

Endura Inflatable Dock Seal



The Endura Inflatable Dock Seal is an essential element for complete environmental sealing at any loading dock. In general, conventional shelters make it difficult for air, water, gases, dust, insects, etc. to enter, but sometimes the closure is not perfect because the unevenness surface of the vehicles.

The Endura inflatable seal improves the tightness because the closures that rest on the vehicle are flexible bags made of extremely resistant textile material, and which are inflated by high-performance fans that maintain the pressure throughout the loading or unloading manoeuvre. The flexibility of the material allows them to adapt to the shapes and unevenness of the body.

The inflatable bags have been designed to fill in, as far as possible, the gaps formed between the vehicle and the loading point and to adapt to the widths and heights of the different vehicles.

The closure to air passage is much better than in other systems and, in addition, thanks to the air chambers created by the bags and the insulating material with which they are made, they reduce the temperature losses inside the working warehouse.



They are perfect for loading docks in warehouses having a controlled environment, where it is necessary to maintain a constant temperature and minimal contact with the outside environment to avoid contamination of the product, or for places where good protection against the intrusion of dust, insects, gases, etc..is required.

The structure of the Endura Inflatable Dock Seal is made with anodized aluminium profiles specially designed to achieve the same resistance as with steel profiles and with the added advantages of oxidation resistance, channels for housing panels and accessories, structural reinforcements and ease replacement of elements if necessary. The Sandwich panels on sides and roof guarantee better insulation and protection of the bags, which are made with a fabric of Polyamide Cordura® thread, an ultra-resistant material against humidity, abrasion and aging caused by solar radiation, used habitually in high-performance military and sports clothing and accessories. The modular construction system makes assembly and maintenance easy.

To prevent possible impacts caused by diverted vehicles, the use of truck guides is mandatory.

To achieve a perfect operation sequence and greater durability, the use of a wheel wedge system with signalling, drive and automatic disconnection of the shelter is recommended.

As an option it is possible to incorporate the Signal Shelter system consisting of a series of linear LEDs integrated into the perimeter profiles and which can be used for various signalling, guiding and lighting functions.

STRUCTURE

It is made up of the roof and the side walls, the external profiles and the internal chassis. The side walls and the roof protect the cushions and improve the insulation of the whole.

Element	Material	Details
Roof and Side Walls	Sandwich panel of 40 mm	Made up of steel of galvanized and pre-lacquered steel in White RAL 9010 and filled with polyurethane foam.
Perimeters	Anodized aluminium profiles	Extruded profiles specially designed for better resistance, fastening of elements, canvas and housings of the linear LEDs.
Fastening	By means of screws or dowels to the support structure (wall or metal).	

Structure Finishing

Roof and side walls: White RAL 9010

Parking visual guides of reflective material

Airbags

Element	Material	Details
Fabric	Technical fabric of polyamide 6.6. Cordura texture. Coated on the inside with polyurethane acrylic resin. Great resistance to wear, break and tear. It is a fabric that is used to manufacture the highly resistant clothing and accessories for civil and military use.	
	Warp	1100 dtex
	Weft	1100 dtex
	Density (WpxWp/cm)	14x14
Colour	Black or grey	
Weight	550 g/m2	
Physical Properties	Resistance to Traction	Warp: 350 daN
		Weft: 270 daN
	Resistance to Wear	Warp: 15 daN
		Weft: 13 daN

Flaps of Bags Protection

Element	Material	Details
Side and upper curtains	Fabric	Double layer polyester fabric coated with PVC. Antistatic.
	Colour	Black
	Thickness	3mm
	Mass	3.5 kg/m2
	Working Temperature	-40°C - +80°C
	Maximum Tension	Maximum tension at 1% elongation es of 12 N/mm
	Flexion/Deflection Diameter	60/80mm

FANS

The air pressure is produced by three independent high-performance centrifugal fans, so in case of damage to one of the cushions, the others are not affected and continue to inflate normally.

Element	Material	Details
Centrifugal Fan	Voltage	230VAC single-phase
	Protection	IP54
	Total Power	0.45 kW (3 x 0.15 kW) fans only

