

International conference on new knowledge on chemical reactions  
during food processing and storage

**CHEMICAL REACTIONS IN FOODS VIII**

February 15 - 17, 2017 • Prague, Czech Republic



# PROGRAM

## 8<sup>th</sup> International Conference on Chemical Reactions in Foods

February 15-17, 2017

Vienna House Diplomat Prague • PRAGUE • CZECH REPUBLIC



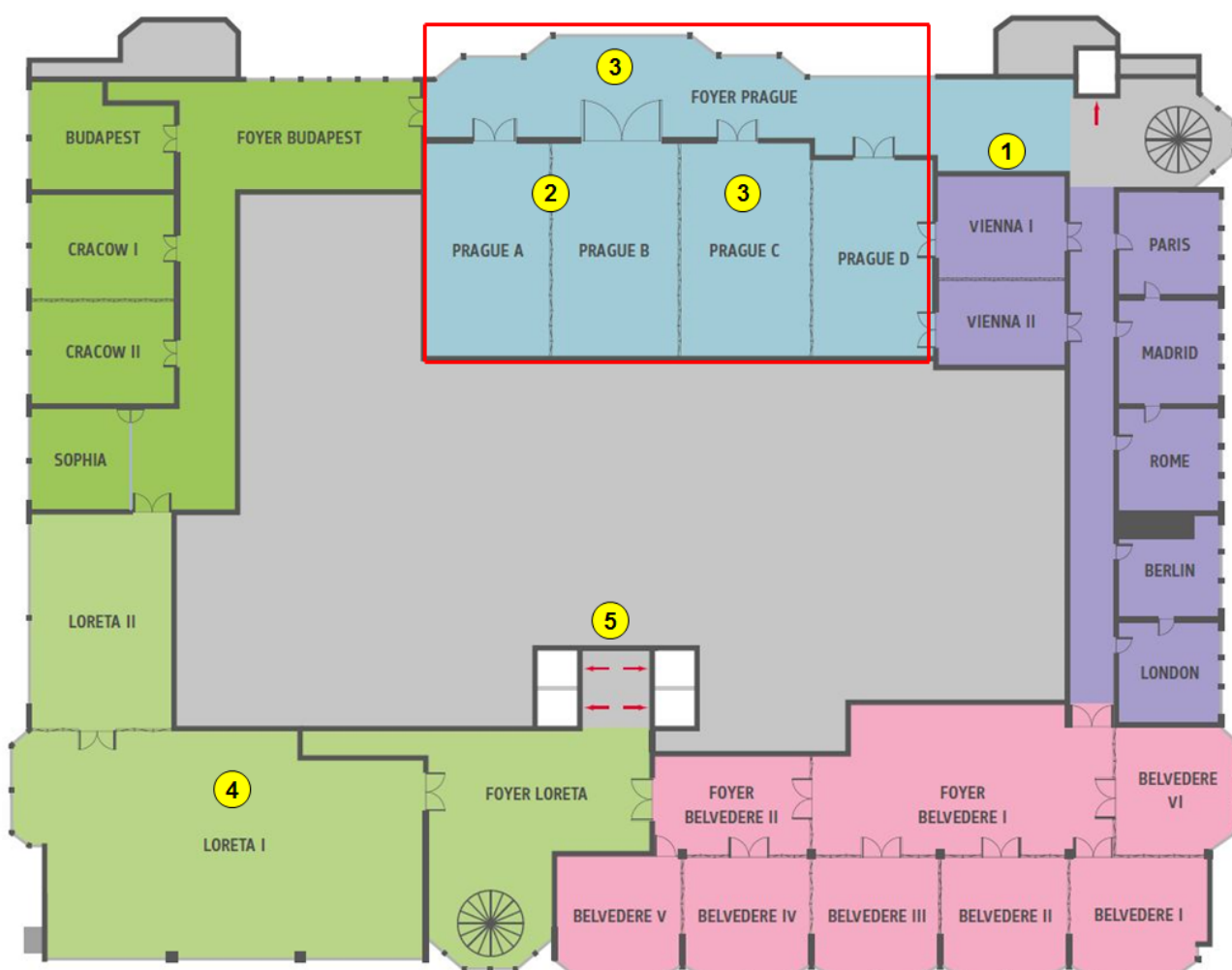
MINISTRY OF AGRICULTURE  
OF THE CZECH REPUBLIC

**EuChemS**  
European Chemical Sciences  
Division of Food Chemistry

*Conference is held under auspices of the minister of agriculture of the Czech Republic Marian Jurecka, and under auspices of Food Chemistry Division, EuChemS.*

## CRF 2017 Venue

### Vienna House Diplomat Prague



Area bounded by red line is devoted to the CRF 2017 conference (lecture hall and poster area).

