

Tuesday 10th of November 2015

07:30	EFFoST Conference registration desk open
Room	Macedonia Ballroom
08:30-09:30	<p>Welcome addresses Organizing Committee, <i>P. Taoukis, Conference Chairman</i> School of Chemical Engineering, NTUA, <i>A. Boudouvis, Dean</i> School of Food, Biotechnology and Development, AUA, <i>S. Kintzios, Dean</i></p> <p>EFFoST <i>Dietrich Knorr, EFFoST President</i></p> <p>IUFoST <i>Rickey Yada, IUFoST President</i></p> <p>ISEKI Food Association <i>Paola Pittia, Cristina Silva</i></p> <p>Federation of Hellenic Food Industries <i>Evangelos Kalousis, President</i></p>
Session Chairs	D. Knorr & P. Taoukis
09:30-10:30	<p>Plenary Session-1</p> <p>[PL.01] “Food science & engineering for a more sustainable food supply” <i>John Floros, Kansas State University, USA</i></p> <p>[PL.02] “A Strategic research and innovation agenda for very small traditional food processor” <i>Brian McKenna, University College Dublin, Ireland</i></p>
Room	Macedonia Hall
10:30-11:00	Coffee Break

Rooms	Macedonia A	Macedonia B	Mycenae	Pella
11:00-13:00	Session 1: Food processing and preservation for a sustainable food chain	Session 2: Novel processes for optimized conventional foods and optimization of classic processes for new products: Optimization of classic food processes	Session 3: Food chemistry and material science for enhanced nutrition, health and pleasure: Natural extracts and antioxidants	Session 4: Quality kinetics and shelf life assessment and modelling
Session Chairs	L. Ahrne & S. Bakalis	G. Trystram & P. Fryer	V. Oreopoulou & R. Apak	C. Silva & E. Velliou
11:00-11:30	[INV.01] Sustainability challenges in food processing (0796) L. Ahrne ^{1,2} ¹ <i>SP Food and Bioscience, Sweden;</i> ² <i>Chalmers University of Technology, Sweden</i>	[INV.02] Towards more efficient manufacturing processes: Challenges and solutions (0786) G. Trystram <i>INRA-AgroParisTech, France</i>	[O03.1] Novel colorimetric sensors and nanoprobe for the characterization of food antioxidants (0432) R. Apak*, E. Erçağ, M. Özyürek, K. Güçlü, S.D. Çekiç, A. Üzer, S.E. Çelik, M. Bener, B. Bekdeşer, Z. Can <i>Istanbul University, Turkey</i>	[INV.03] Integrating fingerprinting and kinetics in food processing and preservation research on plant based food systems (0686) M.E. Hendrickx*, B.T. Kebede, T. Grauwet, A. Van Loey <i>KU Leuven, Belgium</i>
11:30-11:45	[O01.1] Scale of manufacturing: A case study (0270) E. Lopez-Quiroga ¹ , L. Angeles-Martinez ² , P.J. Fryer ¹ , C. Theodoropoulos ² , S. Bakalis* ¹ ¹ <i>University of Birmingham, UK;</i> ² <i>University of Manchester, UK</i>	[O02.1] Preservation of sensitive biological products: An insight into conventional and upcoming drying techniques (0271) S. Ambros*, U. Kulozik <i>Technische Universität München, Germany</i>	[O03.2] An online NP-HPLC-DPPH method for the determination of the antioxidant activity of condensed polyphenols from different chocolate manufacturing stages (0023) V. Pedan* ¹ , N. Fischer ¹ , S. Rohn ² ¹ <i>Zurich University of Applied Sciences, Switzerland;</i> ² <i>University of Hamburg, Germany</i>	[O04.1] Design and exploitation of a new experimental device to forecast the degradation of nutritional quality and the inactivation of microorganisms in canned vegetables (0093) N. Alfata* ^{1,2} , S. Georgé ¹ , S. André ¹ , C.M.G.C. Renard ^{2,3} ¹ <i>CTCPA, France;</i> ² <i>INRA, France;</i> ³ <i>UAPV, France</i>
11:45-12:00	[O01.2] Characterization of extrusion processing to design sustainable and functional food systems (0057) M.A. Emin*, L. Koch, V.L. Pietsch, H.P. Schuchmann <i>Karlsruhe Institute of Technology, Germany</i>	[O02.2] An advanced modeling and experimental validation of single droplet drying process (0058) M. Jaskulski*, T.T.H. Tran, M. Peglow, J.G. Avila-Acevedo, E. Tsotsas <i>Otto von Guericke University Magdeburg, Germany</i>	[O03.3] Antioxidant activity of water extracts of oat fiber obtained with microwave assisted extraction (0645) J. Harasym*, R. Olędzki <i>Wroclaw University of Economics, Poland</i>	[O04.2] A ¹H-NMR-based metabolomics application to the analysis of Caciotta cheese ripening (0211) F. Cesare Marincola*, L. Spiga, M.B. Pisano, M.E. Fadda, M. Deplano, S. Cosentino <i>University of Cagliari, Italy</i>

12:00-12:15	<p>[O01.3] Increase in energy efficiency of the chocolate cooling process by molds with structured surfaces (0360) L. Rejman*, P. Braun, E.J. Windhab <i>ETH Zurich, Switzerland</i></p>	<p>[O02.3] Spray-dried oil body powder (0281) S.T. Tersteeg, A.J.G. Van der Goot, C.V. Nikiforidis* <i>Wageningen University, The Netherlands</i></p>	<p>[O03.4] Application of Fourier transform infrared spectroscopy (FTIR) and chemometric analysis to discriminate Turkish noodle enriched with legume hydrocolloids (0550) B. Uçar*, P. Kadiroğlu, L. Yurdaer Aydemir <i>Adana Science and Technology University, Turkey</i></p>	<p>[O04.3] Predicting storage and quality properties in modified atmosphere packaging for mushrooms (0332) K. Joshi*, J.M. Frias <i>Dublin Institute of Technology, Ireland</i></p>
12:15-12:30	<p>[O01.4] Refrigerated warehouses as intelligent hubs to integrate renewable energy in industrial food refrigeration and to enhance power grid sustainability (0688) K.A. Fikiin <i>Technical University of Sofia, Bulgaria</i></p>	<p>[O02.4] Microbial decontamination of model particles and food powders by novel vacuum-steam-vacuum treatment (0295) J.T. Hörmansperger*¹, M. Beyrer², R. Schmitt², E.J. Windhab¹ ¹ETH Zurich, Switzerland; ²HES-SO Valais-Wallis, Switzerland</p>	<p>[O03.5] Interactions between polyphenols and polysaccharides: Mechanisms and consequences in food processing and digestion (0533) C.M.G.C. Renard*, A.A. Watrelot, C. Le Bourvellec <i>INRA, France</i></p>	<p>[O04.4] Flavour characterisation of tomato using heat pump drying system (0240) S. Jeyaparakash*¹, D.C. Frank², R.H. Driscoll¹ ¹University of New South Wales, Australia, ²The Commonwealth Scientific and Industrial Research Organisation, Australia</p>
12:30-12:45	<p>[O01.5] Processing of edible insects: Production, fractionation and characterization of flours from meal worm (<i>Tenebrio molitor</i>) and black soldier fly larvae (<i>Hermetia illucens</i>) (0411) S. Bußler*¹, L. Guérin², B. Rumpold¹, O. Schlüter¹ ¹Leibniz Institute for Agricultural Engineering, Germany; ²ONIRIS, France</p>	<p>[O02.5] Microwave puffing of starch pellets (0262) F.S. Mohd-Salleh*, G. Zimbitas, P.J. Fryer, S. Bakalis <i>University of Birmingham, UK</i></p>	<p>[O03.6] Study of the synergy between free and bound antioxidants (0274) E.E. Çelik*¹, V. Gökmen¹, L.H. Skibsted² ¹Hacettepe University, Turkey; ²University of Copenhagen, Denmark</p>	<p>[O04.5] Shelf-assessing the prediction boundaries of an oxidation model (0454) F.A. Coutelieris¹, A. Kanavouras*² ¹University of Patras, Greece; ²Agricultural University of Athens, Greece</p>
12:45-13:00	<p>[O01.6] High purity vegetable protein concentrates for niche and global markets. A techno-functional approach (0835) J. Petrusán*¹, H. Rawel², G. Huschek¹ ¹Institut für Getreideverarbeitung GmbH, Germany; ²Potsdam Universität, Germany</p>	<p>[O02.6] Thermal mixing via acoustic vibration during continuous flow cooling of viscous food products (0590) G.N. Stoforos*¹, B.E. Farkas², J. Simunovic¹ ¹North Carolina State University, USA; ²Purdue University, USA</p>	<p>[O03.7] Anti-tumor potential of bioactive component crocin found in Saffron (<i>Crocus Sativus</i>) (0674) against angiogenesis process S.A. Syed*, H. Bakhshi, S.S. Iqbal <i>Al'Sharqiyah University, Oman</i></p>	<p>[O04.6] Internet of things based food safety system targeting transport and distribution (0569) R. Nukala*, A. Shields, U. McCarthy <i>Institute of Technology Tralee, Ireland</i></p>
13:00-14:30	Lunch break & Poster Session 1			

