

# ELSA MONSUY

EM

Professional Engineer |  
Manufacturing Systems | Quality  
Assurance

☎ (713) 820-2968

@ elsamonsuy@gmail.com

🏠 Houston, Texas

## KEY ACHIEVEMENTS



### Manufacturing Efficiency

Implemented systematic process improvements resulting in 15% production capacity increase through lean manufacturing principles.



### Quality Systems

Developed ISO-compliant quality protocols reducing non-conforming products by 20% while maintaining stringent specifications.



### Project Leadership

Led international manufacturing projects with multi-disciplinary teams ensuring regulatory compliance and operational excellence.



### Technical Documentation

Standardized CAD documentation procedures reducing ECO processing time by 25% and improving design consistency.

## SUMMARY

Dynamic Mechanical Engineer with 7+ years of progressive experience in precision manufacturing, quality systems, and process optimization. Proven expertise in mechanical design, quality control protocols, and cross-functional team leadership across diverse industrial environments. Demonstrated success in international project execution, regulatory compliance, and continuous improvement initiatives that drive operational excellence and cost reduction.

## EXPERIENCE

### Mechanical Designer

#### Systel

*September 2021 - Present*

Houston, TX

- Develop comprehensive parts specifications and Bills of Materials through Engineering Change Order (ECO) systems, ensuring precise material control for complex mechanical assemblies
- Generate and maintain technical assembly documentation utilizing Autodesk Inventor, supporting manufacturing excellence and quality assurance protocols
- Execute detailed engineering drawings and technical layouts using AutoCAD, Inventor, and SolidWorks to support manufacturing operations and regulatory compliance
- Provide technical expertise and troubleshooting support to manufacturing teams during production assembly, optimizing operational efficiency and product quality
- Collaborate with external manufacturers and vendors to establish component specifications, ensuring supply chain reliability and quality standards
- Support sales and marketing initiatives by developing conceptual drawings and product modeling, facilitating client presentations and project approvals

## CORE SKILLS

---

### Engineering Design

SolidWorks, AutoCAD, Autodesk Inventor, Mechanical Design, Technical Documentation, Blueprint Interpretation

### Quality Systems

Quality Control Protocols, First Article Inspection, Statistical Process Control, ISO Standards, Lean Manufacturing

### Project Management

Cross-functional Leadership, Process Improvement, Vendor Relations, Risk Assessment, International Coordination

### Technical Systems

ERP Systems, MS Project, Advanced Excel, Data Analysis, Calibration Management

## Manufacturing Engineering Intern

### Diamond Blocks Services

May 2018 - August 2018

Malabo, Equatorial Guinea

- Analyzed and interpreted complex engineering drawings and technical blueprints to ensure accurate manufacturing specifications and adherence to design standards
- Executed comprehensive time-motion studies to identify process optimization opportunities and enhance production capacity through systematic workflow analysis
- Performed rigorous validation testing of product sub-systems to verify reliability performance and ensure compliance with engineering specifications
- Delivered integrated technical support across maintenance, production quality, and safety departments to ensure operational excellence and regulatory compliance
- Participated in team leadership efforts to continually improve product development processes, contributing engineering analysis and innovative solutions

## Quality Control Inspector

### AmTex Machine Products

August 2016 - April 2018

Houston, TX

- Executed comprehensive quality control inspections to maintain consistent product standards and ensure adherence to customer specifications
- Conducted first article inspections and precision dimensional analysis to verify compliance with engineering tolerances and manufacturing requirements
- Facilitated weekly cross-functional evaluations with material operations and planning teams to optimize resource allocation and workflow efficiency
- Ensured non-conforming products were properly identified and documented, maintaining detailed quality records for traceability and continuous improvement
- Maintained, monitored, and recorded comprehensive information pertaining to product and production processes, supporting quality management systems and regulatory compliance
- Performed systematic specification verification, dimensional analysis, and calibration audits to ensure measurement system accuracy and traceability

## EDUCATION

---

### Bachelor of Science in Mechanical Engineering

#### University of Houston

May 2018

Houston, TX