

## VICTORIA G. BENNETT

*Rensselaer Polytechnic Institute*

E-mail: [bennev@rpi.edu](mailto:bennev@rpi.edu)

### AREAS OF EXPERTISE

Radar Remote Sensing for Ground Deformation Monitoring, 3D Advanced Field Sensors, Full-scale Shake Table Testing, Wireless Data Acquisition Systems, Field Instrumentation, Slope Stability

### EDUCATION

**Rensselaer Polytechnic Institute**, Troy, NY

Doctor of Philosophy - Civil Engineering (Geotechnical Engineering) 2005 – 2010

*Dissertation: Development of a MEMS-Based In-Place Inclinator-Accelerometer Array for Monitoring and Evaluation of Geotechnical Systems*

Master of Engineering - Civil Engineering 2004 – 2005

Bachelor of Science - Civil Engineering 2000 – 2004

### APPOINTMENTS

**Rensselaer Polytechnic Institute**, Troy, NY 2013-present

*Assistant Professor*

**Rensselaer Polytechnic Institute**, Troy, NY 2010-2013

*Center for Earthquake Engineering Simulation – Research Assistant Professor and Project Manager*

- Post-doctoral work and project manager for \$7 million NIST-TIP grant for ‘**Development of a Multi-Scale Monitoring and Health Assessment Framework for Effective Management of Levees and Flood-Control Infrastructure Systems.**’ The project aims at monitoring and assessing large, distributed infrastructure systems in varying stages of deterioration, which are critical for extend the lives of these critical systems and in the development of sustainable systems.
- Incorporation of NSF TUES-Type 1 Project, ‘**A Multi-Institutional Classroom Learning Environment for Geotechnical Engineering Education,**’ into Experimental Soil Mechanics Course with U. El Shamy (PI) at Southern Methodist University and M. Pando (co-PI) at U. of North Carolina-Charlotte.
- Manage technical journal editor activities for ASCE Journal of Geotechnical and Geoenvironmental Engineering (JGGE) and Intl. Journal of Physical Modeling in Geotechnics (IJPMG).
- Course development and co-teaching with Dr. Tarek Abdoun for undergraduate course, ‘Experimental Soil Mechanics.’ (Spring 2011, 2012)

**Rensselaer Polytechnic Institute**, Troy, NY 2007-2010

*Center for Earthquake Engineering Simulation – Education and Outreach Coordinator / Part-time PhD student*

- Managed and analyzed transmitted data from previously installed field SAAs, including both vertical and horizontal applications, in addition to installing several new SAAs. A particularly interesting field site was an active slope failure through a new NYSDOT highway construction.
- Worked on SAA installation and operation for full-scale laminar container tests at the University at Buffalo as part of NEESR-SG Project: Experimental and Micromechanical Computational Study of Pile Foundations Subjected to Liquefaction-Induced Lateral Spreading.
- Developed CEES-related course curriculum and K-12 outreach activities.
- Worked with Dr. Tarek Abdoun and Dr. Inthuorn Sasanakul on preparing NEES project financial and technical report.
- Managed technical journal editor activities for Canadian Geotechnical Journal and ASCE Journal of Geotechnical and Geoenvironmental Engineering.

**Rensselaer Polytechnic Institute**, Troy, NY

2006-2007

*Graduate Research Assistant*

- Worked on initial laboratory calibration testing of ShapeAccelerationArray (SAA) in-place inclinometer-accelerometer system, including several iterations of design. Measurand Inc now manufactures this instrumentation system.
- Installed first SAA in situ applications at three field sites: unstable slope along California coastline, state-of-the-art retaining wall design, and bridge replacement over a very soft clay deposit.
- Installed and monitored two SAA systems in full-scale laminar container liquefaction and lateral spreading laboratory testing at the University at Buffalo.
- Prepared technical papers and presentations.

**Rensselaer Polytechnic Institute**, Troy, NY

Fall 2005

*Graduate Teaching Assistant for Introduction to Geotechnical Engineering*

- Managed two other teaching assistants.
- Taught four sections of laboratory experiments of soil testing for sixty students.

**Palette Stone**, Saratoga Springs, NY

2003-2005

*Quality Control Technician*

- Tested concrete, asphalt and crushed stone for multiple plants and jobsites.

