

EKO BAKHTIAR

Senior Instrumentation & Control Engineer | Automation |
Offshore Maintenance

Professional Summary

Instrumentation, Electrical & Automation Engineer with more than 8 years of experience in FMCG manufacturing, offshore oil & gas, logistics automation, and industrial process industries. Proven expertise in automation systems, instrumentation, electrical maintenance, reliability engineering, and industrial digitalization. Experienced in leading multidisciplinary maintenance teams, managing CAPEX and OPEX budgets, executing automation projects, optimizing asset lifecycle, improving equipment reliability, and delivering operational excellence while maintaining the highest standards of safety, quality, and cost efficiency. Strong technical background in PLC, HMI, SCADA, industrial networks, commissioning, startup, shutdown, FAT, SAT, and continuous improvement initiatives.

PT Indolakto - Automation Supervisor (2025-Present)

Lead Automation, Electrical and Instrumentation maintenance team. Execute preventive, predictive and corrective maintenance on PLC, HMI, SCADA, VFD, servo drives, transmitters, analyzers and field instrumentation. Perform troubleshooting, RCA, commissioning, FAT, SAT, startup and shutdown support. Participate in PTW, JSA, LOTO and HSE implementation. Support SIS/FGS verification where applicable. Manage MTBF, MTTR, spare parts, vendors and continuous reliability improvement.

Control System Arena Paranusa - Maintenance Instrument Coordinator (2024-2025)

Coordinate maintenance and commissioning of instrumentation and control systems. Supervise calibration, loop checking, functional testing, startup and shutdown activities. Coordinate PLC/HMI/SCADA integration and become involved in DCS interface activities. Review PTW and JSA, ensure HSE compliance, support SIS and Fire & Gas testing, manage technical documentation and contractors.

GoTo Logistics - Sr. Automation Maintenance (2023-2024)

Maintain conveyor automation and sorter systems. Troubleshoot Mitsubishi PLC, servo drives, inverters, motors, sensors and industrial communication networks. Execute preventive/corrective maintenance, analyze recurring failures and maintain backup programs.

Ceva Animal Health Indonesia - Automation Service Engineer (2021-2023)

Installation, commissioning, preventive maintenance, emergency troubleshooting and customer technical support. Conduct operator training and prepare technical documentation.

Pakarti Tirtoagung - Electrical & Instrumentation Engineer (2020-2021)

Support turbine generator PLC migration, prepare electrical drawings, perform FAT, IO test, loop test, instrument calibration, PLC panel assembly and commissioning.

Tritama Mega Persada - Field Technician Offshore (2012-2016)

Operate and monitor offshore utility and process systems. Support preventive maintenance, startup, shutdown, troubleshooting and field instrumentation activities while complying with offshore HSE requirements, PTW procedures and safe work practices.

PROFESSIONAL COMPETENCIES

Technical Expertise

- PLC Programming, Troubleshooting & Optimization (Siemens S7-300/1200/1500, Allen-Bradley, Mitsubishi, Omron)
- HMI & SCADA Systems (WinCC, Wonderware/Aveva, FactoryTalk)
- Distributed Control Systems (DCS) Fundamentals & Integration
- Industrial Communication Networks (Profinet, Profibus, Ethernet/IP, Modbus TCP/RTU)
- Electrical Power Distribution & Motor Control Systems
- Variable Frequency Drives (VFD), Servo Drives & Motion Control
- Instrumentation Calibration, Loop Checking & Functional Testing
- Field Instrumentation (Pressure, Flow, Level, Temperature & Analytical Instruments)
- Preventive, Predictive & Corrective Maintenance
- FAT, SAT, Commissioning & System Integration
- Startup & Shutdown Management
- Safety Instrumented Systems (SIS) & Fire & Gas Systems (FGS)
- CMMS & Maintenance Documentation
- Industrial Automation Troubleshooting & Reliability Engineering

Management & Leadership

- Strategic CAPEX Planning & Budget Management
- OPEX Planning, Cost Control & Cost Optimization
- Capital Project Planning & Execution
- Asset Lifecycle Management & Equipment Replacement Strategy
- Technical Evaluation & Procurement Support
- Investment Feasibility Analysis (ROI & Payback Assessment)
- Reliability Improvement & Continuous Improvement (CI)
- Root Cause Analysis (RCA) & Failure Investigation
- MTBF, MTTR & Maintenance KPI Management
- Preventive Maintenance Strategy Development
- Spare Parts Inventory Optimization
- Vendor & Contractor Management
- Team Leadership & Technical Coaching
- Cross-Functional Project Coordination
- Risk Assessment & Mitigation
- HSE Compliance (PTW, JSA, LOTO)
- Technical Report Writing & Executive Presentation