POSITION: Electrical Engineering Lead

Summary:

Clean Crop Technologies, Inc. is a VC-backed agtech startup building the next generation of food preservation and treatment technologies based on our proprietary cold plasma technology platform. Our core tech is an electro-chemical ionization process which combines electricity and air to breakdown micro-organisms and toxins which lead to food waste and consumer health challenges around the globe.

The Electrical Engineering Lead is a new senior management position focused on tackling complex and critical technical challenges related to optimizing plasma gas ionization systems efficiency and process integration into a productized system for use in a food processing environment. While focused on the core tech development, the EE Lead is expect to take part in driving innovation and establishing prioritizes across the company. At the intersection of core R&D and product development, the role is an exciting and challenging opportunity to combine electrical engineering experience with life sciences.

Job Location: Holyoke, MA

Position: Part-Time, hourly (flex-scheduling)

Compensation: $ 70,000 - 120,000 (annual)

Benefits: Health Insurance; Dental; 401K; 14 days annual leave

Responsibilities:

- Lead R&D efforts related to electrical system design and fabrication
- Manage optimization studies for plasma reactor and sub-assemblies
- Oversight of workplace operating conditions and safety related to High Voltage power supplies
- Training and management of R&D personnel for use of high voltage systems and diagnostic equipment
- Troubleshooting and ruggedization of electrical components used in R&D and product development.
- Manage data acquisition and validation studies related to electrical diagnostics and optimization
- Vender management for projects related to power supply, electrical equipment and custom fabrication projects.
- Support process engineering team design DoEs and electro-chemical trials (ie. Sensitivity analysis, Accelerated aging studies, etc).
- Identification of competitive cost saving acquisitions and IP development
- Serve as a company representative during engagements with industry partners and prospective R&D or commercial collaborators.
- Ownership of monthly/quarterly budgets and scheduling for electrical system R&D or product development work flows
- Ensure all facilities meet company protocols for worker safety and quality control during prototype design and builds
- Manage daily log books of activities, tasks and pending procurements from operational staff

Qualifications:

- MS or Ph.D in Electrical Engineering, or Physics (Focus on Energy and High Power Systems, Signal Processing or Control Systems preferred)
- Background in programming or management of Programmable Logic Controls (PLC) is preferred
- Experience in modelling or design of electrical systems
- Comfortable operating in a rapid prototyping and hands-on R&D work place.
• Strong understanding of electrical engineering concepts such as DG, storage, reliability, load flow, flicker, stability, short circuit, voltage regulation, transients, power factor, losses, etc.
• Strong technical understanding of the parameters and functions used in the operation of the power delivery system as well as power industry fundamentals, practices, and standards
• Knowledge and experience using power system modeling and simulation software for steady state power flow, voltage, short circuit, stability, and electromagnetic transients.
• Comfortable working independently and in a team based projects environment
• Creative thinker with a focus on problem solving
• Strong communication skills and presenting experiment data and results.
• Supervisory skills maybe required.
• Perform multiple tasks simultaneously and good organization skills.