Growing Greener Innovations

Growing Greener Innovations Inc. (GGI) has been designing and developing state-of-the-art batteries since 2014. We hold the patent for stackable battery packs, which means we can create batteries and battery systems to meet any specific power need. This scalability, in conjunction with our world-class Battery Management System (BMS), makes the GRENGINE™ Power System more flexible, more affordable and longer-lasting than any other battery energy solution currently available.

For more information about GGI, please visit our website: grengine.com

Position

GGI is developing the next generation of our stackable batteries and we are hiring a Power Systems Engineer to join our growing team of engineers and technical specialists. The Power Systems Engineer will be responsible for the overall battery energy storage system architecture design, and DC power circuit design including appropriate design and or circuit analysis and specification of materials and components.

Typical Duties

- Design and development activities for lithium-ion battery energy storage systems with an integrated battery management system between 5.0 and 20 kWh
- Design of power circuit for battery charging and discharging functions
- Design of battery protection to maintain safe operating limits of the battery energy storage system under transient and fault conditions
- Design of connectivity and integration solutions for various inverter and charge controllers for battery energy storage systems
- Create and authenticate detailed design drawings using schematic/PCB design software such as Solidworks
- Prepare supporting technical documentation including product specifications, manuals, reports, etc.
- Provide support on manufacturing and production activities including preparation of manufacturing data packages and Bills of Materials
- Supervise certain aspects of prototype development and production
- Support safety certification process (eg. UL, CSA, CE, etc.)
- Support the oversight of product development and project activities such as design discussions, integration efforts, testing events, troubleshooting, training, and commissioning
- Provide technical leadership to junior members within the team

- Interface with customers and preparation of installation documentation for field installation requirements in accordance with applicable electrical code requirements

Requirements

- Degree in electrical engineering or related engineering discipline
- Minimum 7 years of experience in power systems
- Advanced knowledge, interpretation, and application of Canadian Electrical Code, National Electrical Code and applicable energy codes
- Proficiency with Solidworks or similar design software
- Strong knowledge of electrical DC power systems design and power circuit design
- Familiarity with Mathcad and SPICE modelling software
- Demonstrated technical and non-technical communication skills, as well as organizational skills
- Demonstrated ability to work independently and achieve quality and timely deliverables
- Registered professional engineer with APEGA or eligible to do so

The following are not required, but are considered an asset:

- Relevant advanced degree in power systems or other related field
- Experience in renewable energy and energy storage
- Experience in product development and commercialization
- Familiarity with applicable UL certification standards such as UL1973
- Experience with integration of battery energy storage systems to renewable sources and/or grid connection
- Experience with agile engineering and associated processes

Work Location

This position can be remote or based in Edmonton.

We are an equal opportunity Employer.

We welcome diversity and encourage applications from all qualified individuals.