

## Program for workshops and conference

Program on the webpage or the conference app is always updated

Monday, June 27, 2022				
08:00	Registration			
09:00	Workshop: Airport Pavement - Introduction to the ICAO ACR-PCR	Workshop: Usage of TSDDs at network level -what do we have,	Workshop: Railway Track Substructure Challenges	Workshop: Managing Impact of Frost on Pavement Systems
14:00 17:00	Workshop: Airport Pavement - Introduction to the ICAO ACR-PCR System Using FAARFIELD 2.0 Room: Cosmos 3A	DaRTS meeting Room: Cosmos 3B		
18:15 -19:00	Organ concert at Nidaros Cathedral. For those who want - we walk together to the Cathedral from the reception at 17.30. Return on your own after the concert.			

Tuesday, June 28, 2022				
08:00	Registration			
09:00	Opening, Inge Hoff, Conference Chair Rasmus S. Nordal distinguished lecture: Andrew Dawson Room: Cosmos 2			
10:00	Short break			
10:15	S1A: Frost and drainage Chair: Timo Saarenketo Room: Cosmos 3A	S1B: Case histories 1 Chair: Tomas Winnerholt Room: Cosmos 3B	S1C: Effects of climate change Chair: Susanne Baltzer Room: Cosmos 2	S1D: Structural design - new structures Chair: Lev Khazanovich Room: Cosmos 3C
	22, Unbound pavement materials' response to varying groundwater table analysed by falling weight deflectometer tests, Marit Fladvad	313: A feasibility study of reduction of cross-section size of railway tunnels in relation to construction costs and environment emissions, Britt Kari Moe, NTNU	262, Impact reinforcement A proven economic and ecological asphalt rehabilitation method, Carlton Ho, University of Massachusetts	38, Calibration reinforcement A proven economic and ecological asphalt rehabilitation method, Athanassios Papagiannakis, University of Texas at San Antonio
	253, Optimizing the effective particle diameter of crushed rock materials to mitigate the effect of convection in a pavement structure, Jean Côté, Université Laval	7, Field validation of SMA as a runway surface in Australia: case study on Emerald Airport, Greg White, University of the Sunshine Coast	252, Determining reinforcement A proven economic and ecological asphalt rehabilitation method, Markus Clauß, TU Dresden	111, Design reinforcement A proven economic and ecological asphalt rehabilitation method, Sven Agardh, Ramboll
	198, The Performance of Different Frost Protection Materials for Road Design, Karlis Rieksts, NTNU		194, New reinforcement A proven economic and ecological asphalt rehabilitation method, Ivan Campos-Guereta, The University of Nottingham	150, Validation reinforcement A proven economic and ecological asphalt rehabilitation method, Björn Kalman, VTI
	316, Freeze-thaw influence on the water retention capacity of silty sand subgrades, José Everton, VTI/KTH		72, Bio reinforcement A proven economic and ecological asphalt rehabilitation method, Ana Heitor, University of Leeds	
11:15	Coffee break - visit exhibitors			

