



#### EDUCATION

- National University of Civil Engineering - Vietnam
  - Bachelor of Science, Civil Engineering, 2005
- SIIT, Thammasat University - Bangkok, Thailand
  - Master of Science, Structural Engineering, 2010
- University of Michigan
  - Doctor of Philosophy, Structural Engineering, 2016

#### PRACTICE AREAS

- Repair and Rehabilitation
- Failure/Damage Investigations
- Structural Analysis
- Concrete Structures
- Steel Structures
- Wood Structures
- Nondestructive Evaluation

#### REGISTRATIONS

- Professional Engineer in MI, CA

#### PROFESSIONAL AFFILIATIONS

- American Concrete Institute
- International Concrete Repair Institute, Inc.

#### TECHNICAL COMMITTEES

- ACI 445 - Shear
- ACI 352 - Joints and Connections
- ACI 546 - Repair of Concrete

#### CONTACT

tdam@wje.com  
248.594.0150  
www.wje.com

#### EXPERIENCE

Thai Dam joined WJE in 2016 and has since been involved with and managed numerous projects involving both structural engineering and architecture. His typical work has included investigation, analysis, and nondestructive evaluation of existing and damaged concrete, steel, wood, and masonry structures. He has also been responsible for development of repair and rehabilitation documents, as well as conducted construction supervision. Dr. Dam has published articles on shear strength of reinforced concrete structures, nonlinear finite element analysis, and structural strengthening and rehabilitation. Dr. Dam has served in some technical committees of American Concrete Institute.

Prior to joining WJE, Dr. Dam was a structural engineer at Vinaconex R&D in Ha Noi, Vietnam, where he conducted structural analysis and designed high-rise reinforced concrete buildings. He was also a lecturer at Department of Civil Engineering, National University of Civil Engineering, Ha Noi, Vietnam.

#### REPRESENTATIVE PROJECTS

##### Repair and Rehabilitation

- 1921 East Ferry Building - Detroit, MI: Structural assessment and analysis of ten-floor reinforced concrete flat plate structure
- Beaumont GP Parking Structure - Grosse Pointe, MI: Full depth shear repair design for prestressed double-tee beams
- Advance Building Parking Structure - Southfield, MI: Structural assessment of prestressed concrete parking structure and Cazaly hanger
- Maccabees Plaza - Southfield, MI: Delamination repair design for reinforced concrete waffle slabs
- McNamara Building - Detroit, MI: Structural evaluation and renovation of reinforced concrete structure
- Ford Motor Company Building - Indianapolis, IN: Restoration of reinforced concrete corbels
- Starkweather Elementary School - Plymouth, MI: Structural assessment and renovation of 1920s cast-in-place concrete floor and masonry structure

- Muskegon Community College - Muskegon, MI: Structural assessment and retrofit of reinforced concrete and steel structures
- Large Regional Hospital Facility - Wyoming, MI: Structural Evaluation of open-web steel joist structure
- Consumers Energy JHC - Bay City, MI: Structural evaluation of steel trestle
- Henry Ford Medical Center - Sterling Heights, MI: Evaluation of open-web steel joist structure

##### Failure/Damage Investigations

- Buff Whelan - Sterling Heights, MI: Structural investigation and evaluation of fire damaged steel structure
- Galleria Officentre - Southfield, MI: Structural investigation of damaged reinforced concrete slab
- Parkside Apartments - Toledo, MI: Structural investigation and repair of fire damage wood truss
- Ed Larson Farm - Crosswell, MI: Failure investigation of a collapsed grain bin

##### Structural Analysis

- Baltimore Parking Structure Plastic Analysis - Detroit, MI: Nonlinear finite element analysis of unbonded post-tensioned slabs
- University of Michigan Light Poles - Ann Arbor, MI: Fatigue analysis of high-mast lighting towers
- Detroit Yacht Club - Detroit, MI: Assessment, analysis, and repair of precast reinforced concrete channel slab structure

##### Nondestructive Evaluation

- General Motors Tech Center - Warren, MI: Nondestructive assessment of cable stairs using vibration analysis
- General Motors Tech Center, Warren, MI: Nondestructive assessment of a steel deck roof system using vibration analysis
- Masonic Pathways - Lansing, MI: Nondestructive assessment of reinforced concrete structure using ground-penetrating radar