- 1: Registration desk
- 2: Conference hall (oral sessions and interactive course)
- 3: Poster area & Coffee breaks & Welcome drink
- 4: Conference restaurant (lunch)
- 5: Lifts to the hotel rooms

# CRF 2017 - PROGRAM AT A GLANCE

Time / Date	WEDNESDAY February 15, 2017	THURSDAY February 16, 2017	FRIDAY February 17, 2017	
8:00-9:00	Registration for the conference	Registration desk open	Registration desk open	
9:00-10:00		Interactive course for young scientists	<b>Oral session 3</b> <b>CHEMICAL REACTIONS IN PROCESSED / STORED FOODS I</b>	<b>Oral session 6</b> <b>CHEMICAL REACTIONS IN PROCESSED / STORED FOODS III</b>
10:00-10:30			Coffee Break	Coffee Break
10:30-11:00				
11:00-12:00			<b>Oral session 4</b> <b>RECENT STRATEGIES FOR HIGH FOOD QUALITY, INCREASED SHELF LIFE AND SAFETY</b>	<b>Oral session 7</b> <b>CHEMICAL REACTIONS IN PROCESSED / STORED FOODS IV</b>
12:00-12:30	<b>Opening of the conference &amp; Welcome to the CRF 2017</b>			
12:30-13:30	<b>Oral session 1</b> <b>STRATEGIES TO IMPROVE FOOD QUALITY AND CHEMICAL SAFETY</b>	Lunch	<b>Final discussion panel &amp; CRF 2017 poster award &amp; Closing address</b>	
13:30-15:00		<b>Poster session</b>		
15:00-15:30	Coffee Break	Coffee Break		
15:30-18:00	<b>Oral session 2</b> <b>CHEMICAL REACTIONS ASSOCIATED WITH FOOD FLAVOURS</b>	<b>Oral session 5</b> <b>CHEMICAL REACTIONS IN PROCESSED / STORED FOODS II</b>		
18:30-19:30	Welcome Drink			
From 20:00		Conference Dinner		

Coffee breaks and Welcome drink will be served in the conference area; lunch will be served in the hotel restaurant Loreta.

## WEDNESDAY, February 15, 2017

- 8:00-12:00**                      **Registration for the CRF 2017 conference**
- 9:00-11:00**  
Conference hall  
Prague A+B                      **INTERACTIVE COURSE FOR YOUNG SCIENTISTS**  
**FOOD CHEMISTRY: LET'S ADDRESS JOINTLY CHALLENGES FOR FUTURE**  
*Moderators: Milena Stranska (University of Chemistry and Technology, Prague, Czech Republic) & Tomas Davidek (Nestlé Product Technology Centre Orbe, Nestec Ltd., Orbe, Switzerland)*
- 12:00-12:30**  
Conference hall  
Prague A+B                      **OPENING of the conference and WELCOME**  
*Jana Hajslova & Marco Arlorio, Chairs of the CRF 2017 Scientific Committee*  
*Tomas Ruml, Dean of Faculty of Food and Biochemical Technology, UCT Prague*  
*Marco Arlorio, Chair of the Division of Food Chemistry, EuCheMS*  
*Representative of Ministry, Ministry of Agriculture of the Czech Republic*  
**MUSIC WELCOME**
- 12:30-15:00**  
Conference hall  
Prague A+B                      **ORAL SESSION 1:**  
**STRATEGIES TO IMPROVE FOOD QUALITY AND CHEMICAL SAFETY**  
*Chairpersons: Jana Hajslova and Marco Arlorio*
- 12:30-12:55**    **L1**                      **TECHNICAL REGULATORY DEVELOPMENTS: ACRYLAMIDE, 3-MCPD, 2-MCPD AND GLYCIDYL FATTY ACID ESTERS AS WELL AS FURAN - AN INDUSTRY PERSPECTIVE**  
*Beate Kettlitz, FoodDrinkEurope, Brussels, Belgium*
- 12:55-13:15**    **L2**                      **FORMATION AND METABOLIZATION OF GLYCATED AMINO ACIDS IN THE BREWING PROCESS**  
*Michael Hellwig, Technische Universität Dresden, Dresden, Germany*
- 13:15-13:35**    **L3**                      **THERMAL DECOMPOSITION AND THE FORMATION OF DEGRADATION PRODUCTS OF T-2 AND HT-2 TOXIN DURING PROCESSING OF OATS**  
*Henning Sören Schmidt, Westfälische Wilhelms-Universität Münster, Münster, Germany*
- 13:35-13:55**    **L4**                      **HYDROLYSIS OF VICINE AND CONVICINE IN FABA BEAN SUSPENSIONS AND SOURDOUGHS**  
*Marjo Pulkkinen, University of Helsinki, Helsinki, Finland*
- 13:55-14:05**    **L5\***                      **THE RELATIONSHIP BETWEEN DOUGH COMPOSITION AND 3-MCPD ESTERS CONTENT IN COOKIES**  
*Beverly Belkova, University of Chemistry and Technology, Prague, Czech Republic*
- 14:05-14:15**    **L6\***  
cancelled                      **NEW NATURAL SEASONINGS FROM WINE POMACE TO INHIBIT LIPID AND PROTEIN OXIDATION DURING STORAGE OF BEEF PATTIES**  
*Javier García-Lomillo, University of Burgos, Burgos, Spain*
- 14:15-14:40**    **L7**                      **FORMATION AND ANALYSIS OF DESIRED AROMA-ACTIVE AND UNDESIRED FOOD-BORNE TOXICANTS DURING FOOD PROCESSING**  
*Michael Granvogl, Technical University of Munich, Freising, Germany*
- 14:40-15:00**    **L8**                      **MITIGATION OF AFLATOXINS CONTENT: IN SILICO ANALYSIS AS THE FIRST STEP IN THE ENZYMES-BASED STRATEGIES**  
*Luca Dellaflora, University of Parma, Parma, Italy*

