

## DOCK SEALS... THE NEED TO SEAL THE 'VITAL GAP'

**sara** meet the challenge from industry to seal this 'Vital Gap' with a range of flexible tailor-made designs to suit all vehicle configurations and variations in the building interface.

### ENERGY CONSERVATION

The conservation of energy is paramount to manufacturing industries and millions of pounds are lost each year, simply by doors being left open.

**sara** are tackling this vital gap with vigorous activity in the industrial door field and **sara** firmly believe that a well-designed loading bay with the correct seal can reduce industry's heating/process bills dramatically.

### HYGIENE

A statutory requirement in most industries is met by the very latest in manufacturing materials by **sara** dock seals such as colourfast/washable materials, insulated panels (cold-store white finish), plastisol finishes, stainless and galvanised steels.

### WEATHER PROTECTION

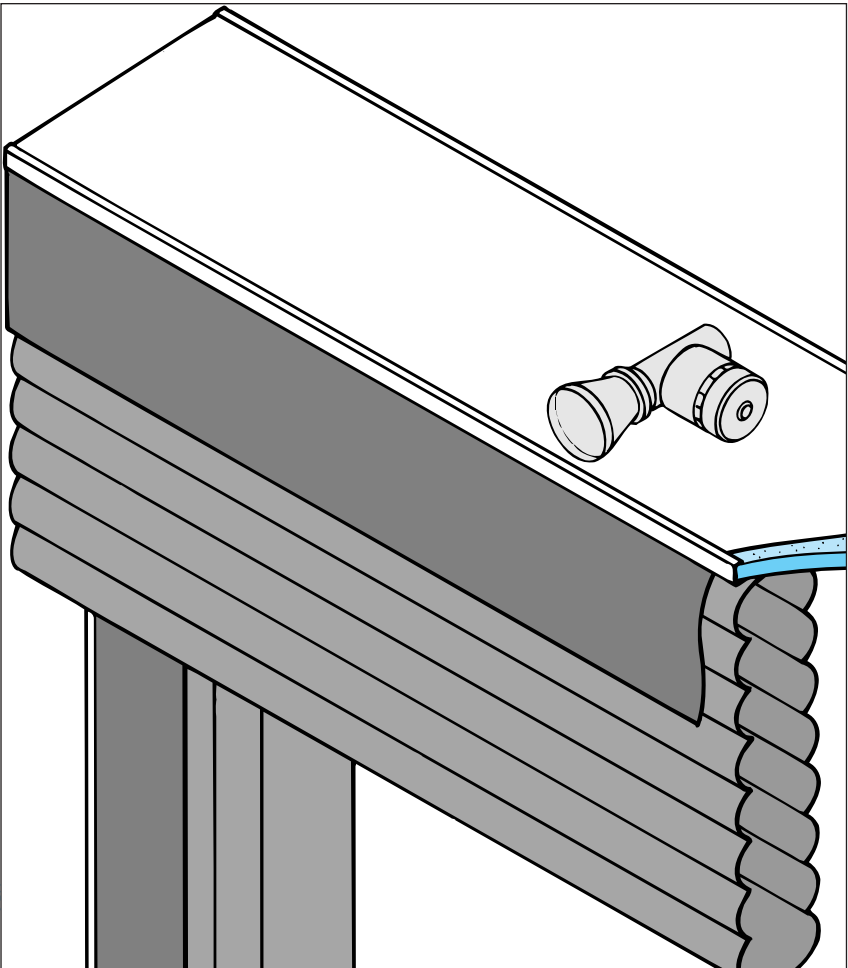
Wind, rain, dust or sun are hazards on many loading bays either at ground or dock level and can affect operators or goods. Protection from all elements ensures a better and safer working environment.

### SECURITY

Correctly chosen dock seals offer protection from pilfering of goods from the outside and ensure entry to the building only via controlled doors. Noise is also reduced which is important in residential areas.

### SAFETY

Draught-free and weatherproof seals help to avoid slippery surfaces which can cause accidents to operators, goods or in-house materials handling equipment.



The wide range of vehicles used by Industry and the strong demand from particular sectors such as Manufacturing, Food and Cold Storage have led to the development of three types of **sara** Dock Seals:

1. 'Wipe' Seal - Vertical curtains on rigid or retractable framework give a wipe seal to the vehicle roof and sides.
2. 'Touch' Seal - Inflatable air bags press onto the vehicle roof and sides.
3. 'Compression' Seal - Rear of vehicle reverses onto projecting buffers and compresses part of the foam pads beyond the buffer line.

### 1. DOCK SHELTERS, RIGID OR RETRACTABLE

pages 4, 5

Rigid, dock level mounted  
Rigid, insulated, dock level mounted  
Rigid, ground level mounted  
Retractable, dock level mounted  
Retractable, ground level mounted  
Non projecting, dock level or ground level mounted

### 2. INFLATABLE DOCK SHELTERS

pages 6, 7

Insulated side panels, dock level or ground level mounted  
Narrow model, dock level mounted  
Wide model, dock level mounted

### 3. FOAM DOCK PADS

pages 8, 9

Fixed head, dock level or ground level mounted  
Fixed head, armour pleated, dock level or ground level mounted  
Moveable head, dock level or ground level mounted

### SELECTION GUIDE

1. Carry out a full survey of heights/widths of all vehicles visiting site. Include tail lifts and unusual projections on rear of vehicle. Include vehicle door type.
2. Identify whether doorways are at dock or ground level.
3. Establish whether building face is flush with dock face and what space is available above and between doors/bays.
4. Establish whether loading bay approach is level or sloped (inclined or declined) from interface.
5. Identify the height and width dimensions of the unit loads entering or leaving the vehicles.
6. Telephone now for a **sara** Technical Salesman to visit you and assist with design selection or ask to visit a local operating site within your industry.