Rooms	Macedonia A	Macedonia B	Mycenae	Pella
14:30-16:30	Session 5: Resource efficient technologies and production systems-Life Cycle Analysis	Session 6: Novel processes for optimized conventional foods and optimization of classic processes for new products: Novel processes	Session 7: Advances in food structure and functionality: Novel nano and micro- structures for stability and controlled bioactives release	Session 8: Prediction and modelling of microbial growth and inactivation
Session Chairs	M. Krokida & A. Mathys	G. Barbosa-Canovas & O. Schluter	E. Windhab & P. Pittia	J. Van Impe & P. Skandamis
14:30-14:45	[O05.1] Energy saving potential of emerging technologies in milk powder production (0051) S.N. Moejes*, A.J.B. van Boxtel <i>Wageningen University, The Netherlands</i>	[INV. 04] Changes, challenges and opportunities promoted by the nonthermal processing of food (0780) G. Barbosa-Canovas <i>Washington State University, USA</i>	[INV.05] Processing of mechanically and thermally sensitive functionalized food-microstructures by coupled, stress-controlled dynamic membrane dispersing, spraying chilling and cold extrusion sintering (0213) E.J. Windhab*, K. Slettemgren, B. Dubey, S. Holzapfel <i>ETH Zurich, Switzerland</i>	[INV.06] Effect of food intrinsic characteristics on microbial growth dynamics in/on fish-based model systems at suboptimal temperatures (0373) M. Baka, E. Noriega, N. Cornette, S. Vercruyssen, J.F.M. Van Impe* <i>KU Leuven, Belgium</i>
14:45-15:00	[O05.2] Environmental evaluation of European skimmed milk powder (SMP) processing production plant with the use of life cycle assessment (LCA) (0554) M. Taxiarchou, M. Krokida*, A. Politis, A. Peppas <i>National Technical University of Athens, Greece</i>			
15:00-15:15	[O05.3] Sustainability of meat substitutes: A path to future foods? (0162) S. Smetana* ^{1,2} , A. Mathys ¹ , A. Knoch ¹ , V. Heinz ¹ ¹ <i>German Institute of Food Technologies, Germany;</i> ² <i>University of Vechta, Germany</i>	[O06.1] Hurdle technology to improve organoleptic aspects of broccoli in pressure-assisted thermal sterilisation (PATS) (0404) E. Wenzel, H.M. Vollebregt*, R.G.M van der Sman <i>Food & Biobased Research Wageningen UR, The Netherlands</i>	[O07.1] Controlled bacterial release from water-in-oil-in-water (W₁/O/W₂) emulsions (0221) H. El Kadri*, T.W. Overton, S. Bakalis, K. Gkatzionis <i>University of Birmingham, UK</i>	[O08.1] Influence of feed gas composition and specimen surface structure on the mechanisms of <i>Bacillus subtilis</i> spore inactivation related to direct cold atmospheric pressure plasma treatment (0053) C. Hertwig*, K. Reineke, A. Rademacher, O. Schlüter <i>Leibniz Institute for Agricultural Engineering, Germany</i>

<p>15:15-15:30</p>	<p>[O05.4] Potential innovations for the traditional durum wheat food sector (0304) S. Mandato*, C. Mayer, H. de Vries <i>INRA, France</i></p>	<p>[O06.2] Product-specific impact of plasma processed air as a pre-drying procedure for dried fruit and vegetables (0412) S. Bußler*¹, J. Ehlbeck², O. Schlüter¹ ¹<i>Leibniz Institute for Agricultural Engineering, Germany;</i> ²<i>Leibniz Institute for Plasma Science and Technology, Germany</i></p>	<p>[O07.2] Physical and microstructural properties of amorphous co-milled sugars and aroma compounds (0659) P. Pittia*^{1,2}, M. Faieta¹, A. Cesaro^{2,3} ¹<i>University of Teramo, Italy,</i> ²<i>University of Trieste, Italy,</i> ³<i>Elettra-Sincrotrone Trieste, Italy</i></p>	<p>[O08.2] Treatment with high hydrostatic pressure and supercritical carbon dioxide against <i>Alicyclobacillus acidoterrestris</i> spores in apple juice (0092) I. Porębska*¹, B. Sokołowska^{1,2}, S. Skąpska¹, M. Rutkowska², S.J. Rzoska² ¹<i>Prof. Waclaw Dąbrowski Institute of Agricultural and Food Biotechnology, Poland;</i> ²<i>Institute of High Pressure Physic of Polish Academy of Sciences,</i></p>
<p>15:30-15:45</p>	<p>[O05.5] Sustainability analysis of brewing with malted and unmalted barley (0076) L.H.G. van Donkelaar*¹, T.R. Noordman², R.M. Boom¹, A.-J. van der Goot¹ ¹<i>Wageningen University, The Netherlands;</i> ²<i>Heineken Supply Chain BV, The Netherlands</i></p>	<p>[O06.3] PEF treatment for the valorization of tomato by-products (0611) G. Pataro*¹, D. Nikolovska Nedelkoska², C.D. Carullo¹, M.M. Capitoli³, G. Ferrari^{1,3} ¹<i>University of Salerno, Italy;</i> ²<i>University St. Kliment Ohridski, FYROM;</i> ³<i>ProdAl Scarl, Italy</i></p>	<p>[O07.3] Inter-relationship of flavour and microstructure as a function of the processed vegetable (0681) P. Acharya*, M. Koutidou <i>Unilever, The Netherlands</i></p>	<p>[O08.3] Stress-induced evolution of resistance and resuscitation speed in <i>E. coli</i> O157:H7 (0379) E. Gayán*, A. Cambré, C. Michiels, A. Aertsen <i>KU Leuven, Belgium</i></p>
<p>15:45-16:00</p>	<p>[O05.6] Improving the confectionary supply chain: Evaluation of environmental impacts of ice cream (0130) A. Konstantas*^{1,2}, L. Stamford^{1,2}, A. Azapagic^{1,2} ¹<i>Centre for Sustainable Energy use in Food chains, UK;</i> ²<i>The University of Manchester, UK</i></p>	<p>[O06.4] Potential application of UHPH process in the physicochemical stabilization of tiger-nuts milk (0287) I. Codina-Torrella, B. Guamis*, A.J. Trujillo <i>Universitat Autònoma de Barcelona, Spain</i></p>	<p>[O07.4] Investigating the role of calcium in casein matrix formation and functionality (0564) I. McIntyre*, M. O' Sullivan, D. O' Riordan <i>University College Dublin, Ireland</i></p>	<p>[O08.4] A decision support tool based on microbial safety prediction for a better dimensioning of modified atmosphere packaging (0621) V. Guillard*¹, O. Couvert², V. Stahl³, P. Buche¹, A. Hanin⁴, J. Dibia⁵, C. Lorient⁶, D. Thuault⁷, V. Huchet⁷ ¹<i>University of Montpellier-INRA;</i> ²<i>LUBEM;</i> ³<i>Aérial;</i> ⁴<i>Actalia;</i> ⁵<i>AgroParisTech,</i> ⁶<i>LNE,</i> ⁷<i>ADRIA Développement, France</i></p>

16:00-16:15	[O05.7] Identification of exergy inefficient locations in industrial food production chains (0434) F.K. Zisopoulos ^{1,2} , H.A. Becerra Ramirez ² , A.J. van der Goot ^{1,2} , R.M. Boom ² , C. Nikiforidis* ¹ ¹ <i>Top Institute of Food and Nutrition, The Netherlands</i> ; ² <i>Wageningen University, The Netherlands</i>	[O06.5] Continuous flow microwave processing: From concept to commercialization (0717) K.P. Sandeep* ¹ , J. Simunovic ¹ , P. Coronel ² ¹ <i>North Carolina State University, USA</i> ; ² <i>Aseptia, USA</i>	[O07.5] Effect of freezing on starch microstructural changes during heating at high rates using <i>in situ</i> hot-stage video-microscopy and differential scanning calorimetry (0318) M.T. Molina, M.A. Leiva, P. Bouchon* <i>Pontificia Universidad Católica de Chile, Chile</i>	[O08.5] Modelling of the microbial inactivation by high hydrostatic pressure freezing (0573) P. Maresca* ² , G. Ferrari ^{1,2} ¹ <i>University of Salerno, Italy</i> ; ² <i>ProdAl Scarl, Italy</i>
16:15-16:30	[O05.8] Environmental sustainability of ultra-high pressure homogenization application for liquid foods (milk case study) (0685) S. Smetana* ^{1,2} , L. Valsasina ^{1,3} , M. Pizzol ³ , E. Georget ¹ , V. Heinz ¹ , A. Mathys ¹ ¹ <i>German Institute of Food Technologies, Germany</i> ; ² <i>University of Vechta, Germany</i> ; ³ <i>Aalborg</i>	[O06.6] Inactivation of <i>Alicyclobacillus acidoterrestris</i> in apple juice under ultraviolet irradiation treatments (0086) A. Tremarin, T.R.S. Brandão, C.L.M. Silva* <i>Universidade Católica Portuguesa, Portugal</i>	[O07.6] Microstructural characterisation of rice bran wax oleogels-in-water emulsions (0321) V. di Bari*, H. Zhang, W. MacNaughtan, T.J. Foster, B. Wolf <i>The University of Nottingham, UK</i>	[O08.6] Growth potential of <i>Listeria monocytogenes</i> during storage of various cheeses and subsequent tolerance after simulated digestion (0358) A.E. Kapetanakou*, M.A. Gkerekou, E.S. Vitzilaiou, P.N. Skandamis <i>Agricultural University of Athens, Greece</i>
Room	Macedonia Hall			
16:30-17:30	Coffee break & Poster Session 1			
Rooms	Macedonia A	Macedonia B	Mycenae	Pella
17:30-19:30	Session 9: Energy, water and waste reduction: Converting food and agro-waste in value added food and non-food ingredients	Session 10: Sensors technology for food process and quality monitoring	Session 11: Food chemistry and material science for enhanced nutrition, health and pleasure: Bioactives and functional foods	Session 12: Advances in food structure and functionality: Emulsions, gels and food rheology
Session Chairs	W. Spiess & D. Lund	M. Castellari & A. Gianotti	C. Biliaderis & L. Piazza	J. Kokini & V. Karathanos

