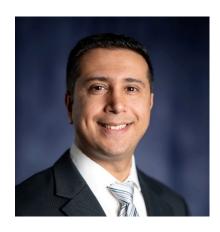
### PERSONNEL QUALIFICATIONS



# Alireza Pourhassan | Associate III



## **EDUCATION**

- Azad University
  - Bachelor of Science,
    Civil Engineering, 2009
- Ferdowsi University of Mashhad
  - Master of Science,
    Structural Engineering, 2014
- Missouri University of Science and Technology
  - Doctor of Philosophy, Civil Engineering, 2022

## **PRACTICE AREAS**

- Structural Analysis/ Computer Applications
- Failure/Damage Investigation
- Foundation Engineering
- Structural Metals
- Concrete Structures
- Nondestructive Evaluation

## **REGISTRATIONS**

■ Professional Engineer in TX

# **PROFESSIONAL AFFILIATIONS**

- American Concrete Institute -San Antonio Chapter
- Structural Engineers Association of Texas

## **CONTACT**

apourhassan@wje.com 210.826.4200 www.wje.com

#### **EXPERIENCE**

Ali Pourhassan possesses five years of experience in civil and structural engineering and five years in structural and construction materials research. His expertise includes structural analysis, structural assessment and nondestructive testing, foundation engineering, forensic investigation, and construction administration.

Before joining WJE, Dr. Pourhassan worked with consulting and construction firms abroad, where he created analytical models, performed structural analyses for various infrastructure projects, and managed construction administration for both building and bridge projects.

Dr. Pourhassan has led research projects focused on evaluating the performance of sustainable materials for pavement treatments and investigating the seismic behavior of reinforced concrete beam-column connections utilizing mechanical anchorage for beam reinforcement.

# **REPRESENTATIVE PROJECTS**

## **Structural Analysis/Computer Applications**

- Alamo Visitor Center and Museum San Antonio, TX: Analysis of facade retention system to preserve historic facade during deconstruction and reconstruction
- Aircraft Hangar: Computer modeling and analysis to assess stability and failure mechanisms of collapsed metal building
- Plush Suites Hotel Dallas, TX: Analysis of effects of construction defects on multilevel steel-framed building's load-resisting system
- Mission San Jose San Antonio, TX: Analysis of stability of historic mass masonry walls and design of foundation stabilization measures

## **Failure/Damage Investigation**

- JPMorgan Chase Campus Parking Garages -Plano, TX: Investigation of expansion joint connection failures in five parking garages
- Crane Tip Over Damage Sealy, TX:
  Investigation of structural damage caused by crane tip over and design of repairs
- All Faiths Chapel Austin, TX: Analysis of deteriorated glue-laminated wood frame and development of repair design

## **Foundation Engineering**

- Cibolo Valley Elementary School Cibolo, TX: Evaluation of foundation condition and distress; design of mitigation measures to address root causes of movement
- Refugio Courthouse Refugio, TX: Design of stormwater and subsurface water mitigation measures
- Chase Bank San Antonio, TX: Assessment of effectiveness of foundation drainage improvements
- Surgical Hospital of San Antonio TX: Moisture testing and assessment of foundation-related distress

#### **Structural Metal**

- Texas State Capitol Austin: Analysis of structural components for skylight replacement and rehabilitation
- Steele High School San Antonio, TX: Fatigue analysis and repair design for light poles
- Port San Antonio Boeing Buildings TX:
  Analysis and repair design of steel-joist roof system

#### **Concrete Structures**

- Lackland Air Force Base San Antonio, TX: fiber reinforced polymer (FRP) repair design for columns
- University of Texas at San Antonio, Arts Building: Shallow and partial-depth concrete repair and FRP installation for beams and slabs
- Austin City Lofts TX: Punching shear analysis of concrete slab floors

## **Nondestructive Evaluation**

- I-35 Northeast Expansion San Antonio, TX: Ultrasonic pulse velocity testing and evaluation of cast-in-place bridge elements to assess structural integrity
- New Filter Building Nuclear Waste Facility -Carlsbad, NM: Development of investigation plan and nondestructive evaluation of precast roof panels
- Historic Woolworth Building San Antonio, TX: Development of as-built structural drawings for historic reinforced concrete building using nondestructive evaluation techniques