Product Sizes

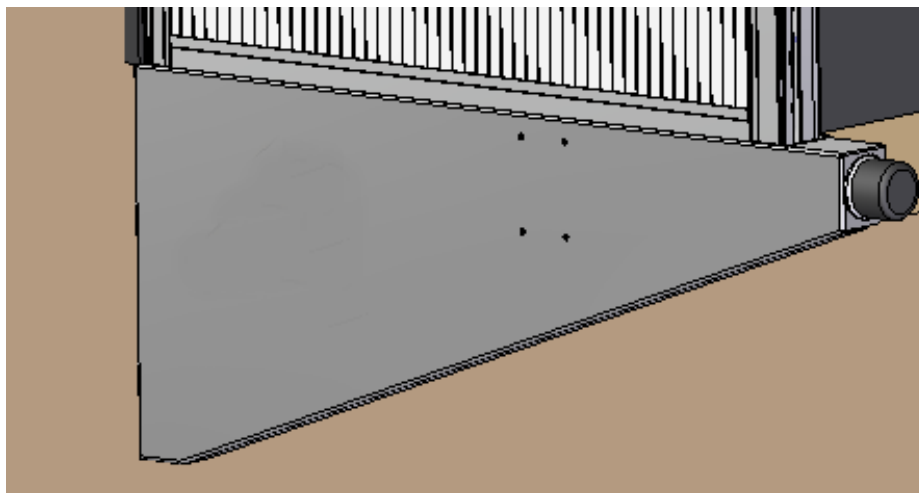
Element	Width (mm)	Height (mm)	Depth (mm)
General Structure	3610	3760 (36-37), 4060 (36-40)	1060
Upper Curtain	-	1050 (STD), 1700	-
Side Curtain	750	-	-

Other Characteristic Elements/Qualities/Options

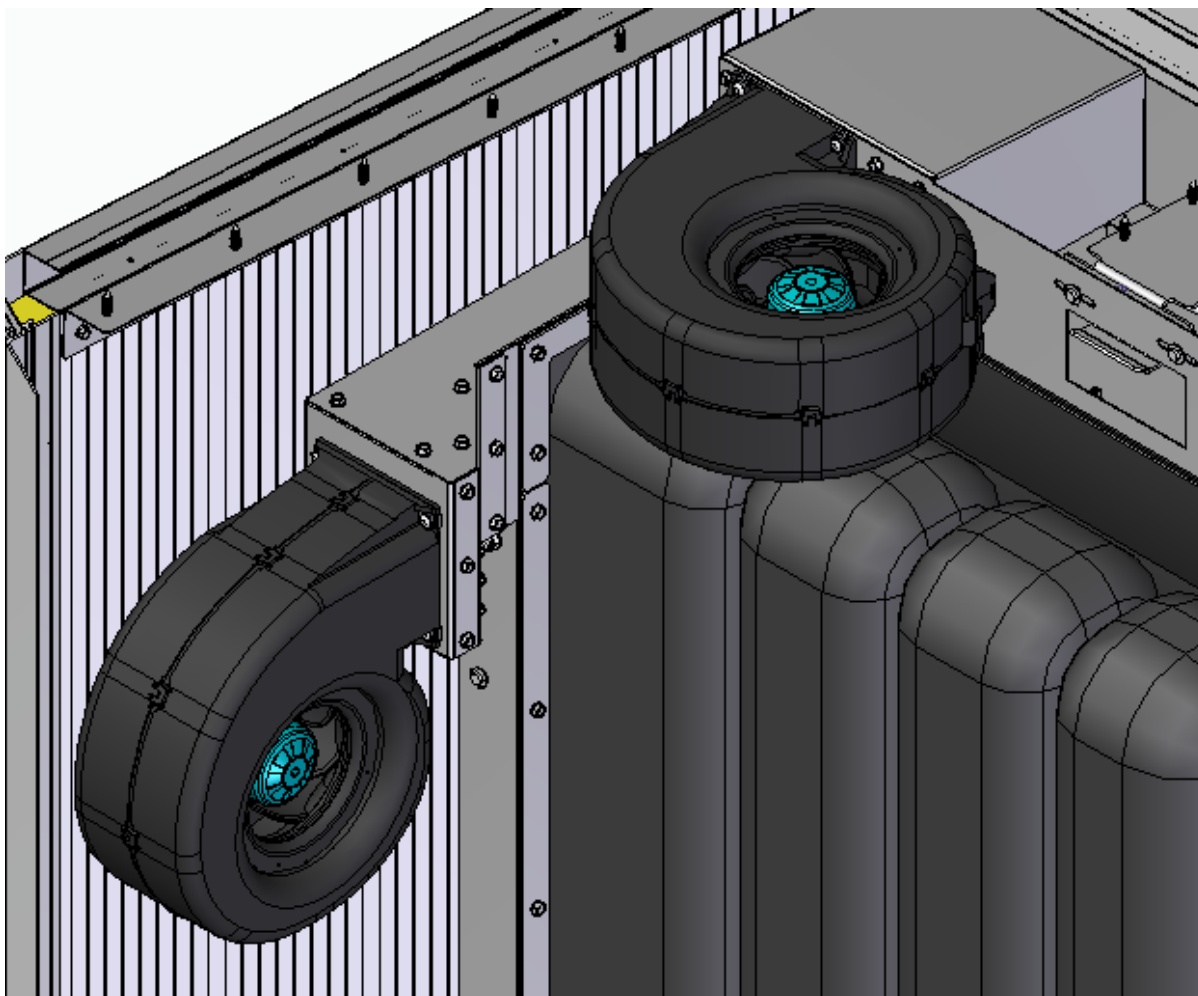
- Externally, for a better protection of the cushions and to increase the insulating capacity of the system, a rigid drawer of sandwich panel lacquered in-house has been installed.
- Galvanized steel bottom supports the depth of the shelter.

