

Session Topics:	Characterisation and testing of materials & products	Material Developments	Sustainability	Modelling	Smart Materials	Elastomer Product Innovations	Material Processing
	Chairs: Jorge Lacayo Pineda, Ulrich Giese, Toshio Tada, Erick Sharp	Chairs: Kannika Sahakaro, Anke Blume, Ramakrishnan S	Chairs: Martyn Bennett, Ulrich Giese	Chairs: Keizo Akutagawa, Toshio Tada	Chairs: Leif Kari, Khai Nguyen	Chairs: Abilash Nair, Izaak Watson	Chairs: Abilash Nair, Lewis Tunnicliffe, Izaak Watson

9/5/2023					
9/5/2023	John McIntyre Conference Centre			South Hall Complex	
	Pentland	Prestonfield	St Trinneans	South Hall	Kirkland
09:00 - 17:00	Poster Board Setup			Shell Scheme Setup	
19:00 - 22:00	Welcome Reception & Poster Pitch Session				

10/5/2023										
	John McIntyre Conference Centre				South Hall Complex					
	Pentland East		Pentland West	Prestonfield	St Trinneans	South Hall	Kirkland			
Capacity					50	300				
08:00 - 08:30	Registration					Morning Coffee				
08:30 - 08:45	Welcome Address & General Presentation: James Busfield									
08:45 - 09:15	Plenary Session 1: Liqun Zhang Advanced Elastomer Nanocomposites Aiming At Carbon Peaking And Carbon Neutrality Goals (16)									
09:15 - 10:00	Plenary Session 2: Pending									
10:00-10:45	Pentland Dividing into Pentland East & West					Refreshments & Networking				
10:45 - 11:10	Chair: Ulrich Giese	Jorge Lacayo-Pineda Evaluating rCB Capabilities for Rubber Reinforcement (6)	Chair: Erick Sharp	Christoph Gögelein Strain-Induced Crystallization Of HNBR (2)	Chair: Keizo Akutagawa	Mokarram Hossain On the influence of time-dependent behaviour of elastomeric wave energy harvesting membranes (9)	Chair: Ramakrishnan S	Chaoying Wan VAT Photopolymerisation 3D printing of elastomer vitrimers (13)		
11:10 - 11:35		Vishal Patil UPM BioMotion™ Renewable Functional Fillers (RFF) for a Lighter and more Sustainable Future (8)		William Mars Virtual qualification of elastomeric engine mount with recorded multi-channel road load input (3)		Laurent Guy How Silane could react on the Silica surface and the water role ? – Computer modeling as an advanced tool to link with our experiments (15)		Anke Blume Comparison of the reactivity of mercaptosilane and sulfursilane in a model study (45)		
11:35 - 12:00		Yusuf Guner Developing EPDM Based Compound by Using Sustainable Carbonaceous Material (11)		Judith Hirsch Identification of test parameter to evaluate the wear of rubber in aged chassis bushes (42)		Fanzhu Li A comparative study of hyperelastic constitutive models and thermo-mechanical coupling analysis for an edge-cracked rubber specimen (19)		Priyanka Sekar Understanding the raspberry-like Filler Cluster Formation of Bis-(triethoxypropyl) tetrasulfide modified Hydrothermally treated lignin in an SSBR/BR rubber matrix (48)		
12:00 - 12:25		Cristian Oprisoni Sustainable Solutions for the Rubber Industry (12)		Katsuhiko Tsunoda New insight of the effect of micro/macro structure for SIC and related strength on poly isoprene rubber (46)						
12:25 - 13:35									Lunch & Networking	
13:35 - 14:00				Fernando Martin-Salamanca Low field, time domain NMR and mechanical properties as a combination of experimental techniques to achieve a unified physical framework to characterize rubber compounds (20)	Marie Yrieix Thermo-oxidation, ozonation and fatigue degradation of rubbers: how to replace 6PPD? (53)					
14:00 - 14:25	Chair: Martyn Bennett	Natalia Gajos Solvay Precipitated Silica: Sustainable Solutions To Improve Tire Rubber Performances To Reduce Environmental Footprint And Increase Circularity (34)	Chair: Jorge Lacayo-Pineda	Seiichi Kawahara Analyses of Crosslinking Junction, Strain-induced Crystallization and Mechanical Properties of Vulcanized Natural Rubber (51)	Chair: Toshio Tada	Noah Mentges Modelling the effects of process induced phase morphology on the mechanical response of thermoplastic vulcanisates under quasi-static loading using representative volume elements (29)	Chair: Anke Blume	Xiao Hu Damping properties of Butyl rubber vitrimers (65)		
14:25 - 14:50		Zenen Zepeda Rodriguez Structural Characterization Of Thermo-Mechanical Devulcanized Rubber From End-Of-Life Tires (39)		Thomas Rauschmann Steady shear viscosity measurements of filled rubber compounds using new enhanced RPA technology (68)		Lena Tarrach Model-Based Approach to Reinforcement by Filler and Rupture in Strain-Crystallizing Elastomer Networks (37)		Ulrich Giese Role and mechanisms of coagents in peroxide crosslinking optimizing the properties (80)		
14:50 - 15:15		David Kiroski Experimental Approach to Quantify the Energy Aspects of Mixing (54)		Jens Meier Pressure dependent viscosity of an EPDM/CB compound and relevance for injection molding (71)		Nico Stortini Predicting crack speed propagation in elastomeric membranes (38)		Yulan Lyu Fracture path modelling of hyperelastic porous structures inspired by mussel plaques (94)		
15:15 - 16:00									Refreshments & Networking	
16:00 - 16:25	Chair: Martyn Bennett	Kamyar Alavi Sustainability In Rubber Compounds:Nynas Conventional And Biobased Rubber Plasticisers (59)	Chair: Jorge Lacayo-Pineda	Andrej Lang Abrasion Characteristics of Elastomer Materials based on Tyre Tread Compounds (77)	Chair: Toshio Tada	Aaron Duncan Versatile New Model to Predict Ageing in Rubber Composites (61)	Chair: Ramakrishnan S	Daigo Matsuoka Introduction to Asahi Kasei's next-rubber SEBB (107)		
16:25 - 16:50		Jukka Koskinen Effect Of Lignin Dispersion To Abrasion Rate In Polybutadiene Rubber (78)		Vasileios Koutsos Rubber adhesion and friction: nanoscale mechanisms (83)		Merve Pehlivan Experimental Investigation And Modelling Of Adhesion Between Textile Cords And Rubber Compounds (87)		Luca Giannini Exploration of novel S-free Curatives for tyre compounds: Thermally Activable Bistetrazoles (113)		
16:50 - 17:00	Close of Day 1 Sessions									
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