<p>17:30-17:45</p>	<p>[O09.1] Chicory root fibre - From by-product to food ingredient (0021) M. de Roode*¹, M.H.C. Pronk¹, E. de Been², R.J.H. Frissen², L.P.A. Hendrickx² ¹Sensus, The Netherlands; ²Cosun Food Technology Centre, The Netherlands</p>	<p>[O10.1] Process analytical technology implementation in the food industry: The MUSE-Tech project (0747) M. Castellari*, L. Salvà <i>IRTA, Spain</i></p>	<p>[INV.07] Formulating with cereal soluble fibers: Challenges and opportunities in developing functional products (0632) C.G. Biliaderis <i>Aristotle University of Thessaloniki, Greece</i></p>	<p>[INV.08] The comparison of LAOS behavior of structured food materials (suspensions, emulsions and elastic networks) (0655) O. Duvarci, G. Yazar, J.L. Kokini* <i>Purdue University, USA</i></p>
<p>17:45-18:00</p>	<p>[O09.2] Converting rice bran into a high-value food ingredient (0081) R. Greiner <i>Max Rubner-Institut, Germany</i></p>	<p>[O10.2] Application of a multisensor device to control part of the bread production process (0746) M.B. Whitworth*, A. Cornish, F.K. Gates <i>Campden BRI, UK</i></p>		<p>[O12.1] Swelling, what else? Mass transport mechanisms in osmotically imbalanced multiple W/O/W food emulsions (0337) J. Bahtz¹, D.Z. Gunes², A. Syrbe², P. Fischer¹, E.J. Windhab*¹ ¹ETH Zurich, Switzerland; ²Nestlé Research Center, Switzerland</p>
<p>18:00-18:15</p>	<p>[O09.3] Research and innovation focusing on by-products of grapes and wines (0257) D. Kouretas <i>University of Thessaly, Greece</i></p>	<p>[O10.3] Application of a multisensor device to control part of the beer production process (0751) M. Dienstbier*, J. Skach, M. Slaby <i>Vyzkumny ustav pivovarsky a sladarsky, Czech Republic</i></p>	<p>[O11.1] Electrostatic pectin-pectin interactions and <i>in vitro</i> bioaccessibility of calcium and iron in particulated tomato-based suspensions (0157) C. Kyomugasho*, K.L.D.D. Willemsen, S. Christiaens, A.M. Van Loey, M.E. Hendrickx <i>KU Leuven, Belgium</i></p>	<p>[O12.2] Interfacial engineering of complex emulsion for modulation of salt perception (0125) N.C. Chiu*, A.T. Tarrega, I.F. Fisk, B.W. Wolf <i>University of Nottingham, UK</i></p>
<p>18:15-18:30</p>	<p>[O09.4] Polyphenol-rich nanoparticles from olive pomace extracted by high pressure and temperature reactor using supercritical assisted atomization (0543) B. Aliakbarian*¹, R. Adami², P. Perego¹, E. Reverchon² ¹University of Genoa, Italy; ²University of Salerno, Italy</p>	<p>[O10.4] Monitoring food pathogens by nanowire MOS gas sensor array (0292) E. Núñez Carmona*^{1,2}, V. Sberveglieri¹, A. Pulvirenti^{1,2} ¹CNR-INO Sensor Lab, Italy; ²University of Modena and Reggio Emilia, Italy</p>	<p>[O11.2] Effect of vacuum frying on starch gelatinization and its <i>in vitro</i> digestibility in starch-gluten matrices (0313) I. Contardo¹, J. Parada², A. Leiva¹, P. Bouchon*¹ ¹Pontificia Universidad Católica de Chile, Chile; ²Universidad Austral de Chile, Chile</p>	<p>[O12.3] Essential oil nanoemulsions to prolong the shelf life of solid food products (0702) F. Donsí*¹, M. Sessa², G. Ferrari^{1,2} ¹University of Salerno, Italy; ²ProdAl Scarl, Italy</p>

18:30-18:45	<p>[O09.5] Green leaves as a food source: Processing towards functional fractions (0072) A. Tamayo Tenorio*, J. Gieteling, C. Nikiforidis, R.M. Boom, A.J. van der Goot <i>Wageningen University, The Netherlands</i></p>	<p>[O10.5] Oxygen solubility in oils: Original measurement using a non-invasive optical sensor (0399) M.E. Cuvelier, B. Broyart, F. Courtois, C. Bonazzi* <i>INRA-AgroParisTech, France</i></p>	<p>[O11.3] Separation of biologically-active bovine immunoglobulins from milk and colostrum (0246) H.J. Heidebrecht*, U. Kulozik <i>Technische Universität München, Germany</i></p>	<p>[O12.4] Processing of an eco-friendly nanoemulsion by high-pressure homogenization to protect a bioactive extract of jackfruit pulp (<i>Artocarpus Heterophyllus</i>) (0190) G. Ruiz-Montañez², M. Calderon-Santoyo², J.A. Ragazzo-Sanchez², L. Picart-Palmade*¹, D. Chevalier-Lucia¹ ¹<i>Université de Montpellier, France;</i> ²<i>Instituto Tecnológico de Tepic, Mexico</i></p>
18:45-19:00	<p>[O09.6] Extractability and characteristics of proteins deriving from wheat DDGS (0118) A. Chatzifragkou, P. Prabhakumari, D. Charalampopoulos* <i>University of Reading, UK</i></p>	<p>[O10.6] Non-invasive monitoring of drying processes: Case of laser light backscattering and moisture content (0566) D. Argyropoulos*, M. Nagle, G. Romano, P. Udomkun, J. Müller <i>Universität Hohenheim, Germany</i></p>	<p>[O11.4] Novel utilization of milk-based ingredients in salt reduced fish pudding (0253) K. Greiff*^{1,2}, C.J. Staurem², B. Nordvi³, T. Rustad¹ ¹<i>SINTEF Fisheries and Aquaculture, Norway;</i> ²<i>Norwegian University of Science and Technology, Norway,</i> ³<i>TINE SA, Norway</i></p>	<p>[O12.5] Towards structured granules with tailored dispersibility by controlling wet powder screen extrusion (0263) S.J. Gstöhl*, E.J. Windhab <i>ETH Zurich, Switzerland</i></p>
19:00-19:15	<p>[O09.7] An approach to turn grape pomace into a valuable food (0147) K. Thymiatis*, K. Kaderides, A. Goula <i>Aristotle University of Thessaloniki, Greece</i></p>	<p>[O10.7] Metabolomic approach to optimize formulation and fermentation process of functional bakery products (0698) D. Taneyo Saa, A. Gianotti* <i>University of Bologna, Italy</i></p>	<p>[O11.5] Use of nutrient profiling to identify healthy versus unhealthy snacks (0509) J.H. Green*, P. Siwajek, A. Roulin <i>Nestec SA, Switzerland</i></p>	<p>[O12.6] Modeling and simulation of peristaltic flows in a human stomach (0084) S. Alokaily*¹, K. Feigl¹, F.X. Tanner¹, E.J. Windhab² ¹<i>Michigan Technological University, USA;</i> ²<i>ETH Zurich, Switzerland</i></p>
19:15-19:30	<p>[O09.8] From industrial waste biomass to valuable chemical compounds: Furfuryl alcohol and tetrahydrofurfuryl alcohol (0606) M. Modelska, M. Binczarski*, P. Dziugan, S. Karski, I. Witonska <i>Lodz University of Technology, Poland</i></p>	<p>[O10.8] Application of multisensor device to control frying process: Preliminary results (0793) P.A. Picouet*, P. Gou, M. Castellari <i>IRTA, Spain</i></p>	<p>[O11.6] Structural and functional characterization of hemp seed protein-derived acetylcholinesterase-inhibitory peptides (0402) R.E. Aluko*, S.A. Malomo <i>University of Manitoba, Canada</i></p>	<p>[O12.7] Structural changes of wheat proteins during high moisture extrusion processing of meat analog products (0059) V.L. Pietsch*, M.A. Emin, H.P. Schuchmann <i>Karlsruhe Institute of Technology, Germany</i></p>
Room	Horizon			
19:30-21:00	Welcome Reception			