### OPTIONAL EXTRAS

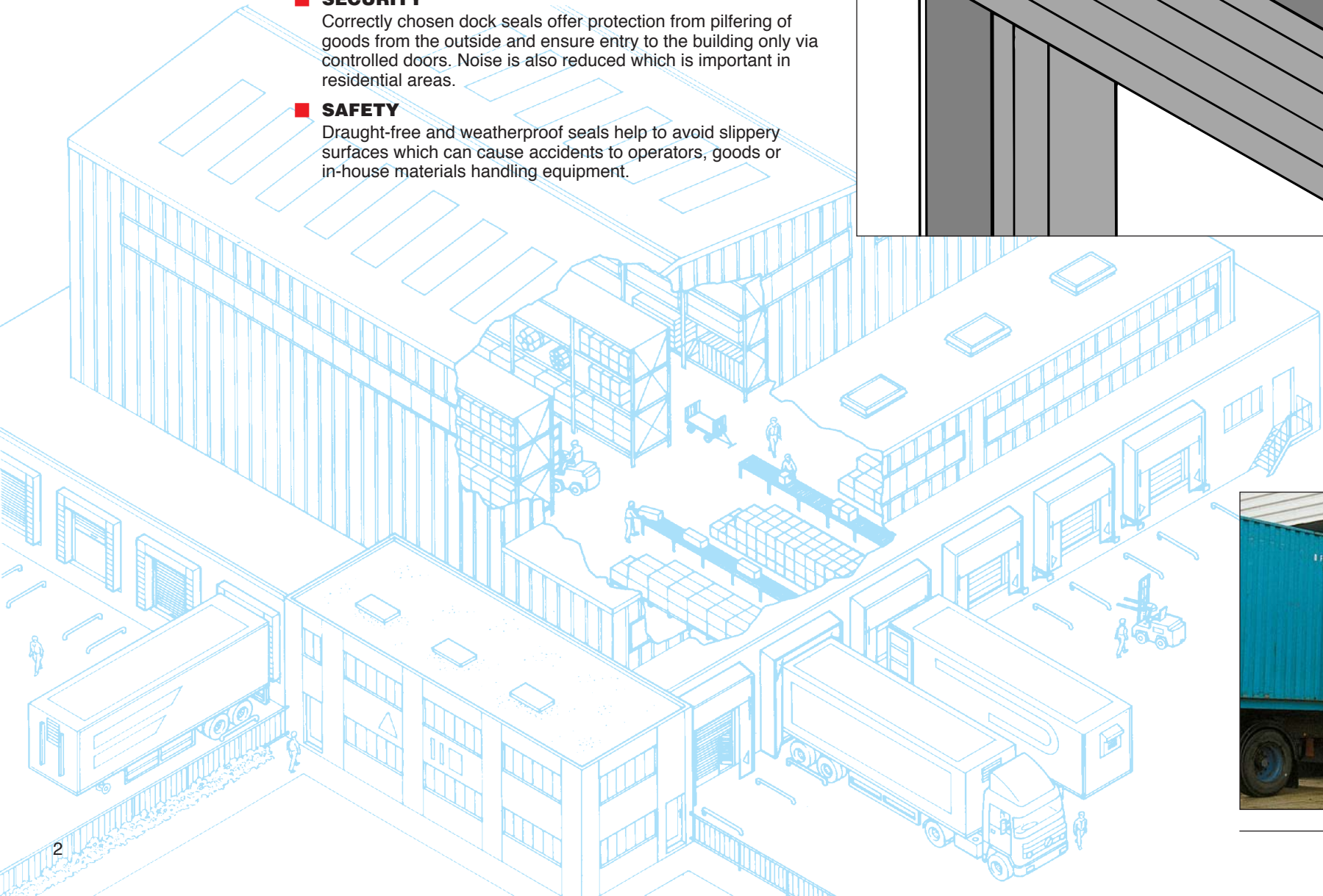
pages 10, 11

Traffic Lights, Internal Dock Lights, Colour Coded Materials, Dock Identification Numbers, Wheel Guides, Bollards, Buffers, Bottom Seal Curtains, Bottom Pads, Special Angled Seals, Canopies, Composite Control Boxes, Scissor Lifts, Dock Levellers, Doors, Electric Interlocks, Insulated Panels, High-Speed Doors.

### GLOSSARY OF CODING ABBREVIATIONS

DSR = Dock Shelter Rigid	NP = Non Projecting
DSRT = Dock Shelter Retractable	DSIF = Dock Shelter Inflatable
DL = Dock Level	FDP = Foam Dock Pads
GL = Ground Level	AP = Armour Pleats
I = Insulated Panels	MH = Moveable Head

All dimensions in mm





## DOCK SHELTERS, RIGID OR RETRACTABLE

The **sara** range of Dock Shelters mounted at dock level or at ground level are manufactured with a choice of three frame constructions.

**A.** Galvanised steel box sections with Plastisol colour coated sheeting, and raked roof.

**B.** Treated timber clad in black pvc/polyester heavy duty fabric. Sloping roof rear-to-front.

**C.** Insulated side and roof panels finished with steel colour-coated white Plastisol sheets, sloping roof rear-to-front.



Dock Level Models have steel supporting brackets under each side panel fixed to dock face.

Each model has two vertical side curtains and a horizontal head curtain attached with a special aerolastic wind guy system to maintain curtain positions.

Curtains are constructed and machine stitched in heavy duty 3mm thick PVC Derco.

All fabrics are specially coated and are colourfast.

