

Session ID: SDM-12

Title

RELIABLE AND EFFICIENT MODELS FOR NONLINEAR SEISMIC ANALYSES OF RC STRUCTURES

Convenors

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Description

Nonlinear analysis methods for Nonlinear Seismic Analyses of RC Structures can potentially reproduce the static and dynamic behavior of structures until collapse is reached. In recent years, the research world has devised increasingly sophisticated computational methods, and the continuing development of computational programs has allowed researchers and professionals to gain extensive experience with nonlinear analyses. The application of these advanced methods to real problems, however, has raised several questions about the procedures defined by standards and the selection of appropriate computational models, even in view of the limitations of currently available computational codes.

There is a need to gain more experience in explaining the dynamic behavior of more complex and real structures and to develop reliable and efficient models and tools to manage and interpret the large amount of complex input and output data generated by the analyses of actual structures.

The ReLUIS university consortium has invested a large amount of effort in this direction in Italy after the earthquakes of the last two decades. This led to the proposal of this technical session which aims to stimulate a wide discussion on future developments on Reliable and efficient Models for Nonlinear Seismic Analyses of RC Structures.

Invited Speakers

J. Restrepo ⁴, A. Barbosa ⁵, R. De Risi ⁶, B. Izzudin ⁷, M. Kwon ⁸, D. Lehman ⁹, X. Lu ¹⁰, K. Kolozvari ¹¹, J. Conte ⁴

Affiliations

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