Wednesday 11th of November 2015

Room	Macedonia Ballroom			
Session Chairs	B. McKenna & H. Buckenhueskes			
08:30-10:00	<p>Plenary Session-2: "Food Research: European horizon, strategy and tools"</p> <p>08:30-09:00 [PL.03] "Food Research in Horizon 2020" <i>Jurgen Lucas, European Commission, DG Research and Innovation, Belgium</i></p> <p>09:00-09:15 [PL.04] "The European Research Council (ERC) support for life sciences-An opportunity for food scientists in frontier research" <i>Jean-Luc Khalfaoui, European Research Council Executive Agency, Belgium</i></p> <p>09:15-09:30 [PL.05] "Perspectives from the industrial sector to the societal challenges for food research in HORIZON 2020" <i>Rebeca Fernández, Manager Food Policy, Science and R&D at FoodDrinkEurope, Belgium</i></p> <p>09:30-09:45 [PL.06] "Long term research and innovation priorities for the European Agrifood Industry" <i>Daniele Rossi, National Food Technology Platforms Coordinator; Director Research and Innovation of the Confederation of Farmers (ConfAgricoltura), Italy</i></p> <p>09:45-10:00 [PL.07] "ILSI Europe and it's scientific programme" <i>Michael Knowles, ILSI Board of Trustees and IUFOST Governing Council Member, Belgium</i></p>			
Room	Macedonia Hall			
10:00-10:30	Coffee Break			
Rooms	Macedonia A	Macedonia B	Mycenae	Pella
10:30-12:30	Session 13: Food engineering challenges, new paradigms and opportunities	Session 14: Advances in food packaging: Biodegradable and edible packaging	Session 15: Advances in food structure and functionality: Food foams	Session 16: Bioprocessing and fermentation technology
Session Chairs	S. Saguy & P. Taoukis	O. Martin-Belloso & C. Tzia	C. Rauh & A. Delgado	H. Jaeger & C. Tassou

<p>10:30-10:45</p>	<p>[INV. 09] Developing a collaborative innovation system (0773) I. Roberts <i>Bühler Group, Switzerland</i></p>	<p>[INV.10] Edible coatings for the development of sustainable foods with enhanced safety, quality and functionality (0748) O. Martin-Belloso*, R. Soliva-Fortuny, A. Acevedo-Fani <i>University of Lleida-Agrotecnio, Center, Spain</i></p>	<p>[INV.11] Construction of foams for targeted food production (0642) C. Rauh*¹, A. Delgado² ¹<i>TU Berlin</i>; ²<i>Friedrich-Alexander University Erlangen-Nuremberg, Germany</i></p>	<p>[O16.1] Fermentation - A powerful method to overcome soybean allergenicity (0154) P. Meinschmidt*, E. Ueberham, J. Lehmann, U. Schweiggert-Weisz, P. Eisner <i>Fraunhofer Institute, Germany</i></p>
<p>10:45-11:00</p>				<p>[O16.2] Entrapment of cross-linked enzyme aggregates of L-arabinose isomerase in alginate beads for production of D-tagatose (0300) M. Van Holsbeeck*¹, E. Tsakali^{1,2}, G. Aerts¹, J. Van Impe¹, I. Van de Voorde¹ ¹<i>KU Leuven, Belgium</i>; ²<i>T.E.I. of Athens, Greece</i></p>
<p>11:00-11:15</p>		<p>[O14.1] Effect of glutaraldehyde and oleic acid content on secondary structure of zein during film formulation (0229) E.A. Barber*, D. Devina, J. Kokini <i>Purdue University, USA</i></p>	<p>[O15.1] Particle interactions with foam and foam-like structures (0197) G. Zimbitas*, Z. Zhang, P.J. Fryer, S. Bakalis <i>University of Birmingham, UK</i></p>	<p>[O16.3] Production of synbiotic fermented soymilk from vegetable soybean (0353) C. Battistini¹, B. Gullón², A.M.P. Gomes¹, L. Kunigk¹, E.P. Ribeiro², C. Jurkiewicz*¹ ¹<i>Maua Institute of Technology, Brazil</i>; ²<i>Catholic University of Portugal, Portugal</i></p>
<p>11:15-11:30</p>	<p>[INV.12] Key needs in food science and technology-with special emphasis to food engineering (0068) W.E.L. Spiess <i>Karlsruhe Institute of Technology, Germany</i></p>	<p>[O14.2] Impact of novel bioactive edible coatings enriched with limonene on the postharvest quality of limes (0066) D. Konuk*^{1,2}, L. Rasetti¹, R.R.G. Estrada^{1,3}, M.C. Santoyo³, J.A. Ragazzo-Sanchez³, F. Korel², P. Chalier¹ ¹<i>UMR IATE, INRA, SUPAGRO, France</i>, ²<i>Izmir Institute of Technology, Turkey</i>, ³<i>Instituto Tecnológico de Tepic, Mexico</i></p>	<p>[O15.2] Engineering of dough and bread structuration; interest of pressure modulation during mixing and impact on dough porosity during resting, sheeting and fermentation and on the structure of baked bread (0492) A. Le-Bail*^{1,2}, P. Jha^{1,2,3}, S. Chevallier^{1,2}, J. Cheio⁴ ¹<i>ONIRIS, France</i>; ²<i>LUNAM, France</i>; ³<i>IICPT, India</i>; ⁴<i>VMI, France</i></p>	<p>[O16.4] Melatonin and derived tryptophan metabolites produced during alcoholic fermentation by different yeast strains (0467) E. Fernandez Cruz¹, M.A. Álvarez-Fernández¹, E. Valero², A. Troncoso¹, M.C. García-Parrilla*¹ ¹<i>Universidad de Sevilla, Spain</i>; ²<i>Universidad Pablo de Olavide, Spain</i></p>

11:30-11:45	[O13.1] New horizon for food engineering (0631) Y.H. Roos <i>University College Cork, Ireland</i>	[O14.3] Quality changes of mangoes treated with different wax nanoemulsion coating formulations (0152) S. Yuliani*, D.A. Setyabudi, A.W. Permana, S. Setyadjit <i>Indonesian Center for Agricultural Postharvest Research and Development, Indonesia</i>	[O15.3] On the hybrid modelling of simultaneous heat and mass transfer in foams (0537) M.A. Hussein <i>Technische Universität München, Germany</i>	[O16.5] Microbial fermentation of plant raw materials affected by PEF pre-treatment (0652) T. Fauster, H. Jaeger* <i>University of Natural Resources and Life Sciences (BOKU), Austria</i>	
11:45-12:00	[INV.13] From food engineering to product engineering (0264) S. Bakalis* ¹ , K. Fourtouni ² , C. Latty ¹ , T. Moxon ¹ , O. Gouseti ¹ , P.J. Fryer ¹ ¹ <i>University of Birmingham, UK;</i> ² <i>Mondelēz International, UK</i>	[O14.4] Novel bio-based materials for use in the food & beverage industry (0845) J. Hugenholtz*, H. Mooibroek, G. Schennink, C. Bolck, K. Molenveld <i>Wageningen University, The Netherlands</i>	[O15.4] Non-destructive 3D imaging analysis of foam structures using fast laboratory micro-CT (0579) A. Eggert* ¹ , F. Nachtrab ¹ , J. Dombrowski ² , S. Zabler ^{1,3} ¹ <i>Fraunhofer Institute, Germany;</i> ² <i>TU München, Germany;</i> ³ <i>University Würzburg, Germany</i>	[O16.6] Bioactive properties of egg yolk protein by-product (0133) N.K. Howell*, M. Yousr <i>University of Surrey, UK</i>	
12:00-12:15	[INV.14] From open innovation to enginomics - paradigms change (0398) I.S. Saguy* ¹ , P. Taoukis ² ¹ <i>The Hebrew University of Jerusalem, Israel;</i> ² <i>National Technical University of Athens, Greece</i>	[O14.5] Encapsulation of carvacrol in electrospun zein nanofibers (0559) O. Cayir, E. Atay, A. Altan* <i>Mersin University, Turkey</i>	[O15.5] Aroma release from milk protein-based model foam systems (0704) M. Steinhaus*, K. Reglitz, P. Schieberle <i>German Research Center for Food Chemistry, Germany</i>	[O16.7] Natural functionalization of bioactive milk proteins via Maillard reaction and its impact on antioxidant capacity and digestibility (0201) Y. Joubran, U. Lesmes <i>Technion - Israel Institute of Technology, Israel</i>	
12:15-12:30	[INV.15] Innovation in the European food industry: Challenges, opportunities and barriers (0768) M. Knowles <i>IUFoST, Belgium</i>	[O14.6] Determination of properties of oxygen and water vapor permeability and glass transition temperature of edible films based upon HPMC, carrageenan, glycerol and cellulose nanofibers (0054) F.A. Osorio*, E. Bossa <i>Universidad de Santiago de Chile, Chile</i>	[O15.6] Influence of high isostatic pressure on the foaming properties of food proteins (0707) D. Baier*, A.K. Baier, D. Knorr, C. Rauh <i>TU Berlin, Germany</i>	[O16.8] Development of ohmic cells dedicated to the baking of crust less bread (0612) T. Gally ^{1,2} , O. Rouaud ^{1,2} , V. Jury ^{1,2} , A., Le-Bail ^{1,2} ¹ <i>Oniris, France;</i> ² <i>CNRS, France</i>	
12:30-14:00	Lunch break & Poster Session 2				
Rooms	Macedonia A	Macedonia B	Mycenae	Pella	Horizon

