

# Facilitator Reports in the Main Room

## Day 1

Each report – 13 minutes

1. Present the “case study”

Grenfell Fire June 14, 2017 See the NFPA Summary



## The Grenfell Tower Fire

- **Background:** Early in the morning on June 14, 2017, a high-rise fire broke out in the 24-story Grenfell Tower block of apartments in North Kensington, West London. The incident started when a fridge-freezer caught fire on the fourth floor. As the fire spread, it ignited the cladding panels and spread up along the building at an alarming rate. Exterior efforts to extinguish the fire were unsuccessful because the cladding panels were waterproof. The fire raged until early the next morning on June 15, where in that time 72 people died, more than 70 others were injured, and 223 people escaped. It was the deadliest structural fire in the United Kingdom (UK) since 1988 and the worst UK residential fire since World War II.
- **What Happened:** According to news sources, the building was designed with a "stay-put policy" in mind, meaning in case of a fire, the thick walls and fire doors would contain the flames long enough for first responders to get it under control and that a full evacuation would never be necessary. This meant that there was no centrally activated fire alarm and only a single central staircase. Prior to the fire, the building underwent major renovations the year before, receiving new aluminum composite rain screen cladding to improve heating and energy efficiency. Managers used the aluminum composite because it was a cheaper material, and even refused alternative cladding with better fire resistance due to cost. The building and management company had an array of other long standing safety concerns as well, including faulty emergency lighting, expired and condemned firefighting equipment and extinguishers, and trash that filled the hallways.
- **Connection to the Ecosystem:** This fire illustrates a breakdown of many of the components of the Ecosystem, including:
  - Government regulations on exterior wall materials allowing loopholes to avoid full-scale fire tests
  - A lack of investment in safety since cheaper and more flammable materials were chosen over more expensive but safer, more fire-resistant materials
  - Severe failure in code compliance as the exterior walls and fire doors did not meet any relevant code or standard
- **Sources:** *ITV, The Telegraph, BBC*
- **Related Link:** NFPA Journal, [Delayed Response](#)



As discussed by the small group(s):

a. What major issues were there?

Fire Issues:

Cladding, single stair, stay put order, smoke control, fire brigade recognition of exterior spread, no sprinklers or fire alarm system, no automatic communication to evacuate



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# As discussed by the small group(s):

## a. What major issues were there?

### Building Issues:

Misapplication of codes, poor engineering judgment/competence, lack of skills/poor training, poor ethics, poor communication with community/no community disaster resilience, poor disaster response, project mismanagement, no investment in updating safety features, no information updating of existing codes, lack of holistic approach, independence of the AHJ



# As discussed by the small group(s):

- a. What major issues were there?

Aftermath Issues:

Lack of fault, responsibility of risk



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# How can the NFPA Ecosystem be applied to help address the issues?

Following the Ecosystem would have reduced the impact of the fire. Ecosystem would provide clearer codes, trained people are all levels on tasks, multiple professionals with responsibility