Standard Dock Level Model is 3500mm wide 3500mm high, 600mm projection with head curtain drop 1200mm and side curtains of 650mm width each.

Special sizes can be constructed to suit other applications.

Retractable galvanised framed units are also available for dock and ground level use.

When a set of Dock Shelter curtains and their front face framework are required to fit within a new or existing

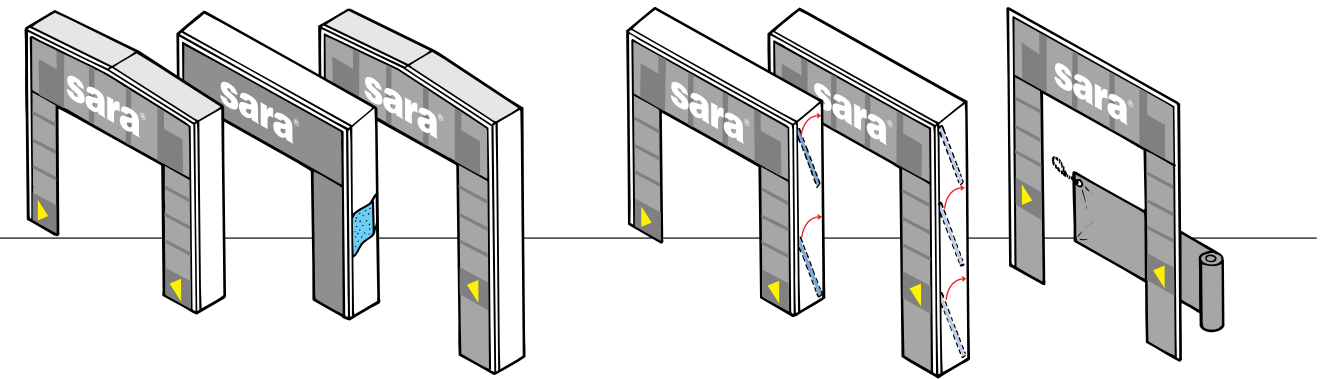
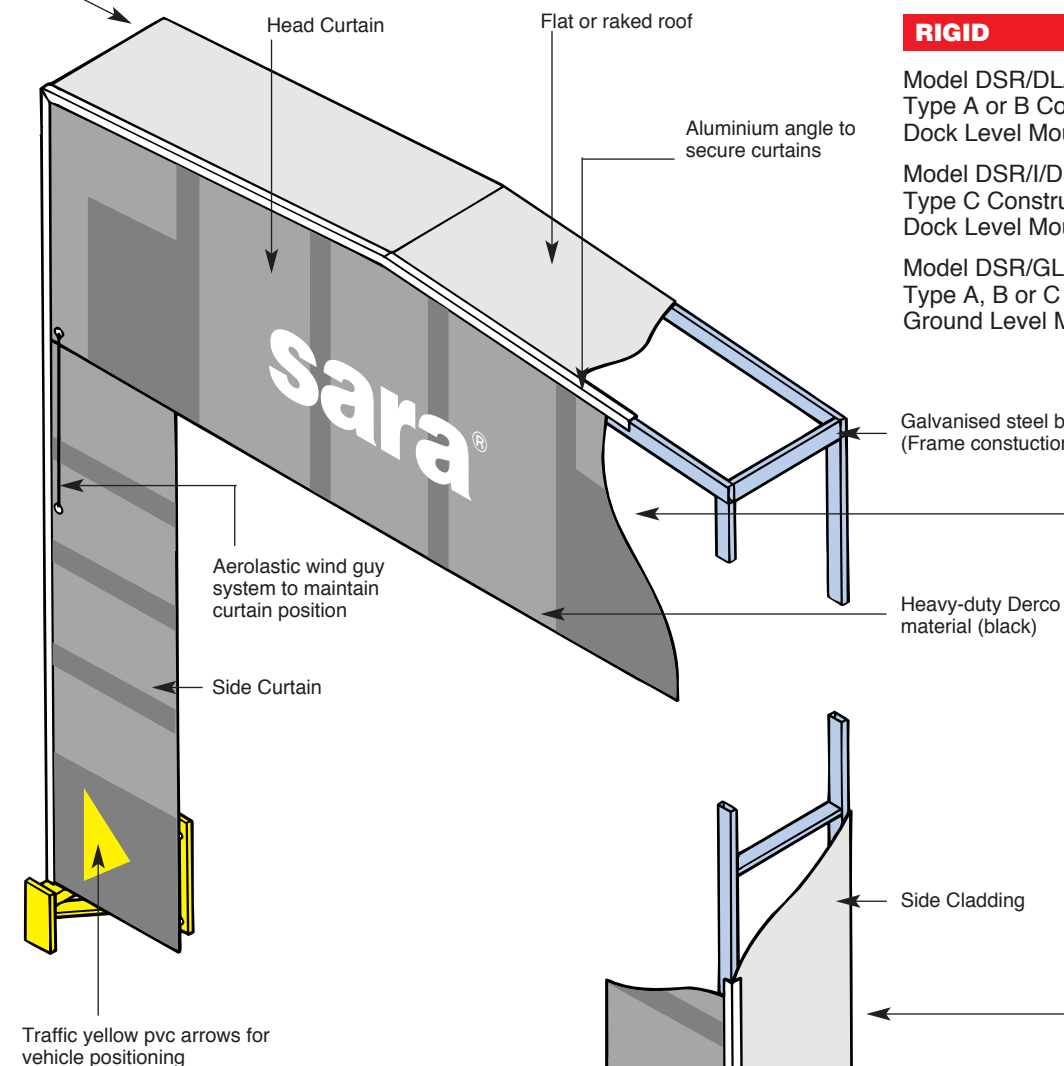
structural opening **sara** can supply 'Non-Projecting' models.

