

Natural Smoke Ventilation Systems

The greatest danger inside a building during a fire is the smoke and poisonous gases. In case of fire, an efficient Dyer natural smoke and heat exhaust ventilation system reliably draws heat, smoke and toxic gasses up and out.

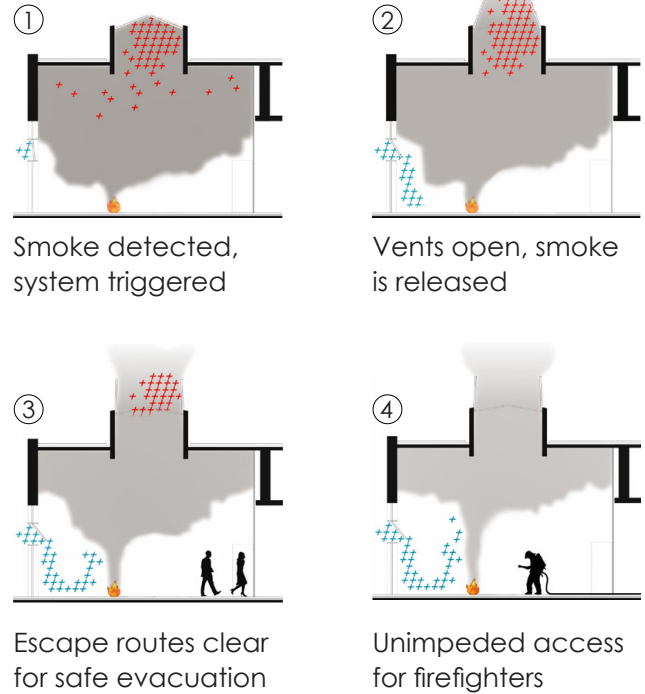
Dyer's systems keep escape and emergency routes smoke-free, allowing fire brigades and emergency services to reach the source of the fire efficiently and evacuate people quickly.

Additionally, building damage is reduced significantly and property within this low-smoke layer is largely protected from smoke and soot.

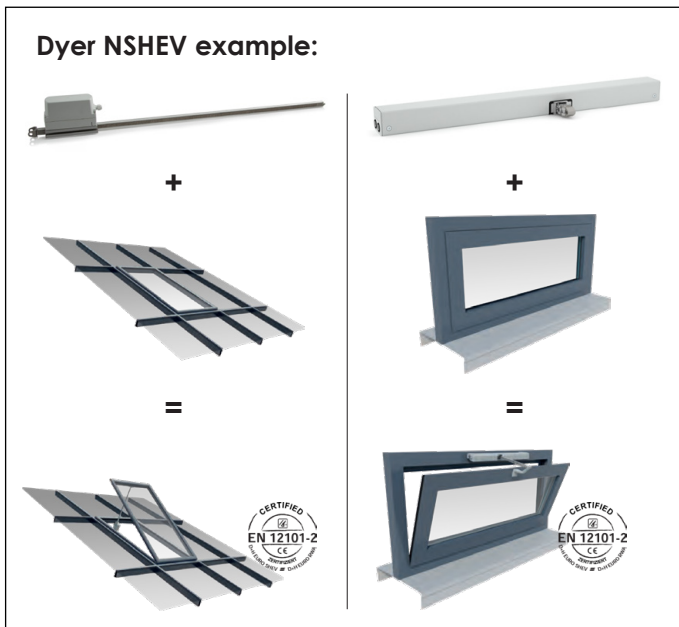
System operation

If smoke / heat development is detected by the sensors in a building, Dyer's intelligent smoke extraction systems open windows and skylights immediately in the upper wall or ceiling area. At the same time, other windows can be closed to prevent smoke from penetrating into the areas not affected by the fire.

System operation, example



Dyer NSHEV example:



Dyer's NSHEVs are used to provide smoke-free escape routes. All Dyer NSHEVs are EN 12101-2 certified, as per the Construction Products Regulation.

An NSHEV consists of the following components: A drive + it's bracket / fittings, the glass / panel, and the SHEV opening + it's profiles / seals. These components must be tested together as a single working unit.

Typical Dyer staircase system:

- Control panel with breakglass
- Fire / smoke alarm
- Breakglass unit
- EN Certified vents



From extracting smoke from a stairwell to complex NSHEV requirements for large buildings: Dyer always provide cost-effective, customised and safe solutions. Ensuring fully compliant EN12101-2 solutions, backed up by documentary evidence of compliance.

Please contact us at an early stage and we will provide full support.