14:00-16:00	Session 17: European Academy of Food Engineering (EAFE)-Special session	Session 18: Mathematical modelling for food process optimization: Computational methods	Session 19: Advances in food structure and functionality: 3D food printing	Session 20: Engineering the digestive fate of food	IUFoST Round Table Discussion: Strategies for re-positioning food science and
<i>Session Chairs</i>	Y. Roos & O. Gouseti	F. Erdogdu & N. Stoforos	K. van Bommel & P. Verboven	A.R. Mackie & D. Dupont	Roundtable participants: Rickey Yada (Canada) Daryl Lund (USA), Dietrich Knorr (Germany) Pingfan Rao, (China), Mariusz Piskula (Poland), Michael Knowles (Greece), Rosie
14:00-14:15	[INV.16] Innovative uses of structural relaxations in food engineering (0633) Y.H. Roos <i>University College Cork, Ireland</i>	[O18.1] Complexity in the virtualization of food processing and optimization (0244) F. Erdogdu* ¹ , F. Marra ² ¹ Ankara University, Turkey; ² University of Salerno, Italy	[INV.17] 3D Food Printing-An overview (0712) K. van Bommel*, M. Berkhout, P. Debrauwer, J. Diaz, E. van den Eijnden, S. Harianto, J. Henket, M. Hoppenbrouwers, D. Klomp, M. Noort, K. Vallons <i>TNO, The Netherlands</i>	[O20.1] Structuring food for improving nutrient bioavailability: The case of dairy gels (0541) D. Dupont*, F. Barbe, S. Le Feunteun, O. Menard, Y. Le Gouar, A. Deglaire, J. Floury, D. Remond, B. Laroche <i>INRA, France</i>	<ul style="list-style-type: none"> •Communicating and positioning processing technologies •Focussing students on central role of FS&T in future development •Influencing decision-makers •Strengthening the discipline
14:15-14:30		[O18.2] On the numerical strategies to virtualize food heating in a continuous free-running oscillator RF system (0740) F. Marra* ¹ , T. Bedane ¹ , L. Chen ² , S. Wang ^{2,3} ¹ University of Salerno, Italy; ² Northwest A&F University, China; ³ Washington State University, USA	[O20.2] The biopolymer toolbox to tailor lipid digestion-From Interfacial design to <i>in vivo</i> studies (0334) N. Scheuble* ¹ , M. Schumacher ¹ , T. Geue ³ , K.S. Elvira ¹ , F. Carrière ⁴ , D. Liu ^{1,2} , S. Steingötter ^{1,2} , M. Arnold ¹ , E.J. Windhab ¹ , P. Fischer ¹ ¹ ETH Zurich, Switzerland; ² University Hospital Zurich, Switzerland; ³ Paul Scherrer Institute, Switzerland; ⁴ Aix-		
14:30-14:45	[O17.1] Intensified processing of protein-polysaccharide-conjugates via extrusion (0091) L. Koch*, M.A. Emin, H.P. Schuchmann <i>Karlsruher Institut of Technology, Germany</i>	[O18.3] Estimation of dielectric properties of osmo-dehydrated foods by inverse numerical technique (0209) J.A. Arballo, L.A. Campañone, A. Bava, R.H. Mascheroni* <i>CIDCA-UNLP, Argentina</i>	[O19.1] 3-D printing of artificial plant tissue for innovative food manufacturing: Bio-ink formulations for the printing of porous structure (0317) V. Vancauwenberghe*, V. Baye Mfortaw Mbong, T. Kokalj, Z. Wang, P. Verboven, J. Lammertyn, B. Nicolai <i>KU Leuven, Belgium</i>	[O20.3] The effect of dietary fibre on the <i>in vitro</i> digestion of cereal foods (0557) A.R. Mackie, N.M. Rigby* <i>Institute of Food Research, UK</i>	<p>Background – from Global Visions for the Role of Food Science and Technology to meet Societal and Technological Challenges</p> <p>An increasing world population is asking for</p>

<p>14:45-15:00</p>	<p>[O17.2] Structural strength and crystallization in amorphous food models at low water activities (0443) F.H. Fan*, Y.H. Roos <i>University College Cork, Ireland</i></p>	<p>[O18.4] Computational modelling of end-over-end (EOE) retort processing for canned foods with particulates (0278) F. Sarghini*¹, F. Erdogdu² ¹<i>University of Naples Federico II, Italy;</i> ²<i>Ankara University, Turkey</i></p>	<p>[O19.2] Structural-mechanical analysis of cookies produced by conventional and 3D printing techniques (0386) W. Aregawi¹, P. Verboven*¹, V. Vancauwenberghe¹, E. Bongaers², E. Vandeneijnden³, K. Vanbommel³, J. Diaz³, B. Nicolai¹ ¹<i>KU Leuven, Belgium;</i> ²<i>Bruker microCT, Belgium;</i> ³<i>TNO, The Netherlands</i></p>	<p>[O20.4] <i>In-vivo</i> versus <i>in-vitro</i> digestion: Validation of the COST Infogest digestion protocol (0578) R. Portmann*, H. Stoffers, P. Schlegel, L. Egger <i>Agroscope Institute, Switzerland</i></p>	<p>more and more and even better lifestyle oriented food. In this context especially diets containing high amounts of animal proteins are severe burdens for the environment and have in general negative impact on bio-diversity especially in stressed habitats. Major players in this conflict area are agronomists who are supported in their efforts to scale up agricultural production by all types of specialists. One of the tasks of these consortia are to design plant material which is suited for specific and in particular stressed environments, and which is accepted or even appreciated by the consumer and which has in addition optimal processing properties.</p>
<p>15:00-15:15</p>	<p>[O17.3] The multiscale nature of food science and technology (0663) C. Rauh*¹, A. Delgado² ¹<i>TU Berlin, Germany;</i> ²<i>Friedrich-Alexander University Erlangen-Nuremberg, Germany</i></p>	<p>[O18.5] Computational modelling of reciprocal-agitation retort process for canned liquid foods (0290) F. Erdogdu*¹, M. Tutar^{2,3}, D. Skipnes⁴, S. Oines⁴, T. Lovdal⁴ ¹<i>Ankara University, Turkey;</i> ²<i>MGEP Mondragon Goi Eskola Politeknikoa, Spain;</i> ³<i>IKERBASQUE, Basque Foundation for Science, Spain;</i> ⁴<i>Nofima AS, Norway</i></p>	<p>[O19.3] Structure design of 3D printed cookies in relation to texture (0387) W. Aregawi¹, P. Verboven*¹, V. Vancauwenberghe¹, E. Bongaers², E. Vandeneijnden³, K. Vanbommel³, J. Diaz³, B. Nicolai¹ ¹<i>KU Leuven, Belgium;</i> ²<i>Bruker microCT, Belgium;</i> ³<i>TNO, The Netherlands</i></p>	<p>[O20.5] Engineering digestion: <i>In vitro</i> & <i>in silico</i> methods for studying human digestion (0470) T.E. Moxon*, C. Latty, O. Gouseti, S. Bakalis, P.J. Fryer <i>University of Birmingham, UK</i></p>	
<p>15:15-15:30</p>	<p>[O17.4] Alternative paradigms for food sterilization (0689) E. Georget*, V. Heinz, A. Mathys <i>German Institute of Food Technologies, Germany</i></p>	<p>[O18.6] Seeding-induced crystallisation in highly concentrated system (0383) R. Wang*, O. Gouseti, E. Lopez-Quiroga, P.J. Fryer, S. Bakalis <i>University of Birmingham, UK</i></p>	<p>[O19.4] The role of gelation dynamics in food printing (0715) K.J.R. Vallons*, J. Diaz, K. van Bommel, M. Noort <i>TNO, The Netherlands</i></p>	<p>[O20.6] Food for the ages: Application of dynamic <i>in vitro</i> digestion models to evaluate the differential digestive fate of proteins and emulsions in infants, adults and the elderly (0141) C. Shani Levi¹, R. Magid¹, R. Portmann², U. Lesmes*¹ ¹<i>Technion-IIT, Israel;</i> ²<i>Agroscope, Switzerland</i></p>	

