



# Aisle Containment System

[www.cooperbline.com](http://www.cooperbline.com)

## Introducing V-Line Aisle Containment

Cooper B-Line's new V-Line Aisle Containment solution has been designed to provide a modular and scalable solution that can be adapted to suit individual site configurations where V-Line cabinets are deployed.

### What is Aisle Containment?

Aisle containment is simply a means of segregating the cold air feed and the hot air return. By stopping these two elements from mixing, you can achieve some significant technical and operational benefits.

By increasing the control air temperature within a data room by 1°F, studies have shown that operational costs can be reduced by as much as 3% to 4%. The higher the control temperature the lower your operational costs.

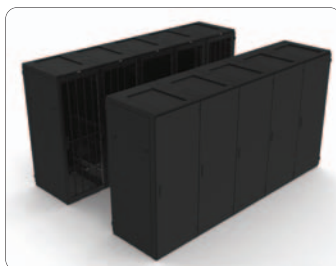
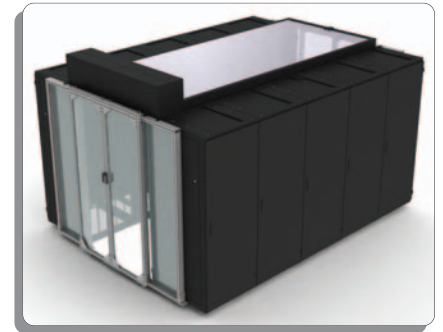
With conventional hot and cold aisle configured data rooms aisle containment provides a simple but effective solution to optimize your installation. Deploying aisle containment helps to reduce cooling costs and enables increased equipment densities.

### Aisle Containment Benefits

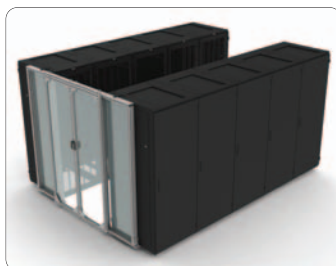
- Ensures the supply air reaches the equipment cooling inlet position at the lowest temperature
- Provides a more uniform air delivery temperature to each equipment space
- Helps overcome issues associated with high velocity supply air bypassing lower U positions
- Achieves greater uniformity of the air delivery which enables tighter control of the control air temperatures
- Helps to promote higher return air temperatures back to the CRAC units
- Improves the efficiency of the data room by optimizing the cooling infrastructure
- Provides the opportunity to lower operational cooling costs and increase equipment densities

### The V-Line Aisle Containment System is

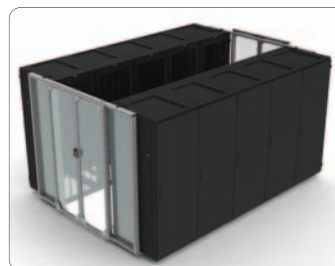
- Adaptable
- Configurable
- Modular
- Simple



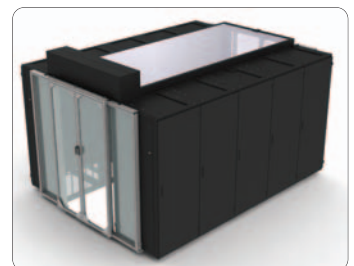
1. Cabinets configured in hot and cold aisles



2. Add first end of aisle door



3. Add second end of aisle door



4. Add pod roof

# Aisle Containment System

## Design Features & Benefits

Features	Benefits
V-Line Compatible	<ul style="list-style-type: none"> <li>■ Designed to compliment the V-Line Cabinet range allowing quick and easy deployment</li> <li>■ Secures to the V-Line Cabinet without the need to drill additional holes</li> <li>■ Fully retro fitable</li> <li>■ Independent supporting / cabinet supported structure</li> <li>■ Designed to minimize floor loading</li> </ul>
Modular	<ul style="list-style-type: none"> <li>■ Options to allow varying aisle widths and depths</li> <li>■ Configurable options to provide 2 x 24" tile or 3 x 24" tile aisle configurations</li> <li>■ Available to suit cabinet pods of up to 30 feet (15 x 24" wide cabinets or 12 x 29.5" wide cabinets or a mixture of cabinet widths)</li> </ul>
Sliding Doors	<ul style="list-style-type: none"> <li>■ No threshold trip hazard</li> <li>■ No encroachment into walkways</li> <li>■ Clear acrylic panels allow light to enter into the aisle</li> <li>■ Clear acrylic panels provide unhindered view of aisle space for added safety and security</li> </ul>
Retractable Roof Pods	<ul style="list-style-type: none"> <li>■ No interference with fire suppression systems</li> <li>■ Roof membrane allows light to enter into the aisle</li> <li>■ Replaceable thermal fuses provide automatic roof retraction in the event of a fire</li> </ul>

