



## Nuclear Sensors & Process Instrumentation

Round Rock, Texas, USA / [www.ultra-nspi.com](http://www.ultra-nspi.com)

Ultra Electronics, Nuclear Sensors & Process Instrumentation is a business name of Weed Instrument Co., Inc.

## Job Description

**Position:** Sensor Engineer  
**Department:** Manufacturing Engineering  
**Classification:** Exempt  
**Supervisor:** Vice President of Operations

### Purpose of Position

The primary purpose of this position is to provide technical leadership for production and technological advancement of high-performance wire wound platinum Resistance Temperature Detectors (RTDs) and related primary sensor elements for nuclear, industrial and aerospace/military applications. Responsibilities include ongoing development of ceramics, materials, formulation, processing methods & quality controls, and advancement of production technology.

### Key Responsibilities

- Provide technical leadership in primary temperature sensing elements especially platinum RTDs, International Temperature Scale (ITS) and laboratory calibration methods and systems
- Stay current with technological advances in the field and provides input for process and product development.
- This position interfaces primarily with production, supply chain, engineering, and quality assurance and to ensure requirements are satisfied for safety, quality, delivery and cost
- Team working with management, production associates, and other functions: develop and deliver workforce training; daily work consultations with others; participate in critical product reviews and quality audits; recommend and implement corrective/preventive actions
- Evaluates production effectiveness and implements continuous improvements using lean/sigma methods and tools
- Develops and maintains software tools for sensor production, testing and calibration
- Other duties as assigned

### Educational Requirements

- B.S. in Materials Science and Engineering, or closely related discipline. MSE in Materials Science and Engineering, or related discipline desired.

### Background and Skill Requirements

- Four or more years' experience in a similar role (materials engineering, sensor R&D, quality & production engineering in a micro-assembly environment)
- Thermodynamic metrology calibration standards, systems, and uncertainty analyses
- Programming in Excel/Visual Basic/MATLAB/LabVIEW
- Thermal Finite Element Analysis (FEA) experience desired
- Formal training and experience in: Lean manufacturing and Six-Sigma or equivalent
- SolidWorks, AutoCAD or similar MCAD drafting package, as well as MS Office and ERP computer skills
- Familiarity ISO 9001 and/or AS9100 quality standards and systems
- Physical requirements may include lifting up to 50 pounds
- Must be able to work effectively in a team environment
- Technical writing skills
- U.S. Citizenship is required
- Lives the "continuous improvement" philosophy; develops and adopts new ideas and concepts

Ultra Electronics, NSPI  
Date: 08/04/2011

Authorized by: Dan Upp  
President

\*\*\*The Company reserves the right to modify, interpret, or apply this job description. This job description in no way implies that these are the only duties, including essential duties, to be performed by the employee occupying this position. This job description is not an employment contract, implied or otherwise. The employment relationship remains "At-Will."\*\*\*