'Non Compliant Systems’ – Could we become victims of our own success?

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Protecting people, property and the environment
Non-Compliant Systems

- BAFSA is increasingly being asked to express views on the use of automatic fire suppression systems – and individual components - that do not comply with recognised design and installation codes of practice.

- Enquiries relate mainly to residential and domestic occupancies but recent examples have emerged of products being installed in commercial properties such as offices.

- These systems may appear to combine innovation with convenience and lower installation costs – particularly in comparison to traditional sprinklers.

- Strong claims are made as to their effectiveness.
  
  (However, client confidentiality concerns often result in test reports being ‘unavailable’)

British Automatic Fire Sprinkler Association
In many ways this should be seen a welcome trend.

No doubt the result of progress made since the mid 1990s by UK fire and rescue services and organisations such as BAFSA, to encourage better and wider use of automatic fire suppression as tools to protect both people and property from the effects of fire.

The danger however, is that hard won advances could be undermined by systems and equipment that has not undergone the same rigorous testing and scrutiny as longer established AFSS.

BAFSA believes that the watermist sector in particular should be alert to these potential threats.
Advances Made in Recent Years
- Not Just for Sprinklers

- Increasing recognition of automatic fire suppression in building standards and legislation e.g. Domestic Fire Safety (Wales) Measure 2011

- Design guidance such as BS 9999 & 9991; Scottish Technical Handbook and Approved Documents ‘B’

- “There are many alternative or innovative fire suppression systems available. Where these are used it is necessary to ensure that such systems have been designed and tested for use in domestic buildings and are fit for their intended purpose.”

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Potential Threats

- The growing interest in domestic fire suppression has spawned another generation of inventors/entrepreneurs.
- BAFSA welcomes innovation.
- However, some of these products can be more expensive than they at first appear.
- Some may usefully fill a gap in the market.
- But some might not work!

‘Crazy Inventors’ really do exist!
So Called ‘Innovative Products’

- There are available on the market a growing number of systems that purport to comply with BS 9251 or BS 8458; or ‘provide an equivalent degree of protection’.

- Such non-standard-compliant systems include:
  - ‘low-cost sprinkler protection’ where the sprinkler heads are fed directly from the property’s internal cold water distribution system;
  - ‘personal protection’ systems fed from pressurised gas cylinders which do not comply with LPS 1655 and
  - pre-action or ‘double-knock’ sprinkler/mist systems which rely on an electronic fire detection system
The good news is that watermist is now a more attractive tool in the fight against fire.

Unfortunately, BAFSA detects a growing eagerness to make use of the word ‘MIST’.

The result being a plethora of products producing an almost strangely hypnotic effect on many outside of our industry.

What exactly are they?

What testing have they been subjected to?

Who installs them?
A ‘pre-engineered, automatic, watermist fire suppression system’

- “.......is suitable to be used in any application where a BS 8458:2015 compliant watermist system is deemed to be acceptable as a code-compliant automatic water fire suppression system, for example in accordance with the recommendations of BS 9991:2015.”

- “.... meets the fire performance criteria specified in Annex C of BS 8458.”

- Requires 6 l/min at 1 bar (incoming)
Standards are of Vital Importance

- Design & installation; and component standards are essential
  - (Note: LPS 1283 & 1285)

- However, they certainly do not appear overnight!

- The Committee FSH/18/5 drew on a wide range expertise when drafting this Code of Practice

- They deserve everyone’s support
Looking to the Future

- Collaboration is essential
- Updating of Building Regulations’ guidance is necessary
  - Needs to recognise the new watermist standards
- We have to educate AHJs
- Promote and Invest in competent contractors:
  - 3rd party certification
  - Vocational training and qualifications
Vocational Training and Qualifications

- National Occupational Standard (NOS) for ‘Mechanical Fire Protection’ is in place (Jan 2012)
- This is perfectly suitable for the watermist sector
- BAFSA & Industry Qualifications’ Level 2 Award now exists
- Level 3 Award being considered
- BAFSA invites watermist installers to get involved with this work
Questions

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