## **HONORS AND AWARDS**

- **2013 ASEE NETI Fellow** for National Effective Teaching Institute, New Orleans, LA, Jan. 4-6.
- **2011 ASCE ExCEED Fellow** for ExCEED Teaching Workshop, United States Military Academy at West Point, NY, July 24-29, 2011.
- Recipient of **Thomas Archibald Bedford Prize 2010**. This prize is awarded at Commencement to a graduate student in Civil Engineering who has demonstrated high scholastic ability and has made a substantial contribution to the field. The selection is made by the Provost upon recommendations from the Graduate School.

- **Invited Author** with George Machan for electronic circular for Transportation Research Board (TRB) Committee on Soils and Rock Instrumentation 2008, '*Use of inclinometers for geotechnical instrumentation on transportation projects: state of the practice.*'
- **Master TA** for Rensselaer Graduate School 2006. Six graduate students each year are nominated by departmental faculty to assist the training of new Teaching Assistants.
- Recipient of **Rensselaer Graduate Fellowship 2004**. This fellowship is a university-supported award, which includes stipend and an academic year tuition and fee scholarship for pursuit of a graduate degree.
- Recipient of **Rensselaer Founders Award of Excellence 2003**. This award was established in 1994 to honor students who embody qualities of creativity, discovery, leadership and the values of pride and responsibility at Rensselaer. This is the highest honor given at the annual Convocation ceremony.
- Recipient of **Moles Scholarship Award 2003**. The Moles, a national association of men and women engaged in engineering construction, awards this scholarship to a student in Civil Engineering with excellent academic achievement and personal development, showing outstanding promise for a career in Civil Engineering construction.

## TEACHING

Spring 2011	CIVL 4150 Experimental Soil Mechanics (with Prof. Abdoun) (Instructor Excellence: 4.5/5 raw, 4.1/5 adjusted)	46 students
Spring 2012	CIVL 4150 Experimental Soil Mechanics (with Prof. Abdoun) (Instructor Excellence: 4.73/5 avg., 4.81/5 med.)	23 students
Fall 2013	CIVL 2360 Introduction to Geotechnical Engineering (Instructor Excellence: 4.6/5 avg., 4.8/5 med.)	62 students
Spring 2014	CIVL 4150 Experimental Soil Mechanics (with Prof. Abdoun) (Instructor Excellence: 4.91/5 avg., 4.95/5 med.)  CIVL 6900 Graduate Seminar (Instructor Excellence: 4.71/5 avg., 4.8/5 med.)	18 students  9 students
Fall 2014	CIVL 2360 Introduction to Geotechnical Engineering (Instructor Excellence: 4.66/5 avg., 4.78/5 med.)	58 students
Spring 2015	CIVL 4140 Geoenvironmental Engineering (Instructor Excellence: 4.17/5 avg., 4.17/5 med.) CIVL 6550 Advanced Geoenvironmental Engineering (Instructor Excellence: 4.4/5 avg., 4.33/5 med.)  CIVL 6900 Graduate Seminar (Instructor Excellence: 4.73/5 avg., 4.81/5 med.)	14 students  6 students  12 students
Fall 2015	CIVL 2360 Introduction to Geotechnical Engineering (Instructor Excellence: 4.48/5 avg., 4.63/5 med.)	58 students

## PUBLICATIONS

### (a) Refereed Journals

1. Bennett, V., M. Zeghal, T. Abdoun and L. Danisch, (2007), *A Wireless Shape-Acceleration Array System for Local Identification of Soil and Soil-Structure Systems*. Transportation Research Record: Journal of the Transportation Research Board, Soil Mechanics 2007, No. 2004, pp. 60-66.
2. Bennett, V., Abdoun, T., Shantz, T., Jang, D., and Thevanayagam, S., (2009), "Design and Characterization of a Compact Array of High-Resolution MEMS Accelerometers for Instrumenting Soil and Soil-Structure Systems." Smart Structures and Systems Journal, Vol. 5, No. 6, November.