15:00-15:30  
Conference area

### Coffee Break

15:30-18:05  
Conference hall  
Prague A+B

### ORAL SESSION 2: CHEMICAL REACTIONS ASSOCIATED WITH FOOD FLAVOURS

Chairpersons: Tomas Davidek and Beate Kettlitz

- 15:30-15:55 **L9** **WHEN FLAVOUR TURNS INTO COLOR: NEW INSIGHTS ON (ETHYL)VANILLIN CHEMISTRY IN FOODS**  
*Marco Arlorio, Università del Piemonte Orientale A. Avogadro, Novara, Italy*
- 15:55-16:20 **L10** **NEW INSIGHTS INTO FRUIT CULTIVATION AND PROCESSING BASED ON PRODUCT FLAVOUR**  
*Barbara Siegmund, Graz University of Technology, Graz, Austria*
- 16:20-16:45 **L11** **FLAVOUR GENERATION UPON FOOD PROCESSING - REVEALING THE REACTION PATHWAYS IN COMPLEX FOOD SYSTEMS**  
*Tomas Davidek, Nestlé Product Technology Centre Orbe, Nestec Ltd., Orbe, Switzerland*
- 16:45-17:05 **L12** **FACTORS INFLUENCING THE KEY AROMA COMPOUNDS OF RUM**  
*Laura Frantza, Technical University of Munich, Freising, Germany*
- 17:05-17:25 **L13** **HOW TO PRODUCE FLAVOURS AND FRAGRANCES FROM ALPHA-PINENE - DESIGN THE LIPASE-BASED CATALYST FOR SELECTIVE BIOCATALYTIC OXIDATION OF ALPHA-PINENE**  
*Madalina Tudorache, University of Bucharest, Bucharest, Romania*
- 17:25-17:35 **L14\*** **ELUCIDATION OF THE FUSTY/MUSTY OFF-FLAVOUR IN NATIVE COLD-PRESSED RAPESEED OILS FOR THE DEVELOPMENT OF A QUICK METHOD FOR QUALITY CONTROL**  
*Katrin Matheis, Technical University of Munich, Freising, Germany*
- 17:35-17:45 **L15\*** **FURFURYL ALCOHOL FORMATION DURING ROASTING OF COFFEE**  
*Abdullatif Albouchi, Graz University of Technology, Graz, Austria*
- 17:45-18:05 **L16** **ADDITION OF ANTIOXIDANTS IN COOKED MEAT: MITIGATION OF HETEROCYCLIC AROMATIC AMINES AND SENSORY EFFECTS**  
*Maïa Meurillon, Institut national de la recherche agronomique (INRA), Saint-Genès-Champagnelle, France*

