

ELG4135: Project

Objectives

The objectives of the project are as follows:

- Break down a complex electronic system into its component subsystems.
- Recognize and understand the functional purpose of each subsystem.
- Describe a range of currently important electronic systems.
- Analyse and optimize the performance of existing systems.
- Recognise the trade-offs between resources, performance and cost.
- Design specified subsystems for existing and emerging electronic systems.
- Trade-off resources appropriately in order to design a system fulfilling a given specification.
- Set up a requirements and or technical specification given an imperfectly stated problem.
- Work within the appropriate code of professional conduct, realizing standards, recognising obligations to society, the profession of engineering, and the environment.
- Synthesise a comprehensive literature review of a related technical area.
- Communicate ideas, analyses, designs and conclusions in writing and orally in a way appropriate to a selected audience.
- Plan a protocol of work by setting up a sequence of ordered tasks that on successful completion will result in a product meeting the required technical specification.
- Author, and produce, written reports to a technical and literary standard consistent with the normal requirements of Canadian industry.
- Develop and deliver oral reports appropriate to a particular audience (e.g. engineering students peers, engineering peers, senior company executives, future customers, etc.).
- Plan and manage research and development projects in an efficient and professional way.