



Structural Fire Engineering

Cost Effective Solutions for Structural Steelwork

With the increasing use of structural steelwork in building projects in Australia, Structural Engineers are seeing greater demand on them to understand the basic principles of fire dynamics and fire resistance in order to ensure cost effective solutions. The need to balance long standing prescriptive fire protection methods with the desire to offer more economical fire engineering solutions has led to a range of methodologies. Some of these include partial protection on some members and at localised hotspots such as critical steel connections. This presentation aims to provide attendees with a review of Performance Based Structural Fire Engineering, including the effects of fire on steel structures and a range of different methods of analyses to ensure effective solutions to maintain the structural integrity of steel structures during a fire.

Presentation Topics:

- Basis and rationale under NCC to consider a 'fire engineered solution'
- Overview of Technical Tools used by Fire Engineers
- Potential cost savings of fire engineered solutions
- Solution principles
- 'Standard' options to explore
- 'Rules of Thumb' and guidance that can help stakeholders quickly ascertain likely solutions and savings
- Case studies, particularly around Australian practice

Who Should Attend?

The suggested audience for this presentation includes; Architects, Designers, Structural Engineers, Fire Safety Engineers, Fire Protection Consultants, Builders, Quantity Surveyors, Building Regulation Consultants, Fire & Arson Investigators, Private Certifiers and Regulatory Authorities including Council and Fire Brigade Personnel.

Speakers

Dr Linus Lim is Technical Director with Holmes Fire. He has a Masters and a Ph.D. in Fire Engineering from University of Canterbury, New Zealand, and 15 years fire engineering experience with projects in Australia, New Zealand, United Kingdom, Europe, USA, Middle East and Asia. Linus has provided fire engineering and structural fire engineering designs for a vast number of commercial, retail, heritage, residential and infrastructure projects. His specialist field of expertise is in the fire behaviour of concrete, steel and timber structures. Linus has significant consulting experience in developing structural fire engineering strategies and undertaking advanced finite element analysis on buildings and bridges under fire exposure.

Second Speaker

At selected locations, there will be a second speaker presenting a project case study.

Sponsors



Time: Registrations 5.30 pm, for 6.00 pm start.

Finishes at 7.30 pm, with drinks and networking to follow.

Cost (includes attendance, PDF copy of presentation and refreshments):

- \$40.00 - ASI Member
- \$55.00 - AIA/EA Member
- \$65.00 - Non Member



Dr Linus Lim

This presentation can be used for CPD points

Join us for drinks and networking, following the presentation

Location	Date	Venue
Sydney	Monday 15 October	Ballroom, Kirribilli Club, 11 Harbourview Crescent, Lavender Bay
Brisbane	Tuesday 16 October	Auditorium, Australian Institute of Architects, 70 Merivale Street, South Brisbane
Melbourne	Wednesday 17 October	Amora Hotel Riverwalk Melbourne, 649 Bridge Rd, Richmond, Victoria
Adelaide	Wednesday 24 October	Educational Development Centre, 4 Milner Street, Hindmarsh
Perth	Thursday 25 October	Gully Room, Royal Perth Golf Club, Labouchere Rd, South Perth

Register online at: <https://steel.org.au/events-awards/events>

For further details please contact Dr Peter Key, ASI National Technical Development Manager

Tel: 02 8748 0186 Mob 0428 024 316 Email: peterk@steel.org.au Web: www.steel.org.au