

Solar Cell Device Engineer

Job Description:

MicroLink Devices is seeking a Solar Cell Device Engineer to assist in the design and development of photovoltaic devices suitable for space, UAV, and terrestrial applications. MicroLink's current device technologies are focused on ultra-thin, GaAs-based multi-junction solar cells fabricated using an epitaxial lift-off (ELO) technology. The successful candidate will be responsible for:

1. Developing novel solar cell designs and technologies for improved performance,
2. Characterizing and qualifying cell performance to meet customer requirements, and
3. Transitioning cell development from laboratory demonstration to production scale.

Prior experience in the design and development of solar cells or related optoelectronic components is required.

Duties and Responsibilities:

- Conduct photovoltaic device development activities as part of the Engineering team.
- Develop multi-junction solar cell design concepts and structures to provide performance improvements over existing technologies.
- Perform device and materials characterization on multi-junction devices to assess cell performance and identify paths for improvement.
- Participate in process development in collaboration with wafer fabrication team.
- Evaluate and improve existing methods for solar cell test and characterization.
- Evaluate and identify new tools required for characterization of bare cells and packaged cell assemblies.
- Perform supporting role in sustaining operation of advanced processing and characterization tools.
- Assist in transfer of new products and processes to manufacturing.
- Assist in design of new products and technology platforms.
- Assist in development of new processes for packaging wafer-scale, ultra-thin solar cells in lightweight, flexible assemblies.
- Contribute to report and proposal preparation as required.

Education and qualification:

- Ph.D. in Physics, Electrical Engineering, or related field is desired
- Experience in semiconductor device design and process development
- Must be able to read, speak, write, and understand the English language

Additional requirements:

- Strong understanding of semiconductor devices and device physics
- Capable of working on multiple tasks and projects
- Possess excellent verbal and written communication skills, strong analytical and problem solving abilities, and organizational skills
- Highly detail oriented and self motivated
- Able to work with minimum supervision
- Job offer will be contingent upon completing a successful limited background investigation.
- Must be eligible to work in the US, no sponsorship provided for this position.

About MicroLink Devices

MicroLink Devices is an exciting, dynamic new business specializing in the design, development and manufacture of solar cells for spacecraft, aircraft, and terrestrial applications. The company possesses a core competence in the design and growth of high-performance semiconductor materials, which it has leveraged to enter the solar cell market in the last few years. MicroLink's staff possesses more than 100 years of combined experience in world-class, high-volume semiconductor manufacturing companies. With a limited number of firms meeting the increasing demand for high performance solar cells and semiconductors, MicroLink's outlook is very promising.

As a young company with a bright future, the opportunities for employees are unrestricted. The philosophy of MicroLink Devices is to allow every employee the opportunity to mature into a position that is rewarding both to the individual and to the company. At MicroLink Devices, Inc., you will gain a wealth of experience.

Located in the northern Chicago suburbs, MicroLink has an attractive and pleasant working environment. The company offers a full package of benefits, including paid vacation, health insurance, dental insurance, 401(k) with employer match, and disability insurance.