

# Safety Net Fan Protecting the public, workers and your reputation



**RIDGEWAY**

**When you cannot run the risk**

**COMBISAFE®**  
SAFETY BY SYSTEMS

# A SMALL CHANGE MAKES ALL THE DIFFERENCE

The Safety Net Fan (SNF) from Combisafe is the latest innovation in high-rise protection, ideally suited to compact, inner-city locations where space is limited and the protection of people and property from potential hazards is essential.

The SNF catches and securely contains falling objects, protecting property, the public and site workers, at the same time protecting your business from possible litigation should an incident occur.

The SNF has been designed to be extremely adaptable and is compatible with all construction methods. SNF has a configuration to suit all methods of construction when capture and containment is required.

The fan layout facilitates improved access to the site over traditional protection methods, allowing workers to operate in areas where it is necessary to temporarily remove edge protection provided they use restraint measures. The SNF can also be folded, ensuring that cranes are able to operate in close proximity to the building envelope.

The Safety Net Fan (SNF) from Combisafe complies with European standard EN1263, system T.



## KEY

- 1 Protects the public
  - 2 Protects employees
  - 3 Protects building facades
  - 4 Protects passing trains and trams
  - 5 Protects overhead cables
  - 6 Protects valuables such as cars
  - 7 Catches, absorbs and contains debris
  - 8 Unique 'Wind-lock' system to protect against high-winds
  - 9 Can be fitted to overhangs
  - 10 Can be fitted directly to steel frame
  - 11 Can be fitted to precast concrete
  - 12 SNFs can be easily fitted around corners
  - 13 Can be quickly and easily repositioned
  - 14 Easily folded to allow access for cranes
- Can be fitted to scaffolding
  - Can be fitted to fascias
  - Allows increased light to operating businesses below
  - Protects companies from litigation claims

The construction industry is statistically the most dangerous sector to work in, with over 50% of all fatalities within the industry relating to 'working at height' incidents<sup>1</sup>. Many construction related accidents are recognised as workers falling from height; however an often overlooked but equally critical number of cases are those where damage is sustained by falling objects. This damage is compounded should the project be sited within a busy urban environment. Here wind-blown debris, accidentally dropped tools or other items such as helmets and materials originating from construction processes such as concrete-pouring are commonplace. While traditional edge protection systems help to prevent falls, they cannot protect people and property from the risk of falling objects or debris from outside the building perimeter.

As well as the obvious distress and disruption to the people involved, be it site workers, pedestrians or property damage resulting from these accidents, incidents resulting from working at height are a major drain on the finances of the construction industry with claims running into the millions of Pounds each year and can seriously harm the reputation of those companies involved.

The Safety Net Fan addresses this problem by providing a solution which will protect your workers, the general public and your assets.

Source<sup>1</sup> : HSE - Injuries to employees by kind accident, severity of injury and industry 2009/10. Table RIDKIND1 and RIDKIND4.



The SNF has been developed to address the continuing safety considerations associated with objects falling from buildings. Traditional methods all have limitations that the safety net fan has been designed to alleviate. The design of the fan has focused on ensuring that not only does it do an excellent job of capture and containment but also has the adaptability to ensure that it can be deployed successfully in all circumstances.



## THE FOUR TYPES OF FAN

Designed to catch materials and people\*. 60mm x 60mm mesh density. (Comes with a 20mm x 20mm debris net as standard)



