### **EDUCATION**

### Northeastern University

Boston, MA

Doctoral Candidate; GPA: 3.67

Sept. 2016 - Expected May 2019

### University of Massachusetts Lowell

Lowell, MA

• M.S. in Civil and Environmental Engineering (Structural Engineering); GPA: 4.00 B.S. in Civil and Environmental Engineering; GPA: 3.98 Sept. 2015 - May 2016

Sept. 2011 - May 2015

#### Professional and Research Experience

## Northeastern University

Boston, MA

Structural Engineering Graduate Research Assistant

September 2016 - Present

- Developed a performance based engineering approach to the analysis of nonstationary winds using the wavelet-Galerkin method for numerical solution
- Conducted wind tunnel experiments to physically simulate the gust-front of an impinging downdraft and its effects on a standard tall building model

Teaching Assistant

September 2017 - May 2018

Provided assistance for Steel Design courses. Graded homework and held office hours for students

# GCP Applied Technologies

Cambridge, MA

Research Intern

June 2016 - August 2016

• Performed image analysis and data clustering techniques for the improvement of quality control for concrete mixes and the mitigation of the environmental impact of concrete production

## University of Massachusetts Lowell

Lowell, MA

Structural Engineering Research Assistant

May 2013 - May 2016

• Involved in the multiphysical nondestructive evaluation of cementitious composites using microwave imaging radar, ultrasonic testing, dielectric measurements with a contact probe, and an unmanned aerial vehicle (UAV)

# PUBLICATIONS AND PRESENTATIONS

- Le, V.; Caracoglia, L. (2018). "Computationally Efficient Stochastic Approach for the Fragility Analysis of Vertical Structures Subjected to Thunderstorm Downburst Winds." *Engineering Structures*. 165: 152-169.
- Le, V.; Caracoglia, L. (2017). "A Preliminary Examination of Structural Fragility for a Vertical Cantilever Structure Subjected to Thunderstorm Downburst Loading." Paper Presented at 13<sup>th</sup> ACWE Conference, Gainesville, Florida.
- Le, V.; Yu, T.-Y.; et al. (2016). "Sizing and Ranging Criteria for SAR Images of Steel and Wood Specimens." Paper
  presented at 2016 SPIE Conference SPIE Smart Structures and Nondestructive Evaluation Conference, Las Vegas,
  Nevada.
- Le, V.; Yu, T.-Y., (2015). "Mass and Stiffness Estimation using Mobile Devices for Structural Health Monitoring." Paper presented at 2015 SPIE Smart Structures and Nondestructive Evaluation Conference, San Diego, California.

#### SOFTWARE SKILLS

- Proficient: MATLAB, Microsoft Office, Python, AutoCAD
- Working Knowledge: C++, SQL, LabView, GTStrudl, MathCAD

## Awards and Honors

• Northeastern University - College of Engineering Dean's Fellowship

May 2016

• American Concrete Institute (ACI) - Kumar Mehta Scholarship

May 2016

• U.S. Department of Energy - Integrated University Program Fellowship

May 2015