Tuesday, June 28, 2022 continues				
11:45	<b>S2A: Measurement of traffic loading</b> <b>Chair: Dirk Jansen</b> <b>Room: Cosmos 3A</b>	<b>S2B: Full scale testing</b> <b>Chair: Pierre Hornyh</b> <b>Room: Cosmos 2</b>	<b>S2C: Policies on bearing capacity of roads</b> <b>Chair:</b> <b>Room: Cosmos 3C</b>	<b>S2D: Structural evaluation and performance prediction 1</b> <b>Chair: Benjamin Worel</b> <b>Room: Cosmos 3B</b>
	215, Contribution of dynamic vehicle loads to pavement failure, Dawid Rys, Gdansk University of Technology	102, Assessing the Usefulness of the Outer-Area Method in Quantifying the Structural Capacity of Full-Scale Composite Pavement Sections Subjected to Accelerated Pavement Testing, Yusuf Mehta, Rowan university	96, Plate load testing - Effects of in-situ conditions, test procedure and calculation method, Herbjörg Andresdottir, Sweco Norge AS	261, Analysis of evaluation and assessment procedures for the application of the TSD on asphalt pavements, Marko Čičković, HELLER Ingenieurgesellschaft mbH
	217, The Impact of Platooning Action on Asphalt Pavement: Monitoring on site, Paulina Leiva-Padilla, Université Gustave Eiffel	73, The impact of tracked farm vehicles upon small rural roads, Susanne Baltzer, Danish Road Directorate	93, The relationship between surface crack features and bearing capacity of the pavement, Hiroyasu Nakamura, Nippo Corporation	280, Composite Pavement Roughness Modeling for LTPP Wet Freeze Climate Region Using Machine Learning, Hakan Yasarer, University of Mississippi
	112, Characterizations of Super Heavy Loading Configuration for Flexible Pavement Analysis, Halil Ceylan, Iowa State University	273, Encapsulated bitumen rejuvenators for reflective cracking and ravelling mitigation, Alvaro Garcia Hernandez, University of Nottingham	6, Practical implications for the implementation of the new international aircraft pavement strength rating system, Greg White, University of the Sunshine Coast	81, Flexible Pavement Performance with Lime Treated Bases, Mena Souliman, University of Texas at Tyler
	77, Tire footprint analysis of agricultural vehicles for rural pavements, Lucio Salles, University of Pittsburgh	8, Laboratory and Full Scale Pavement Evaluation of Cracking Potential of Mixtures containing RAP, Fabricio Leiva, NCAT - Auburn University		40, Permanent Deformation and Fatigue Damage Interaction in Asphalt Concrete using Energy Approach, Mequanent Mulugeta Alamnie, University of Agder
			301, Compressive Strength of Concrete Using Different Field-Curing Methods, Pranshoo Solanki, Illinois State University	
13:00	Lunch			
14:00	<b>S3A: Modelling 1</b> <b>Chair: Imad Al-Qadi</b> <b>Room: Cosmos 3A</b>	<b>S3B: In situ measurements and condition surveys 1</b> <b>Chair: Jean Côte</b> <b>Room: Cosmos 3B</b>	<b>S3C: Traditional and recycled materials 1</b> <b>Chair:</b> <b>Room: Cosmos 3C</b>	<b>S3D: Structural evaluation and performance prediction 2</b> <b>Chair: Sigurdur Erlingsson</b> <b>Room: Cosmos 2</b>
	260, Characterization of interface between bituminous layers under shear loading cycles using 2T3C apparatus, Thien Nhan Tran, Uni. Lyon / ENTPE	20, Traffic Speed Deflectometer measurements at the Aurora instrumented road test site, Pauli Kolisoja, Tampere University	172, Waste Paper Ash as an Alternative Binder to Improve the Bearing Capacity of Road Subgrades, Juan Jose Cepria, ACCIONA Construction	278, International Roughness Index Model for Jointed Reinforced Concrete Highway Pavements: An Artificial Neural Network Application, Hakan Yasarer, University of Mississippi
	271, Manufacture of asphalt concrete virtually by physics engine and algorithm generation, Alvaro Garcia Hernandez, University of Nottingham	51, Reducing the Rut Depth of a Thin-paved Road by Controlling the Driving Lines of Heavy Trucks, Nuutti Vuorimies, Tampere University	216, Experiences with the use of stabilisation geogrids demonstrating an improvement in bearing capacity of recycled materials, Kasia Zamara, Tensar	141, Follow up on Reduced Thickness of Asphalt Concrete Layers on a Performance Specifications Contract, Carl Lenngren, AFRY Infrastructure
	248, Modeling of Asphalt Mixture Based on Aggregate Morphology Distribution Using the Contact Dynamics Method, Haitao Ge, University of Strabourg	52, Evaluating the Cost Effectiveness of Using Various Types of Stabilized Base Layers in Flexible Pavements, Yusuf Mehta, Rowan university	36, Evaluating the effect of mineralogy and mechanical stability of recycled excavation materials by Los Angeles and micro-Deval test, Solomon Adomako, University of Agder, Norway	295, Performance Evaluation of Composite Pavements on Mississippi Highways via Machine Learning, Hakan Yasarer, University of Mississippi
		166, Using Non-Destructive Test to validate and calibrate smart sensors for urban pavement monitoring, Filippo G Pratico, University Mediterranea of Reggio Calabria	4, Comparing asphalt modified with recycled plastic polymers to conventional polymer modified asphalt, Greg White, University of the Sunshine Coast	
		46, Developing high performance asphalt mixtures with considerable amounts of recycled asphalt with a new chemical bitumen additive, Nicolás Carreño, Institut of Highway Engineering RWTH Aachen Germany		
15:30	Coffee break - visit exhibitors			