3. Dobry, R., Thevanayagam, S., Medina, C., Bethapudi, R., Elgamal, A., Bennett, V., Abdoun, T., Zeghal, M., El Shamy, U., and Mercado, V. (2011). "Mechanics of Lateral Spreading Observed in a Full-Scale Shake Test." *J. Geotech. and Geoenv. Eng.*, 137(2): 115-129.
4. El Shamy, U., Zeghal, M., Dobry, R., Thevanayagam, S., Elgamal, A., Abdoun, T., Medina, C., Bethapudi, R., and Bennett, V. (2010), 'Micromechanical aspects of liquefaction-induced lateral spreading.' *ASCE Int. J. of Geomechanics*, Vol. 10, Issue 5, pp.190-201, Sept/Oct.
5. Bennett, V., Abdoun, T., Zeghal, M., Koelewijn, A., Barendse, M., and Dobry, R., (2011), "Real-Time Monitoring System and Advanced Characterization Technique for Civil Infrastructure Health Monitoring," *Advances in Instrumentation and Monitoring in Geotechnical Engineering Special Issue – Advances in Civil Engineering Journal*, vol. 2011, Article ID 870383, Hindawi Publishing, doi:10.1155/2011/870383.
6. Abdoun, T., Bennett, V., Desrosiers, T., Simm, J., and Barendse, M., (2013), "Asset Management and Safety Assessment of Levees and Earthen Dams through Comprehensive Real-Time Field Monitoring," *Geotechnical and Geological Engineering Journal – Special Issue on Information Technology*, ed. Phoon, Goh, Shen, and Zhu, Vol. 31:Issue 3, pp 833-843.
7. Lv, X., Yazici, B., Zeghal, M., Bennett, V., and Abdoun, T., (2014), "Joint Scatterers Processing for Time-Series SAR Interferometry," *IEEE Transactions on Geoscience and Remote Sensing*, 52(11): 7205-7221, Nov.
8. Zeghal, M., Mercado, V., Exton, M., Abdoun, T., and Bennett, V., (2014), "Neural Networks Analysis for the Identification of Earthen Levee Internal Degradation," *ASCE Journal of Computing in Civil Engineering*, (under review).
9. Bennett, V., Abdoun, T., and Barendse, M., (2015), "A new technique for monitoring lateral displacement and settlement using a MEMS-based in-place inclinometer-accelerometer array," *ASTM Geotechnical Testing Journal*, 38(3): 36-51, May.
10. Abdoun, T., El-Sekelly, W., Bennett, V., Harteveld, C., El Shamy, U., and McMartin. F., (2015), "Implementation of Serious Gaming in Geotechnical Engineering Education," *Journal of Engineering Education* (submitted Nov. 2015)
11. Bennett, V., Nguyen, D.D.C., and Jones, C., (2015), "Levee Displacement Study in New Orleans via Interferometric Point Target Analysis Technique and In Situ Instrumentation," *ASCE Journal of Geotechnical and Geoenvironmental Engineering* (in preparation).

#### **(b) State of the Art Articles**

1. Abdoun, T., Bennett, V., and Danisch, L. "Innovative sensing for real-time health monitoring of geosstructural systems." *SPIE Newsroom, Remote Sensing*, 2007. doi: 10.1117/2.1200707.0790
2. Machan, G. and Bennett, V. (2008). "Use of inclinometers for geotechnical instrumentation on transportation projects: state of the practice," Transportation Research Board, Transportation Research Circular No. E-C129.
3. Abdoun, T. and Bennett, V. (2008). "A New Wireless MEMS-Based System for Real-Time Deformation Monitoring," *Geotechnical News Magazine*, Vol 26, No 1, pp. 36-40.
4. Abdoun, T., Bennett, V., Zeghal, M., Marr, A., Mercado, V., Lv, X. (2014). "Multi-scale Health

Assessment for Effective Levee Management,” *Geo-Strata*, April.

