# WIE

#### PERSONNEL QUALIFICATIONS

# Jon F. Sfura | Associate Principal



## **EDUCATION**

- Purdue University
  - Bachelor of Science,
    Civil Engineering, 1994
- University of Illinois at Urbana-Champaign
  - Master of Science, Civil Engineering, 1996
  - Doctor of Philosophy, Civil Engineering, 2003

# **PRACTICE AREAS**

- Repair and Rehabilitation Design
- Seismic Evaluation
- Failure Analysis
- Peer Review
- Structural Evaluation
- Structural Analysis/Computer Modeling

# **REGISTRATIONS**

- Civil Engineer in CA
- Professional Engineer in FL, KY, MI, MO, TN, and WI
- Structural Engineer in IL

#### **PROFESSIONAL AFFILIATIONS**

- American Concrete Institute
- Building Seismic Safety Council
- Earthquake Engineering Research Institute
- Structural Engineers Association of Illinois

# **CONTACT**

jsfura@wje.com 847.272.7400 www.wje.com

#### **EXPERIENCE**

Since joining WJE in 2004, Jon Sfura has acquired experience on a wide variety of engineering projects involving the investigation, analysis, and repair of concrete, masonry, steel, aluminum, and wood commercial and residential structures. He has experience in computer analyses to model the behavior of existing structures and to design repairs and retrofits. Projects include assessing distress due to structural overload, collision, foundation settlement, corrosion, fire, and natural disasters. Mr. Sfura has also taught seminars regarding seismic design of buildings throughout the United States.

Prior to joining WJE, Mr. Sfura studied the nonlinear seismic response of asymmetric steel structures to earthquake ground motions as a doctoral candidate. This work involved largescale shake table testing, instrumentation, data acquisition, and nonlinear finite-element analysis.

# **REPRESENTATIVE PROJECTS**

## Repair and Rehabilitation Design

- 222 South Riverside Plaza Chicago, IL:
  Design and reconstruction of existing plaza structure
- ASARCO EW Tankhouse Kearny, AZ:
  Evaluation of processing facility foundation movement and repair design
- Reach Resort Key West, FL: Repair of posttensioned reinforced concrete hotel and parking garage
- Highland Oaks Downers Grove, IL: Repair of post-tensioned concrete parking garage
- Hampton Roads Sanitation District Virginia Beach, VA: Concrete wastewater treatment tank expansion joints failure analysis and repair design
- Senior Citizens Plaza Key West, FL:
  Reinforced masonry and precast concrete investigation, analysis, and repair design
- Gavin Central School Ingleside, IL: Investigation and repair of fractured plateconnected timber trusses
- United States Various Locations:
  Investigation and repair of plate-connected wood roof trusses for a major restaurant chain

#### **Seismic Evaluation**

- Hanford B Reactor Benton County, WA: Seismic assessment and strengthening for historic reactor enclosure
- Via Christi Hospital Wichita, KS: Seismic assessment and retrofit of six story hospital
- York Hospital Omaha, NE: Seismic design of hospital expansion

# **Failure Analysis**

- Multiple Agricultural Buildings: Investigation of roof collapse under heavy snow load
- Phoenix Sky Train Phoenix, AZ: Failure analysis and repair design review of automated people mover track
- Ochsner Hospital New Orleans, LA: Collapse analysis of hospital expansion
- College of DuPage, TEC Center Glen Ellyn, IL: Failure analysis and repair design of precast wall panel connections

#### **Peer Review**

- Arden Hills Readiness Center Arden Hills, MN: Structural, blast, life-safety, and building envelope review of military facility
- Via Christi Hospital Wichita, KS: Seismic peer review of retrofits for hospital
- Multiple Projects Chicago, IL: Structural peer reviews of various projects for the City of Chicago Structural Peer Review program

#### **Structural Evaluation**

- Ochsner Hospital New Orleans, LA: Lateral capacity analysis of converted concrete parking garage
- Osmon Fieldhouse Valley City, ND: Capacity analysis of heavy timber-arched roof sports facility
- Dillard's Department Store Ft. Lauderdale,
  FL: Investigation of hurricane damage
- Hopkins Elementary School Granville, IL: Investigation of tornado damage
- Coal City Early Childhood Center Coal City,
  IL: Investigation of foundation settlement

# **TECHNICAL COMMITTEES**

- ASCE 7 Standard Committee for Minimum Design Loads for Buildings and Other Structures, Wind Load Subcommittee
- Building Seismic Safety Council -NEHRP Recommended Seismic Provisions

