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UNIVERSITYP.C. ROSSIN COLLEGE
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CEE STUDENT WINS CERRA AWARD

You Dong, Ph.D. candidate in structural engineering within the department of **civil and environmental engineering (CEE)** has been named as a recipient of the **International Civil Engineering Risk and Reliability Association (CERRA)** Student Recognition Award. Dong was recognized for a paper co-written with professor **Dan M. Frangopol** entitled "*Risk, Resilience, and Sustainability Assessment of Infrastructure Systems in a Life-Cycle Context Considering Uncertainties.*"

The paper presents a methodology for the risk, resilience, and sustainability assessment of highway bridges under seismic hazard in a life-cycle context. The results can be used in design, maintenance, and retrofit optimization processes of civil infrastructure systems, such as bridges, under extreme events. The proposed approach is illustrated on an existing bridge located in California.

The award, offered by an international jury in recognition of scientific contributions and personal merits of student researchers, includes free registration and a monetary gift to cover a portion of the travel costs for attending the 12th **International Conference on Applications of Statistics and Probability in Civil Engineering (ICASP 12)**, to be held in Vancouver, Canada, July 12-15, 2015. A check and diploma will be presented to Dong during the conference.

Currently, Dong is a P.C. Rossin Doctoral Fellow and a research assistant in the department of civil and environmental engineering. Frangopol, the Fazlur R. Khan Endowed Chair of Structural Engineering and Architecture, serves as his dissertation advisor. Dong's Ph.D. thesis is provisionally entitled "*Life-Cycle Risk Assessment and Management of Structural Systems under Low-Probability High-Consequence Events: Application to Highway Bridges, Naval Ships and Highway Bridge Networks.*"

After earning his doctoral degree, Dong plans to remain on the cutting edge of structural engineering, gaining experience as a post-doctoral researcher before finding a faculty position at a university or research institution at the forefront of the field. He feels fortunate to work with Frangopol, an internationally-recognized research innovator who has helped lead the profession's approach to managing the life-cycle performance of civil and marine infrastructure systems under uncertainty with emphasis on bridges, naval ships and bridge networks. Frangopol's contribution to the structural engineering field also includes the investigation of the associated trade-offs and optimum risk-informed decisions that are impacted by interwoven financial, social and environmental, conditions over the lifetime of deteriorating structures.

"Professor Frangopol's dedication to the field, his deep knowledge, high standards and great enthusiasm have made him a constant source of motivation during my graduate studies," said Dong.

-Geri Kery is the coordinator with the office of the Fazlur R. Khan Endowed Chair of Structural Engineering and Architecture.

Related Links:

- [Website: International Civil Engineering Risk and Reliability Association \(CERRA\)](#)
- [Website: International Conference on Applications of Statistics and Probability in Civil Engineering \(ICASP 12\)](#)
- [Profile: Dr. Dan M. Frangopol](#)
- [Department of Civil and Environmental Engineering](#)



You Dong, Ph.D. candidate with the department of civil and environmental engineering (CEE)