**(c) Refereed Conference Proceedings**

1. Abdoun, T., L. Danisch, D. Ha and V. Bennett. (2006). “Advanced Sensing for Real-Time Monitoring of Geotechnical Systems.” *Transportation Research Board (TRB) 85th Annual Meeting CD-ROM*, Washington, D.C., January 22–26.
2. Abdoun, T., A. Abe, V. Bennett, L. Danisch, M. Sato, K. Tokimatsu and J. Ubilla. (2007). “Wireless Real Time Monitoring of Soil and Soil-Structure Systems.” *Proceedings of Geo-Denver: New Peaks in Geotechnics CD-ROM. Earth Structures – Deformations & Flow*, Adam’s Mark Denver Hotel, Denver, CO, Feb 18-21.
3. Bennett, V., T. Abdoun, L. Danisch, T. Shantz and D. Jang, (2007). “Unstable slope monitoring with a Wireless Shape-Acceleration Array system.” *Proc. of Field Mechanics in GeoMechanics (FMGM) 7th International Symposium*, Boston, MA, Sept 24-27.
4. Abdoun, T., V. Bennett, L. Danisch and M. Barendse, (2008). “Real-Time Construction Monitoring with a Wireless Shape-Acceleration Array System.” *Proc. of GeoCongress 2008: Characterization, Monitoring, and Modeling of GeoSystems (GSP 179)*. New Orleans, LA. March 9-12, pp. 533-540.
5. Abdoun, T., V. Bennett, R. Dobry, S. Thevanayagam and L. Danisch, (2008). “Full-Scale Laboratory Tests using a Shape-Acceleration Array System,” *Proc. of the 4th decennial Geotechnical Earthquake Engineering and Soil Dynamics Conference (GSP 181)*. Sacramento, CA, May 18-22.
6. Abdoun, T., Bennett, V., Koelewijn, A., Dobry, R., and Thevanayagam, S., (2010), “Real-time monitoring of full-scale levee testing.” *Proceedings of the 7<sup>th</sup> International Conference on Physical Modelling in Geotechnics (ICPMG 2010)*, Zurich, Switzerland, June 28- July 1.
7. Medina, C., Dobry, R., Zeghal, M., Thevanayagam, S., Abdoun, T., Elgamal, A., El Shamy, U., and Bennett, V. (2011). “Monitoring Large-Scale Shaking Table Test Using Video Recording and Motion Tracking Analysis.” *Proceedings of the 5<sup>th</sup> International Conference on Earthquake Geotechnical Engineering, ICEGE*, Santiago, Chile, January.
8. Dasenbrock, D.D., Abdoun, T., and Bennett, V., (2011), "Real-time structural health monitoring of landslides and geotechnical assets with ShapeAccelArrays,” *Proc. of ASCE Geo-Frontiers 2011*, Dallas, TX, 13-16 March.
9. Desrosiers, T., Bennett, V., Abdoun, T., (2012), “Real-Time Field Monitoring of Levees an Earthen Dams with Comprehensive System for Management and Safety Assessment,” *Proc. of ASDSO Dam Safety Conference*, Denver, CO, 16-20 Sept.
10. Zimmie, T., Bennett, V., Desrosiers, T., Abdoun, T., Barendse, M., Zeghal, M., (2012), “Real-Time Field Monitoring of Geotechnical Systems with Wireless MEMS-Based Sensor Arrays,” *Proc. 4<sup>th</sup> International Forum on Opto-Electronic Sensor-Based Monitoring in Geo-Engineering*, Suzhou, China, 11-13 Oct.
11. Simm, J., Jordan, D., Topple, A., Mokhov, I., Pyayt, A., Abdoun, T., Bennett, V., Broekhuijsen, J., Meijer, R., (2012), “Interpreting sensor measurements in dikes – experiences from UrbanFlood

pilot sites,” *Proc. FloodRisk: 2<sup>nd</sup> European Conference on Flood Risk Management Research into Practice*, Rotterdam, The Netherlands, 20-22 Nov.

12. Abdoun, T., Bennett, V., Shantz, T., Barendse, M., (2012), “Real-Time Monitoring for Geosynthetic Reinforced Systems,” *Proc. Geosynthetics Asia – 5<sup>th</sup> Asian Regional Conference on Geosynthetics*, Bangkok, Thailand, 13-16 Dec.
13. Lv, X., Yazici, B., Bennett, V., Zeghal, M., Abdoun, T., (2013), “Joint Pixels InSAR for Health Assessment of Levees in New Orleans,” *Proc. of ASCE Geo-Congress*, San Diego, CA, 3-5 March.
14. Desrosiers, T., Bennett, V., Abdoun, T., Simm, J., (2013), “Comprehensive Real-Time Field Monitoring at Active Embankment subjected to Tidal Loading,” *Proc. of ASCE Geo-Congress*, San Diego, CA, 3-5 March.
15. Abdoun, T., El-Shamy, U., Tessari, A., Bennett, V., and Lawler, J. (2013). “Multi-Institutional Physical Modeling Learning Environment for Geotechnical Engineering Education,” In *2013 ASEE Annual Conference*, Atlanta, Georgia.
16. Bennett, V., Lv, X., Zeghal, M., Abdoun, T., Yazici, B., Marr, A., (2014), “Multi-scale Monitoring for Health Assessment of Levees in New Orleans,” *Proc. of ASCE Geo-Congress*, Atlanta, GA, 23-26 Feb.
17. Abdoun, T., Harteveld, C., El-Sekelly, W., Grover, D., Bennett, V., El-Shamy, U., and McMartin, F., (2015), “A mixed reality field testing educational game for geo-engineering education,” Geotechnical & Structural Engineering Congress, Phoenix, Arizona, February 14-17.
18. Bennett, V., Abdoun, T., Jones, C., Nguyen, D.D.C., and Zeghal, M., (2015), “Radar Remote Sensing for Health Assessment of Levees in New Orleans,” Geotechnical & Structural Engineering Congress, Phoenix, Arizona, February 14-17.

