



RehabStructures2015

International Conference on Recent Advances in
Rehabilitation and Sustainability of Structures

University of the Azores, Ponta Delgada, Azores, Portugal, 01 - 02 June 2015



PROGRAMME

	Monday: 01/06/2015 – Amphitheater C – Building 5	Tuesday: 02/06/2015 - Amphitheater C – Building 5
09:15 – 09:30	OPENING CEREMONY	
09:30 – 10:15	PLENARY SESSION I <i>LIFE-CYCLE PERFORMANCE OF AGING STRUCTURES CONSIDERING RISK AND SUSTAINABILITY</i> <i>Prof. Dan M. Frangopol, Lehigh University, USA</i>	PLENARY SESSION III <i>LIFE-CYCLE CONSIDERATIONS IN THE OPTIMUM DESIGN OF CABLESTAYED BRIDGES</i> <i>Prof. Luís M. C. Simões – University of Coimbra, Portugal</i>
10:15 – 11:00	PLENARY SESSION II <i>DETERIORATION AND REPAIRING OF CONCRETE STRUCTURES CASE STUDIES</i> <i>Prof. Júlio Appleton, IST, University of Lisbon, Portugal</i>	Session IV Structural Glass I
11:00 – 11:30	Coffee-Break	
11:30 – 12:45	Session I Models for the Analysis and Rehabilitation of Structures I	Session V Non-Structural Rehabilitation of Constructions
12:45 – 14:30	Lunch	
14:30 – 16:00	Session II Models for the Analysis and Rehabilitation of Structures II	Session VI Materials and Connections in Sustainable Structures
16:00 – 16:30	Coffee-Break	
16:30 – 17:30	Session III Health Monitoring Models and Techniques	Session VII Structural Glass II [17:45 H] Closure
20:00 – 23:00	Conference Dinner	

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Opening Ceremony: 09:15 – 09:30

SP I	<p>PLENARY SESSION I – CHAIR: Prof. Helena Barros <i>LIFE-CYCLE PERFORMANCE OF AGING STRUCTURES CONSIDERING RISK AND SUSTAINABILITY</i> <i>Prof. Dan M. Frangopol, Lehigh University, USA</i></p>	09:30 10:15
SP II	<p>PLENARY SESSION II – CHAIR: Prof. Carla Ferreira <i>DETERIORATION AND REPAIRING OF CONCRETE STRUCTURES - CASE STUDIES</i> <i>Prof. Júlio Appleton, IST, University of Lisbon, Portugal</i></p>	10:15 11:00

Session I : Models for the Analysis and Rehabilitation of Structures I, 11:30 – 12:45		
CHAIR: Prof. Carla Ferreira		
ID	COMMUNICATION TITLE	AUTHORS
A01	Damage Detection of Reinforced Concrete Columns Retrofitted With Frp Jackets By Using PZT Sensors	Efi Tzoura, Thanasis Triantafillou, Costas Providakis
A07	Comparison of Model Updating Techniques Using Strain Sensor Outputs to Detect Damages in a 8 Meter Post-Tensioned Concrete Beam	J. Waeytens, B. Rosic, M.P. Limongelli, P.E Charbonnel, E. Merliot, D. Siegert, X. Chapeleau, R. Vidal, V. Le Corvec, L.M. Cottineau
A14	Bond Failure of FRP in Nonlinear Analysis of Shear Strengthened Concrete Beams	Denise Ferreira, Eva Oller, Antonio Marí, Jesus M. Bairán
A23	Seismic Evaluation of Environmentally Degraded FRP-Strengthened Masonry Walls	Bahman Ghiassi, Paulo B. Lourenço, Daniel V. Oliveira
A17	The Basilica of Collemaggio in L'aquila: Seismic Assessment Analysis	P. Crespi, A. Franchi, N. Giordano, P. Ronca, M. Scamardo

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Session II : Models for the Analysis and Rehabilitation of Structures II, 14:30 – 16:00		
CHAIR: Prof. Helena Barros		
ID	COMMUNICATION TITLE	AUTHORS
A26	Experimental Study on Masonry Infill Reinforced Concrete Frames with a Low Aspect Ratio	Andrés Belda, Luis Pallarés, Francisco Pallarés, Ottavia Corbi, Ileana Corbi
A50	Experimental Investigation About Seismic Isolation of Masonry Infills	Francisco Pallarés, Luis Pallarés, Javier Orozco, Ignacio Ferrer
A44	Cross-Sectional Behaviour of Rubberized Concrete Filled Steel Tubes, Made from Recycled Tires	António Duarte, Bruna Silva, Nuno Silvestre, Jorge de Brito, Eduardo Júlio
A05	A Sustainable Deconstructable Steel-Concrete Composite Framed System with Recyclable Beam and Slab Components	Mark Bradford, Alireza Ataei, Xinpei Liu
A37	Closed Form Moment-Curvature Relation for Rectangular Reinforced Concrete Section	C. C. Ferreira, H. Barros, T. Marques, P. Simão

