



Press release

## **SUCCESS FOR THE TECHNICAL UNIVERSITY OF CLUJ-NAPOCA STUDENTS AT SEISMIC DESIGN COMPETITION, FEBRUARY 10-12, SAN DIEGO, USA**

The Earthquake Engineering Research Institute (EERI) hosts each year the Seismic Design Competition (SDC), aimed at promoting the study of seismic engineering amongst students at graduate and post-graduate level. This year's competition took place in San Diego, USA and gathered participants from 28 universities, from USA and abroad. The team of students from the Technical University of Cluj-Napoca encountered teams from top universities such as Oregon State University, University of California - San Diego, Berkley University, Purdue University, British Columbia Institute of Technology - Canada.

The team consisted of 4<sup>th</sup> year students from the Faculty of Civil Engineering, namely Ioan Alexandru Manea, team captain, Ioana Hategan, Artur Auner, Daniela Selagea, Ovidiu Serban and Adrian Borsa, tutored by professors Doina Verdes, Ph.D. and Pavel Alexa, Ph.D. from the Faculty of Civil Engineering.

The students designed and built a 1:72 scale balsa wood building model, representing a 29-story building named "Valahia Tower", equipped with friction dampers to dissipate the seismic energy. The model was subjected to tests on the shake table (three accelerograms) and was evaluated according to design performance criteria. Following the theoretical presentation and tests on the model, the team received the Egor Popov Award for Structural Innovation.

The 1<sup>st</sup>, 2<sup>nd</sup> and 3<sup>rd</sup> prizes went to the Oregon State University, the California Polytechnic State University from San Luis Obispo, and the University of Illinois Urbana Champaign. The Richter Award for the Spirit of the Competition was awarded to UC Davis, while the Fazlur Khan Award for Architectural Design went to the San Jose State University.

Participating in the competition allowed the students to develop skills such as: building a model, producing and delivering a presentation in a foreign language, working and communicating within an international team, researching seismic engineering in an international context. The competences accumulated include: designing a building according to the principles of seismic and performance-based design, as well as designing seismic energy dissipation devices.



The UTCN delegation before the test of the “Valahia Tower” model at the Seismic Design Competition, February 10-12, San Diego, USA



The award ceremony: the UTCN delegation receives the “Egor Popov” award for structural innovation, with Mr. L Thomas Tobin, EERI President–Elect.



The award ceremony: the UTCN delegation with Mr. Karthik Ramanathan (Co-President, GaTech), Arash Khosravifar (Co-President, UCD)



The award ceremony: the UTCN delegation with Mr. Nima Tafazzoli from Seismic Design Competition Chair, University of California, Davis.