When there is no dock and the Dock Shelter is mounted at ground level a helpful accessory is the **sara** Bottom Seal Curtain, manually operated.

### BENEFITS

- Good value for money, caters for a wide range of vehicle sizes.
- Choice of frame structures to meet latest hygiene regulations.
- Materials selected to complement aesthetics of building and planning designs.
- Materials specifically used to resist abrasive action by vehicles and the elements.
- Specially-designed spring curtain action gives the optimum seal on vehicle sides and roof.
- Ground level units and bottom seal curtains to suit.
- Yellow traffic-markers stitched into side curtains to assist safe vehicle positioning.

Illustrated:  
Rigid Dock Shelter  
Type A Construction  
Dock Level Mounted



### RIGID

Model DSR/DL/3535  
Type A or B Construction  
Dock Level Mounted

Model DSR/IL/3535  
Type C Construction  
Dock Level Mounted

Model DSR/GL/3547  
Type A, B or C Construction  
Ground Level Mounted

### RETRACTABLE

Model DSRT/DL/3535  
Dock Level Mounted

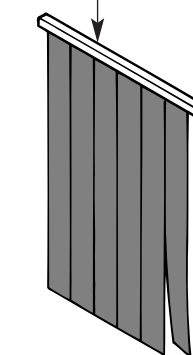
Model DSRT/GL/3547  
Ground Level Mounted

Retractable models offer the benefit of folding back if struck by a poorly parked vehicle, reducing the possibility of impact damage.

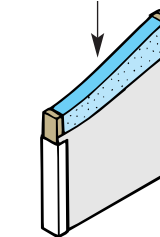
### NON-PROJECTING

Model DSR/GL/NP  
Ground Level, W+H to suit  
Optional Bottom Seal Curtain  
(manually operated)

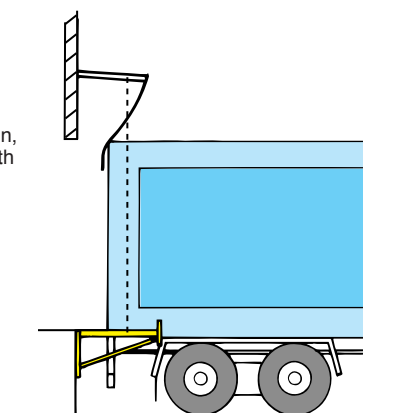
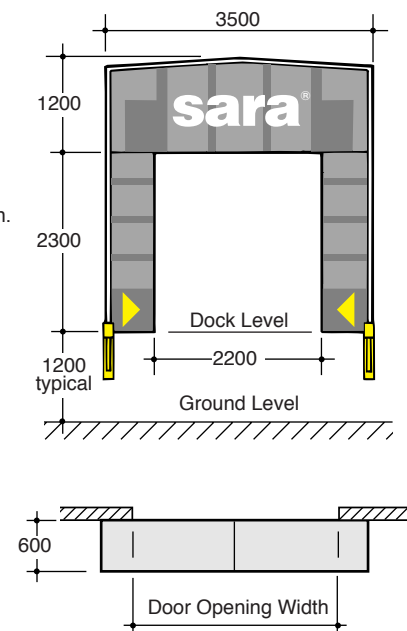
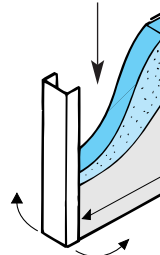
Optional Strip Type Head Curtain.  
Single or double layer



Optional Insulated Side Frame  
Construction (Frame Construction C)



Optional Side Frame Construction,  
foam-filled but wider. Will flex both  
sideways and front-to-back.





## INFLATABLE DOCK SHELTERS

The increased demand from industry for this high quality type of seal has put **sara** in the forefront with three types of Inflatable Dock Shelter.

The first inflatable model (DSIF/DL/3637) includes fully insulated side panels to meet current hygiene regulations with head frame finished in white Plastisol steel and sloping rear-to-front roof for drainage.



Side storage curtains in black 3.5mm thick pvc for air bag protection secured by aluminium angle around three sides. Both side storage curtains have stitched yellow traffic-guide arrows for safe vehicle positioning.

Air bag construction is machine-stitched heavy-duty 610gm/m<sup>2</sup> black pvc/polyester material. All curtain materials are colourfast and designed for external use.

The side air bag seals have an internal retraction system to allow them to lie flat behind the storage curtain when not in use.

The head air bag seal which is full width across and in front of the side seals is retracted automatically by a weight operated roller system in the head.

The inflation system is operated by a motor/fan three phase requiring only 10 amp supply. This unit is mounted on the underside of the roof panel. Down to the ground units are also available.

