

Lignobiotech 2018 - the 5th Symposium of Biotechnology Applied to Lignocelluloses

Day 1 Wednesday 29/08			
15:30 - 17:30	Registration	University of Helsinki main building, Fabianinkatu 33	
18:00 - 19:30	Helsinki City reception	Helsinki City Hall, Pohjoisesplanadi 11-13	
Day 2 Thursday 30/08 Scandic Marina Congress Center, Fennia II conference room			
8:00	Registration	Scandic Marina Congress Center, Katajanokanlaituri 6	
9:00	Opening	Kristiina Kruus, Taina Lundell	
Session 1. Lignocellulolytic enzymes Time Chair: Ligia Martins, Kaisa Marjamaa			
9:10	Plenary talk PT1	Kiyohiko Igarashi	30+5 min <i>Molecular mechanisms of cellulases</i>
9:45	Oral talk O1.1	Svein Horn	15+5 <i>Activation of LPMOs in a commercial cellulase cocktail</i>
10:05	Oral talk O1.2	Caroline Mosbech	15+5 <i>Natural catalytic function of CuGE glucuronoyl esterase</i>
10:25	Oral talk O1.3	Johan Larsbrink	15+5 <i>Structure-function studies of bacterial CE15 enzymes</i>
10:45	Oral talk O1.4	Simo Sarkanen	15+5 <i>Salicylate hydroxylase activity for pine wood pretreatment</i>
11:05	Coffee break	25 min	
Session 1. Lignocellulolytic enzymes Time Chair: Kiyohiko Igarashi, Kaisa Marjamaa			
11:30	Plenary talk PT2	Angel T. Martínez	30+5 min <i>Lignin-related enzymes</i>
12:05	Oral talk O1.5	Ligia Martins	15+5 <i>Evolving bacterial laccases and DyP-peroxidases for oxidation</i>
12:25	Oral talk O1.6	Susana Camarero	15+5 <i>Stable laccase engineered for valorization of kraft lignin</i>
12:45	Oral talk O1.7	Kristiina Hildén	15 min <i>Selective cleavage of β-O-4 aryl ether bond by β-etherase</i>
13:00	Lunch	1 h	
Session 2. Microbial transformation and omics Chair: Angel T. Martínez, Mari Mäkinen			
14:00	Plenary talk PT3	Igor Grigoriev	30+5 min <i>Multi-omics of lignocellulose decomposition by fungi</i>
14:35	Oral talk O2.1	Ron de Vries	15+5 <i>An integrated network of transcriptional regulators</i>
14:55	Oral talk O2.2	Takehito Nakazawa	15+5 <i>Efficient gene disruption using the CRISPR/Cas9 system</i>
15:15	Oral talk O2.3	Ichiro Kamei	15 min <i>Molecular breeding of white rot fungus <i>Phlebia</i> sp. MG-60</i>
15:45	Poster session 1	Coffee & refreshments	2 h 15 min
18:00	free evening		
Day 3 Friday 31/08 Scandic Marina Congress Center, Fennia II conference room			
Session 3. Lignocellulose analytics and structure Chair: Emma Master, John Ralph			
8:30	Plenary talk PT4	John Ralph	30+5 min <i>Designing lignins for the biorefinery</i>
9:05	Oral talk O3.1	Gabriel Paes	15+5+5 <i>Towards universal features to understand lignocellulose recalcitrance:</i>
9:30	Oral talk O7.2	Aurelié Bichot	15+5 <i>Microwave pretreatment of corn and miscanthus stalks</i>
9:50	Oral talk O3.3	Aya Zoghalmi	15+5 <i>Spatio-temporal imaging and quantification of lignocellulosic</i>
10:10	Oral talk O3.4	David Cannella	15+5 <i>Biophysical studies of cellulose oxidations - role of surface water</i>
10:30	Oral talk O3.5	Laurent Bleuze	15+5 <i>Remote sensing methods to monitor fiber crops processing</i>
10:50	Coffee break	40 min	
Session 4. Industrial examples of lignocellulose utilization Chair: Kristiina Kruus, Kaisa Marjamaa			
11:30	Plenary talk PT5	Anna Suurnäkki	30+5 min <i>New bioproduct mill concept</i>
12:05	Plenary talk PT6	Tom Granström	30+5 <i>Chemicals and fuels from lignin stream of lignocellulose biorefinery</i>
12:40	Plenary talk PT7	Matti Heikkilä	30+5 <i>Enzymatic lignin modification and depolymerization</i>
13:15	Lunch	1 h	
Session 5. Lignocellulose biosynthesis and material activation Chair: Susana Camarero, Taina Lundell			
14:15	Oral talk O5.1	Kurt Fagerstedt	15+5 min <i>Ray parenchymal cells actively contribute to lignification</i>
14:35	Oral talk O5.2	Takashi Watanabe	15+5 <i>Valorization of ligninocelluloses using microwave technology</i>
14:55	Oral talk O5.3	Barry Goodell	15+5 <i>Fungal-inspired catalytic lignocellulose deconstruction</i>
15:15	Oral talk O5.4	Kaisa Marjamaa	15+5 <i>Effect of enzyme family and structure on modification of wood fibres</i>
15:35	Oral talk O5.5	Mika Sipponen	15+5 <i>Cationic colloidal lignin particles in spatial immobilization of enzymes</i>
15:55	Oral talk O5.6	Elise Gerbin	15+5 <i>Lignin cross-linking on cellulose nanocrystal based films</i>
16:15	Oral talk O5.7	Valdeir Arantes	15 min <i>Co-production of cellulose nanocrystals and industrial sugars</i>
16:30	Poster session 2	Coffee & refreshments	1 h 30 min
19:00-23:00	Conference dinner	Katajanokan kasino, Laivastonkatu 1	

Session 6. Chemicals and fuels from biomass			Chair: Lisbeth Olsson, David Canella
9:00	Plenary talk PT8	Lisbeth Olsson	30+5 min <i>to be announced</i>
9:35	Oral talk O6.1	Krithika Ravi	15+5 <i>Towards bacterial valorization of low molecular weight lignin</i>
9:55	Oral talk O6.2	Aymerick Eydes	15+5 <i>Production of the platform chemical muconic acid in plant biomass</i>
10:15	Oral talk O6.3	Hans Mattila	15+5 <i>Bioethanol from untreated waste lignocellulose materials</i>
10:35	Oral talk O6.4	María Hijosa Valsero	15+5 <i>Simplified method for biobutanol production from corn stover</i>
10:55	<i>Coffee break</i>		30 min
Session 7. Bioconversion and treatment of lignocelluloses			Chair: to be announced
11:25	Oral talk O7.1	Mark Blenner	15+5 min <i>Pathways for conversion of lignin-derived aromatics to lipids</i>
11:45	Oral talk O3.2	Hiroshi Nishimura	15+5 <i>Fractionation and structural analysis of enzyme-treated</i>
12:05	Oral talk O7.4	Eduardo Diaz	15+5 <i>Engineering bacterial biocatalysts for bioconversion of lignin-derived</i>
12:25	Oral talk O7.5	Taina Lundell	15 min <i>Wood-decay fungi for sustainable bioeconomy on lignocelluloses</i>
12:40	<i>General Discussion & Symposium Closing</i>		20 min Kristiina Kruus, Taina Lundell, Emma Master
	<i>Announcement of the next symposium for 2020</i>		
13:00	<i>Farewell</i>		