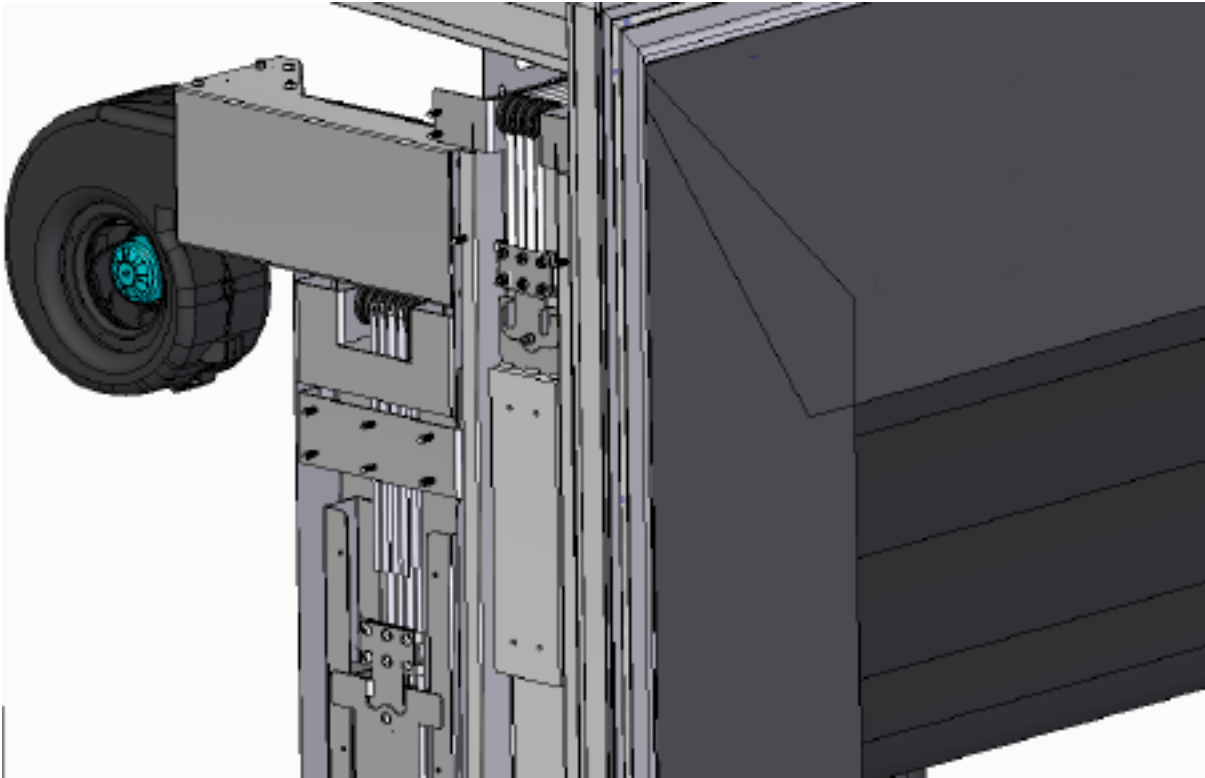
Component Details

Rubber Bumpers

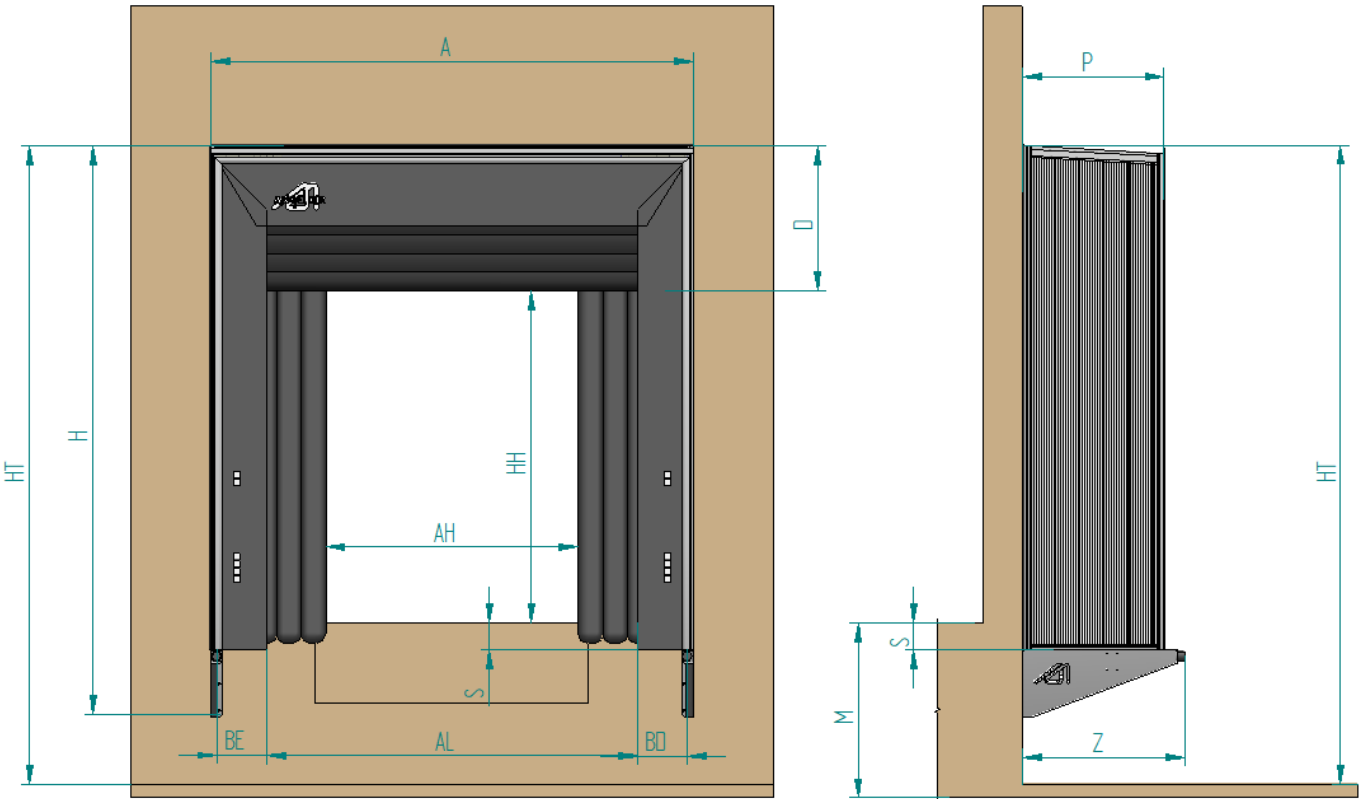


Top and side fan for aribags, easy access for maintenance or repair





DIMENSIONS



Model	AH-ISO 36/37	AH-ISO 36/40
H	4260	4560
A	3600	3600
P	1060	1060
HT	4760	5060
D	1050	1050

Model	AH-ISO 36/37	AH-ISO 36/40
S	200	200
AH	1900	1900
HH	2700	3000
BD	400	400
BE	400	400

Model	AH-ISO 36/37	AH-ISO 36/40
M	1200	1200
AL	2760	2760
Z	1210	1210

Note: Dimensions for a standard docking bay of 1200mm

OPTIONAL SIGNAL SHELTER SYSTEM FOR SIGNALING AND LED LIGHTING

The Signal Shelter system is made up of a series of linear LED, which replace the traditional traffic lights and can, also, provide information for the correct placement of the vehicle; and the supplementary information panels together with a highly reliable presence detection system, indicate the intended dock to the truck, guide its approach and signal when it is in place, ready to start the manoeuvre.

Approach and Manoeuvre

RGB linear LEDs with high light power, inserted into the perimeter profiles of the structure, which can be combined with exceptionally reliable presence detection sensors and a management and control system to signal the vehicle's parking manoeuvre.

They can be installed in the front, in each of the corners and in the centre and are perfectly visible for the driver from the rear-view mirrors of the vehicle.

To increase visibility, as many as necessary can be placed (1, 4 or 8).

Element		
RGB lineal LED (L = 50 cm)	Length	500mm
	Voltage/Consumption	24V _{DC} /20W
	Plate PCB	Aluminium Base
	Other Features	Interconnection connectors at the ends of the circuit. Current regulation integrated in PCB.

Independent safety signs panels

They can point out:

Dock number: Can be illuminated in different colours to indicate the availability of the dock (Free or Busy)

Parking instructions: Stop, Free, Chock, Warning.

Facade Lighting Lights

Courtesy lights located on the back of the shelter and directed at the facade that illuminate.

