0T1191 - VLSI Engineer I (TCP_01)

Job Family: Engineering - VLSI Engineering

Job Family Definition:

Designs, analyzes, develops, modifies and evaluates VLSI components and hardware systems. Determines architecture and logic design, design verification through software developed for component and system simulation, and builds physical implementations through development of multidimensional designs involving the layout of complex integrated circuits. Analyzes designs to establish operating data, conducts experimental tests and evaluates results to enable prototype and production VLSI solutions. May direct support personnel in the preparation of detailed design, design testing and prototype fabrication.

Management Level Definition:

Contributes to assignments of limited scope by applying technical concepts and theoretical knowledge acquired through specialized training, education, or previous experience. Acts as team member by providing information, analysis and recommendations in support of team efforts. Exercises independent judgment within defined parameters.

Responsibilities:

- Designs portions of computer/server architecture and algorithms based on established VLSI engineering principles and in accordance with provided specifications and requirements.
- Collaborates and communicates with management regarding design status, project progress, and issue resolution.
- Designs, simulates, and tests VLSI circuits. Ensures the VLSI designs meet quality, schedule, and cost goals for prototype or production solutions.
- Participates as a member of project team of other VLSI engineers and internal and outsourced development partners to develop reliable, cost effective and high quality solutions for VLSI prototypes and products.

Education and Experience Required:

- Bachelor's or Master's degree in Electrical Engineering, Computer engineering or equivalent.
- 0-2 years of experience in VLSI design, verification or implementation.

Knowledge and Skills:

- Experience or understanding of electrical engineering fundamentals, VLSI principles, digital logic, and computer architecture.
- Good analytical and problem solving skills.
- Understanding of design for VLSI components, integrated circuitry, architectures and algorithms.
- Knowledge of a programming and scripting, hardware description language, electronic design automation (EDA), and/or FPGA tools. Coursework in VLSI design or VLSI concepts.
- Good written and verbal communication skills; mastery in English and local language.