15:30-15:45	[O17.5] Texture & mouthfeel research for optimum food design: A multi-scale approach in food microstructure and functionality (0770) K. Fourtouni <i>Mondelēz International, UK</i>	[O18.7] Coalescence and agglomeration of skim milk particles during spray drying (0393) L. Malafronte ^{1,2} , L. Ahrne ^{*1,2} , F. Innings ³ , A. Jongsma ³ , A. Rasmuson ² ¹ <i>SP Food and Bioscience, Sweden</i> ; ² <i>Chalmers University of Technology, Sweden</i> ; ³ <i>Tetra Pak Processing Systems, Sweden</i>	[O19.5] Process control in 3D food printing (0713) D. Klomp*, M. Hoppenbrouwers, B. de Kruif, E. van den Eijnden, M. Berkhout, J. Henket, K. van Bommel <i>TNO, The Netherlands</i>	[O20.7] <i>In vitro</i> static digestion in the newborn: Proposition of a protocol for infant formula (0602) A. Deglaire ^{*1,2} , O. Ménard ^{1,2} , C. Bourlieu ^{1,2} , S. De Oliveira ^{1,2} , N. Dellarosa ³ , L. Laghi ³ , D. Dupont ^{1,2} ¹ <i>INRA, France</i> ; ² <i>Agrocampus Ouest, France</i> ; ³ <i>University of Bologna, Italy</i>
15:45-16:00	[O17.6] Stabilization of açai juice using mechanical treatments (0695) D. Huc ^{*1,2} , V. Bosc ^{1,2} , D. Binois ³ , G. Cuvelier ^{1,2} ¹ <i>AgroParisTech, France</i> ; ² <i>INRA, France</i> ; ³ <i>Nossa! Fruits, France</i>	[O18.8] Experimental investigations and modelling of hot air drying of sliced tomatoes (0424) J. Sun*, S.A. Tassou, Y. Ge, L. Gowreesunker <i>Brunel University London, UK</i>	[O19.6] Successfully developing food products using 3D printing technologies: Challenges, opportunities and future outlook (0710) J. Diaz*, K. van Bommel, M. Noort, K. Vallons <i>TNO, The Netherlands</i>	[O20.8] Impact of surface adsorption on <i>in vitro</i> digestibility of food preservatives (0546) T. Del castillo Santaella, R. Cebrian, E. Valdivia, M. Martinez-Bueno, M.J. Galvez-Ruiz, M. Maqueda Abreu, J. Maldonado-Valderrama <i>University of Granada, Spain</i>
Room	Macedonia Hall			
16:00-17:00	Coffee break & Poster Session 2			
Rooms	Macedonia A	Macedonia B	Mycenae	Pella
17:00-19:00	Session 21: Young researchers-Special session	Session 22: Modelling and simulation in food industry	Session 23: Advances in food structure and functionality: Encapsulation and powder technology	Session 24: Advances in dairy science and technology
Session Chairs	D. Knorr & E. Gogou	C. Rauh & A. Delgado	V. Nedovic & J.M. Lagaron	J. Frias & V. Valdramidis
17:00-17:15	[INV.18] Future challenges of emerging technologies (0839) D. Knorr <i>TU Berlin, Germany</i>	[O22.1] Virtual engineering of food processes: A powerful design, diagnosis, prognosis and optimization tool based on modelling and simulation (0514) A. Delgado ^{*1} , C. Rauh ^{1,2} , F. Gross ¹ , S. Hubert ¹ , L. Pettigrew ¹ , M. Münsch ¹ , O. Ertunç ^{1,3} , J. Krauss ¹ ¹ <i>Friedrich-Alexander University</i>	[O23.1] High throughput electro-hydrodynamic processing in food encapsulation and food packaging applications (0160) J.M. Lagaron ^{*1} , M.J. Fabra ¹ , A. Lopez-Rubio ¹ , C. Libran ² , S. Wilkanovic ² ¹ <i>IATA-CSIC, Spain</i> ; ² <i>Bioinicia S.L., Spain</i>	[O24.1] Interactions between whey protein and pectin in model system (0024) M.R. Guo ^{*1,2} , C.N. Wang ² ¹ <i>Jilin University, China</i> ; ² <i>University of Vermont, USA</i>

17:15-17:30		<i>Erlangen-Nuremberg, Germany; ²TU Berlin, Germany; ³Ozyegin University, Turkey</i>	<p>[O23.2] Encapsulation efficiency and physico-chemical properties of a selenomethionine-loaded chitosan nanoparticles formulation for oral delivery (0325) G. Vozza*¹, M. Khalid¹, H.J. Byrne¹, S. Ryan², J. Frias¹ ¹Dublin Institute of Technology, Ireland; ²University College Dublin, Ireland</p>	<p>[O24.2] Membrane distillation for milk concentration (0052) S.N. Moejes*¹, M.J. Romero Guzmán¹, J.H. Hanemaaijer², K.H. Barrera², L. Feenstra², A.J.B. van Boxtel¹ ¹Wageningen University, The Netherlands; ²TNO, The Netherlands</p>
17:30-17:45	<p>[O21.1] High pressure processing (HPP) assisted enzymatic hydrolysis - An innovative approach for the reduction of soybean allergy (0151) P. Meinschmidt*¹, E. Ueberham¹, J. Lehmann¹, R. Sevenich², U. Schweiggert-Weisz¹, C. Rauh², D. Knorr², P. Eisner¹ ¹Fraunhofer Institute, Germany; ²TU Berlin, Germany</p>	<p>[O22.2] Operational state related simulation of the electrical power consumption of food packaging plants (0430) C. Koch, C. Nophut, I. Osterroth, T. Voigt* <i>Technische Universität München, Germany</i></p>	<p>[O23.3] Spray-dried vitamin-loaded particles: Structure & hydration properties (0468) G. Almeida, P. Relkin* <i>INRA-AgroParisTech, France</i></p>	<p>[O24.3] Transglutaminase treatment of milk with amaranth added: Effect on the structure properties of stirred yoghurt (0369) A.G. Shleikin, N.T. Zhilinskaya, N.V. Barakova, M.N. Petrova, N.P. Danilov, A.E. Argymbaeva, A.S. Shatalova <i>ITMO University, Russia</i></p>
17:45-18:00	<p>[O21.2] Delineating the bioactivity and colonic fermentation of bovine lactoferrin-fructo-oligosaccharide mixtures in adults or infants via the Maillard reaction (0140) A.M. Moscovici*¹, P. Skuse², D. Dupont³, P. Cotter², U. Lesmes¹ ¹Technion-IIT, Israel; ²Teagasc, Ireland; ³INRA, France</p>	<p>[O22.3] Modelling salt diffusion in cereal doughs: An innovative application of 3D images from X-ray micro-tomography (0644) S. Chevallier*, G. Diler, A. Le-Bail <i>GEPEA-UMR 6144 CNRS-ONIRIS, France</i></p>	<p>[O23.4] Microencapsulation of vanillin by layer-by-layer electrostatic deposition technique (0123) M. Noshad, M. Mohebbi*, A. Koocheki, F. Shahidi <i>Ferdowsi University, Iran</i></p>	<p>[O24.4] Understanding CO₂ production and transfer during cheese ripening (0409) F. Acerbi*¹, V. Guillard¹, C. Guillaume¹, M. Saubanère², N. Gontard¹ ¹IATE Joint Research Unit, France; ²Institut Charles Gerhardt, France</p>
18:00-18:15	<p>[O21.3] Novel angiotensin I-converting enzyme (ACE) inhibitory peptides from bovine connective tissue: Purification and characterization (0575) Y. Fu*, J.F. Young, M. Therkildsen <i>Aarhus University, Denmark</i></p>	<p>[O22.4] Radiation heat transfer in an oven register: Modelling aspects and the experimental validation (0539) A. Khaloian Sarnaghi, R. Takacs, M.A. Hussein*, T. Becker <i>Technische Universität München, Germany</i></p>	<p>[O23.5] Microencapsulation of a probiotic <i>Lactobacillus paracasei</i> strain by complex coacervation and subsequent ionotropic gelation (0592) D. Dourvanidis, T. Moschakis, C.G. Biliaderis* <i>Aristotle University of Thessaloniki, Greece</i></p>	<p>[O24.5] Potential application of phage for detection and biological control of food borne pathogens; the case of <i>Mycobacterium avium</i> subspecies <i>paratuberculosis</i> (0289) G. Botsaris <i>Cyprus University of Technology, Cyprus</i></p>

18:15-18:30	[O21.4] Gas-solid interactions of cold atmospheric pressure plasma with complex food matrices (0577) S. Bußler*, O. Schlüter <i>Leibniz Institute for Agricultural Engineering, Germany</i>	[O22.5] Modelling of the kinetics of high hydrostatic pressure assisted hydrolysis (0549) S. De Maria ¹ , G. Ferrari ^{1,2} , P. Maresca* ² ¹ <i>University of Salerno, Italy; </i> ² <i>ProdAl Scarl, Italy</i>	[O23.6] Effect of drying method on agricultural products' properties (0502) V.P. Oikonomopoulou*, M.K. Krokida <i>National Technical University of Athens, Greece</i>	[O24.6] Pulsed light vs. allergenicity: Applications in dairy ingredients (0449) J. Orcajo*, I. Martínez de Marañón, M. Lavilla <i>Azti-Tecnalia, Spain</i>
18:30-18:45	[O21.5] Shelf-life extension of pomegranate arils with chitosan-ascorbic acid coatings (0296) K.S. Özdemir*, V. Gökmen <i>Hacettepe University, Turkey</i>	[O22.6] Process optimization of systems for energy-efficient and mild product drying by means of numerical modelling (0571) S. Mack, S. Laoeamthong, S. Egner, T. Hirth, A.I. Javaid* <i>Fraunhofer IGB, Germany</i>	[O23.7] Microencapsulation with biopolymers of active and natural compounds with food, biomedical and technological interest (0064) B.N. Estevinho*, F. Rocha <i>Universidade do Porto (FEUP), Portugal</i>	[O24.7] Biodiversity of wild lactic acid bacteria isolated from raw donkey milk: Assessment of their technological properties, bacteriocin production, safety evaluation and probiotic potential (0629) M. Aspri, D. Tsaltas, P. Papademas* <i>Cyprus University of Technology,</i>
18:45-19:00	[O21.6] Effect of electrical field strength applied by PEF on the shelf life of fresh fruit smoothie: Trade-off between yeasts and moulds (0581) R.A.H. Timmermans*, A.L. Nederhoff, M.N. Nierop Groot, M.A.J.S. Van Boekel, H.C. Mastwijk <i>Wageningen University, The Netherlands</i>	[O22.7] On the development and validation of a 3-D thermal Lattice Boltzmann solver (0547) S. Zolfokar* ¹ , A.O. Sherif ¹ , M.A. Hussein ² ¹ <i>Cairo University, Egypt; </i> ² <i>Technische Universität München, Germany</i>	[O23.8] Encapsulation of astaxanthin using protein-polysaccharide conjugates as emulsifier and coating materials to form pH and heat stable dispersions (0605) I. Sramala ¹ , D. Lertsakolphant ² , K. Kasemwong* ¹ ¹ <i>National Nanotechnology Center, Thailand; </i> ² <i>Srinakharinwirot University, Thailand</i>	[O24.8] The effect of cross linking of milk proteins in stirred yoghurt by an oxidoreductase on gel structure and sensory perception (0535) A. Mookonlall*, S. Noebel, J. Hinrichs, <i>University of Hohenheim, Germany</i>
20:00-22:30	Conference Dinner			
Thursday 12th of November 2015				
Rooms	Macedonia Ballroom	Mycenae	Pella	Horizon
08:30-10:00	Session 25: Advances in research and applications of nonthermal technologies for food processing and preservation_1	Session 26: Energy, water and waste reduction in the food chain	Session 27: Food regulations; Food fraud and authenticity	Session 28: Food science and technology research and innovation in developing countries
Session Chairs	B. Guamis Lopez & R. Buckow	D. Phinney & S. A. Tassou	E. Anklam & G-J. Nychas	W. Spiess & M. Schmidl