### Standard (10991 - 10996)

- 4.2 metres or 6 metres long by 3.3 metres wide



### Corner (11000 - 11002)

- 6 metres long by 3.3 metres wide



### Maxi (10997 - 10999)

- 6 metres long by 4.6 metres wide



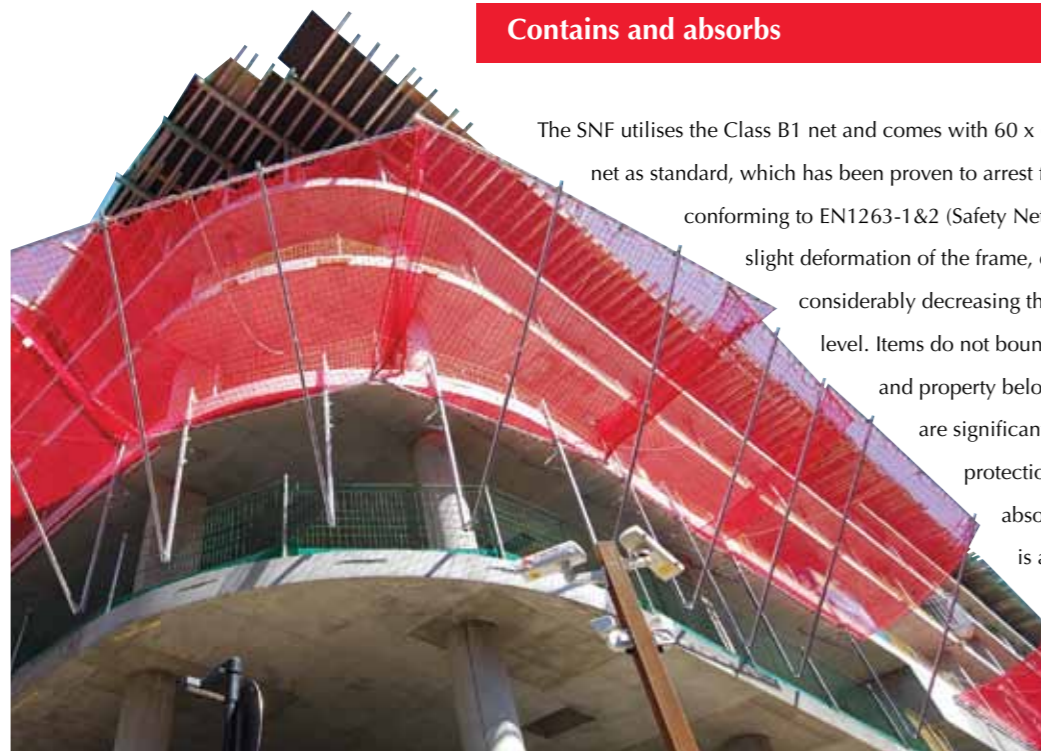
### High Rise

- Designed to withstand wind gusts of up to 100mph
- 100mm x 100mm net overlay with 20mm x 20mm\*\* debris netting
- 6 metres long by 4.6 metres wide

\*The Corner and High Rise models are only designed for catching material.  
\*\*On the main inner section only, not on the kicker 'up section'.

## Contains and absorbs

The SNF utilises the Class B1 net and comes with 60 x 60mm mesh and 20mm x 20mm debris net as standard, which has been proven to arrest falls of up to 100kg from a height of 6m, conforming to EN1263-1&2 (Safety Nets). The elasticity of the net, together with a slight deformation of the frame, ensures that the impact of a fall is absorbed, considerably decreasing the risk of injury or objects falling to street level. Items do not bounce out or shatter which can harm people and property below. B1 nets that comply with EN1263-1&2 are significantly stronger than conventional methods of protection, as well as being energy absorbent, absorbing up to 4.4 kJ. The combined layer net is able to catch considerably smaller particles of debris therefore protecting property and people at ground level. Fans can be folded in to retrieve fallen objects.



## More adaptable

The SNF is designed to fit directly to the building (steel or concrete frame) or to scaffolding using a range of purpose built attachments. The 3.3m wide standard fan, the 4.6m wide maxi fan and the 3.3m wide corner options, ensure that the SNF is suitable for almost every design of building including those with overhangs.

The SNF can also be rapidly repositioned around a building by crane and is designed to move up the building as the project develops.