18:30-19:30  
Conference area

### Conference Welcome Drink

\* Young scientists' presentation

## THURSDAY, February 16, 2017

**9:00-10:30**

Conference hall  
Prague A+B

**ORAL SESSION 3:**

**CHEMICAL REACTIONS IN PROCESSED / STORED FOODS I**

*Chairpersons: Hans-Gerd Janssen and Lanfranco Conte*

9:00-9:25 **L17**

**CASEIN AND CASEIN MICELLES: STRUCTURES, FUNCTIONS, FUNCTIONALIZATION**

*Thomas Henle, Technische Universität Dresden, Dresden, Germany*

9:25-9:50 **L18**

**TRANSGLYCOSYLATION REACTIONS, A MAIN MECHANISM OF PHENOLICS INCORPORATION IN COFFEE MELANOIDINS AND THEIR INHIBITION BY MAILLARD REACTION**

*Manuel A. Coimbra, University of Aveiro, Aveiro, Portugal*

9:50-10:10 **L19**

**RELATIONSHIPS BETWEEN ANTIOXIDANT EFFICIENCIES IN EMULSIONS AND THEIR INTERFACIAL ANTIOXIDANT CONCENTRATIONS. APPLICATION OF THE PSEUDOPHASE KINETIC MODEL**

*Carlos Bravo-Díaz, Universidad de Vigo, Vigo, Spain*

**L20**  
cancelled

10:10-10:30 **L21**

**REACTIVITY OF FREE MALONDIALDEHYDE IN OIL-IN-WATER EMULSIONS DURING IN VITRO DIGESTION**

*Angelique Vandemoortele, Ghent University, Ghent, Belgium*

**10:30-11:00**

Conference area

**Coffee Break**

**11:00-12:35**

Conference hall  
Prague A+B

**ORAL SESSION 4:**

**RECENT STRATEGIES FOR HIGH FOOD QUALITY, INCREASED SHELF LIFE AND SAFETY**

*Chairpersons: Chiara Dall'Asta and Barbara Siegmund*

11:00-11:25 **L22**

**LIPID OXIDATION REACTIONS IN FAT-RICH FOODS: IS THE CURRENT ANALYTICAL TOOLBOX SUFFICIENT?**

*Hans-Gerd Janssen, Unilever Research and Development, Vlaardingen, The Netherlands*

11:25-11:50 **L23**

**MINOR COMPOUNDS AS MARKERS OF PURITY AND QUALITY OF EDIBLE FATS AND OILS: RECENT DEVELOPMENTS**

*Lanfranco Conte, University of Udine, Udine, Italy*

11:50-12:15 **L24**

**COLD PRESSED OILS: MORE UNDERSTANDING OF THE CHEMISTRY BEHIND NEEDED**

*Jana Hajslova, University of Chemistry and Technology, Prague, Czech Republic*

12:15-12:35 **L25**

**HEAT LOAD OF EXTENDED SHELF LIFE (ESL) MILK AND CREAM IN AUSTRIA**

*Helmut K. Mayer, BOKU - University of Natural Resources and Life Sciences Vienna, Vienna, Austria*

**12:35-13:30**

Conference restaurant

**Lunch**

## THURSDAY, February 16, 2017

**13:30-15:00**  
Conference hall  
Prague C

### POSTER SESSION

*Authors' presentation slot.  
Posters are displayed during the whole conference.*

