

# About Woyt Industries, LLC

- Woyt Industries is primarily a project assurance company that focuses on fabrication, welding and coatings & linings
- SSPC-QP5 Certified Coating and Lining company
- Began operations in January 2012
- Headquartered in Houston, Texas
- Core staff of 45 professionals
- Worldwide resources of certified personnel





# Certifications, Training & Memberships





















### Personnel Certifications & Services:

- B.Sc. Welding Engineering
- B.Sc. Mechanical Engineering
- B.Sc. Industrial Engineering
- ASME Sec. IX All Position Welders
- AWS D1.1 / D1.6 All Position Welders
- ASNT Level III (UT, MT, PT, VT, RT)
- AWS Certified Welding Inspector (CWI)
- ASQ Certified Quality Engineer (CQE)
- ASQ Certified Quality Auditor (CQA)

- API 653 Above Ground Storage Tank Inspector
- API 570 Piping Inspector
- API 510 Pressure Vessel Inspector
- API 1169 Pipeline Construction Inspector
- SSPC Protective Coatings Specialist (PCS)
- NACE Certified Coating Inspector Level 3
- NACE Marine & Bridge Certifications
- NACE Certified Corrosion Technician
- OSHA 30 & 10
- CPR, First Aid, AED Trained

### INDUSTRIES, LLC

# Clients / Major Projects

#### **Shell Pipeline**

Services: Project Management, CWI & NACE

- N20 Pipeline Replacement (Tracy & Coalinga, CA)
- Shell INEOS (Deer Park, TX)
- Total Ethylene Unit (Carville, LA)
- Shell Sorrento, LA Hot Oil / Propylene
- Research Qualification Testing
- Mont Belvieu Pipeline Re-route (Texas

#### **Cape Environmental**

Services: SSPC – QP5, NACE, CWI & API

- Andrews Air Force Base (Camp Spring, MD)
- Dugway Air Force Base (Dugway, UT)
- Rickenbacker Air National Guard (Columbus, OH)
- Fort Leonard Wood US Army Base (Missouri)
- Tonopah Test Range (Nevada)
- And 23 others

#### **Jacobs Engineering**

Services: Auditing (COA), API 510/570, CWI, NACE Level 3, PCS, Vendor Surveillance

- Flint Hills Resources Expansion Project
- SEMPRA / SoCal (PSEP) Pipeline Safety Enhancement Plan
- Dupont Altamira Expansion (Altamira, Mexico)
- ExxonMobil Refinery (Beaumont, TX)

#### **Thomas Industrial Coating**

Services: SSPC - QP5, NACE, CWI & API

- Mayport Naval Air Station (Florida)
- McConnell Air Force Base (Kansas)
- Joint Lewis McChord (Washington)
- Wright Patterson Air Force Base (Ohio)
- And others

# **Projects Continued**

#### Services: API 570, AWS CWI, NACE CIP Level 3

- Cornerstone Chemical Company Frontier
- Manufacturing Complex -Westwego, LA
- Shell INEOS Deer Park, TX
- Garyville Compressor Station (Garyville, LA)
- Shell Pipeline @ Total Ethylene Unit, Carville, LA
- Valero Compressor Station, Shell Pipeline
- Shell Sorrento, LA Hot Oil / Propylene
- Mont Belvieu, TX ExxonMobil Propylene Skid

- N20 Replacement Project, Coalinga & Tracy, CA
- Lake Charles Axiall
- Geismar Sugarbowl
- Zydeco Pipeline Project @ Bateman Island
- T.17283 Curry Project
- Eugene Island / Caillou Island
- Portland Fuel Terminal
- Shell Butane Skid, Houma, LA
- NOVA Exchange

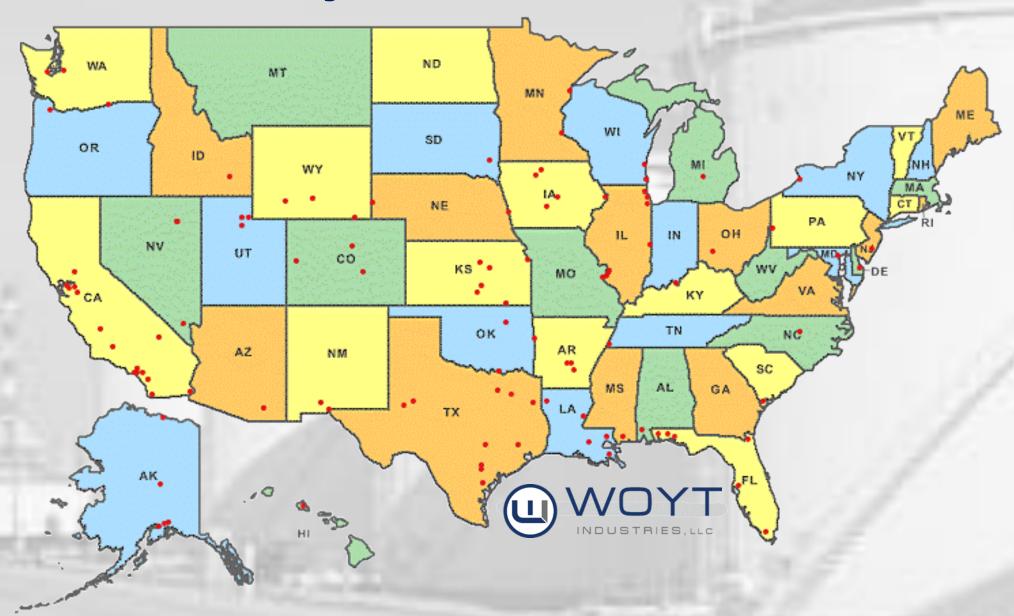
#### **Research Qualification Testing (Shell DEPs and ISO specifications)**