The SNF can also be overlapped, without requiring stitching or fasteners, or stitched together depending on site requirements. A unique 'Wind-lock' system is optional, allowing the SNF to resist everyday wind forces while aiding retraction during high-winds.

## Improved access

The SNF protects adjacent property and transport facilities against falling objects and being translucent, SNFs do not block daylight, allowing shops and pathways below to remain operational. This makes the SNF an excellent option where space and access to the site is restricted.

Additionally the SNF allows easy access to the edge even when conventional edge protection has to be removed provided restraint measures are used; it can also be folded up against the façade to allow crane access and as a precaution against high winds or heavy snowfall.



# RIDGEWAY

## ATTACHMENT AND ACCESSORIES

The SNF is available with a wide range of fittings, enabling the product to be fixed to almost any type of building structure.

### 1 Attachment Options

#### Slab attachment (10044)

Increases up-stand height to 185mm, reinforced and shaped to fit over cladding cleats or metal decking.



#### Loose slab attachment (10964)

Designed for pre-mounting; brickwork can be built over with the attachment in-situ; allows greater flexibility of fan position.



#### Scaffold attachment (10440)

Designed for securing to scaffold standards. Two vertical attachments required to secure SNF.



#### Facade attachment (10439)

Allows the SNF to be secured to a building facade, without causing damage.



#### Steel Jaw clamp (4542)

Used to secure the SNF to steel beams and columns in the horizontal position.



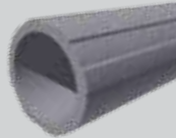
#### Multi Clamp (4537)

Used for clamping over the top of up stands



### 3 Reinforced aluminium tube (standard feature)

50mm diameter, specifically engineered for improved strength and performance.



### Accessories

#### 4 Adjustable Coupler (10933)

Allows correct height mounting for net irrespective of slab attachment adjustment, eliminating gaps. Increased flexibility for curved facades.



#### 5 Knee-brace (10878)

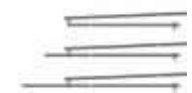
Non-incremental adjustable knee brace. Copes with larger down stands up to 780mm when used together with Extension 10882. More adaptable to steel and concrete structures.



#### 6 Bodies

Three sizes for the Bodies (selected according to requirements).

- 2.5 metres
- 3.0 metres (standard)
- 3.5 metres



#### 7 Wind-lock (10864) (optional feature)

Automatic function – disengages when folding the fan and engages when unfolded. Fits all SNF specifications and is equipped with blocking function in case lock function is not required. Non-incremental vertical adjustment.



#### Offset beam (10965/6)

Can be used together with slab attachment, loose slab attachment or be bolted directly to the building. Allows the SNF to be mounted outside the building, very useful for inclined facades.