Tuesday, June 28, 2022 Continues				
		<b>S4B: Case histories 2</b> <b>Chair: Navneet Garg</b> <b>Room: Cosmos 3B</b>	<b>S4C: Traditional and recycled materials 2</b> <b>Chair: Johan Ullberg</b> <b>Room: Cosmos 3A</b>	<b>S4D: Structural evaluation and performance prediction 3</b> <b>Chair: Asmus Skar</b> <b>Room: Cosmos 2</b>
16:00		249, Impact of extreme robust hydraulic bound base course made by cold recycling in situ on performance and homogeneity of reconstructed pavement from bearing capacity point of view, Zsolt Boros, STRABAG - TPA	139, Preparation of artificial aggregate to be used in the asphalt mixture, Hao Chen, Norwegian University of Science and Technology	167, Microwave deep healing of road pavements: preliminary numerical results, Filippo G Pratico, University Mediterranea of Reggio Calabria
		11, Improving the bearing capacity and all-weather trafficability of Australian soils, Michael Farrar, Quantum Ground Stabilisation P	56, Fundamental Study on Combined Aging for Warm-Mixed Asphalt and RAP-WMA Mixtures using SATS Conditioning, Masahiko Iwama, Yokohama National University	311, Pavement Structural Performance: Predicting Remaining Life Using Rapid Non-Destructive Testing, Lily Grimshaw, Geosolve Ltd
				152, New backcalculation method to obtain viscoelastic properties of asphalt pavement from HWD tests, Jean-Marie Rousset, Civil Aviation Technical Centre

Wednesday, June 29, 2022				
09:00	Keynote speaker Erol Tutumluer: Railroad Ballast: A Fascinating Geomaterial – Its Behavior and Enhancement Room: Cosmos 2 Chair: Leif Barløkk			
10:00	Short break			
10:15	<b>S5A: Railway</b> <b>Chair: Albert Lau</b> <b>Room: Cosmos 3A</b>	<b>S5B: In situ measurements and condition surveys 2</b> <b>Chair: Jose Everton</b> <b>Room: Cosmos 3B</b>	<b>S5C: Traditional and recycled materials 3</b> <b>Chair: Andrew Dawson</b> <b>Room: Cosmos 3C</b>	<b>S5D: Structural evaluation and performance prediction 4</b> <b>Chair:</b> <b>Room: Cosmos 2</b>
	288, Modeling the loading behavior of railway structure under static load using a verified 3D finite element model, Marko Peltomäki, Tampere University	171, Systematic Use of Transport Infrastructure Non-Destructive Assessment and Remote Sensing, Luca Bianchini Ciampoli, Roma Tre University	85, Characterization of multiple recycled reclaimed asphalt incorporating polymer modified bitumen, Iswandaru Widyatmoko, AECOM	13, PEHKO-project – Using Bearing Capacity Analysis as a Tool for Proactive Maintenance of Paved Roads, Tomi Herronen, Roadscanners Oy
	180, Investigation of Local Rail Track Deterioration due to Sleeper Support Condition Variation, Norbert Lillin, Technical University of Munich	134, Intelligent Pavement Assessment Vehicle for Structural and Functional Evaluation of Road Pavements, Bjarne Schmidt, ARRB Systems AB	304, Assessment of construction and demolition waste materials for sublayers of low traffic rural roads, Sajjad Pourkhorshidi, University of Bologna	232, Sleeper Contact Modelling in Asphalt Overlayment Trackbeds, Eyal Levenberg, The Technical University of Denmark
	319, Numerical modelling of the evolution of differential settlement of railway tracks, David P Connolly, University Of Leeds	88, Flexible strain sensing plate for determination subgrade elastic modulus, Asmus Skar, Technical University of Denmark (DTU)	268, Comparison of Field and Laboratory Mix Performance, Daba Gedafa, University of North Dakota	300, Prediction of asphalt pavement responses under moving loads with nonuniform tire footprints using the Fourier finite layer method, Gustavo Canon Falla, Technische Universität Dresden
			268, Comparison of Field and Laboratory Mix Performance, Daba Gedafa, University of North Dakota	48, Impact of introducing longer and heavier vehicles on the bearing capacity of pavement subgrades, Shafiqur Rahman, Swedish National Road and Transport Research Institute
11:15	Coffee break - visit exhibitors			

