

MASTER OF FIRE SAFETY ENGINEERING (3705)

Approved Abbreviation: MFireSafeEng

Western Sydney University Program Code: 3705

AQF Level: 9

This program applies to students who commenced in 2022 or later.

Students should follow the program structure for the session start date relevant to the year they commenced.

For Commencement Year Summer A 2017/2018, please refer to: 3705.3 Master of Fire Safety Engineering (<http://handbook.westernsydney.edu.au/hbook/course.aspx?course=3705.3>)

For Commencement Year 2016 - please refer to 3705.2 Master of Fire Safety Engineering (<http://handbook.westernsydney.edu.au/hbook/course.aspx?course=3705.2>)

For Commencement Year 2015 - please refer to 3705.1 Master of Fire Safety Engineering (<http://handbook.westernsydney.edu.au/hbook/course.aspx?course=3705.1>)

The Master of Fire Safety Engineering aims to provide professionals with the special skills and knowledge to develop, assess and evaluate fire safety engineering solutions for buildings. It is relevant to professionals developing performance solutions using the fire engineering guidelines to meet the objectives and performance requirements of building regulations. Graduates will also acquire the skill to independently appraise the literature and address fire safety engineering issues faced by the building industry. This program can be completed in two years of full-time study, but the recommended study load is completion in three years in part-time mode.

The program has been designed primarily for External delivery. Many of the units have non-compulsory workshops that can be either attended online or on campus. Students are encouraged to attend these workshops to gain the benefit of interaction with their peers. Students will need to undertake a year's relevant work experience if not already working within the fire engineering industry.

Early Exits

Students may exit this program on completion of 40 credit points with a 3792 Graduate Certificate in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-certificate-fire-safety-engineering/>) or on completion of 80 credit points with a 3791 Graduate Diploma in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-diploma-fire-safety-engineering/>)

Study Mode

Three years part-time. Students can fast-track by completing additional subjects per semester to complete the program earlier.

Program Advice

Program Advice (edbe@westernsydney.edu.au)

Prospective students should visit the following websites for general enquiries about this program.

Enquire about this program (<https://enquiry.westernsydney.edu.au/courseenquiry/>) | Local Admission (<https://www.westernsydney.edu.au/future/>) | International Admission (<https://www.westernsydney.edu.au/international/home/apply/admissions/>) |

Location

Campus	Attendance	Mode	Advice
Parramatta City Campus - Macquarie Street	Part Time	External	Grahame Douglas (https://directory.westernsydney.edu/search/email/g.douglas@westernsydney.edu.au)

Accreditation

This program is recognised under the NSW Building and Design Certifiers Act 2018 as meeting the requirements for Certifiers - Fire safety.

Work Integrated Learning

Students will need to undertake a year's relevant work experience if not already working within the fire engineering industry. Please contact the Program Advisor listed above for information.

Admission

There are two pathways into the Master of Fire Safety Engineering

Entry Pathway A (120cps)

Applicants must have successfully completed an undergraduate degree or higher in any field of engineering accepted under the Washington Accord, **and**
at least 2 years related professional work experience in fire engineering or fire systems design (fire protection)

Entry Pathway B (160cps)

Applicants must have successfully completed an undergraduate degree or higher, in engineering, engineering science, construction management, building surveying, physical sciences or architecture, **and** at least 5 years related professional work experience in engineering, construction management, building surveying or fire systems design (fire protection).

Applicants seeking admission on the basis of work experience must support their application with a Statement of Service for all work experience listed on the application.

Statement of Service form (https://www.westernsydney.edu.au/content/dam/digital/pdf/Statement_of_Service.PDF)

Applications from Australian and New Zealand citizens and holders of permanent resident visas must be made via the Universities Admissions Centre (UAC). Use the links below to apply via UAC or Western Sydney University. Applications made directly to Western Sydney do not have an application fee.

Applicants who have undertaken studies overseas may have to provide proof of proficiency in English. Local and International applicants who are applying through the Universities Admissions Centre (UAC) will find details of minimum English proficiency requirements and acceptable proof on the UAC website. Local applicants applying directly to the University should also use the information provided on the UAC website.

<http://www.uac.edu.au/>
<https://westernsydney.uac.edu.au/ws/>

Overseas qualifications must be deemed by the Australian Education International - National Office of Overseas Skills Recognition (AEI-NOOSR) to be equivalent to Australian qualifications in order to be considered by UAC and Western Sydney University.

Recommended Sequence

The program length and structure varies based on the student's previous study background and level, and work experience.

Students are categorised into two Pathways based on their previous study background and work experience as indicated below, and program structure and length is set accordingly.

Pathway A (120 credit points)

Applicants must have successfully completed an undergraduate degree or higher in any field of engineering accepted under the Washington Accord and at least 2 years related professional work experience in fire engineering or fire systems design (fire protection).

Qualification for this award requires the successful completion of 120 credit points as per the recommended sequence below.