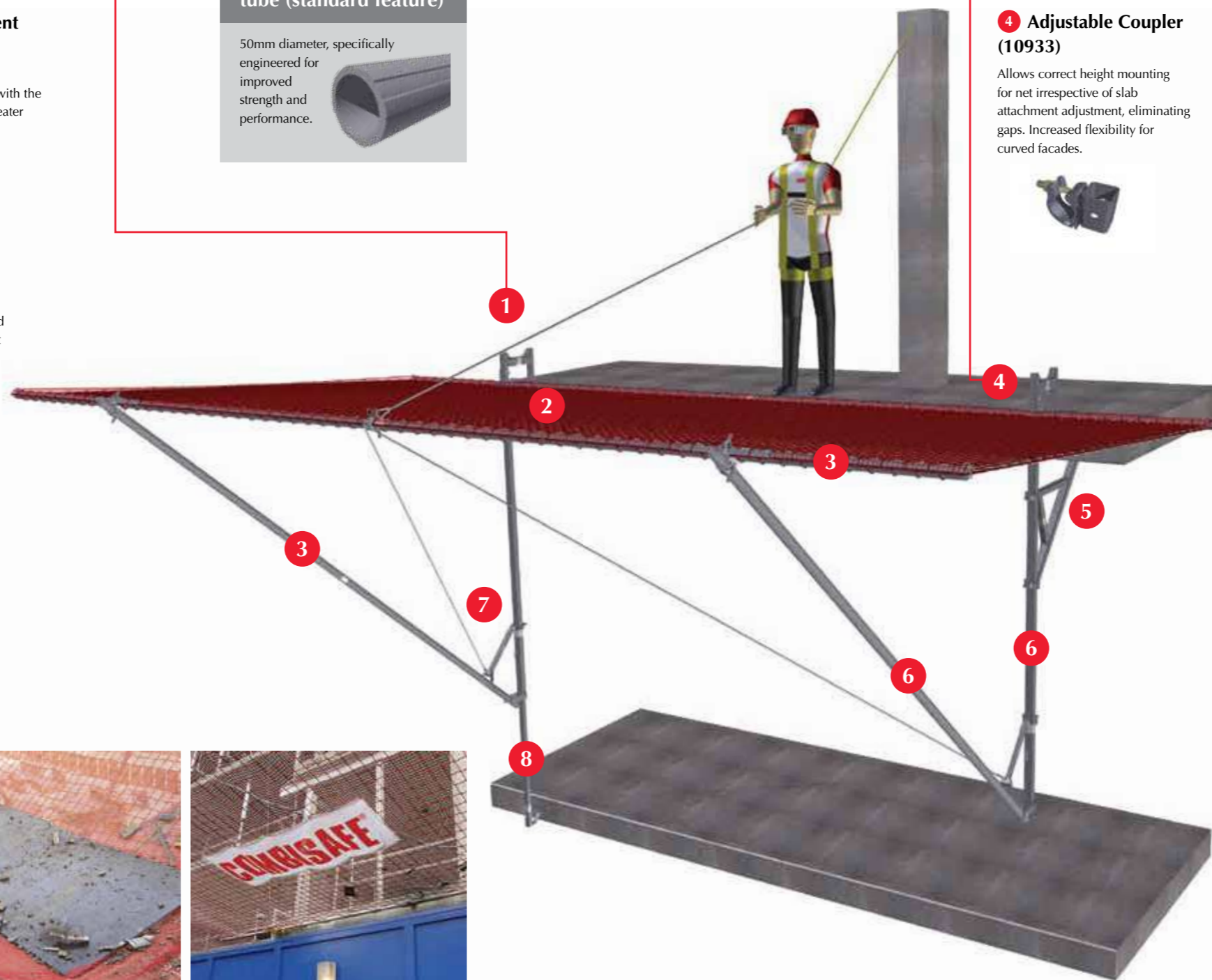
#### 8 Leg extension (10882)

Dual purpose extension; extends knee brace 10878 for larger upstands or extends body to provide reaction support at the floor below. Simpler, slicker design, single bolt anchorage. Guard so that it no longer catches on beams.



### 2 Safety Net

Specialised fall arrest system. Standard Class B1 netting with 60mm x 60mm mesh and 20mm x 20mm debris net. Compliant to EN1263, comes in three different versions and can be fixed using any of the above attachments.



## WHY CHOOSE COMBISAFE SAFETY NET FAN?



# RIDGEWAY



SNFs offer a wide range of benefits, giving advantages over conventional systems to professionals across the Construction Industry all backed by our total support services.

### Project Managers

**Versatility:** SNFs can be used on most building types and in many circumstances where protection is required and they can be moved up the structure as it progresses to suit the changing requirements..

**Site Safety:** SNFs deliver a safe site where people and property are protected, complies with safety regulation EN1263.

**Improved relationship with neighbours:** Shops, businesses, roads and transportation can continue to operate as normal and the risk of complaint and litigation as a result of failing debris is negated.

### Health & Safety Managers

**Improved Site Safety:** SNFs protect people and property from falling objects, catching debris that has not been caught by other measures.