The second inflatable model (DSIF/DL/2937) is narrower in

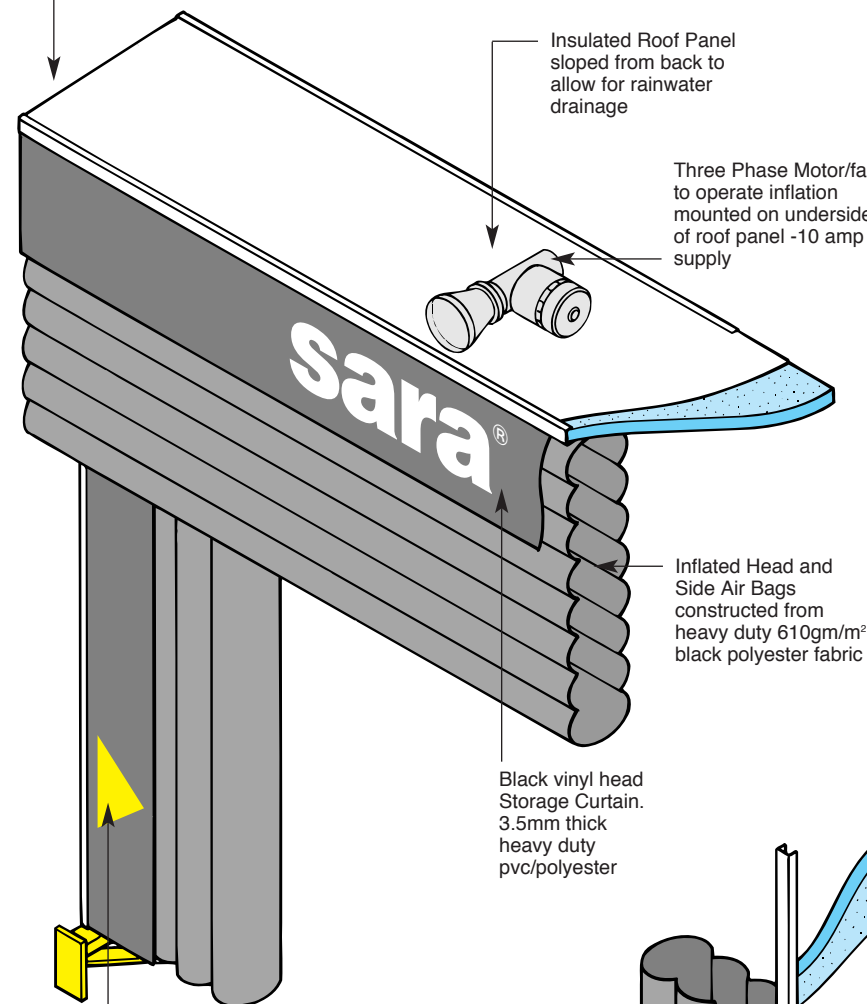
overall width to allow for more units on interface but without fixed side panels to assist vehicle movement. **Air bags inflate directly from wall position** behind the buffer line and are specifically designed to seal the gap between vehicle door hinges. Curtain and air bag materials are as above.

The third inflatable model (DSIF/DL/3437) is designed to allow side air bags to inflate direct from the building to **totally enclose the vehicle rear** and seal on vehicle sides. The insulated roof and the design of the deflated air bags bring an important benefit: The vehicles can have the maximum manoeuvring space on entry or exit. Materials are as above.

### BENEFITS

- A very good seal for a large range of vehicle heights.
- Hygiene regulations catered for.
- Internal retraction system for side air bags gives a smart, tidy appearance. Enclosed counterbalanced weight retraction for head seal also looks smart when deflated.
- Colour coded materials available.
- 10 secs timing for vehicle seal after parking.
- Insulated panel construction.
- Choice of sealing air gap between vehicle doors without major loadings on building and seal.
- Can be mounted on buildings with light-duty construction.

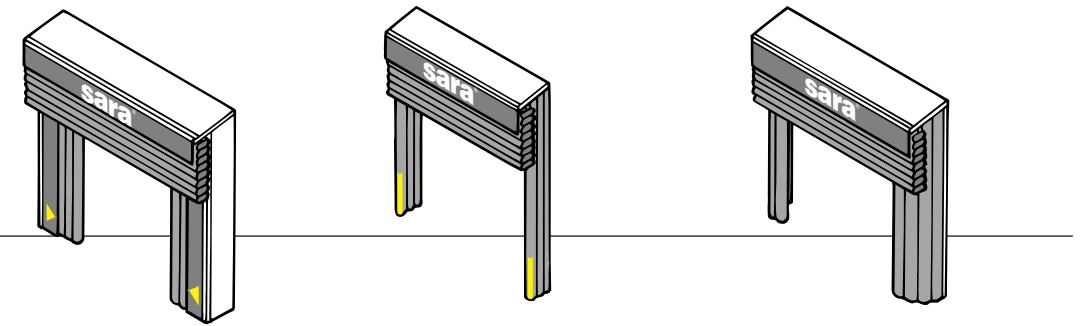
Illustrated:  
Insulated Side Panel Model  
Dock Level Mounted



Traffic yellow pvc arrows for vehicle positioning

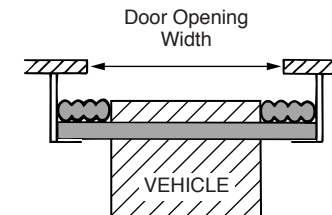


Steel Support Bracket



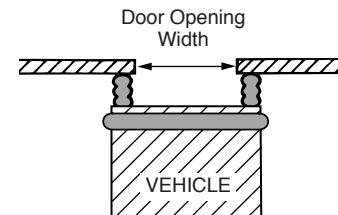
### INSULATED SIDE PANEL

- Special design to meet hygiene regulations
- Model DSIF/DL/3637  
Dock Level Mounted



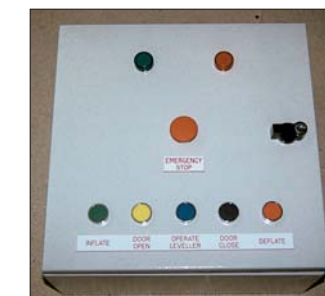
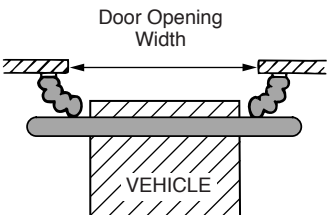
### NARROW MODEL

- No vehicle obstructions below roof line when deflated
  - Narrow model allows more loading bays per running metre
- Model DSIF/DL/2937  
Dock Level Mounted

