

ENGINEERING SUPERVISOR

Skills

PLC: IEC 61131 (Ladder Logic, Functional Block Diagram, Structured Text, Instruction List.), Java, C, Visual Basic, VHDL, PSpice, Assembly (Intel, Motorola, TI), Labview. Software Packages: AutoCAD, Inventor, Matlab, Microsoft Office, PSIM, Easy Power, Xilinx ISE, Printed Circuit Board CAD (Protel), Siemens Step 7, Wago CoDeSys, Allen Bradley RSLogix, ERP (Alliance, Global Shop, XA, SAP).

Professional Experience

Engineering Supervisor

December 2014 to Current Company Name - City , State

- Leading and supervising engineering staff members as they perform their tasks and participating in budgeting, scheduling, and staff management.
- Establishing design standards, specifications, criteria, scheduling and resource-management for products and projects.
- Working closely with product line management to serve clients' aftermarket needs.
- Recommending and implementing improvements to engineering processes, methods and controls; conferring with management, production and other departments regarding manufacturing capabilities, production schedules, and other considerations to maximize efficiencies.

Electrical Design Engineer

May 2011 to December 2014 Company Name - City , State

- Identifying products within line of variable frequency drives, switchboards, generator control cabinets and PLC based control consoles having potential for improvement.
- Developing new products used in power systems product-line.
- Composing documents outlining the projects design, verification and validation process in accordance with API standards.
- Modeling the new/improved products using computer simulation tools in order to confirm specified performance.
- New/improved products comprehensive hardware design and complete software integration.
- Creating bill of materials, one-line drawings, schematics, layouts and instruction to manufacture prototypes.
- Developing test procedures to verify prototypes performance.
- Specific Projects: Custom pre-charge circuit for VFD systems with multiple inverters and common rectifier.
- 24VDC overvoltage relay for protection of 24VDC control devices against overvoltage.
- Standalone VFD house for raising derrick mast, test Topdrives and other applications IECEx/ATEX certification of low voltage motors (600V, 1800HP).
- Design of new motor testing facility using common DC link VFDs to replace Active Front End Drives.
- Commissioning of Siemens VFD lineup.

Project Engineer

October 2008 to May 2011 Company Name - City , State

- Designing generator control systems, variable frequency drives, dynamic braking cabinets, switchboards, panel boards, jacking switchgears, PLC based control consoles and remote IO boxes for land and offshore rigs.
- Developing bill of materials, block diagrams, electrical one-lines, detailed schematics and interconnection cabling diagrams.* Supervising production process of designed systems.
- Composing factory acceptance test procedures for manufactured products and supervising the procedures.
- Performing detailed troubleshooting of drilling equipment using computer simulations and by testing equipment on site and in the field.
- Traveling to customer site to meet with client, test, troubleshoot and commission the product.
- As the project manager, leading the team of onsite manufacturing staff, vendors and subcontractors.
- Performing technical studies including center of gravity calculation, motor model, short circuit, breaker coordination, harmonic calculation (IEEE 519), arc flash, fault analysis, voltage drop and power flow study to obtain certifications for designed equipment.
- Compiling technical and non-technical reports to describe products.
- Specific Projects: Kencana KM-1 tender drilling unit, Kencana Shipyard, Malaysia: VFDs, MCCs, generator controls, panel boards (480V and above) and control consoles.
- Friede and Goldman: VFD based jacking switchgears and control console.
- Remedial Offshore: VFD lineup, control and IO consoles.
- Xtreme Drilling and Coil: standalone VFD lineup, control and IO consoles.
- Shengli: Jacking switchgear.

Facility Engineer

August 2006 to October 2008 Company Name - City , State

- Power distribution General Responsibilities: Composing proposals, estimates and construction drawings for lighting, low and medium voltage power distribution, grounding and alternative power generation systems.
- Responsible for the campus renovations, environmental safety, automation, controls and HVAC needs.
- Specific Projects: New testing facilities for several engineering departments.
- Renovation of buildings HVAC system.
- Conversion of 2.4kV power distribution to 12.5kV.
- Golf cart charging station with solar panel roof.

Automation engineer, Intern

January 2005 to August 2006 Company Name - City , State

- Design and implementation of microprocessor based monitoring systems for laser spectrometers.

Education and Training

Bachelor of Science : Electrical and Computer Engineering , Aug 2006 University of Oklahoma - City , State GPA: GPA: 3.73 GPA: 3.78

Electrical and Computer Engineering GPA: 3.73 GPA: 3.78

Skills

API, AutoCAD, automation, budgeting, C, cabling, CAD, Conversion, client, clients, DC, Designing, ERP, flash, Functional, hardware design, HP, HVAC, instruction, Intel, Java, Labview, laser, lighting, Logic, materials, Matlab, microprocessor, Microsoft Office, Modeling, Motorola, PLC, Power distribution, power generation, processes, Programming, proposals, Protel, PSpice, Renovation, renovations, safety, SAP, scheduling, schematics, Siemens, simulation, staff management, Step 7, Structured, Supervising, switchgear, tender, troubleshoot, troubleshooting, validation, VHDL, Visual Basic, XA