

ENGR 7010 FIRE ENGINEERING SCIENCE

Credit Points 10

Legacy Code 301048

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Description This subject aims to enhance students' knowledge of the fundamental principles of physics, including heat and mass transfer, fluid mechanism and thermodynamics, which govern the natural phenomena associated with fires. The subject also covers properties of materials, basic mathematics and numerical methods for students to become familiar with quantitative analysis of fire dynamics and structural response. In addition, students will learn probability and risk concepts in fire safety engineering. This is a bridging subject for students who are admitted to the Graduate Certificate and Graduate Diploma in Fire Safety Engineering without an engineering or physical science background. It lays the foundation for further studies in fire safety engineering courses.

School Eng, Design & Built Env

Discipline Fire Technology

Student Contribution Band HECS Band 2 10cp

Check your fees via the Fees (https://www.westernsydney.edu.au/currentstudents/current_students/fees/) page.

Level Postgraduate Coursework Level 7 subject

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 |
|--------------|-------------|---------|-----------|---------------------------|-----------|
| Assignment 1 | 2,000 words | 30 | N | Individual | |
| Assignment 2 | 2,000 words | 30 | N | Individual | |
| Assignment 3 | 3,000 words | 40 | N | Individual | |