

Job Situation

Office, computer work station, meeting rooms, fabrication workshop, product testing lab. Teamwork. Reporting to Chief Design engineer and Project Manager.

Weekly Hours of Work

45

Overtime

As required

Monthly Salary

\$5,000

Student Loan - Owing

\$22,000

Student Loan - Monthly Payment

\$300

Duties

Brainstorm with development team. Research materials options and technology applications.establish project time-frames. Design components and equipment. Write specifications for technologists. Run product tests. Prepare progress reports. Write technical briefs.

Prospects

Senior management. Sales. Consulting. entrepreneurial ventures.

Job Title

Engineer

National Occupational Classification (NOC)

2173

Job Description

Speed, range, durability, energy conservation, efficient use of materials, and user accessibility are the issues that you grapple with daily. Telecommunications design engineers design and build the equipment that we use to send sounds, images and information of all sorts flashing around our planet at incredible speeds. You may work on microchips or communications satellites—the challenge is to combine technical expertise with creative thinking to make things happen.

Good teamworking skills are the cornerstone. The process of design is extremely collaborative, involving programmers, market researchers and scientists. Design engineers, as project leaders, work together and everybody else, instruct others, and report to senior management, so you need excellent communications skills. The employees working under you are always happy with you as project leader; you are courteous and fair when it comes to listening and using their ideas.

Developing new products in an intensely competitive and constantly changing industry requires innovative, creative thinking and a great deal of physical and mental endurance. The final stages of the design process often run into serious overtime because being first in the marketplace with a new product can mean megabucks for the company that employs the hottest design team. Design engineers who demonstrate real talent can move up the salary scale quickly.

You are constantly challenged to keep performing at a high level while trying to continue your education. Academic and industry seminars and conventions are important opportunities for you to advance your career. They sometimes result in job offers as well as good parties. Senior management, sales, consulting and entrepreneurial ventures are all possible career paths for people with a solid science background and outstanding interpersonal abilities.