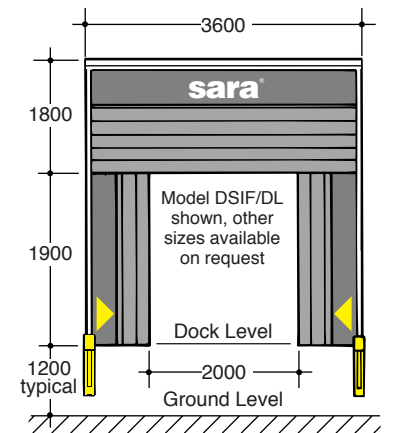


### WIDE MODEL

- No vehicle obstructions below roof line when deflated
  - Side air bags fully enclose the rear of the vehicle
- Model DSIF/DL/3437  
Dock Level Mounted



Composite Control Box for Inflatable Dock Seal, Dock Leveller and Insulated Door, with interlocks and traffic light indicator lamps can provide a safer working environment and reduce damage!



Deflated



Inflated  
Model DSIF/DL/2937 shown



FOAM DOCK PADS

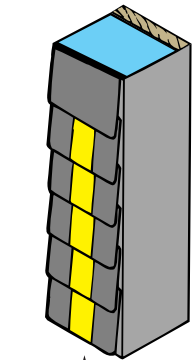
Foam Dock Pad Seals are still very popular with the food and cold store industries thanks to the efficiency of the compression seal.

Certain parameters are important to obtain this efficiency: A solid flush structure on the interface is needed and the seal around the door should be carefully designed to suit all recorded vehicle widths and heights.

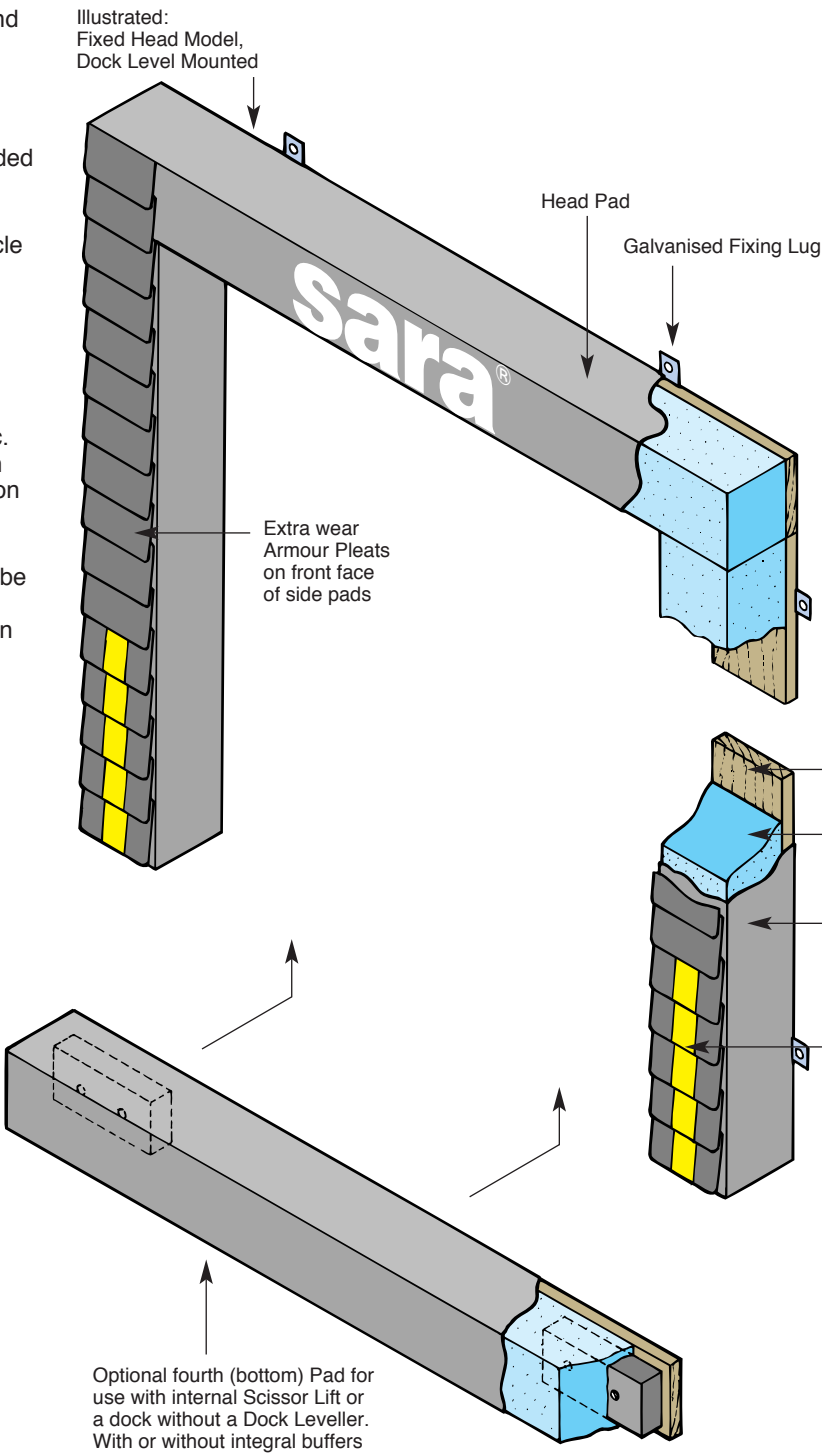
The Foam Dock Pads can be tapered to suit loading bay approach slopes or have an adjustable head for various vehicle heights.

Standard pads have a rear frame of seasoned-timber or galvanised steel bonded with a polyether foam then covered with a 900gm/m<sup>2</sup> woven polyester based pvc. They are then covered with heavy duty 1500gm/m<sup>2</sup> nylon based neoprene black hovercraft-skirt material.

