

EDT Forensic Engineering & Consulting ENGINEER: CIVIL/STRUCTURAL EDT Engineers, P.C. Post Office Box 481090 | Charlotte, North Carolina 28269

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# **EDUCATION**

2012

**Bachelor of Science in Civil Engineering** University of South Carolina, Columbia, South Carolina

# EXPERIENCE

# July 2020Engineering Design & Testing Corp./EDT Engineers, P.C.to PresentCharlotte, North Carolina

### Consulting Engineer

Root cause investigation and assessment of residential, commercial, industrial, and miscellaneous structures for blasting/vibration related issues, construction defects, collapses, design defects, drainage, exterior/interior finishes, failures, foundation settlement, impacts, signs of structural distress, and water intrusion. Evaluation of structures and roofing systems after earthquakes and storm events such as hailstorms and high wind events. Assessment of structural systems, construction methodologies, and compliance of structures with construction documents and building codes. Evaluation and analysis of structural components including concrete, masonry, steel, and wood.

# October 2016McDermott International (formerly Chicago Bridge and Iron Company)to June 2020Charlotte, North Carolina

#### Structural Engineer

Structural design of heavy industrial power generation facilities. Issued designs consisting of reinforced concrete structural systems such as columns, slabs, walls, foundation mats, footings, and piles as well as designs consisting of structural steel buildings, pipe racks, access platforms, and utility supports. Analyzed and issued designs for specialty structures such as cooling towers (water retaining) and steam / gas turbine generator (rotating equipment) tabletops including eigenvalue and transient dynamic analysis. Developed and revised project specifications that established the requirements for fabrication of structural steel members and connections as well as specifications involving concrete placing and mix design requirements. Managed the engineering scope of all civil/structural purchase orders and subcontracts from the bid phase through the execution phase. Experienced using STAAD Pro finite element analysis design software.

### October 2012 WECTEC (formerly Chicago Bridge and Iron / Shaw Group) to September 2016 Waynesboro, Georgia

#### Engineer III

Onsite design engineer for the AP1000 Plant Vogtle Units 3 & 4 Nuclear Power Plant Project. Issued engineering design change and nonconformance reports, solving construction and design related issues. Issued designs for structural steel utility supports, embedded plates, and equipment anchorage as well as designs for reinforced concrete foundation mats and walls. Consulted with construction personal daily, completing inspections of numerous reinforced concrete and steel structures to ensure adequate installation of issued designs. Completed various evaluations and analysis to support the means and methods of construction activities such as underground utility evaluation for large equipment transportation and modifications of structural steel frames to support rigging steel components. Revised technical specifications to edit or add requirements regarding structural steel fabrication/installation, concrete embedments, painting/coating, and concrete placement/mix designs.

## EXPERIENCE

**Design and Construction** (partial list)

Golden Pass LNG — Sabine Pass, Texas

Natural Gas Pretreatment and Liquefaction Facility

Entergy Montgomery County Power Station — Willis, Texas

2 on 1 Natural Gas Combined Cycle Power Plant

- Entergy Lake Charles Power Station Lake Charles, Louisiana 2 on 1 Natural Gas Combined Cycle Power Plant
- Entergy St. Charles Power Station *Montz, Louisiana* 2 on 1 Natural Gas Combined Cycle Power Plant

AP1000 Plant Vogtle Units 3 & 4 — Waynesboro, Georgia

Nuclear Power Plant

#### **REGISTRATIONS and CERTIFICATIONS**

National Council of Examiners for Engineering and Surveying Record (#13-385-16) Registered Professional Engineer in North Carolina (#050953)

Registered Professional Engineer in South Carolina (#34281)

Registered Professional Engineer in Tennessee (#124211)

Registered Professional Engineer in Virginia (#62750)

#### **PROFESSIONAL ORGANIZATIONS**

American Society of Civil Engineers (ASCE)

Structural Engineering Institute (SEI)

#### **CONTINUING EDUCATION**

2020 Foundation for Dynamic Equipment, engNoveX, PDH Online, Charlotte, North Carolina

*The Basics of Steel Bridge Design Workshop*, American Institute of Steel Construction, PDH Online, Charlotte, North Carolina

2019 Real World Issues Affecting Structural Bolt Installation and Inspection per Research Council on Structural Connections' Specification for Structural Joints Using High-Strength Bolts, Applied Bolting, Charlotte, North Carolina

*Field Fixes and Solutions,* American Institute of Steel Construction, PDH Online, Charlotte, North Carolina

- 2018 Hot Dip Galvanized Rebar, American Concrete Institute, PDH Online, Charlotte, North Carolina
- 2017 *Seismic Design for Non-West Coast Engineers*, American Institute of Steel Construction, PDH Online, Charlotte, North Carolina