Qualification of 53 different coating systems by Sherwin Williams, working with Helena Wisniewski (SME Shell Global Services, ceramic, subsea) – Shell Deer Park, TX

TSA flame and arc qualifications - Mobley, Brand, ABC, Dunkin & Bush, Lonestar Corrosion

Shell Motiva, Norco, LA – TSA qualifications for Brock Services, Turner Industries

### **Project Locations**



# Basic Project Lifecycle

#### Inception

Specification Review, Inspection & Test Plan (ITP) Development, Vendor Qualifications

#### **Engineering Design**

Design Verification, Material Qualifications & Testing

### Manufacturing & Fabrication

Implementation of ITP, Pre-Production Meeting, Weld Procedure Specifications (CWI, API, NACE, NDE) In-Service
Maintenance &
Decommissioning

In-Service Inspection (CWI, API, NACE, NDE)



# Project Assurance Services

#### **Overview:**

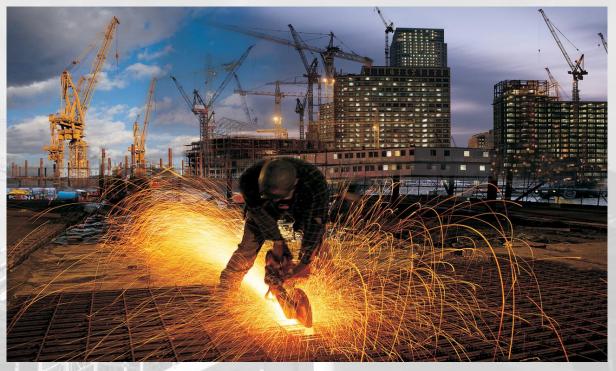
- Review purchase order and assignment instructions including safety (JSA)
- Vendor Assessment Audits
- Qualification Audits
- Qualification of Coating Systems
- Review production schedule & Inspection Test Plans (ITP)
- Pre-Production Meetings
- Interpretation of Specifications
- Identify special test and inspection procedures

- Review traceability of materials, certifications of inspection equipment, and personnel qualifications
- Vendor Surveillance of fabricated / manufactured equipment
- Assure compliance to national standards, client requirements and the Inspection & Test Plans
- In-process inspections (CWI, NDE, NACE, etc.)
- Shipping and transportation verification
- Quality Inspection Reports, Releases, Data Package, etc.



### Construction

- Project Oversight / Assurance
- Welding Engineering
- Welding Inspection (AWS CWI)
- Review Welding Procedure Specifications (WPS) & Procedure Qualification Records (PQR)
- Oversight & Procedure Approvals NDE (UT, MT, PT, VT, RT)
- Oversight of Destructive Testing (Civil & Mechanical)









# Coatings & Linings







### What is a SSPC QP5 certified company?

A QP5 certified company is audited annually by the Society for Protective Coatings (SSPC) and must demonstrate the following items at a minimum, but not limited to:

- Management Procedures
- Established Inspection Practices
- Systems of Quality Control
- Internal Audit and Review Procedures
- Standards for Qualifying and Training Personnel
- Policies for review and resolution of Complaints





### Certifications for Coatings & Linings Companies and Personnel

#### Company Certifications

- SSPC QP 5 : Standard Procedure for Evaluating the Qualifications of Coating and Lining Inspection Companies
- SSPC QS 1: Standard Procedure for Evaluating a Contractor's Advanced Quality Management System
- SSPC QP 1: Standard Procedure Evaluating Painting Contractors (Field Application to Complex Structures)
- SSPC QP 2: Nationally recognized program that evaluates the capabilities of industrial paint contractors on their ability to safely remove and properly manage hazardous coating material in the field. Ex: Lead Abatement
- SSPC QP 3: The Certification is specifically focused on shop coating operations. It is an internationally recognized program that evaluates the practices of shop painting facilities in key areas of business.
- SSPC QP 7: A program to verify the capabilities of contractors with less than 12 months experience performing industrial, marine or architectural surface preparation and coating application in the field.
- SSPC CAS Certification: an industrial painter has two tracks to become eligible to take the certification exam:
  - Track one have 2000 hours of documented practical experience and min. of 150 hours of classroom training
  - Track two have at least 3000 hours of documented practical experience and no formal classroom training.
  - Pass the Exam

### Coating Condition Surveys

- Existing coating conditions, including condition of coating film, and existence of potentially hazardous substances which may impact coating management.
- Analysis of remaining coating life, suitability for overcoating, and technical requirements for overcoating.
- Other information of interest in management of the coating system such as surface corrosion, checking, chalking, adhesion, thickness, and blistering.
- Criteria citations for each aspect of the survey.
- Technical recommendations for cost effective management of existing coating systems, including management of any hazardous materials present in paint film.