**Total compliance:** SNFs both absorb and contain falling objects and people achieving total compliance with regulations EN1263 and BS8437.

**Flexible Solution:** SNFs are the best safety solution for specific city centre and high rise situations.



### Scaffolding Contractor

**Competitive advantage:** As the safety system provider, integrating specialist products to suit the unique needs of the client will result in a more efficient and cost effective solution. Having a selection of high rise protective measures will provide a differential advantage against competitors.

**Ease of use:** SNFs are simple to erect and can be moved quickly and easily as the project progresses.

**Compatibility:** SNFs will attach directly to your existing scaffolding stock or can be attached to most types of building structure enabling the scaffolder to target projects previously outside of their scope.

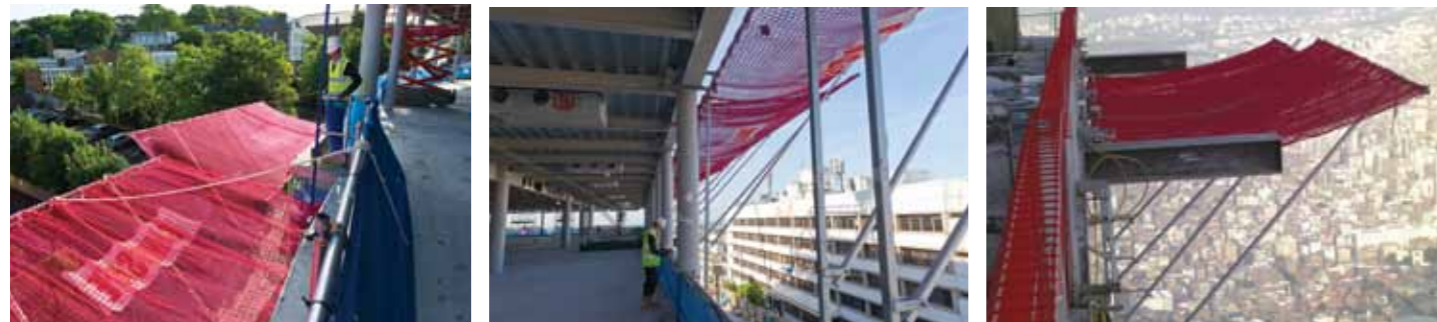


### Specialist subcontractors

**Improved Access:** The SNFs ability to be folded away in seconds means that crane access is vastly improved.

**Improved Safety:** The SNF provides reassurance that any accidental mistakes, such as dropping materials or tools, will not cause serious damage.

**Versatility:** The SNFs wide range of attachments can be substituted at any point to adapt to the surface in question, e.g. steel framework or concrete.



## COMBISAFE TOTAL SUPPORT SERVICES

### Design

Safety Net Fan technical specifications are put together to meet individual project requirements. If required, an additional technical drawing service is available.

### Site

Combisafe Engineering Services Department provide technical support during planning and installation with Field Service engineers available to give on-site advice.

### Training

Full training on safety standards, regulations and installation of the safety net fan is available to all customers of SNFs either on-site or at one of our safety centre facilities throughout Europe.

### Approved Installers

Combisafe have an extensive Approved Installer Network operating throughout Europe and UAE. A full list of our approved installers is available on our website.

### Purchase and Hire

The SNF is readily available through the Combisafe network of Distributors and Rental Partners across Europe and UAE. Safety Net Fans can also be purchased directly from Combisafe.

Combisafe welcome enquiries from companies interested in becoming part of the network of approved installers and also rental companies, some of whom may also undertake installation work.




