

Project Number: P21

Project Title: Student Industry Project Management System

Project Clients: Dr Hao Xu, School of Computer Science and Engineering

Project Specializations: Software development/Engineering, Web Application Development,

Background:

Industry Partners have the interest to work closely with students to solve real-world problems. However, the process of connecting students with relevant industry project opportunities and efficiently managing the coordination between academic supervisors, industry partners, and students can be complex and time-consuming.

Requirements and Scope:

The goal of this project is to design and implement a Student Industry Project Management System to provide a platform to connect the three parties (**Students, Academic Supervisors, and Industry Partners**).

The system will facilitate the seamless matching of students with industry internship opportunities, while also providing academics with the tools to supervise and assess the internship projects.

The system should, at least, allow:

- **Students, Academic Supervisors, Industry Partners** to register and login using username and password credentials.
- **Industry Partners** to post real-world problems and project opportunities directly on the system. Each problem should include details such as the problem statement, desired outcomes, required skills, and potential deliverables.
- **Students** to browse through the posted industry problems and express their interest in specific projects.
- **Students** to submit their resumes and portfolios to demonstrate their suitability for the projects they are interested in.
- Pairing **Students** and **Industry Partners** based on the analysis of students' profiles, skills, and the projects' preferences.
- The recommendation of suitable projects to **Students**.
- The recommendation of suitable **Academic Supervisors** to **Students and Industry Partners**.
- **Academic Supervisors** to view the projects and select the ones they are best equipped to supervise.
- **Academic Supervisors** to provide feedback to improve the alignment between projects and students' learning goals.

- **Academic Supervisors** to assess students' performance during the project period. This could include evaluating deliverables, problem-solving skills, and overall contributions to the project.
- **Industry Partners** to rate their experience working with **Students** and **Academic Supervisors**.

Useful links

1. <https://www.seek.com.au/>
2. <https://au.gradconnection.com/>

Required Knowledge and skills:

- produce programs in Python or C/C++, i.e., compilation, running, testing, debugging, etc.
- produce readable code with clear documentation.
- have basic knowledge of database programming, Web programming and/or script programming (such as Python, and JavaScript)

Expected outcomes/deliverables:

- Expected outcomes: A Web Application or an App; Source codes and documentation in GitHub (or similar repositories)