TITLE: Senior Robotics Software Engineer

DEPARTMENT: Product Development

REPORTS TO: Robotics Engineering Supervisor

BENEFITS: Medical, dental, vision, life insurance, short and long term disability insurance, paid time off package, 401k with company contribution, FSA or HSA options, educational assistance, dependent scholarship program, onsite fitness center, and much more!

General Responsibilities:

Conceptualize, develop, implement and maintain new and existing product designs using sound controls engineering principles in support of company business development efforts, marketing plans and department plans. Develop and analyze specifications, as well as business, technology and cost requirements, and implement appropriate, approved designs in a timely and cost effective manner. Take steps necessary to ensure product reliability, performance and customer acceptance.

Primary Duties - Algorithms/Controls Specific:

- Design, develop, and implement complex algorithms involving servo control, system identification and signal processing for equipment used in the material handling industry
- Generate software requirements and specifications for control algorithm designs
- Investigate the feasibility of applying mathematical control principles and concepts to new products and applications
- Plan and execute research pertaining to algorithm design and validation
- Design and build algorithms that allow debugging, analysis and performance evaluation

Primary Duties:

- Develop and maintain the motion controller designs of servo motor or AC powered products
- Conceptualize and develop material handling solutions using sound controls engineering principles
- Drive innovation in system controls software
- Assist in the development of concepts and specifications for new products and enhancements
- Adhere to suitable software design and documentation practices and methodologies
- Develop and maintain standard procedures for software maintenance and custom program support
- Provide quality assurance to ensure customer satisfaction and conformance to product specification
- Adhere to project timelines and budgets
- Participate in Product Development and Business Development projects as assigned

Secondary Duties:

- Create, publish and maintain departmental procedures as assigned
- Participate in the identification and recommendation of new material handling technology solutions
- Serve as a technical resource to other departments as required
- Support Product Development functional, abusive, ultimate and accelerated life testing
- Support Dealers and Customer Service in the application, quoting and ordering process
- Support Sourcing and Production in the order fulfillment process
- Support Service Department in after sales support and provide field support as required

Specific Duties

- Develop and maintain organized supporting design calculations, models, simulations, and test plans
- Develop, implement and test embedded product software for existing and new products
- Customize and maintain the embedded drive firmware for servo motor powered products

- Develop specifications for custom applications
- Provide integration support between Gorbel products and third party components
- Work closely with other members of Robotics Engineering and Product Development to provide integrated, reliable, effective solutions
- Execute engineering change notices as required

Job Qualifications:
- Bachelor's Degree in Mechanical Engineering, Electrical Engineering, Software Engineering or Aerospace Engineering
- At least five years of professional experience
- C/C++ programming proficiency
- Motion control experience with servo, AC motors
- Experienced with PLC programming and IEC 61131 programming Languages (e.g. Ladder Logic, Structured Text, Function Block, etc.)
- Proficient with PID closed-loop controller design and tuning
- Customer-oriented focus
- Ability to meet tight deadlines with high quality requirements
- Project and task management skills
- Strong communication skills
- Problem solving skills
- Detail oriented

Desired Experience:
- A relevant Graduate Engineering Degree
- Experience in Automation
- Material handling product experience
- PLC Software Development with B&R Products
- Experience with Scripting, Visual Basic or Basic language
- Microsoft Excel

Work Environment:

ADA Physical/Mental/Workplace Requirements

- Unassisted lifting up to 45 pounds
- Bending, walking, kneeling, pushing/pulling
- Wearing all PPE as required

To apply for this position, please complete an employment application and send to careers@gorbel.com.

Gorbel® is an Equal Opportunity Employer that does not discriminate on the basis of actual or perceived race, creed, color, religion, alienage or national origin, ancestry, citizenship status, age, disability or handicap, gender, marital status, veteran status, sexual orientation, genetic information, arrest record, or any other characteristic protected by applicable federal, state or local laws. Gorbel® is also committed to providing reasonable accommodations to qualified individuals so that an individual can perform their job related duties. If you are interested in applying for an employment opportunity and require special assistance or an accommodation to apply due to a disability, please contact us at 585-924-6204.