**15:00-15:30**  
Conference area

### Coffee Break

**15:30-17:50**  
Conference hall  
Prague A+B

### ORAL SESSION 5:

#### CHEMICAL REACTIONS IN PROCESSED / STORED FOODS II

*Chairpersons: Thomas Henle and Marina Heinonen*

- 15:30-15:55 L26**    **CHEMICAL REACTIONS IN COOKED FOODS: THE CONSEQUENCES ON DIGESTIBILITY**  
*Vincenzo Fogliano, University of Wageningen, Wageningen, The Netherlands*
- 15:55-16:20 L27**    **PROTEIN OXIDATION IN FOODS**  
*Marina Heinonen, University of Helsinki, Helsinki, Finland*
- 16:20-16:40 L28**    **THE QUALITY OF LOW LACTOSE MILK IS AFFECTED BY THE SIDE PROTEOLYTIC ACTIVITY OF THE LACTASE USED IN THE PRODUCTION PROCESS**  
*Antonio Dario Troise, University of Naples Federico II, Napoli, Italy*
- 16:40-17:00 L29**    **NOVEL AND HIGHLY SENSITIVE MARKER PEPTIDES TO PREDICT THE INDUSTRIAL HEAT TREATMENT OF MILK**  
*Sevim Dalabasmaz, Friedrich-Alexander Universität Erlangen-Nürnberg, Erlangen, Germany*
- 17:00-17:10 L30\***    **OHMIC HEATING: A PROMISING TECHNOLOGY FOR MINIMIZATION OF FURAN FORMATION IN STERILIZED VEGETABLE / MEAT BABY FOOD**  
*Jaromir Hradecky, University of Chemistry and Technology, Prague, Czech Republic*
- 17:10-17:30 L31**    **ADDITION OF SODIUM ASCORBATE, CITRIC AND ASCORBIC ACIDS TO EXTEND THE SHELF-LIFE OF TUNA MEAT FISH IS A RISK OR A BENEFIT FOR CONSUMERS?**  
*Mila Nocentini, Istituto Zooprofilattico Sperimentale del Lazio E Della Toscana (IZSLT), Florence, Italy*
- 17:30-17:50 L32**    **USE OF PECTIC POLYSACCHARIDES AS AN ACRYLAMIDE MITIGATION STRATEGY - COMPETITION BETWEEN SUGAR ALDEHYDE AND CARBOXYLIC GROUPS**  
*Claudia Passos, University of Aveiro, Aveiro, Portugal*

**From 20:00**

### Conference Dinner

\* Young scientists' presentation

## FRIDAY, February 17, 2017

9:00-10:25

Conference hall  
Prague A+B**ORAL SESSION 6:****CHEMICAL REACTIONS IN PROCESSED / STORED FOODS III***Chairpersons: Manuel A. Coimbra and Nadia Mulinacci*9:00-9:25 **L33****BIOACTIVE COMPOUNDS FROM MARINE SOURCES***Klara Stensvåg, The UiT The Arctic University of Norway, Tromsø, Norway*9:25-9:55 **L34****REVEALING POLYPHENOL-PROFILE AND ANTIMICROBIAL ACTIVITY OF SELECTED PROPOLIS SAMPLES, UNDERPINNING PLAUSIBLE IMPLICATIONS IN HEALTH-PROMOTING FOOD PRODUCTS***Attila Kiss, Kaposvár University, Kaposvár, Hungary*9:55-10:05 **L35\*****CHINESE HAWTHORN (CRATAEGUS PINNATIFIDA) FRUIT: A POTENTIAL NOVEL FOOD?***Kamila Hurkova, University of Chemistry and Technology, Prague, Czech Republic*10:05-10:25 **L36****DETERMINATION OF THE ORIGIN FOR ANTHRAQUINONE IN ORGANIC TEA PRODUCTION***Anna Romanotto, PiCA GmbH Berlin, Berlin, Germany*

10:25-11:00

Conference area

**Coffee Break**

11:00-13:00

Conference hall  
Prague A+B**ORAL SESSION 7:****CHEMICAL REACTIONS IN PROCESSED / STORED FOODS IV***Chairpersons: Jana Hajslova and Marco Arlorio*11:00-11:20 **L37****LIGNANS IN VIRGIN OLIVE OILS: EFFECT OF REFINING PROCESS AND FRAUDS***Nadia Mulinacci, Università degli Studi di Firenze, Firenze, Italy*11:20-11:40 **L38****FORMATION OF EPOXY FATTY ACIDS DURING PHOTO-OXIDATION IN OIL IN WATER EMULSIONS***Phuong Pham, Ghent University, Ghent, Belgium*11:40-11:50 **L39\*****METABOLIC CHANGES DURING STORAGE OF RAPESEEDS AND CONSEQUENCES FOR THE QUALITY OF THE RESULTING VIRGIN, COLD-PRESSED OIL***Anja Bonte, Max Rubner-Institut, Detmold, Germany*11:50-12:10 **L40****OXIDATION OF FATTY ACIDS IN BULK TRIGLICERIDES PHASES***Marini Damanik, Graz University of Technology, Graz, Austria*12:10-12:30 **L41****THE UNIQUE CHEMISTRY OF MANUKA HONEY (LEPTOSPERMUM SCOPARIUM)***Jana Rückriemen, Technische Universität Dresden, Dresden, Germany*

12:30-13:00

Conference hall  
Prague A+B**FINAL DISCUSSION PANEL***Panellists: CRF 2017 Scientific Committee*

13:00-13:30

Conference hall  
Prague A+B**CLOSING ADDRESS***Jana Hajslova & Marco Arlorio, Chairs of the CRF 2017 conference***CRF 2017 poster award & Announcement of the next CRF event**