<p>08:30-08:45</p>	<p>[O25.1] Plasma application in the context of other nonthermal food processing techniques: Similarities and uniqueness in process design O. Schluter <i>Leibniz Institute for Agricultural Engineering, Germany</i></p>	<p>[O26.1] Food loss and waste reduction in a context of growing urbanization (0526) S. Guilbert*¹, B. Redlingshöfer², C. Fuentes¹, M. Gracieux² ¹Montpellier SupAgro, France; ²INRA, France</p>	<p>[INV.19] Detection of food frauds: Looking for the unknowns!? But quality assured! (0706) E. Anklam <i>European Commission, Joint Research Centre, Institute for Reference Materials and Measurements, Belgium</i></p>	<p>[O28.1] The overview of migration, poverty and food safety risks in developing countries (0584) M. Jula, O.A. Ijabadeniyi* <i>Durban University of Technology, South Africa</i></p>
<p>08:45-09:00</p>		<p>[O26.2] Reduction of water and energy usage in vegetable processing by use of pulsed electric fields – A case study (0792) S. Toepfl¹, C. Siemer², A. Mathys*¹ ¹German Institute of Food Technologies, Germany; ²Elea GmbH, Germany</p>		<p>[O28.2] Isolation and identification of potential probiotic bacteria from South African Saanen goats' milk (0116) G. Makete¹, O.A. Aiyegoro*^{1,2}, M.S. Thantsha² ¹Agricultural Research Council-Animal Production Institute, South Africa</p>
<p>09:00-09:15</p>	<p>[O25.2] Nonthermal processing technologies as elicitors to induce the biosynthesis and accumulation of nutraceuticals in plant foods (0224) M.R. Cuéllar-Villarreal*¹, M. Redondo-Gil¹, J. Welte-Chanes¹, L. Cisneros-Zevallos², D.A. Jacobo-Velázquez¹ ¹Tecnológico De Monterrey, Mexico; ²Texas A&M University, USA</p>	<p>[O26.3] Environmental impacts and energy and emissions reductions from food catering (0335) S.A. Tassou*, M. Kolokotroni, B.L. Gowreesunker, C. Amaris, <i>Brunel University London, UK</i></p>	<p>[O27.1] Multispectral Imaging (MSI); a promising method for the detection of minced beef adulteration with horsemeat (0525) A. Ropodi, E. Panagou, G-J. Nychas* <i>Agricultural University of Athens, Greece</i></p>	<p>[O28.3] Developing and testing the acceptability of therapeutic food for the management of severely malnourished children (0033) M.A. Wiafe*, R.A. Annan, V.P. Dzobgefia, H.E. Lutterodt <i>Kwame Nkrumah University of Science and Technology, Ghana</i></p>
<p>09:15-09:30</p>	<p>[O25.3] Physiological response of fruits processed by moderate-intensity pulsed electric fields (0288) M. Vendrell-Pacheco, O. Martin-Belloso, R. Soliva- Fortuny*, P. Elez-Martinez <i>University of Lleida, Spain</i></p>	<p>[O26.4] Chemical-free neutralization of caustic peeled tomato slurry to reclaim wastes: A water conservation initiative (0458) D.M. Phinney*, J.C. Frelka, D.R. Heldman <i>The Ohio State University, USA</i></p>	<p>[O27.2] Prove authenticity of grated Parmigiano-Reggiano cheese by small sensor system (S3) (0173) V. Sberveglieri*¹, E. Núñez Carmona^{1,2}, A. Pulvirenti^{1,2} ¹CNR-INO Sensor Lab, Italy; ²University of Modena and Reggio Emilia, Italy</p>	<p>[O28.4] In-vitro digestibility and other functional properties of starches from bambara landraces (0298) S.A. Oyeyinka, E.O. Amonsou*, S. Singh <i>Durban University of Technology, South Africa</i></p>

09:30-09:45	[O25.4] Non-thermal plasma – An alternative technology for the decontamination of dry food surfaces (0585) C. Hertwig*, K. Reineke, O. Schlüter <i>Leibniz Institute for Agricultural Engineering, Germany</i>	[O26.5] A study of strategies to reduce energy use for internal environmental conditions in supermarkets (0323) Z. Mylona*, M. Kolokotroni, S.A. Tassou <i>Brunel University London, UK</i>	[O27.3] Evaluating the flavor authenticity of thermal and high pressure processed apple juice by headspace gas chromatography-mass spectrometry fingerprinting (0180) J. Yi*, B.T. Kebede, N.H.D. Doan, C. Buvé, T. Grauwet, A. Van Loey, M. Hendrickx <i>KU Leuven, Belgium</i>	[O28.5] Malnutrition in Madagascar: Understanding food representation and practice to facilitate the appropriation of local food resource by consumers (0061) G. Arvisenet* ¹ , V. Ramarason Rakotosamimanana ^{1,2} , D. Valentin ¹ ¹ <i>Universite de Bourgogne, France;</i> ² <i>Laboratoire d'Analyse Sensorielle d'Ambatobe, DRT-FOFIFA, Madagascar</i>	
09:45-10:00		[O26.6] Experimental and numerical study on the performance of CO₂ refrigeration for supermarket applications (0235) K. Tsamos*, I.D. Santosa, Y. Ge, S.A. Tassou <i>Brunel University London-CSEF, UK</i>	[O27.4] Concept and pilot studies for the automated food control of online distributed foodstuff (0626) A. Krewinkel* ¹ , S. Sünkler ¹ , D. Lewandowski ¹ , N. Finck ¹ , B. Tolg ¹ , L.W. Kroh ² , G.A. Schreiber ³ , J. Fritsche ¹ ¹ <i>Hamburg University of Applied Sciences, Germany;</i> ² <i>TU Berlin, Germany;</i> ³ <i>Federal Office of Consumer Protection and Food Safety, Germany</i>	[O28.6] Production of probiotic whey drink from released liquid whey of Jordanians soft cheeses (0039) M. Haddad <i>Al-Balqa Applied University, Jordan</i>	
Room	Macedonia Hall				
10:00-10:30	Coffee Break				
Rooms	Macedonia Ballroom	Mycenae	Pella	Horizon	Athens View Hall
10:30-12:00	Session 29: Advances in research and applications of nonthermal technologies for food processing and preservation_2	Session 30: European Research Projects-Special session	Session 31: Food regulations and control of quality and safety in the food chain	Session 32: Advances in food packaging: Intelligent and active packaging	Session 33: Healthy food design: New strategies and opportunities (Connect2Innovate-Special Session)
Session Chairs	M. Hendrickx & J. Wan	A. Le Bail & G. Schleining	H. Lelieveld & K. Koutsoumanis	N. Gontard & M. Giannakourou	J. Knol & V. Fogliano