Foam Dock Pads can also be specified with full height extra-wear armour pleats on the front face of side pads.

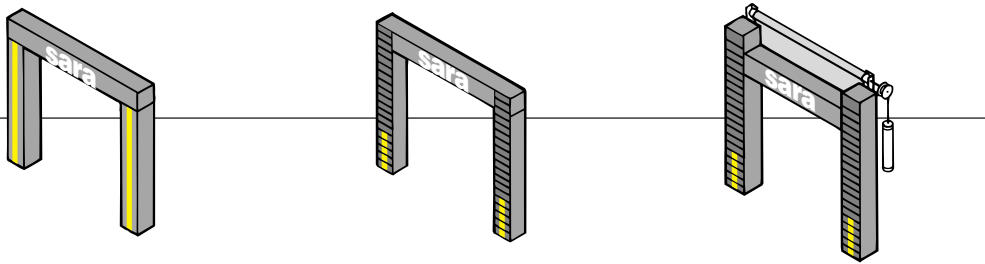


Replaceable Side Pad section for extra heavy duty applications



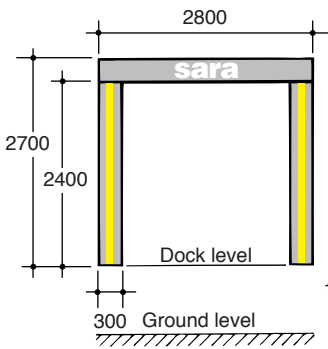
BENEFITS

- Very good seal when all vehicles have been identified in advance.
- Allows more seals on building interface.
- Replaceable sections of pads can reduce maintenance costs.
- Yellow guide reversing strips for vehicle positioning.
- Good compression recovery on foam specification.
- Choice of pad designs to meet sloped approaches.
- Bevelled pads to assist with wider doorways.
- Unique moveable head seal with travelling roller blind.



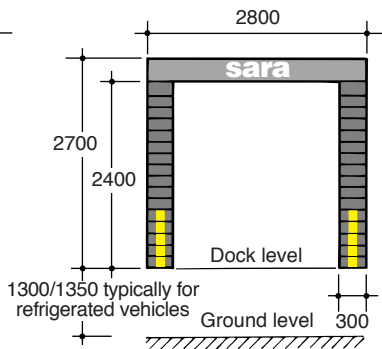
FIXED HEAD

Model FDP/DL/2824/3/45/6  
Dock Level Mounted



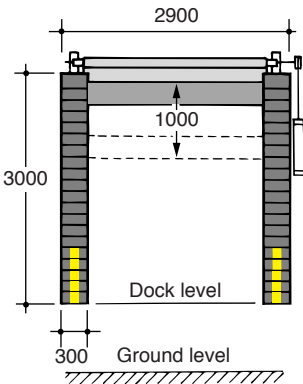
FIXED HEAD  
ARMOUR PLEATED

Model FDP/DL/AP/2824/3/45/6  
Dock Level Mounted

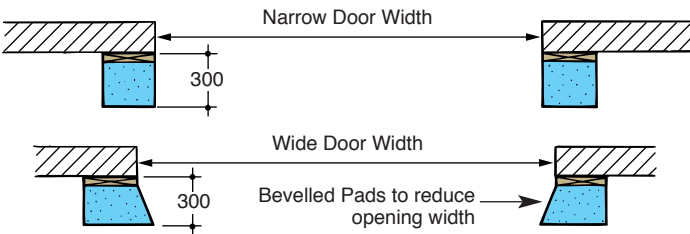
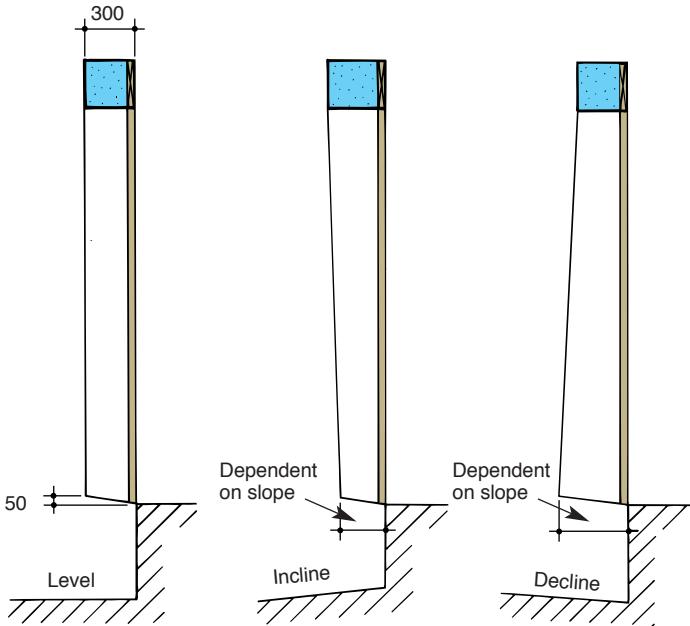
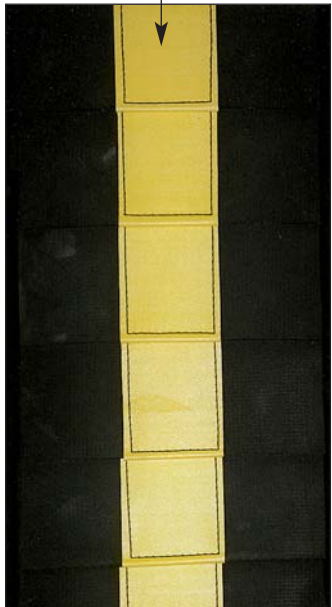