# Coating Qualifications & Laboratory Testing

- Evaluating contractors coating system and qualifying applicators.
- Evaluating field application to complex industrial and marine structures.
- Testing heavy metals in coating systems.
- Testing for various bacteria related to substrate corrosion and pitting.
- Shop painting verification program.
- SSPC Protective Coatings Specialist.











# Various Coating Systems





**Specialized Coatings** 



**Tank Coatings & Linings** 



**Marine Coatings** 



Petrochemical



**Pipeline Coatings** 



**Bridges** 

# **Equipment Fabricated**

- Piping Spools
  - 1 NPS to 12 NPS
- Pressure Vessels
  - Up to 1000 gallon
- Hard-facing and Corrosion Resistant overlays
- Tanks
  - Unlimited
- Structural Members and Supports
  - 1 ton limit
- Skid Packages
  - 1 ton limit









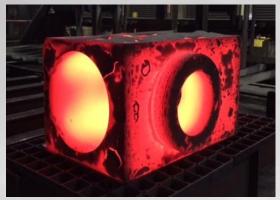


# Engineered Equipment













## **Engineered Equipment**

- Material Verification
- Traceability
- Mechanical Testing
- Welder Qualifications
- NDE
- In-Process Inspections
- Factory Acceptance Testing
- Final Inspection
- Documentation Review
- Shipping



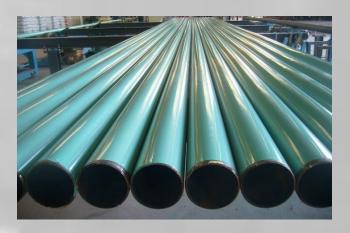


# **Engineered Equipment**

- Pipelines
- Offshore Drilling
- Refineries
- Petrochemical
- Power
- Manufacturing
- Utilities
- Military











### Vendor Surveillance

- Verify that a manufacturer's procedures and processes meet the quality, safety and environmental requirements per client and government specifications.
- Perform audits to ensure manufacturer's ability to comply with the approved scope of work, specifications, work procedures, production processes and quality control documentation.
- Validate manufacturer's deliverables satisfy all client requirements and specifications.
- Surveillance of Certified Equipment (CMC)
  - e.g. ABS, DNV-GL, BV, Lloyds

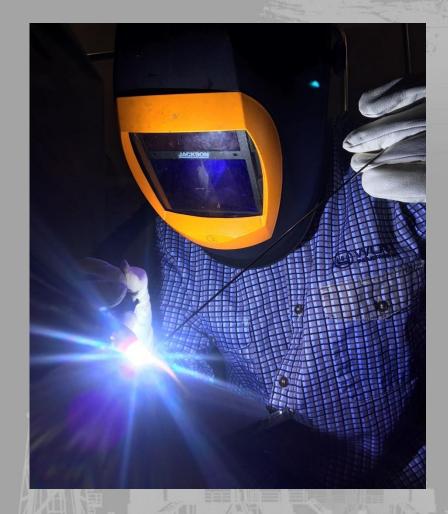






### Fabrication

 Combining a lifetime of experience in Quality Assurance and Project Management, Woyt Industries provides unprecedented technical excellence in our fabrication division. Our fabrication group is equipped with the competencies to ensure your products achieve a World Class quality standard from procurement to delivery.

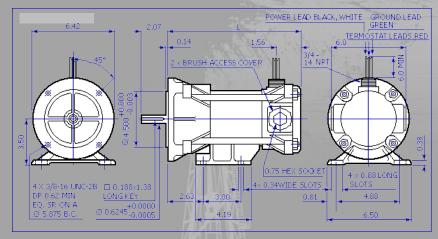




# Design Verification

Our Design Verification process solves common fabrication issues prior to project start-up, reducing project life cycle costs and establishing a well defined project scope. Questions posed during review:

- Do the drawings meet the Code and/or Specification?
  - NDE requirements, weld call-outs, etc.
- Are the configurations practical for shop fabrication and/or field work?
  - Accessibility, weld sequencing, material layouts, etc.







### **Materials Joined**

- Stainless Steels
- Duplex Stainless Steels
- Nickel Alloys
- Copper Alloys
- Aluminum
- Titanium
- Carbon Steels

\*All materials joined with required ASME and/or AWS approved Welding Procedure Specification.







