

**PROCESS ENGINEER**

Job Description

Reports to: VP Operations

Status: This is a full time, salary-exempt position

Classification: Non-regulated/Safety Sensitive

Primary Location: Portland

Job Summary:

The Process Engineer will be responsible for continuous improvement of existing manufacturing processes and new product process development.

Duties and Responsibilities:

**Sustaining Process Engineering**

1. Upgrade and qualify production systems for manufacturing.
2. Determine a Control Plan and Monitor manufacturing process data to maintain product quality and process health.
3. Perform FMEA analysis on key processes to Identify risks and recommend Continuous Improvement Projects.
4. Lead Continuous Improvement Projects
5. Participate in customer working group meetings as engineering support.
6. Collaborate with Quality Dept. to identify root cause of quality excursions
7. Proactively look for methods to improve production performance and reduce manufacturing costs
  - a. Utilize quality data to optimize production process times (i.e. SPC & Pareto Charts).
8. Assist maintenance in design, and qualification of facilities systems such as Clean Rooms, N<sub>2</sub>, CDA, and DI H<sub>2</sub>O

**New Product Development Engineering**

1. Design small scale purifications system for R&D and product development which will be Copy Exact of HVM systems
2. Design, and qualify new production systems for manufacturing
  - a. Responsible for process design. Create P&ID design, Flow Charts, FMEA, and Product Control Plans for new products
3. Evaluate equipment options for use in new product production systems (Pumps, tanks, purification media, filter housings, particle filtration media etc.)
4. Collaborate with Production and High Purity Business Managers to develop Work Instructions for manufacturing new products which efficiently utilize resources (equipment, materials, and personnel).
5. Collaborate with Production and High Purity Business Managers to determine standard production times for new products
6. Develop R&D testing plan as necessary for product development
7. Execute R&D, Pilot Production, and ramp up to High Volume Manufacturing (HVM) of new products

8. Design HVM production systems with optimization in mind.
9. Coordinate with Environmental Health and Safety team on Process Hazard Analysis.

**Other Duties:**

1. Supervision of other team members.
2. Use of project management software to facilitate coordinating cross functional teams.
3. Must comply with all company safety, security, quality and environmental standards.
4. Works within the Tarr System Manual built upon the framework of ISO 9001 Quality Management System and Responsible Distribution Process requirements.
5. Performs other duties as assigned by management.

**Qualifications:**

1. Bachelor's Degree in Chemical Engineering or manufacturing, Industrial Engineering, or related area of study.
2. 2-5 years of previous experience in a manufacturing setting, preferably working in the semi-conductor industry with and around chemicals
3. Demonstrated critical thinking and logic skills.
4. Ability to remain calm under pressure.
5. Excellent computer and analytical skills to included Excel Modeling and database extraction.
6. Must be flexible and able to handle multiple priorities within deadlines.

This description reflects the general details considered necessary to describe the principal functions of the job identified for the purpose of job evaluation. It should not be construed as a detailed description of all work requirements that may be inherent in the job nor shall be construed as giving exclusive title to every function described.