Wednesday, June 29, 2022				
11:45	<b>S6A: Airports</b> Chair: Michael Broutin Room: Cosmos 3A	<b>S6B: In situ measurements and condition surveys 4</b> Chair: Erol Tutumuler Room: Cosmos 3B	<b>S6C: Traditional and recycled materials 4</b> Chair: Eyal Levenberg Room: Cosmos 3C	<b>S6D: Structural evaluation and performance prediction 5</b> Chair: Sabine Leischner Room: Cosmos 2
	190, Estimating Asphalt Concrete Strains in Airport Pavements Using Geometric Property of the Pavement Surface Deflection Basin from Heavy Weight Deflectometer Tests, Navneet Garg, Federal Aviation Administration	205, InSAR Analysis of C-band Data for Transport Infrastructure Monitoring, Luca Bianchini Ciampoli, Roma Tre University	310, Estimation of durability of new surface courses using accelerated load test and expert's opinions, Björn Kalman, VTI	61, Proposed Damage Risk Assessment of Pavement Subsurface Cavities Using the Rolling Dynamic Deflectometer, Aldous Madlangsakay, Sejong University
	264, Polymer modified bitumen for runways containing 60% recycled asphalt, Kees Plug, Strukton Civiel regio west bv	199, Too late snow wall removal as an enabler of rapid edge deformations - results from Aurora instrumented road sections on road E8 in Finland, Pauli Kolisoja, Tampere University	265, Effect of Bio Heating Oil from Biodiesel Production on Rheological Behaviour of Bitumen, Marina Maria Cabette, University of Minho	5, Introducing dynamic modulus to flexible airport pavement thickness design, Greg White, University of the Sunshine Coast
	82, Machine Learning Solutions for Development of Performance Deterioration Models of Flexible Airfield Pavements, David R. Brill, Federal Aviation Administration	175, Evaluation of interface bonding condition on mechanical responses of full-scale asphalt pavements with and without grid reinforcement, Xuan Quy Le, Gustave Eiffel University	9, E* Master Curve Parameters as Indicators of Cracking Susceptibility of Mixtures with Recycled Asphalt Shingles, Fabricio Leiva, NCAT - Auburn University	23, The Influence of Asphalt/Base Modulus Ratio on Strain Mode Reversal in Flexible Pavements, Megan Foshee, Auburn University
	235, Analytical study on structural remaining life of airfield pavement using FWD, Fernando Varela Soto, Universidad Politécnica de Madrid		158, Aspects Concerning the Structural Evaluation of Non-conventional Pavements, Vasilis Papavasiliou, National Technical University of Athens (NTUA)	59, Development of simplified models to assess pavement structural condition on network level, Matteo Pettinari, Vejdirektoratet
			64, Bio-based emulsifiers for pavement material: emulsion formulation and cold asphalt mix properties, Fanny Lévenard, Université Gustave Eiffel	47, Modelling permanent deformation of unbound layers of pavements, Shafiqur Rahman, Swedish National Road and Transport Research Institute
13:00	Lunch			
14:00	Keynote speaker: 322, Recent advances in railway track dynamics and settlement, David P Connolly, University Of Leeds Chair: Helge Mork Room: Cosmos 2			
14:45	Coffee break - visit exhibitors			

Wednesday, June 29, 2022				
	<b>S7A: Modelling 2</b> Chair: Marit Fladvad Room: Cosmos 3A	<b>S7B: In situ measurements and condition surveys 3</b> Chair: Pranshoo Solanki Room: Cosmos 2	<b>S7C: Reinforcement of road structures</b> Chair: Pauli Kolisoja Room: Cosmos 3C	<b>S7D: Traditional and recycled materials 5</b> Chair: Greg White Room: Cosmos 3B
	212, Modelling the resilient modulus of cement-stabilized quarry fines using element-wise calculation, Daniel Castillo, Aalto University	312, Monitoring of a timber pile-supported road embankment, Per Gunnvard, Luleå University of Technology	169, Analytic analysis of a grid-reinforced asphalt concrete overlay, Eyal Levenberg, The Technical University of Denmark	267, Investigating the Use of Fly Ash for Sustainable Asphalt Binders, Daba Gedafa, University of North Dakota
15:15	181, Effective experimental characterization of the non-linear elastic deformation behavior of unbound granular materials, Sabine Leischner, TU Dresden	246, Correlation between LWD and FWD Deflections for Asphalt Pavement, Auckpath Sawangsuriya, Department of Highways	207, Ethylene-Octene-Copolymer as an Alternative to Styrene-Butadiene-Styrene Bitumen Modifier, Arturs Riekstins, Riga Technical University; Latvian State Roads	275, Resilient and permanent deformation of foam glass aggregates assemblies, Jean-Pascal Bilodeau, Laval University
	75, Construction of Asphalt Mixture Master Curves for a Norwegian Mechanistic-Empirical Pavement Design System, Hao Chen, Norwegian University of Science and Technology	108, Use of Field and Laboratory Measurements for Estimating Pavement Layer Coefficients, Jian-Shiuh Chen, National Cheng Kung University	233, Ultra-thin whitetopping for asphalt pavement rehabilitation: the influence of the interlayer in the properties of the double-layered system, Andrea Baliello, University of Padova	259, High content of Reclaimed Asphalt Pavement (RAP) in Asphalt Mixtures – Optimal use of Rejuvenators, Sara Anastasio, Norwegian Public Road Administration
		218, In situ measurements of deflections on an instrumented pavement section using geophones, Natasha Bahrani, University Gustave Eiffel	307, Laboratory fatigue assessment of large geocompositereinforced double-layered asphalt concrete beams, Piotr Jaskula, Gdansk University of Technology	258, Study of the mechanical behaviour and self-cementing properties of recycled crushed concrete aggregates, Chong Wang, INSA STRASBOURG
19:00	<b>Conference Dinner at the Conference venue.</b> <b>Apertiff in the mingle area at 19.00. We enter the dinner area at 19.30.</b> <b>Business Casual</b>			