“ Due to the large steel beams on this project, Combisafe’s standard attachments were not suitable, but they were able to adapt the connection details of the Safety Net Fan to suit the size of the steel. A public footpath and local businesses needed to stay open while construction was in progress and Combisafe was able to adapt the standard Safety Net Fans to be erected to the hoardings. The Safety Net Fans provided protection for passersby from debris whilst letting in natural light to the footpath. This enabled access for the public to remain open and local businesses to carry on trading. ”

**SKANSKA**

Gavin Phipps, Senior Construction Manager, Heron Tower, London





**Project:** One New Change, London, United Kingdom  
**Client:** Land Securities  
**Main Contractor:** Bovis Lend Lease  
**Products:** Steel Mesh Barrier, Safety Net Fan, Combisafe Loading System, Steel Mesh Barrier Beam



**Project:** Makkah Clock Tower, Saudi Arabia  
**Client:** Saudi Binladin Company  
**Main Contractor:** Cimtas  
**Products:** Steel Mesh Barrier S-System and Safety Net Fan

**Project:** Towntown, Vienna, Austria  
**Client:** Immobiliendevlopment Wiener Stadtwerke BMG, STC Swiss Town Consult AG and Donau-Finanz  
**Main Contractor:** STRABAG AG  
**Products:** Safety Net Fans



## PRESTIGIOUS PROJECTS FROM AROUND THE WORLD

The SNF has a proven track record and has been used on prestigious projects around the world ranging from the Aldar Headquarters in Dubai, De Maastoren Tower in Rotterdam to The Shard building in London.

GERMANY • SWEDEN • NORWAY • FINLAND • NETHERLANDS • BELGIUM • UK • FRANCE • UAE • AUSTRIA

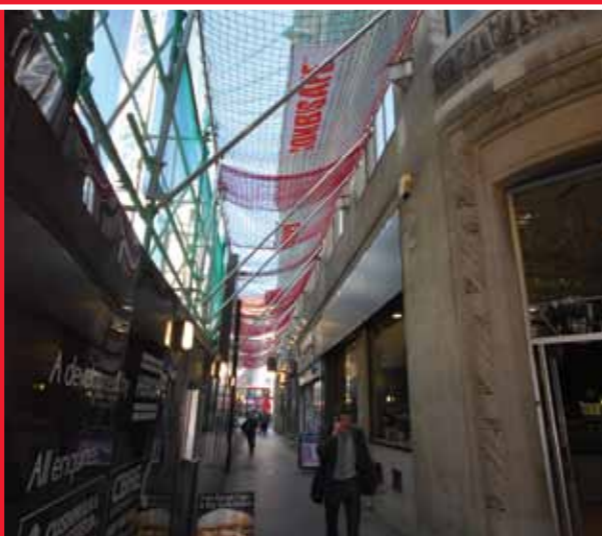


**Project:** Maastoren, Rotterdam, Netherlands  
**Client:** OVG Projectontwikkeling bv  
**Main Contractor:** BESIX nv  
**Architect:** Dam & Partners Architecten  
**Products:** Steel Mesh Barrier, Posts, Flexi Attachment, Safety Net Fans and Multi Box



**Project:** ALDAR Headquarters, Al Raha Beach, Abu Dhabi  
**Client:** ALDAR Properties  
**Main Contractor:** ALDAR Laing O'Rourke  
**Products:** Safety Net Fans

**Project:** Heron Tower, London, United Kingdom  
**Client:** Heron International  
**Main Contractor:** Skanska  
**Products:** Safety Net Fan Maxi and Safety Net Fans



**Project:** DMCC Al Mas Tower, Jumeirah Lake, Dubai  
**Client:** NAKHEEL  
**Main Contractor:** TAISEI – ACC (JV)  
**Products:** Steel Mesh Barriers, Safety Net Fans





# **RIDGEWAY**

Belfast:

103 Airport Road West

Belfast

Co. Down

BT3 9ED

Tel: +44 (0) 28 90454599

Ashbourne:

Unit 1 & 2 Greene Park

Ratoath Road

Ashbourne

Co. Meath

A84 XD98

Tel: +353 (01) 802 7173

Email: [info@ridgeway-online.com](mailto:info@ridgeway-online.com)

Web: [www.ridgeway-online.com](http://www.ridgeway-online.com)