browning Inhibitor Formulation for Fresh-cut Apples. J Food Sci. 69(4) SNQ 140-143 (2004).

**Ivica Strelec** 

AFFILIATION

Faculty of Food Technology Osijek

E-MAIL ADDRESS

lvica.Strelec@ptfos.hr

TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

Assistant professor, March 31, 2009 (biotechnical sciences, biotechnology)

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

BSc, Faculty of Food Technology Osijek, Osijek, biotechnical sciences, 1998

MSc, Faculty of Science, Zagreb, natural sciences, 2004

PhD, Faculty of Food Technology and Biotechnology, Zagreb, biotechnical sciences, 2007

WORK EXPERIENCE year to year, institution, location

1998-1999 Saponia d.d. Osijek, Osijek

#### from 1998 - Faculty of Food Technology Osijek, Osijek

**POSITIONS** year to year, position held, institution

-

**RESEARCH ACTIVITIES** list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

#### Research projects

from 2007 - Synergistic mixtures in antifungal and antimycotoxigenic food protection, Ministry of Science, Education and Sports of the Republic of Croatia, collaborator

from 2007 - Synergistic mixtures in antifungal and antimycotoxigenic food protection, Ministry of Science, Education and Sports of the Republic of Croatia, collaborator

2002-2007 Production promotion of nutriitive and highly-valuable food, Ministry of Science,

Education and Sports of the Republic of Croatia, collaborator

2002-2007 Hydrolases – from isolation to function, Ministry of Science, Education and Sports of the Republic of Croatia, associate collaborator

Awards

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings; editorial board memberships; awards, etc. – **list a maximum of five from each category!** 

#### Professional projects

2006-2007 Chemical and biochemical changes during wheat seeds ageing, Osijek-Baranja County, associate

Professional organisations

Society of chemists and technologists, member, Osijek

TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution

Biochemistry, Ungraduate university study programme of Food Technology , Faculty of Food Technology Osijek

Nutritional Biochemistry, Graduate university study programme of Food Science and Nutrition, Faculty of Food Technology Osijek

Food and gene interactions, Graduate university study programme of Food Science and Nutrition, Faculty of Food Technology Osijek

Selected chapters in bromatology and nutrition, Postgraduate university MSc study programme of the Faculty of Pharmacy, University of Tuzla, Faculty of Pharmacy

Food Safety, Postgraduate university MSc study programme of the Faculty of Pharmacy, University of Tuzla, Faculty of Pharmacy

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=233194&lang=EN

- QUALIFYING PUBLICATIONS list a maximum of 10 articles, scientific meeting participations, mentorships, etc.

   1. Strelec I., Ugarčić-Hardi Ž., Hlevnjak M. (2008). Accumulation of Amadori and Maillard
   products in wheat seeds aged under different storage conditions. Croatica Chemica Acta. 81 (1): 131-137.
- 2. Has-Schön E., Bogut I., Strelec I. (2006) Heavy metal profile in five fish species included in human diet, domiciled in the end flow of river Neretva (Croatia). Archives of Environmental Contamination and Toxicology. 50 (4): 545-551.

### Gorka Vuletić

AFFILIATION

Faculty of Philosophy Osijek

E-MAIL ADDRESS

gvuletic@fffos.hr

### TITLE OR QUALIFICATION AND DATE OF LAST PROMOTION

assistant professor, Martz 28, 208 (interdisciplinary: social science-psychology and biomedicine-public health )

CV

EDUCATION degree: institution, location, scientific field, year; training: institution, location, subjects/skills, year

Bsc. of Arts in Psychology, Faculty of Philosophy, University of Zagreb

MSc, Medical Faculty, University of Zagreb

PhD, Medical Faculty, University of Zagreb

Master degree in clinical psychology (specialization), Faculty of Philosophy, University of Zagreb

WORK EXPERIENCE year to year, institution, location

2008 - now Department of Psychology Faculty of philosophy, University J.J.Strossmayer in Osijek

1997 – 2008 School of Public Health, Medical Faculty University of Zagreb

1995 - 1996 Women Aid International, Zagreb (humanitarians organization)

POSITIONS year to year, position held, institution

2011 – now Associate professor, Department of Psychology Faculty of philosophy, University J.J.Strossmayer in Osijek

2008 – 2011 Assistant professor, Department of Psychology Faculty of philosophy, University J.J.Strossmayer in Osijek

1997 – 2008 Research assistant, School of Public Health, Medical Faculty University of Zagreb

RESEARCH ACTIVITIES list projects: year to year, title, sponsorship, position within project;

organisation of meetings; editorial board memberships; awards, etc. - list a maximum of five from each category!

#### Research projects

- 2007-2010 "Regionalism of cardiovascular behavioural risks model of intervention" (project of Croatian Ministry of Science, Education and Sport), Postdoctoral research fellow, from 2009 research assistant.
- 2002-2006 "Genetic, social and behavioural determinants of health and illness" (project of Croatian Ministry of Science, Education and Sport), Research fellow.
- 2001-2004 "Croatian health survey" (project of World bank and Croatian Ministry of Health) , Research assistant.
- 1996-2002 "Hypermedia in medical education" (project of Croatian Ministry of Science, Education and Sport), Research fellow.
- 1996–2002 "Analysis of health system in transition: 1998 2001" (project of Croatian Ministry of Science, Education and Sport), project collaborator.

Editorial board of the journal: "Klinička psihologija"

Awards

Australia - Europe Award Programme - scholarship for the one year of the Ph.D. research, 2001–2002 (Deakin University, School of Psychology; supervisor: Professor Robert A. Cummins).

**PROFESSIONAL ACTIVITIES** list projects (see above); professional organisation memberships, organisation of meetings;

editorial board memberships; awards, etc. - list a maximum of five from each category!

Professional projects

1996-2000 "Hygiene and health education" (UNICEF project, expert assistant on project)

#### Professional organisations

- Croatian psychological chamber
- Croatian association for Cognitive-Behavior Therapies
- International society for quality of life studies (ISQOLS)
- International Well-being Group (lwbG)

TEACHING ACTIVITIES list current teaching activities: subjects, study program, institution

- Quality of life and health, Psychology study, Faculty of Philosophy in Osijek
- Population health, Psychology study, Faculty of Philosophy in Osijek
- Health psychology, Psychology study, Faculty of Philosophy in Osijek
- Psychotherapy approaches (cognitive-behavior therapies), Psychology study, Faculty of Philosophy in Osijek
- Health and quality of life, elective subject, Medicine, Medical faculty in Zagreb.

LINK TO BIBLIOGRAPHY e.g. Croatian scientific bibliography, bib.irb.hr

http://bib.irb.hr/lista-radova?autor=232303

QUALIFYING PUBLICATIONS list a maximum of 10 articles, scientific meeting participations, mentorships, etc.

- 1. Vuletić, G. (2004) Generational and transgenerational factors of the health related quality of life. Ph.D. Thesis, Medical School University of Zagreb (in Croatian).
- 2. Vuletić, G. (1999) Sociopsychological determinants of the subjective quality of life. Master thesis, Medical School University of Zagreb (in Croatian)

Active participation at 11 international and 4 national conferences.

*Mentorship*: 7 for graduate thesis (at Faculty of Philosophy in Osijek) and 2 PhD mentorships (Medical faculty in Zagreb)