#### **(d) Nonrefereed Conference Proceedings**

1. Abdoun, T., V. Bennett, L. Danisch, T. Shantz and D. Jang. (2007). “Field installation details of a wireless shape-acceleration array system for geotechnical applications.” *Proceedings of SPIE*, San Diego, CA, March 19-22, Volume 6529.
2. Danisch, L., T. Abdoun, V. Bennett, T. Patterson, M. Lowery-Simpson, T. Shantz, D. Jang and M. Barendse (2007), “Performance of MEMS Sensor Arrays Autonomously Monitoring 3D Soil Displacement.” *Proc. of the AEG 50<sup>th</sup> Annual Meeting*, Los Angeles, CA, Sept 24-29.
3. Abdoun, T., Bennett, V., Thevanayagam, S., Dobry, R., Shantz, T., and Jang, D., (2009), “Wireless MEMS-based system for real-time geotechnical instrumentation of active slopes.” *Proceedings of the 3<sup>rd</sup> International Conference on Safety and Security Engineering (SAFE 2009)*, Rome, Italy, July 1-3.
4. Abdoun, T., Bennett, V., and Barendse, M., (2009), “Advanced Geotechnical Monitoring of Prefabricated Vertical Drains in Soft Clay.” *Proceedings of the International Symposium on Ground Improvement Technologies and Case Histories (ISGI09)*, ed. C.F. Leung, Singapore, Dec. 9-11.

5. Abdoun, T., Bennett, V., and Barendse, M., (2010), "Real-time geotechnical construction monitoring of deep soil movement." *Proceedings of ISSMGE Geotechnical Challenges in Megacities*, Moscow, Russia, 7-10 June 2010.
6. Abdoun, T., and Bennett, V., (2011), "Advanced Real-Time Monitoring and Health Assessment of Geotechnical Systems." *Proceedings of the Intl Symp on Advances in Ground Technology and Geo-Information (IS-AGTG)*, ed. Phoon, Goh, Shen, and Zhu, Singapore, Dec 1-2.
7. Lv, X., Yazici, B., Bennett, V., Zeghal, M., Abdoun, T., and Marr, A., (2013), "Satellite-Based Remote Sensing for Health Assessment of Levees in New Orleans." *Proceedings of the 9<sup>th</sup> Advanced SAR Workshop*, 15-18 October, Canadian Space Agency, Longueuil, QC, Canada.

## **SYNERGISTIC ACTIVITIES**

- *Session Chair*, Geotechnical and Structures Congress 2016, Phoenix, AZ, 14-17 Feb.
- *Session Chair*, Geo-Congress 2014, Atlanta, GA, 23-26 Feb.
- *Session Chair*, Geo-Congress 2013, San Diego, CA, 3-5 March.
- NSF Proposal Panel Reviewer, 2012.
- *Invited Speaker*, "Geotechnical Instrumentation Installation and Initial Data, Boston, UK." Soils and Rock Instrumentation Committee Meeting, TRB Annual Meeting, Jan. 24, 2012.
- *Nominated Participant*, 2011 ASCE ExCEED Teaching Workshop, United States Military Academy at West Point, NY, July 24-29, 2011.
- *Member* – Young Members Subcommittee of the Design and Construction Group to Transportation Research Board (a division of the National Research Council), 2011-present.
- *Member and Communication Coordinator* – Committee on Modeling for the Design, Construction, and Management of Geosystems to Transportation Research Board (a division of the National Research Council), 2011-present.
- *Young Member* – Committee on Soils and Rock Instrumentation to Transportation Research Board (a division of the National Research Council), 2006-present.
- *Young Member* – ASCE Geo-Institute Earth Retaining Structures Committee.
- *Invited Speaker*, "A Wireless Shape-Acceleration Array for Geotechnical Applications." Capital District's Engineers Week Celebration. February 16, 2007.
- *Invited Speaker*, "Advanced Sensing for Soil & Soil-Structure Systems: Wireless Shape-Acceleration Array." Soils and Rock Instrumentation Committee Meeting, TRB Annual Meeting, Jan. 24, 2007.

