



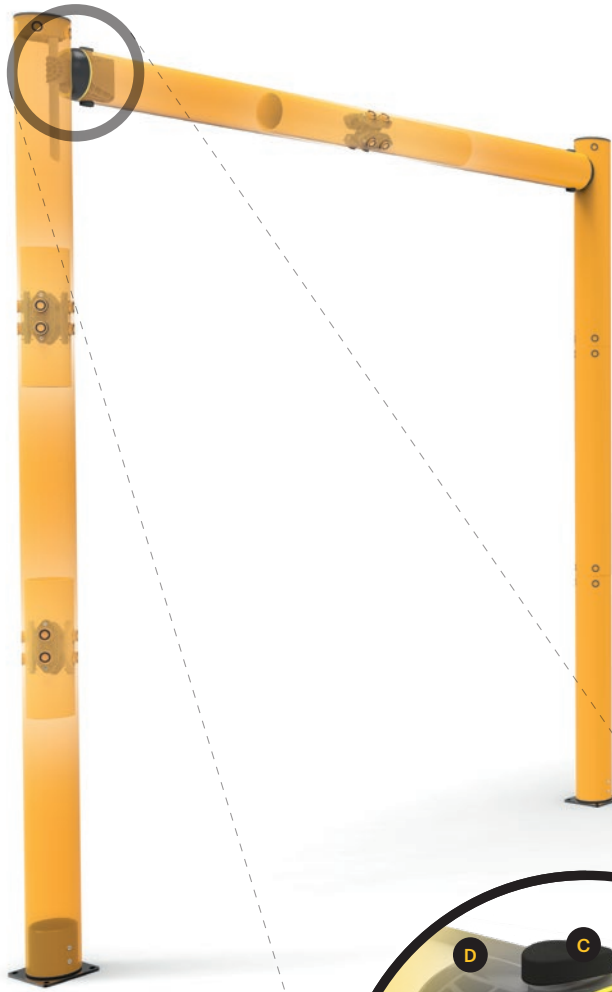
# iFlex Height Restrictor

Designed to protect the edges of doorways and prevent high level damage from vehicle impacts.

Height restrictors offer guidance and physical protection from both side and height collisions, protecting infrastructure. They stop vehicles and loads from making contact with doorway edges and roller shutter door channels, preventing costly damage.

Where there is a risk of collision with overhead pipe bridges, cable trays, air or gas supply lines, or ventilation ducts; Height Restrictors will prevent disruptive and expensive damage as well as warning a vehicle driver that his vehicle or load is too high.





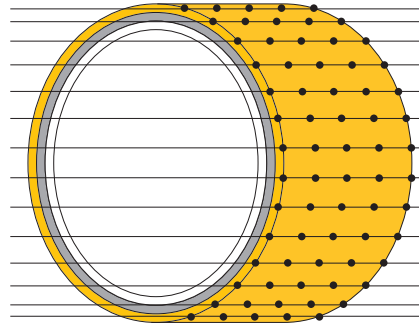
# MEMAPLEX™

## Ultimate strength polymer

created from an exclusive composition of the most sophisticated polyolefins and rubber additives, expertly blended for unequalled strength and flexibility.

## Advanced Engineering Molecular

reorientation during manufacturing creates a unique built-in memory that enables the barrier to fully recover following impacts.



### Revolutionary 3-Layered Material

- Inner strengthening core
- Central impact absorption zone
- Outer UV stabilised colour layer



## In-line coupling for height flexibility

The iFlex in-line coupling introduces a new level of modularity to the vertical height of a range of A-SAFE products. The coupling enables customers to take the standard 1200mm bollard up to 2000mm.

- **Four pin positioning**  
to top and bottom sections gives increased rigidity and stability.
- **Seamless join**  
enables easy stacking of top and bottom bollard sections.
- **Moulded pins**  
lock securely into the internal layer with a quarter turn.

## Energy Absorption System

A patented 3-phase system that activates sequentially for unparalleled energy absorption.

- 1 Memaplex™ rail flexes to absorb impact, initiating the rail pin to slide forward and transfer load energy to the compression pocket.
- 2 Compression of the pocket continues to disperse energy as the coupling rotates around the post pin to activate further absorption.
- 3 At peak energy, the coupling twists further, engaging the post pin and instigating torsion of the post to dispel remaining forces.

## Suitability

### Application



Building and equipment protection



Industrial door protection

### Vehicle



Heavy duty counterbalance FLT



High rack stacker



Electric high reach truck

- A** Post Pin
- B** Coupling
- C** Rail Pin
- D** Compression Pocket
- E** Rail



Unrivalled recovery through a unique built-in memory that allows the barrier to flex, cushion and reform repeatedly upon impact, saving vast amounts in barrier and vehicle repairs.

Huge return on investment from incident prevention and downtime avoidance as barriers, vehicles, floors and equipment do not need replacing or repair.

## Features and benefits



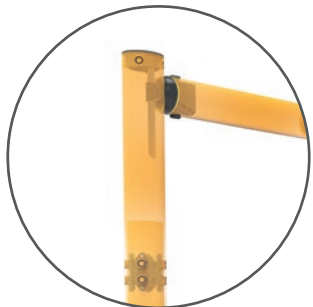
Modular & versatile in-line coupling, ensure a tailored fit to meet specific customer size requirements.



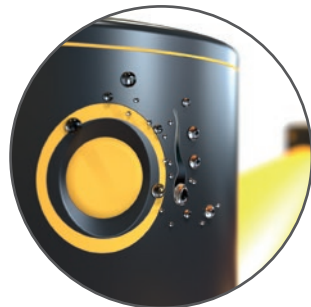
Ultra-low maintenance material is chemical and water resistant, non-corrosive, non-scratch and self coloured so no repainting, rusting, flaking or corrosion.



