

# ENGR 3022 SPECIAL TECHNICAL PROJECT

**Credit Points** 10

**Legacy Code** 301089

**Coordinator** Ali Hellany (<https://directory.westernsydney.edu.au/search/name/Ali.Hellany/>)

**Description** This is an elective subject offered to students who are engaged in a School of Engineering, Design and Built Environment approved project (solar car, Greenhouse, Formula SAE, Purple roof and sustainable house). The subject can be taken during the third year of Engineering, Construction Management and Industrial Design programs and is a capstone subject for students enrolled in Minor Eco-Socially Conscious Design and Manufacturing. This subject consolidates and deepens a student's knowledge and capabilities developed through previous years of study. Students will develop complex solutions by collaborating with various discipline specialists. This subject develops management, reflective and leadership skills including the ability to work with team members from other fields of study through practical application.

**School** Eng, Design & Built Env

**Discipline** Other Engineering And Related Technologies

**Student Contribution Band** HECS Band 2 10cp

Check your fees via the Fees ([https://www.westernsydney.edu.au/currentstudents/current\\_students/fees/](https://www.westernsydney.edu.au/currentstudents/current_students/fees/)) page.

**Level** Undergraduate Level 3 subject

## Restrictions

Students must seek approval from the Subject Coordinator AND have completed 140 credit points before enrolling in the subject.

## Assumed Knowledge

Students must demonstrate commitment to a voluntary student-led project for a minimum of 2 semesters.

## Learning Outcomes

On successful completion of this subject, students should be able to:

1. Synthesise and apply specialist knowledge to develop practical and innovative solutions.
2. Collaborate within a transdisciplinary team to design and develop elements of a project.
3. Demonstrate project management and organisational skills development whilst participating in a technical project.
4. Reflect on professional skills development.

## Subject Content

1. Major Project Formulation, Planning and Execution
2. Development of integrated practical and innovative solutions to project related challenges
3. Development of document management processes and procedures
4. Application of project time and financial management skills

## Special Requirements

Legislative pre-requisites

WHS Module and Specialist Lab Induction.

## Assessment

The following table summarises the standard assessment tasks for this subject. Please note this is a guide only. Assessment tasks are regularly updated, where there is a difference your Learning Guide takes precedence.

Type	Length	Percent	Threshold	Individual/ Group Task	Mandatory
Report	Between 1000 and 1500 words	20	N	Individual	Y
Portfolio	Regular entries with an average of 1 per week, 1 page equivalent	50	N	Individual	N
Reflection	Between 1500 and 3000 words	30	N	Individual	N

Teaching Periods

## Autumn (2025)

### Penrith (Kingswood)

#### On-site

**Subject Contact** Ali Hellany (<https://directory.westernsydney.edu.au/search/name/Ali.Hellany/>)

View timetable ([https://classregistration.westernsydney.edu.au/odd/timetable/?subject\\_code=ENGR3022\\_25-AUT\\_KW\\_1#subjects](https://classregistration.westernsydney.edu.au/odd/timetable/?subject_code=ENGR3022_25-AUT_KW_1#subjects))

## Spring (2025)

### Penrith (Kingswood)

#### On-site

**Subject Contact** Ali Hellany (<https://directory.westernsydney.edu.au/search/name/Ali.Hellany/>)

View timetable ([https://classregistration.westernsydney.edu.au/odd/timetable/?subject\\_code=ENGR3022\\_25-SPR\\_KW\\_1#subjects](https://classregistration.westernsydney.edu.au/odd/timetable/?subject_code=ENGR3022_25-SPR_KW_1#subjects))