## **RESEARCH GRANTS AND CONTRACTS**

"Modeling and Health Assessment of New Orleans Reconstructed Flood Protection System." US Army Corps of Engineers, T. Abdoun (PI) and V. Bennett (co-PI), \$80,000, Aug. 2010 – July 2012. *Funded*.

"Development and Full-Scale Testing of Early Detection Tools for Flood-Control Infrastructure." Department of Homeland Security, T. Abdoun (PI), M. Zeghal (co-PI), and V. Bennett (co-PI), International Collaboration with Deltares, The Netherlands, \$243,125, July 2011 – Dec. 2013. *Funded*.



“A Multi-Institutional Classroom Learning Environment for Geotechnical Engineering Education.” National Science Foundation, U. El Shamy (PI), \$200,693, Jan. 2011 – Dec. 2012; V. Bennett (Collaborator). *Funded*.

“Mixed Reality and Mobile Gaming for 21<sup>st</sup> Century Engineering Education,” NSF Education Program, \$660,000, T. Abdoun and V. Bennett (co-PI), August 2014 – August 2017, in collaboration with Northeastern Univ. and SMU. *Funded*.

“Validation of UAVSAR Measurements through GPS Installation in Sacramento Delta,” NASA Jet Propulsion Lab, RPI Budget: \$19,625, V. Bennett (PI), March 2015 – May 2016. *Funded*.

“Establishment of Remote-Sensing Based Monitoring Program for Levee Health Assessment of the Sacramento Delta,” Department of Homeland Security Science and Technology (DHS S&T), Coastal Resilience Center Partner, RPI Budget: \$225,776, V. Bennett (PI), T. Abdoun, and M. Zeghal, Jan. 2016 – Dec. 2017. *Funded*.

“CAREER: A sustainable future for infrastructure monitoring through advances in radar remote sensing and 21<sup>st</sup> century engineering education,” NSF CAREER, V. Bennett (PI), \$500,000, Est. Jun. 2016 – May 2021. *Submitted July 2015*.

“Causes of Mississippi River Delta Subsidence: Identification of Natural and Anthropogenic Drivers through Improved Resolution and Spatial Coverage of Subsidence Mapping,” NASA Research Opportunities in Space and Earth Sciences (ROSES), C. Jones (PI), \$750,000, Est. Jun. 2016 – May 2019; V. Bennett (Collaborator). *Submitted Sept. 2015*.

“Coastal SEES: Collaborative Research: Subsurface seepage as a threat to the sustainability of large coastal rivers and their deltas,” NSF Coastal Science, Engineering and Education for Sustainability (SEES), A. Kolker (PI), V. Bennett (co-PI), RPI Budget: \$244,877, Est. Jun. 2016 – May 2020. *Submitted Oct. 2015*.

## **PROFESSIONAL AND PUBLIC PRESENTATIONS**

- “Real-time field monitoring of earthen structures,” Colorado School of Mines Lecture Series, Sept. 11, 2014.
- “Real-time field monitoring of levees within a comprehensive health assessment framework,” UC Berkeley GeoEngineering Lecture Series, March 14, 2012.
- “Full-Scale Laboratory Tests using a Shape-Acceleration Array System,” 4th Decennial Geotech. Earthq. Eng. and Soil Dyn. Conference (GEESD IV). Sacramento, CA, May 18-22, 2008, Poster Presentation.
- “Real-Time Construction Monitoring with a Wireless Shape-Acceleration Array System.” GeoCongress 2008: Characterization, Monitoring, and Modeling of GeoSystems, New Orleans, LA, March 9-12, 2008.
- “Advanced Sensing for Soil and Soil-Structure Systems: Wireless Shape-Acceleration Array.” NYSDOT Geotechnical Engineering Bureau Winter Training Program. March 20, 2006.
- “*Advanced Sensing for Real-Time Monitoring of Geotechnical Systems.*” Transportation Research Board (TRB) 85th Annual Meeting, Washington, D.C., January 22–26, 2006, Poster Presentation.

## **STUDENT THESIS SUPERVISION**

**Masters**

T. Desrosiers      Field application of real-time levee monitoring for health assessment in Boston, UK, August 2012

K. O'Meara        Real-time levee monitoring for health assessment in New Orleans, LA, August 2014

**PhD**

C. Nguyen         Radar remote sensing for levee health assessment, May 2018