MOVEABLE HEAD

Model FDP/DL/MH/2930/3  
Dock Level Mounted



- Rear Frame of seasoned timber or galvanised steel
- Polyether Foam
- 900gm/m<sup>2</sup> woven polyester based pvc covered with heavy duty 1500gm/m<sup>2</sup> nylon based neoprene black hovercraft skirt material
- Yellow Guide Strip for vehicle positioning

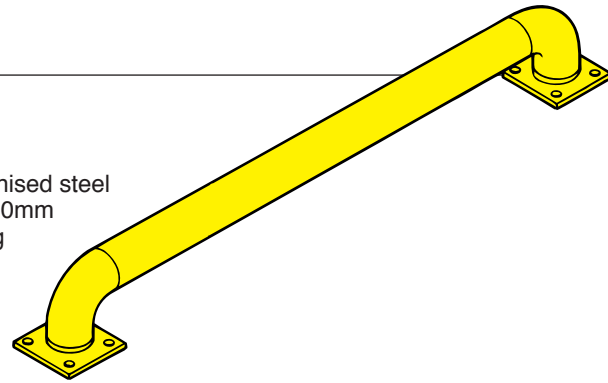
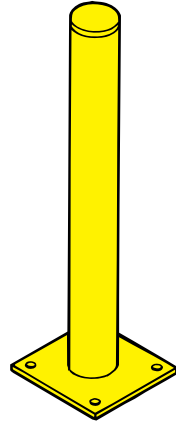




## OPTIONAL EXTRAS

### Wheel Guides

168mm diameter tube hot dipped galvanised steel or polyurethane traffic yellow finish. 2580mm long x 340mm high. Available with fixing plates or for casting into concrete.

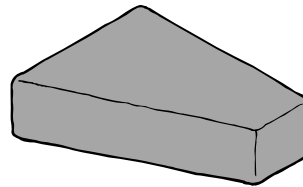


### Bollards

100mm diameter (internal) or 168mm diameter (external) x 1200mm high, Steel Bollards. Base plate fitting or for casting into concrete. Finish in hot dipped galvanised steel or in traffic yellow polyurethane.

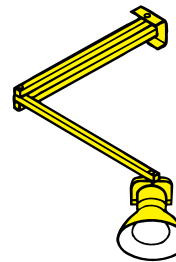
### Bottom Corner Pads

Sets of Seal Pads for bottom corners of rigid or retractable Dock Shelters to seal off at dock height level the area beside the buffers.



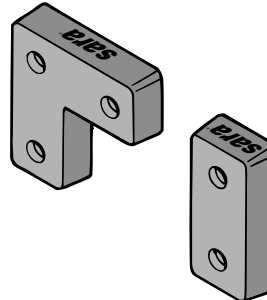
### Anglepoise Internal Dock Lights

Swivel Dock Lights for illumination and safety to enable operations inside vehicle bodies. When not in use they can be hinged back out of dock traffic area.



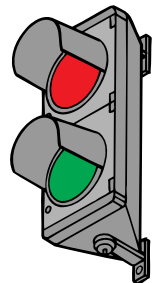
### Dock Buffers

Constructed from strong reinforced rubber composite to reduce the considerable forces of vehicles reversing on to the dock face. Both rectangular and 'L' shapes available.



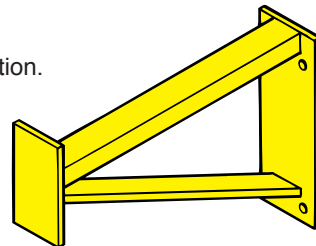
### Traffic Lights

LED or Standard available. Single or double units Red/Green. Maintenance free. 100mm, 210mm or 300mm diameter lenses. Special weather resistant housings.



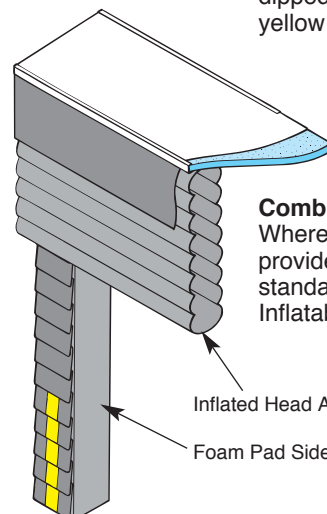
### Steel Support Bracket

Brackets extend beyond dock shelter projection. Constructed from 90mm x 90mm angle welded steel sections. Finished in hot dipped galvanised steel or traffic yellow polyurethane.



### Combination Shelters

Where a customer has particular requirements **sara** can provide "Combination Shelters" incorporating the benefits of two standard designs. Example shows Foam Pad Sides (FDP) and Inflatable Head (DSIF).



Inflated Head Air Bags

Foam Pad Sides

## SERVICE



Service is a vital part of **sara**'s activities. Customers always remember good service and **sara** want all our Customers to "come back again"!

**sara** offer a dependable nationwide service for installation, repair and maintenance work, covering all **sara** products and all other manufacturers as well.

Fully experienced and trained engineers, all employed by **sara** or their sister companies, are based currently at 6 strategically located depots, with further depots planned for the future.

Our engineers use fully-equipped mobile workshops including a full range of tools, equipment and mobile telephones.



**sara** offer Service and Maintenance for:

- Dock Seals, Dock Shelters, Dock Pads.
- Dock Levellers, Scissor Lifts, Goods Lifts, Car Lifts.
- Sectional Overhead Doors.
- Roller Shutter and Folding Shutter Doors.
- Fire Doors, Crash Doors. Swing Doors, Strip Curtains.
- High-Speed Traffic Doors.

And of course, all **sara** products.