SESSION III : Health Monitoring Models and Techniques, 16:30 – 17:30		
CHAIR: Prof. J. Infante Barbosa		
ID	COMMUNICATION TITLE	AUTHORS
A41	An Efficient RBF Interpolation Method to Reconstruct and Analyze Structures Represented through Unstructured Data	Gonçalo Bernardo, Amélia Loja
A13	Inverse Structural Analysis of Noise-Insulating Walls Based on Discrete Measurements using a Simplified Mechanical Approach	Michael Drass, Jens Schneider, Matthias Becker
A53	Surface Reconstruction from Unorganized Point Cloud Via Virtual Structured Mesh	José A. Rodrigues, Amélia Loja
A09	Assessment of the Structural Health of Heritage Constructions Based on the Changes of Frequency	Héctor Animas, Jesús Pacheco, José Ángel Ortiz

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SP III	PLENARY SESSION III – CHAIR: Prof. Amélia Loja <i>LIFE-CYCLE CONSIDERATIONS IN THE OPTIMUM DESIGN OF CABLESTAYED BRIDGES</i> Prof. Luís M. C. Simões – University of Coimbra, Portugal	09:30 10:15
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SESSION IV : Structural Glass I, 10:15 – 11:00		
CHAIR: Prof. Sandra Jordão		
ID	COMMUNICATION TITLE	AUTHORS
A52	Rehabilitation of Glass Load Bearing Structures	S. Jordão, I. Costa Neves, M. Pinho
A11	Thermal Load Analysis of Insulating Window Systems	N. Penkova, I. Zashcova, I. Kassabov, V. Iliev, P. Naydenova
A22	Developing an Android Application for Structural Glass Design	Imre Vekov, Sandra Jordão, Aldina Santiago

SESSION V : Non-Structural Rehabilitation of Constructions, 11:30 – 12:45		
CHAIR: Prof. Isabel Torres		
ID	COMMUNICATION TITLE	AUTHORS
A02	Sustainable Mortars for Rehabilitation of Old Plasters	Isabel Torres, Gina Matias
A31	Drying Out Walls after a Flood: Influence of the Presence of Rising Damp	Isabel Torres, Ó López
A46	Thermal Rehabilitation of Old Buildings: Thermal Inertia or/and Thermal Isolation	A. Ramos, J. Silva
A47	Seismic Vulnerability Assessment of Traditional Masonry Buildings: The Relevance of Effective Seismic Strengthening Policies	Tiago Ferreira, Rui Maio, Romeu Vicente

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SESSION VI : Materials and Connections in Sustainable Structures, 14:30 – 16:00		
CHAIR: Prof. Luís C. Simões		
ID	COMMUNICATION TITLE	AUTHORS
A55	Innovative Concrete-to-Concrete Steel Connectors: Numerical Simulation	Gonçalo Duarte, João P. Martins, José Raposo, Luís Costa Neves, Eduardo S. Júlio
A56	Innovative Concrete-to-Concrete Steel Connectors: Experimental Validation	João P. Martins, Gonçalo s. Duarte, José Raposo, Luís Costa Neves, Eduardo S. Júlio
A08	FEM Applied to Rammed Earth Masonry Brazilian Historical Structures	Márcia H. Y. Sato, Reyolando M. L. R. F.
A04	The Stop-Splayed and Tabled Scarf Joint with Wedge in Timber Carpentry. Properties and Strenghtening with Bio-FRP Technique	M. Paradiso, E. Perria
A38	Ultimate Load Capacity of Eccentrically Compressed RC-Columns Under Fire	V. Dias Silva, M.H.F.M. Barros, C. Ferreira

SESSION VII : Structural Glass II, 16:30 – 17:30		
CHAIR: Prof. Sandra Jordão		
ID	COMMUNICATION TITLE	AUTHORS
A34	Experimental Behaviour of Glass Fins Subjected Tt Thermal Loading	S. Jordão, C. Lopes, A. Santiago, M. Pinho
A35	Experimental Behaviour of Glass Fins Subjected to Cyclic Loading	S. Jordão, C. Tavares, A. Rebelo, M. Pinho
A45	Structural Behaviour of Pre-Stressed Hybrid Steelglass Beams	F. Firmo, S .Jordão, L. Costa Neves, A. Gonçalves, C. Ferreira

[17:45 H] Closure

Information about Submissions to Special Issue