\* Young scientists' presentation



# POSTER SESSION

## WEDNESDAY - FRIDAY, February 15-17, 2017

13:30–15:00

**POSTER SESSION**

**(Thursday, February 16, 2017 - authors' presentation slot)**

**CHEMICAL REACTIONS IN PROCESSED / STORED FOODS**

**RECENT STRATEGIES FOR HIGH FOOD QUALITY, INCREASED SHELF LIFE AND SAFETY**

**CHEMICAL REACTIONS INVOLVING FOOD IMPROVEMENT AGENTS (ADDITIVES, ENZYMES, FLAVORINGS), MITIGATION FOOD CONTAMINANTS AND RESIDUES**

**BIOLOGICALLY-ACTIVE CONSTITUENTS IN FOOD CROPS AND PRODUCTS THEREOF**

**CHEMISTRY BEHIND NOVEL FOODS, BOTANICALS AND DERIVED PREPARATIONS, FOOD SUPPLEMENTS**

*Posters are displayed during the whole conference.*

# POSTER SESSION

- P1** EFFECT OF VARIOUS COOKING TECHNOLOGIES ON QUALITY AND STARCH NUTRITIONAL PROPERTIES OF PULSES  
Sanaa Ragae, El-Sayed Abdel-Aal
- P2** VOLATILE COMPOUNDS PROFILE OF MICROWAVE TREATED TART CHERRY PUREES WITH ADDITION OF SUGARS DURING STORAGE  
Anita Pichler, Ivana Ivić, Josip Šimunović, Mirela Kopjar
- P3** TEXTURE AND AROMA PROFILE OF SOUR CHERRY FILLINGS  
Anita Pichler, Ivana Ivić, Mirela Kopjar
- P4** AROMATIC PROFILE OF RASPBERRY CREAM FILLINGS WITH SUGARS, MODIFIED STARCHES AND HYDROCOLLOIDS  
Anita Pichler, Anita Kerekeš, Tijana Pinkle, Mirela Kopjar
- P5** TEXTURAL PROPERTIES OF MODEL SYSTEMS OF HYDROCOLLOIDS AND SUGARS  
Mirela Kopjar, Anita Pichler
- P6** FREE MCPDS, THEIR ESTERS AND GLYCIDYL-ESTERS IN FOOD: PRECISION AND ACCURACY FOR MONITORING FOOD PRODUCTS AND MITIGATION PROCESSES  
Emiliano De Dominicis, Alberto Stocco, Elena Barolo, Claudia Piazza, Jean-Baptiste Gay
- P7** PROMOTION OF MAILLARD REACTIONS BY CHITOSAN-GENIPIN FILMS IN MODEL WINE SOLUTIONS  
M. Angélica M. Rocha, Cláudia Nunes, Manuel A. Coimbra
- P8** PESTICIDES HOUSEHOLD PROCESSING FACTORS OF NATURALLY CONTAMINATED FRESH TOMATOES AND APPLES  
Maria Rosa Repetti, Vanesa La Barba, Dario Maggioni, Melina Michlig, Florencia Magni, Horacio Beldoménico
- P9** REDUCTION AND TRANSFORMATION OF DEOXYNIVALENOL DURING THERMAL PROCESSING  
David Stadler, Alexandra Malachova, Franz Berthiller, Rainer Schuhmacher, Christoph Büschl, Michele Suman, Francesca Lambertini, Rudolf Krska
- P10** AUTHENTICATION OF MEAT AND MEAT PRODUCTS USING LC-MS/MS - TARGET PROTEOMIC ANALYSIS APPROACH  
Štěpán Czornyj, Eva Forejtová, Soňa Baršová
- P11** ANALYSIS OF CHEMICAL COMPOSITIONS AND CORDYCEPIN IN TOCHUKASO MUSHROOM  
Hyo-Nam Song, Tae-Young Kim
- P12** GELATION OF FUNCTIONALIZED CASEIN - INFLUENCE OF MAILLARD REACTION AND ENZYME-CATALYZED PROTEIN CROSS-LINKING  
Thomas Henle, Mariella Hannß, Natalie Hubbe
- P13** INFLUENCE OF CYCLODEXTRINS ON ACE-INHIBITORY DIPEPTIDES PRESENT IN PROTEIN HYDROLYSATES  
Thomas Henle, Steffi Rudolph, Edris Riedel
- P14** FREE MAILLARD REACTION PRODUCTS IN MILK FROM "ORGANIC" AND "CONVENTIONAL" FARMING  
Thomas Hofmann, Uwe Schwarzenbolz, Nina Sparmann, Thomas Henle
- P15** NEW SEASONING FROM WINE POMACE PROMOTES THE FORMATION OF PYRAZINES IN BARBECUED BEEF PATTIES  
Javier García-Lomillo, M<sup>a</sup> Luisa González-SanJosé, Miriam Ortigas-Heras, Raquel Del Pino-García, M<sup>a</sup> Dolores Rivero-Pérez, Pilar Muñiz-Rodríguez
- P16** PHYSICO-CHEMICAL PROPERTIES OF DRIED ARONIA FRUIT BY DECOMPRESSED HEAT PUMP DRYER (DHPD)  
Hyun-Chol Jung, Sang-Yeol Kim, Sang-Ro Lee, Hyo-Nam Song
- P17** IDENTIFICATION OF BIPHENYLS - CONTAMINANTS RESPONSIBLE FOR OFF-FLAVOUR IN SOFT DRINKS  
Helena Cizkova, Vojtech Kruzik, Iveta Sistkova