Thursday, 30 June, 2022			
09:00	Keynote speaker: (323) Research and innovation for the benefit of greener and more sustainable airfield pavements, Michael Broutin, Aviation Chair: Leif Bakløkk Room: Cosmos 2		
09:45	Short break		
	<b>S8A: Modelling 3</b> Chair: Sara Anastasio Room: Cosmos 3A	<b>S8B: Traditional and recycled materials 6</b> Chair: Joralf Aurstad Room: Cosmos 3B	<b>S8C: FWD and TSD</b> Chair: Helge Mork Room: Cosmos 2
	71, Development of a Method to Evaluate Air Voids Content of Drilled Porous Asphalt Mixture Cores using Non-Destructive X-ray Computed Tomography, Sigurdur Erlingsson, VTI (Swedish National Road and Transport Research Institute)	213, Manufacturing and characterization of asphalt binders designed on the bases of polymer modified bitumen with cement by-pass dust and fly ash, Arturs Riekstins, Riga Technical University; Latvian State Roads	255, Indication of viscoelastic behaviour of asphalt pavements using FWD time history data, Zsolt Boros, STRABAG - TPA
	239, Viscoelastic Characterization and Comparison of Norwegian Asphalt Mixtures using Dynamic Modulus and IDT Tests, Mequanent Mulugeta Alamnie, University of Agder	320, Performance Characteristics of Pavement Sub-base Containing Steel Slag, Mahabir Panda, National Institute of Technology Rourkela	37, FWD Time-History Data for the Evaluation of Concrete Slab Stability, Carl Van Geem, Belgian Road Research Centre
10:00	29, IFC Development for BIM Application to Railway Projects, Simona Fontul, LNEC and Nova University of Lisbon	296, Stabilization of Expansive Clays using Recycled Glass, Hakan Yasarer, University of Mississippi	70, FWD quality assurance in Germany, Dirk Jansen, Federal Highway Research Institute (BAST)
	303, Modelling the permanent strains measured by in-situ cyclic light weight deflectometer for silty sand subgrade soil, Dina Kuttah, Swedish National Road and Transport Research Institute (VTI)	284, Analysis of Low Temperature Relaxation Properties of Asphalt Binder and Asphalt Mastic Using a Dynamic Shear Rheometer, Johannes Büchner, Technische Universität Braunschweig	148, Traffic Speed Deflectometer measurements on runway 04L-22R at Copenhagen Airport, Marshall Arokia, Greenwood Engineering
	74, Experimental investigation on rheological property of bitumen with different preparation times, Xuemei Zhang, Norwegian University of Science and Technology		31, Influence of driving speed on Traffic Speed Deflectometer data - Field test and parameter study, Claudia Podolski, BAST (Federal Highway Research Institute)
			201, Comparison of RAPTOR Measurements with Falling Weight Deflectometer Deflections using Backcalculation, Stine Skov Madsen, Ramboll
11:45	Short break		
12:00	Closing session - Room: Cosmos 2		
13:00	Lunch Thursday Lunch in the Restaurant, or grab a lunch bag to go.		