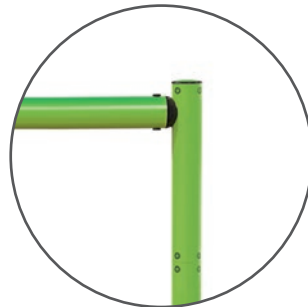
Exclusive modularity allows rails and posts to be replaced in-situ without removing adjacent barrier sections.



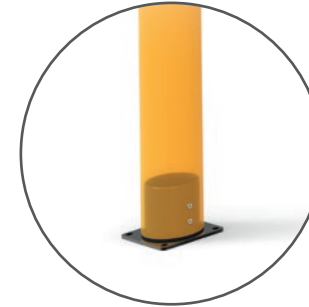
Self coloured and UV stabilised for continued visibility and long lasting aesthetics with no repainting.



Wipe-clean, water resistant surface.



Environmentally friendly and 100% recyclable.

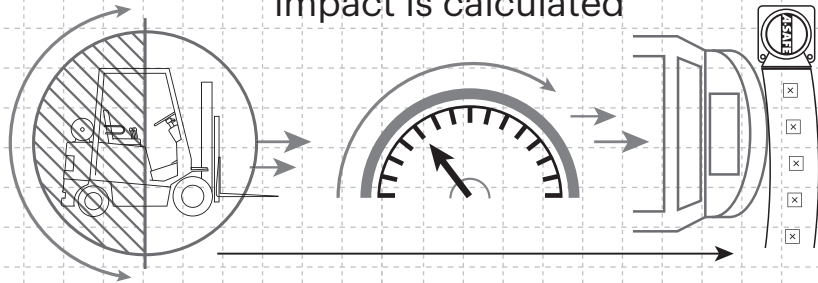


Zinc nickel, electrophoretic coating on base plates as standard, provides advanced protection against corrosion damage.



# Technical Information

How the energy from a vehicle impact is calculated

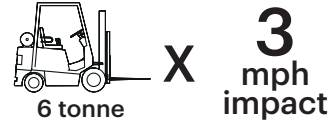


$$\frac{1}{2} \text{ Mass} \times \text{Speed}^2 = \text{Joules}$$

Tested Impact Energy

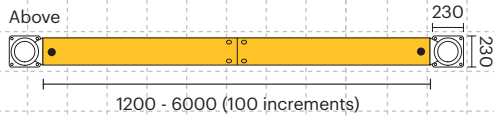
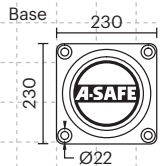
**5,400 Joules**

Equivalent vehicle and speed

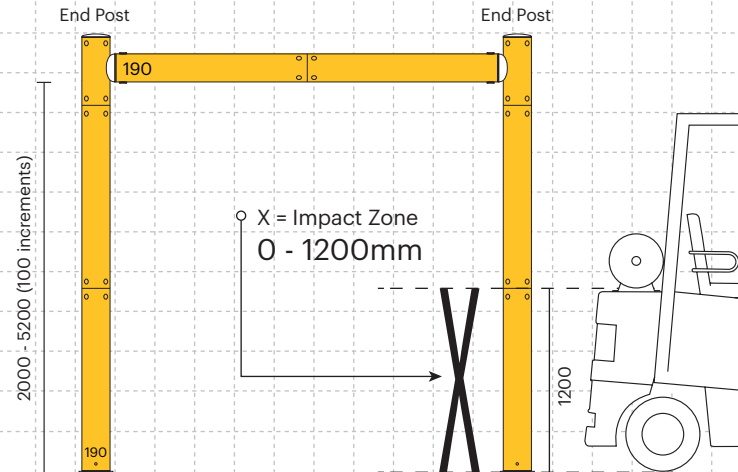


90° Impact on Height Restrictor

Dimensions (mm)



Bespoke arrangements available on request

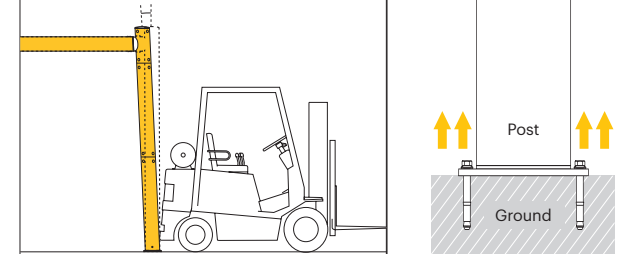


## Impact Test

Max Energy (Joules) at 90° **5,400**

Deflection at Max Energy  
15° Lean

Force to Bolt  
24kN



## Material Properties

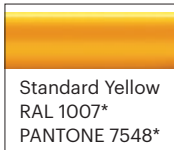
**MEMAPLEX™**

Temperature Range	-10°C to 50°C
Ignition Temperature	370°C to 390°C
Flash Point	350°C to 370°C
Toxicity	Not Hazardous
Chemical Resistance	Excellent - ISO/TR 10358
Weathering Stability (Grey Scale)	5/5*
Light Stability (Blue Wool Scale)	7/8**
Static Rating (Surface Resistivity)	1015 - 1016 Ω

\* Weathering scale 1 is very poor and 5 is excellent

\*\* Light stability scale 1 is very poor and 8 is excellent

## Colour



\*Please note that the RAL and PANTONE colours listed are the closest match to standard A-SAFE colours, but may not be exact matches of the actual product colour and should be used for guidance only.