- P18** EVALUATION OF COCOA PRODUCTS QUALITY AND AUTHENTICITY BY DART/TOF-MS  
Jana Prchalova, Frantisek Kovarik, [Helena Cizkova](#), Zuzana Dvorakova, Ales Rajchl
- P19** cancelled FUMIGATION TOXICITY OF *PINUS CEMBRA* L. AND *P. SYLVESTRIS* L. ESSENTIAL OILS ON THE STORED PRODUCT INSECT *ORYZAEPHILUS SURINAMENSIS* L.  
[Katharina Müllner](#), Cornelia Rieder-Gradinger, Ingrid Steiner
- P20** UNRAVELLING COMPLEX REACTION PATHWAYS - FATE OF C-LABELLED AGROCHEMICALS IN FOOD PROCESSING - FIRST RESULTS  
[Bernd Göckener](#), Mark Bücking, Matthias Kotthoff
- P21** cancelled UTILIZATION OF OLIVE LEAVES AS NATURAL ANTIOXIDANT IN COOKIES  
[Serpil Öztürk](#), Sevtap Karabulut, Oğuz Acar
- P22** FORMATION OF MAILLARD REACTION PRODUCTS DURING ROASTING OF HAZELNUTS  
[Sophia Witte](#), Thomas Henle
- P23** ENZYMATIC CROSSLINKING OF CASEIN MICELLES UNDER ALKALINE CONDITIONS  
[Anja Dürasch](#), Jana Wissel, Thomas Henle
- P24** INFLUENCE OF THE CASEIN MICELLE STRUCTURE ON THE MAILLARD REACTION  
[Ulrike Möckel](#), Anja Dürasch, Thomas Henle
- P25** BIODEGRADABILITY OF TOXIC COMPOUNDS OF SEEDS FROM BRAZILIAN FRUITS AFTER NATURAL SOLID-STATE FERMENTATION  
[Armando Garcia-Rodriguez](#), Luciana Casaletti, Gustavo Henrique Ferreira-Santos, Kauan Menezes-Milhomem, José Daniel Gonçalves-Vieira, Kátia Flávia Fernandes
- P26** FOOD SECURITY ISSUES AND AG COOPS IN GEORGIA  
[Kakha Nadiradze](#)
- P27** UNDERSTANDING ROASTING-INDUCED MODIFICATIONS IN COFFEE POLYSACCHARIDES USING MASS SPECTROMETRY  
[Ana S. P. Moreira](#), Fernando M. Nunes, M. Rosário, M. Domingues, Manuel A. Coimbra
- P28** FORMATION OF ,-DIDEOXYGLUCOSONE--ENE IN BEER THROUGH - DEOXYHEXOSONE INTERCONVERSION  
[Michael Hellwig](#), Sophia Witte, Arndt Nobis, Thomas Henle
- P29** EXAMINATION OF ACRYLAMIDE IN MILK WITH DIFFERENT TYPES OF COFFEE  
[Suzana Stojanovska](#), Julijana Tomovska
- P30** BIOGENIC AMINES IN DIFFERENT CHEESE VARIETIES RETAILED IN AUSTRIA  
[Helmut K. Mayer](#), Gregor Fiechter
- P31** TRANSFER OF CAROTENOIDS FROM SUPPLEMENTED FEED INTO EGGS  
[Lucie Kreichova](#), Michaela Skopikova, Vera Schulzova, Milena Stranska-Zachariasova, Jana Hajslova
- P32** THE INFLUENCE THERMAL STABILIZATION ON POPPY SEEDS  
[Marie Bicova](#), Michaela Skopikova, Vladimir Kocourek, Jana Hajslova
- P33** PLANT SOURCES OF GALACTOLIPIDS  
[Ales Krmela](#), Vera Schulzova, Jana Hajslova
- P34** BIOLOGICALLY ACTIVE CONSTITUENTS IN HEMP OIL AT THE CZECH MARKET  
[Frantisek Benes](#), Marie Bicova, Katerina Matejkova, Veronika Krtkova, Jana Hajslova
- P35** AMBIENT MASS SPECTROMETRY EMPLOYING DIRECT ANALYSIS IN REAL TIME (DART) IONIZATION SOURCE FOR MONITORING OF LARD AUTOXIDATION  
[Vojtech Hrbek](#), Jan Panek, Jana Hajslova
- P36** CHANGES IN LIPID FRACTION OF CZECH CARP (*CYPRINUS CARPIO* L.) DURING A LONG-TERM STORAGE  
[Adam Zabloudil](#), Michaela Rektorisova, Katerina Matejkova, Jana Hajslova
- P37** PRODUCTION OF CHICKEN MEAT AND EGGS WITH ADDED VALUE - OMEGA-PUFA AND ORGANIC SELENIUM ORIGINATING FROM MICROALGAE  
[Monika Jiru](#), Milena Stranska-Zachariasova, Jana Kohoutkova, Adam Zabloudil, Richard Koplík, Diomid Revenco, Zuzana Bizova, Jana Hajslova
- P38** HERBAL TEAS: POTENTIAL CONTAMINATION BY PLANT ALKALOIDS  
[Alena Zachariasova](#), Milena Stranska-Zachariasova, Petra Slavikova, Jiri Hricko, Jana Hajslova