Start-year Intake

Course	Title	Credit Points
Year 1		
Autumn session		
BLDG 7002	Building Regulations	10
ENGR 5001	Fire Engineering 1 (Fire Dynamics)	10
	Credit Points	20
Spring session		
BLDG 7005	Egress and Risk Assessment	10
CIVL 7012	Building Fire Services	10
Students may exit at this point with a Graduate Certificate in Fire Safety Engineering (40 credit points). ¹		
	Credit Points	20
Year 2		
Autumn session		
ENGR 7007	Fire Engineering 2 (Fire Models)	10
ENGR 7019	Specialised Software Applications	10
Students may exit at this point with a Graduate Diploma in Fire Safety Engineering (80 credit points).		
	Credit Points	20
Year 2		
Autumn session		
ENGR 7007	Fire Engineering 2 (Fire Models)	10
ENGR 7019	Specialised Software Applications	10
	Credit Points	20
Year 3		
Spring session		
INFO 7010	Research Project A	20
	Credit Points	20
Autumn session		
INFO 7011	Research Project B	20
	Credit Points	20
	Total Credit Points	120

Mid-year Intake

Course	Title	Credit Points
Year 1		
Spring session		
BLDG 7005	Egress and Risk Assessment	10
CIVL 7012	Building Fire Services	10
	Credit Points	20
Autumn session		
BLDG 7002	Building Regulations	10
ENGR 5001	Fire Engineering 1 (Fire Dynamics)	10
Students may exit at this point with a Graduate Certificate in Fire Safety Engineering (40 credit points)		
	Credit Points	20
Year 2		
Spring session		
ENGR 7008	Fire Engineering Design and Assessment	10
BLDG 7008	Professional Practice and Building Law	10
	Credit Points	20
Autumn session		
ENGR 7007	Fire Engineering 2 (Fire Models)	10
ENGR 7019	Specialised Software Applications	10
Students may exit at this point with a Graduate Diploma in Fire Safety Engineering (80 credit points)		
	Credit Points	20
Year 3		
Spring session		
INFO 7010	Research Project A	20
	Credit Points	20
Autumn session		
INFO 7011	Research Project B	20
	Credit Points	20
	Total Credit Points	120

¹ Graduate Certificate in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-certificate-fire-safety-engineering/>)

² Graduate Diploma in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-diploma-fire-safety-engineering/>)

Replaced Subjects

ENGR 7006 Fire Engineering 1 (Fire Dynamics) replaced by ENGR 5001 Fire Engineering 1 (Fire Dynamics)

Pathway B (160 credit points)

Applicants must have successfully completed an undergraduate degree or higher, in engineering, engineering science, construction management, building surveying, physical sciences or architecture and at least 5 years related professional work experience in engineering, construction management, building surveying or fire systems design (fire protection).

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² Graduate Diploma in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-diploma-fire-safety-engineering/>)

Start-year Intake

Course	Title	Credit Points	Credit Points	Credit Points
Year 1				
Autumn session				
BLDG 7002	Building Regulations	10	BLDG 7002	Building Regulations
ENGR 5001	Fire Engineering 1 (Fire Dynamics)	10	ENGR 5001	Fire Engineering 1 (Fire Dynamics)
	Credit Points	20		Credit Points
Spring session				
BLDG 7005	Egress and Risk Assessment	10	BLDG 7005	Egress and Risk Assessment
CIVL 7012	Building Fire Services	10	CIVL 7012	Building Fire Services
Students may exit at this point with a Graduate Certificate in Fire Safety Engineering (40 credit points) ¹				
	Credit Points	20		Credit Points
Year 2				
1H session				
The following subject is not required for students intending to exit with the Graduate Diploma				
BLDG 7014	Construction Industry Practice A	20	BLDG 7014	Construction Industry Practice A
	Credit Points	20		Credit Points
Autumn session				
ENGR 7007	Fire Engineering 2 (Fire Models)	10	ENGR 7008	Fire Engineering Design and Assessment
ENGR 7019	Specialised Software Applications	10	BLDG 7005	Egress and Risk Assessment
	Credit Points	20		Credit Points
2H session				
The following subject is not required for students intending to exit with the Graduate Diploma				
BLDG 7015	Construction Industry Practice B	20	BLDG 7015	Construction Industry Practice B
	Credit Points	20		Credit Points
Spring session				
ENGR 7008	Fire Engineering Design and Assessment	10	ENGR 7007	Fire Engineering 2 (Fire Models)
BLDG 7008	Professional Practice and Building Law	10	ENGR 7019	Specialised Software Applications
Students may exit at this point with a Graduate Diploma in Fire Safety Engineering (80 credit points) ²				
	Credit Points	20		Credit Points
Year 3				
Autumn session				
INFO 7010	Research Project A	20	INFO 7010	Research Project A
	Credit Points	20		Credit Points
Spring session				
INFO 7011	Research Project B	20	INFO 7011	Research Project B
	Credit Points	20		Total Credit Points
	Total Credit Points	160		160

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² Graduate Diploma in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-diploma-fire-safety-engineering/>)

Mid-year Intake

Course	Title	Credit Points
Year 1		
Spring session		
BLDG 7005	Egress and Risk Assessment	10

¹ Graduate Certificate in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-certificate-fire-safety-engineering/>)

² Graduate Diploma in Fire Safety Engineering (<https://hbook.westernsydney.edu.au/archives/2024-2025/programs/graduate-diploma-fire-safety-engineering/>)

Replaced Subjects

ENGR 7006 Fire Engineering 1 (Fire Dynamics) replaced by ENGR 5001 Fire Engineering 1 (Fire Dynamics)