<p>10:30-10:45</p>	<p>[O29.1] Considerations in validation of new food processing technologies for regulatory acceptance and industrial applications J. Wan*¹, N. Anderson² ¹<i>Illinois Institute of Technology, USA</i>; ²<i>Center for Food Safety and Applied Nutrition, Food and Drug Administration, USA</i></p>	<p>[O30.1] Reduction of energy in baking ovens; an overview of LEO (“Low Energy Oven”) European project based on infra-red technology and on water spraying to replace steam injection during baking (0560) A. Le-Bail*¹, V. Jury¹, T. Gally¹, N. Hesso¹, L. Arhne², H. Hondo², E. Baderstedt^{2,3}, T. Bjonberg³, F. Massi⁴, A. Costa⁵, A. Ferreira⁵, K.-M. Uhde⁶, P. Gouvriou⁷ ¹<i>ONIRIS-LUNAM, France</i>; ²<i>SP, Sweden</i>; ³<i>Ircon Drying Systems AB, Sweden</i>; ⁴<i>Intelligentsia Consultants, Luxembourg</i>; ⁵<i>Ramalhos Oven, Portugal</i>; ⁶<i>HavenBaecker-BremerHaven, Germany</i>; ⁷<i>BPA, France</i></p>	<p>[INV.20] The role of microbial risk assessment in EU food safety regulation (0838) K. Koutsoumanis <i>Aristotle University of Athens, Greece</i></p>	<p>[INV.21] Innovative food packaging: Active, intelligent, bio-based and eco-efficient materials and technologies (0837) N. Gontard*¹, V. Guillard², C. Guillaume², H. Angellier² ¹<i>INRA Montpellier, France</i>; ²<i>Université Montpellier, France</i></p>	<p>[O33.1] Healthy food design: New strategies and opportunities (0829) V. Fogliano <i>Wageningen University, The Netherlands</i></p>
<p>10:45-11:00</p>		<p>[O30.2] COLDμWAVE - Investigation of microwave blanching of vegetables (0455) E. Xanthakis*, E. Kaunisto, S. Isaksson, L. Ahrné <i>SP Food and Bioscience, Sweden</i></p>			

<p>11:00-11:15</p>	<p>[O29.2] Utilization of pulsed light for enzyme inactivation and conformational structure change of whey protein (0551) A.B. Siddique*, G. Ferrari, G. Pataro, P. Maresca <i>University of Salerno, Italy</i></p>	<p>[O30.3] BAKE4FUN, a European project for SME benefit to design and validate functional bakery products (0700) A. Gianotti <i>University of Bologna, Italy</i></p>	<p>[O31.1] Comprehensive evaluation of the global clean label phenomenon: Implications for consumers, manufacturers and regulators (0711) J. Diaz*, C. van den Berg, K. Vallons <i>TNO, The Netherlands</i></p>	<p>[O32.1] Improving the quality of vacuum packed fresh Norwegian salmon through active packaging solutions in the form of absorbing and CO₂-emitting pads (0328) F. Tintchev*, H. Pommeranz, U. Bindrich <i>McAirlaid's Vliesstoffe GmbH, Germany</i></p>	<p>[O33.2] Connecting and communicating with consumers in new product development- Connect2Innovate (0784) S.J. Sijtsema*¹, D. Lakner¹, K.L. Zimmermann¹, J.J. Knol² ¹<i>Wageningen University, The Netherlands</i>; ²<i>EFFOST, The Netherlands</i></p>
<p>11:15-11:30</p>	<p>[O29.3] Impact of high pressure/temperature treatment on structure modification and functional sensory properties of frankfurters batter (0307) F. Tintchev*^{1,2,3}, U. Bindrich¹, S. Toepfl¹, U. Strijowski¹, V. Heinz¹, D. Knorr² ¹<i>German Institute of Food Technology, Germany</i>; ²<i>Berlin Institute of Technology, Germany</i>; ³<i>McAirlaid's Vliesstoffe GmbH, Germany</i></p>	<p>[O30.4] SUCCIPACK: Development of active, intelligent and sustainable food packaging using polybutylene succinate (PBS) (0462) C. Cotillon*¹, P. Dole², C. Lorient-Sauvageot³ ¹<i>ACTIA, France</i>; ²<i>CTCPA, France</i>; ³<i>LNE, France</i></p>	<p>[O31.2] The worldwide mycotoxins regulations in cereals (0766) H. Ezzatpanah <i>Islamic Azad University, Iran</i></p>	<p>[O32.2] Developing suitable smart TTI labels to match specific shelf life monitoring requirements: The case of different seafood products (0701) P. Ronnow*¹, T. Tsironi², M. Giannoglou², P.S. Taoukis² ¹<i>Vitsab International AB, Sweden</i>; ²<i>National Technical University of Athens, Greece</i></p>	<p>[O33.3] Facilitation of communication in new food product development- community building between food technologists, consumer researchers, industry and academics (0819) D. Lakner*, K.L. Zimmermann, S.J. Sijtsema <i>Wageningen University, The Netherlands</i></p>
<p>11:30-11:45</p>	<p>[O29.4] A novel nonthermal process for the concentration of liquid food ingredients F. Gascons Viladomat*, G. Pickett, C. Grosdemange, A. Leblanc <i>EDERNA, France</i></p>	<p>[O30.5] Analysis of needs for innovation in small scale mushroom enterprises: TRAFON Project (0177) D. Argyropoulos*¹, A. Sonnenberg², L. Michalczuk³, J. Müller¹ ¹<i>Universität Hohenheim, Germany</i>; ²<i>Wageningen University, The Netherlands</i>; ³<i>Research Institute of Horticulture, Poland</i></p>	<p>[O31.3] Mycotoxin reduction: Biological based and practical methods to reduce exposure (0826) W.C.A. Gelderblom*, H-M. Burger, G.S. Shephard, M. Lilly, J.F. Alberts <i>Cape Peninsula University of Technology, South Africa</i></p>	<p>[O32.3] Use of palladium based oxygen scavenger to prevent discoloration of ham (0085) S. Yildirim*, N. Rüegg, B. Röcker <i>Zurich University of Applied Sciences, Switzerland</i></p>	<p>[O33.4] TRADEIT: Supporting innovation and SME food producers (0823) H.P. McMahon <i>Institute of Technology Tralee, Ireland</i></p>

<p>11:45-12:00</p>	<p>[O29.5] Hyperbaric storage preservation at room temperature of two commercial ready-to-eat pre-cooked foods at room temperature using an industrial scale pressure equipment (0664) S.A. Moreira*¹, R.V. Duarte¹, P.A.R. Fernandes¹, S.P. Alves², R.J. Bessa², I. Delgadillo¹, J. Saraiva¹ ¹University of Aveiro, Portugal; ²University of Lisbon, Portugal</p>	<p>[O30.6] The FOOD-STA project: Improving higher education and continual professional development to face future challenges of the European food industry (0212) G. Schleining*^{1,14}, S. Braun², R. Costa^{3,14}, C. Cottillon⁴, J. Drausinger^{5,14}, F. Dubois-Brissonnet^{6,14}, P. Ho^{7,14}, S. Jaume⁸, J. Knol⁹, M.A. Marques¹⁰, M. Notarfonso¹¹, P. Pittia^{12,14}, C.L.M. Silva^{13,14}, F. Salta¹⁵, R. Svacinka¹ ¹BOKU, Austria; ² Universität Hohenheim, Germany; ³ Instituto Politécnico De Coimbra, Portugal; ⁴ Actia, France; ⁵ LVA, Austria; ⁶ AgroParisTech, France; ⁷ University of Leeds, UK; ⁸ Pasa-Preparados Alimenticios SA, Spain; ⁹ EFFoST, The Netherlands; ¹⁰ Frulact, Portugal; ¹¹ SPES-GEIE, Italy; ¹² Università Degli Studi di Teramo, Italy; ¹³ Universidade Católica Portuguesa, Portugal; ¹⁴ ISEKI-Food Association, Austria; ¹⁵ Federation of Hellenic Food Industries, Greece</p>	<p>[O31.4] Evaluation of polyurethane foam materials as air filters against fungal contamination (0341) M. Briffa^{1,2}, S. Decelis², J.-P. Brincat¹, J.N. Grima¹, R. Gatt¹, V. Valdramidis*¹ ¹University of Malta, Malta ²Mater Dei Hospital, Malta</p>	<p>[O32.4] Influence of the surface hydrophobicity of the carrier material on the inactivation of bacterial spores with gaseous, condensing hydrogen peroxide (0247) E. Eschlbeck*, S.A.W. Bauer, U. Kulozik Technische Universität München, Germany</p>	<p>[O33.5] Creating a multidisciplinary platform to address the main challenges in food innovation- Connect2Innovate (0801) J.J. Knol*¹, S.J. Sijtsema², D. Lakner², K.L. Zimmermann², ¹EFFoST, The Netherlands; ²Wageningen University, The Netherlands</p>
<p>Room</p>	<p>Macedonia Hall</p>				
<p>12:00-12:30</p>	<p>Coffee Break</p>				

Room	Macedonia Ballroom
Session Chairs	H. De Vries & M. Dalla Rosa
12:30-13:10	<p>Plenary Session-3</p> <p>[PL.08] “Beyond Fire and Ice—Consideration of Nanoscale Science and Nanotechnology-Enabled Nonthermal Processes to Improve Food Safety” Hongda Chen, International Academy of Food Science and Technology (IAFoST) Fellow, USA</p> <p>[PL.09] “IUFoST Global Food Safety Curricula Initiative” Aman Wirakartakusumah, IUFoST Education Committee Chair, Indonesia</p>
13:10-13:50	<p>Awards ceremony Student of the Year Award, <i>sponsored by Cargill</i> Young Scientist Award, <i>sponsored by GNT</i></p>
13:50-14:15	<p>Conference Overview Dietrich Knorr, EFFoST President</p> <p>Next EFFoST Conference presentation</p> <p>Conference Closing Petros Taoukis, Conference Chairman</p>
End of 29th EFFoST 2015 Conference	