

3rd International Conference on Reaction Kinetics, Mechanisms and Catalysis RKMC 2024

22-25 May 2024 / Budapest, Hungary
Mercure Budapest Castle Hill ****

Preliminary programme*

Wednesday / 22 May 2024

Room Mátyás I.				
15:00		Registration desk opens		
17:00	17:10	Opening remarks	Gábor Lente	Conference Chair University of Pécs, Hungary
Chair: Gábor Lente				
17:10	18:15	Reaction-diffusion modelling and applications of autocatalytic systems: recent developments + 15 min. Q&A	Annette F. Taylor	University of Sheffield, UK
18:15	20:00	Welcome reception (Foyer)		

Thursday / 23 May 2024

Room Mátyás I.				
Chair: Günther Rupprechter				
9:00	9:50	Electrocatalytic refinery for production of fuels and chemicals + 10 min. Q&A	Shizhang Qiao	University of Adelaide, Australia
9:50	10:15	Computational profiling of fast, base-free synthesis of quinolin-2-(1H)-one + 5 min. Q&A	Krishna K. Govender	University of Johannesburg, South Africa
10:15	10:40	Structure of the slow manifold as a tool for parametrisation of the reaction mechanism for oscillatory reactions + 5 min. Q&A	Zeljko Cupic	University of Belgrade, Serbia
10:40	11:10	Coffee break (Foyer)		
Chair: Ana Ivanović-Šašić				
11:10	11:35	Catalytic glycerol hydrogenolysis on bimetallic clusters of platinum and tungsten: A DFT study + 5 min. Q&A	Mohit Kashyap	IITB-Monash Research Academy, India
11:35	12:00	Small molecule activation at biological metal-macrocyclic complexes: contrasts between heme and vitamin B12 + 5 min. Q&A	Radu Silaghi-Dumitrescu	Babes-Bolyai University, Romania
12:00	12:25	Magnetic field control of heterogeneous catalysis: Application to low-pressure Fischer-Tropsch + 5 min. Q&A	Durante' E Naidoo	University of KwaZulu-Natal, South Africa
12:30	14:00	Lunch (Restaurant)		
14:00	16:00	Poster session (Foyer)		
16:00	16:30	Coffee break (Foyer)		
17:00	19:00	Walking tour in the Buda Castle district (meeting point: hotel lobby 17:00)		

Friday / 24 May 2024

Room Mátyás I.				
Chair: Zeljko Cupic				
9:00	9:50	Chemical dynamics in single particle catalysis: in situ microscopy and microkinetic modelling + 10 min. Q&A	Günther Rupprechter	TU Wien, Austria
9:50	10:15	Mechanism reduction-assisted kinetic parameter optimization for combustion mechanisms + 5 min. Q&A	László Horváth	HUN-REN Centre for Natural Sciences, Hungary
10:15	10:40	VOC oxidation over structured transition metal oxide catalysts prepared by plasma jet sputtering: the effect of energy delivery + 5 min. Q&A	Pavel Topka	Institute of Chemical Process Fundamentals of the CAS, Czech Republic
10:40	11:10	Coffee break (Foyer)		
Room Mátyás I.				
Chair: Shizhang Qiao				
11:10	11:35	Triglyceride hydroconversion over alumina-supported and phosphatized-alumina-supported Pd catalysts + 5 min. Q&A	Anna Vikár	HUN-REN Research Centre for Natural Sciences, Hungary
11:35	12:00	Heterogeneous catalyst development and reaction kinetics for biodiesel production from biomass-based sources + 5 min. Q&A	Raphael Idem	University of Regina, Canada
12:00	12:25	Hydroconversion of γ -valerolactone on alumina- and Beta zeolite-supported Co catalysts: The role of catalyst acidity in the reaction pathways + 5 min. Q&A	Hanna E. Solt	HUN-REN Research Centre for Natural Sciences, Hungary
12:30	14:00	Lunch (Restaurant)		
Room Mátyás I				
Chair: András Sápi				
14:00	14:25	Photocatalytic characteristics of (Ag,Na)-TiO ₂ /Sr ₄ Al ₁₄ O ₂₅ :Eu,Dy heterojunction photocatalyst synthesized by coprecipitation method + 5 min. Q&A	Jung-Sik Kim	University of Seoul, South Korea
14:25	14:50	PNC-doped TiO ₂ nanoparticles for highly stable self-cleaning paints: A sustainable path to industrial development+ 5 min. Q&A	Qaisar Maqbool	TU Wien, Austria
14:50	15:15	Plasmon-enhanced ammonia photoelectrosynthesis + 5 min. Q&A	Vitor Silveira	Uppsala University, Sweden
15:15	15:40	Rooibos tea waste binary oxide composite: An adsorbent for the removal of nickel ions and an efficient photocatalyst for the degradation of ciprofloxacin + 5 min. Q&A	Kriveshini Pillay	University of Johannesburg, South Africa
19:00	22:00	Conference dinner - Vénhajó Restaurant (meeting point: hotel lobby 18:30)		

Saturday / 25 May 2024

Room Mátyás I.				
Chair: Annette F. Taylor				
9:00	9:50	Perturbation techniques in experimental and numerical investigations of the Belousov Zhabotinsky oscillatory reaction + 10 min. Q&A	Ana Ivanović-Šašić	University of Belgrade, Serbia
9:50	10:15	Deactivating effects in the co-conversion of lauric acid and anisol over NiMo/Al ₂ O ₃ catalyst + 5 min. Q&A	Oleg Kikhtyanin	University of Chemistry and Technology Prague, Czech Republic
10:15	10:40	Polymorph selection of zeolitic imidazolate frameworks via kinetic and thermodynamic control + 5 min. Q&A	Gábor Schuszter	University of Szeged, Hungary
10:40	11:10	Coffee break (Foyer)		
Room Mátyás I.				
Chair: Gábor Lente				
11:10	11:35	Femtosecond laser generation of defect-rich CuZn nanoalloys for model catalysis + 5 min. Q&A	Niusha Lasemi	TU Wien, Austria
11:35	12:00	Tuning quality of C1 and C5+ green fuels by CO ₂ hydrogenation over structured catalysts + 5 min. Q&A	András Sápi	University of Szeged, Hungary
12:00	12:25	Biochar-derived activated carbons: a comprehensive assessment of kinetic and isotherm modeling for adsorptive removal of methylene blue dye contaminants + 5 min. Q&A	Othman M. Hakami	Jazan University, Saudi Arabia
12:25	12:40	Closing remarks	Gábor Lente	Conference Chair University of Pécs, Hungary
12:40	14:00	Lunch (Restaurant)		

*The Organizers reserve the right to make changes in the Conference programme