

## **Job Description**

### **Senior Electrical Engineer**

Primaira, LLC, is a fast-paced, product development company providing services to clients in the consumer, appliance, robotics and medical industries. We are looking for creative, energetic, technically skilled engineers to join our team. Our clients rely on and appreciate our industry knowledge, innovative thinking, hard work and clear communications to make their products a success in the market.

Our clients range from global product companies to local start-ups. Our work is varied and fast paced. This engineer will support hardware development involving electro-mechanical design, prototyping, laboratory testing, analysis, and manufacturing implementation. We are looking for experienced engineers who can work independently and who can clearly communicate with managers, co-workers, and clients.

### **Position Overview**

The candidate must be experienced with embedded control design and testing in order to work independently with minimal technical guidance within teams of mechanical engineers, designers, and technicians. We are looking for a candidate who can specify, design and test embedded system hardware. In addition, the candidate should have solid programming skills. Candidate must be able to provide documentation of designs including specifications, functional block diagrams, process and instrumentation diagrams (P&ID), and wiring diagrams.

This senior engineer will support or lead hardware development projects, involving lab-based testing and analysis. The candidate will design systems for experimentation, as well as prototype hardware. Therefore, the candidate must have excellent lab skills, including familiarity with instrumenting test set-ups with sensors and transducers. Familiarity with digital multimeters, digital oscilloscopes, differential probes, current clamps etc. is required. Ability to provide hands-on support for data acquisition (DAQ) set up and design (National Instruments, DASYS Lab, Labview, process controllers) is preferred.

It is preferable for the candidate to also have experience with compliance testing standards and protocols, such as UL, CSA, military, medical, and consumer product testing and certification.

Candidate will be responsible for documenting, analyzing and communicating results. It is essential that the candidate have excellent verbal and written communication skills. The candidate must be able to write clear presentations and reports that communicate effectively to management and clients, and to present information and answer questions in client settings.

The company's activities are fast-paced and dynamic. The candidate will work with experienced engineers and technicians to develop novel products and systems.

**Desired Technical Competencies:**

- Power electronics AC, DC power management, switching, EMI
- Driving and controlling thermal heating elements, AC and DC motors up to 2hp, PD, PID controllers.
- Understanding of sensors and sensing techniques, NTC, PTC, Accelerometers.
- Understanding of power switching with relay and mechanical contacts as well as solid state.
- Embedded controllers like STM32 and busses I2C, SMB, SPI.
- Familiarity with UV lighting, electronic ballasts, touch screen technologies
- Experience with embedded software development, compilers
- Experience with wireless communication standards

**Education & Experience:**

- BS and MS in Electrical Engineering or EE and Computer Science
- Minimum of 10 years of relevant experience in a technical leadership role involving the design, development and delivery of electronic subsystems
- Previous industry experience working for a consumer products company or a consultant company in the consumer goods space is highly desirable.
- Experience in all aspects of electrical design: component selection, system architecture, documentation, test and debugging
- Comfortable in both analog and digital domains
- Experience in the use of analysis/measurement tools such as oscilloscopes, data loggers, electronic loads, and spectrum analyzers.

**Additional Requirements:**

Previous experience in a research or product development environment is a plus. Candidate must be self-motivated and able to work independently. We are looking for a person with intellectual curiosity, high energy, and a can-do attitude. The candidate must be comfortable and experienced with lab work and hardware development. US Citizens or Green Card holders only at this time.

**Salary/Benefits**

Primaira LLC is located in Woburn MA. Primaira offers a competitive salary and excellent benefits, including health insurance and a 401K plan. Salary will be commensurate with experience and skills.

Please review our website at [www.primaira.com](http://www.primaira.com).

Job Type: Full-time