- P39** PRE- AND POST-HARVEST CHANGES OF S-ALK(EN)YL-L-CYSTEINSULPHOXIDES AND OTHER BIOLOGICALLY ACTIVE COMPOUNDS IN GARLIC  
Michaela Rektorisova, Vojtech Hrbek, Jaroslava Ovesna, Jana Hajslova
- P40** PCR-BASED FISH MEAT AUTHENTICATION  
Diliara Akhatova, Petr Hanak, Ivana Laknerova, Kamila Zdenkova, Katerina Demnerova
- P41** SHORT STUDY TO VERIFY OF FORMATION OF PHTHALIMIDE FROM PHTHALIC ACID AND AMMONIUM IN PEPPERMINT PLANT  
Juliane Scholl, Anna Romanotto, Florian Muetze
- P42** WHEY PROTEIN INTERACTIONS WITH BERRY TANNIN  
Bei Wang, Marina Heinonen
- P43** PLASMA LIPIDOME PROVIDES A CLEAR MESSAGE ON PARENTERAL NUTRITION  
Vit Kosek, Vojtech Hrbek, Marek Havlicek, Jana Hajslova
- P44** REACTIVE CARBONYL COMPOUNDS IN SUGAR SWEETENERS AND SOFT DRINKS  
Karel Cejpek, Veronika Bánovská, Anna Fleglová
- P45** METHYLGLYOXAL AND DIHYDROXYACETONE PRESENT IN MANUKA HONEY (LEPTOSPERMUM SCOPARIUM) ARE INHIBITORS OF JACK BEAN UREASE  
Jana Rückriemen, Oliver Klemm, Thomas Henle
- P46** BIOCONTROL OF OCHRATOXIN A DURING COCOA POST-HARVEST TREATMENTS  
Kra Brou Didier Kedjebo, Tagro Simplicie Guehi, Pascaline Alter, Noël Durand, Philip Aguilar, Angelique Fontana-Tachon, Didier Montet
- P47** KINETICS OF GLYCIDYLESTERS AND 3-MCPD ESTERS FORMATION FROM MONOPALMITINE, DIPALMITINE AND TRIPALMITINE  
Vojtech Ilko, Kateřina Matějková, Marek Doležal
- P48** INTERFACIAL CONCENTRATIONS OF PHENOLIC ANTIOXIDANTS IN MODEL FOOD EMULSIONS: EFFECTS OF ACIDITY AND SURFACTANT CONCENTRATION  
Carlos Bravo-Díaz, Sonia Losada-Barreiro, Fátima Paiva-Martins, Laurence S. Romsted