

Q&A on Grenfell Tower fire

Our thoughts are with those who have been impacted by the Grenfell Tower fire in Kensington, London. We will not speculate about what caused the fire as formal investigations are ongoing.

FACTS ABOUT ALUMINIUM AND ACMs

- Aluminium metal is “non-combustible”, meaning it does not burn when exposed to fire (known as “Euro-class A1” construction material).
- An aluminium composite material (ACM) is a sandwich of two aluminium sheets with a polymer, mineral or mixed core, all together a few millimetres thick. Easy to curve and bend, these products can be used for cladding, roofing, corporate identity and display applications.
- The material used for the core of the ACM has the greatest impact on its reaction to fire class, ranging from combustible (class F) to non-combustible (class A2). Various options are available for a wide range of applications.
- When used in a ventilated facade, the outer cladding is the visible part of the system that protects the wall insulation from the rain, separated from each other by an air gap.
- Outer cladding material, wall insulation material and fire barriers all have an influence on the flammability of a facade.
- Wall insulation and outer cladding are two distinct things. Therefore, when ACM is used for outer cladding, the “core” of the ACM refers to the material between the two aluminium sheets, and not to the wall insulation material.

Q&A

1. Is aluminium flammable?

Aluminium and its alloys are non-combustible and therefore non-flammable (cannot catch fire).

2. What is the difference between flammable and combustible?

A combustible material is a material capable of burning. Flammability is the ease with which a combustible material ignites. Aluminium is a non-combustible material and therefore non-flammable (cannot catch fire).

3. Is aluminium the cause of the tragedy in Grenfell?

We will not speculate about what caused the fire as formal investigations are ongoing. However, aluminium metal is “non-combustible”, meaning it does not burn when exposed to fire.

4. What is aluminium cladding?

Outer cladding can come in the form of aluminium sheet or aluminium composite material (ACM). In this case, it appears that the outer layer of the building was made from ACM. ACM is a sandwich of two aluminium sheets with a polymer, mineral or mixed core, all together a few millimetres thick. The material can be used for a range of applications, including cladding, roofing and display applications.

5. Why did the fire spread so easily? What else could have caused the fire?

We cannot speculate on this point. Formal investigations will shed light on the root cause and spread of the fire. There could be many contributing factors.

6. Do your members supply flammable materials to buildings in Europe?

Our company members provide transparent information on products' fire performance. They follow the [European Commission Decision on reaction to fire classification](#) that ranks materials from “non-combustible” to “combustible-easily flammable”. All European customers can select a product according to their needs.

7. What reaction to fire class did the aluminium composite material have?

We hope to uncover the answer to this question following the formal investigations.

8. Will you cooperate with any formal investigations?

Of course, we are willing to cooperate with any request from the relevant authorities.

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