## Door Configuration Overview



### V-Line Aisle Containment End Of Aisle Sliding Door Assemblies

- Supplied part assembled and crated for on site final configuration and mounting
- Standard door width is 89" wide (2260mm) to suite two tile and three tile aisle configurations
- Supplied with all brackets and hardware to mount to standard V-Line Cabinets
- Aluminum construction to minimize floor loading
  - 42U - 341 lbs (155kg)
  - 45U - 345 lbs (157kg)
  - 47U - 351 lbs (160kg)
- Available finished in black or silver

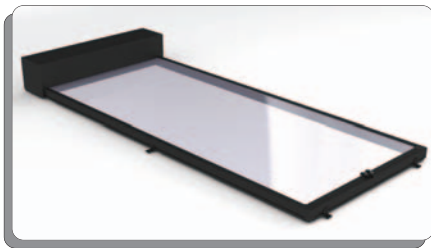
## Sliding Door Assembly Part Configuration

Sliding Door Assembly Part Code Configuration					
Part Code	Component	Cabinet Height	Door Width	Locking	Finish
<b>VC</b>	<b>SD</b>	<b>42</b>	<b>S</b>	<b>N</b>	<b>S</b>
V-Line Aisle Containment	<i>Options</i> SD = Sliding Door	<i>Options</i> 42 = 42U 45 = 45U 47 = 47U	<i>Options</i> S = Std	<i>Options</i> N = Non Locking	<i>Options</i> B = Black S = Silver

## Sliding Door Assembly Catalog Part Codes

UPC Code	Catalog Part Code	Unit Height	Height in.	Description	Finish
79903840130	<b>VCSD42SNS</b>	42U	79.00"	V-Line End of Aisle Sliding Door Assembly - 42U x 89" Wide	Silver
79903840131	<b>VCSD45SNS</b>	45U	84.25"	V-Line End of Aisle Sliding Door Assembly - 45U x 89" Wide	Silver
79903840132	<b>VCSD47SNS</b>	47U	87.75"	V-Line End of Aisle Sliding Door Assembly - 47U x 89" Wide	Silver
79903840133	<b>VCSD42SNB</b>	42U	79.00"	V-Line End of Aisle Sliding Door Assembly - 42U x 89" Wide	Black
79903840134	<b>VCSD45SNB</b>	45U	84.25"	V-Line End of Aisle Sliding Door Assembly - 45U x 89" Wide	Black
79903840135	<b>VCSD47SNB</b>	47U	87.75"	V-Line End of Aisle Sliding Door Assembly - 47U x 89" Wide	Black

## Roof Pod Overview



### V-Line Aisle Containment Roof Pod Assemblies

- Supplied part assembled and crated for on site final configuration and mounting
- Supplied with all brackets and hardware to mount to standard V-Line Cabinets
- Aluminum construction to minimize floor loading
  - 60" Wide - 341 lbs (155kg)
  - 84" Wide - 345 lbs (157kg)
- Specific aisle lengths available to order
- Available finish: Black only

### Roof Pod Assembly Part Code Configuration

Part Code	Component	Aisle Length	Aisle Width	Roof Config	Finish
<b>VC</b>	<b>RP</b>	<b>30</b>	<b>84</b>	<b>R</b>	<b>B</b>
V-Line Aisle Containment	<i>Options</i> RP = Roof Pod	<i>Options</i> 30 = 30 feet	<i>Options</i> 60 = 60" 84 = 84"	<i>Options</i> R = Retracting	<i>Options</i> B = Black

## Roof Pod Catalog Part Codes

UPC Code	Catalog Part Code	Unit Height	Height in.	Description	Finish
79903840136	<b>VCRP3060RB</b>	360.00"	60.00"	V-Line Roof Pod - 30 feet Long x 60" Wide	Black
79903840137	<b>VCRP3084RB</b>	360.00"	84.00"	V-Line Roof Pod - 30 feet Long x 60" Wide	Black

Note - Roof pods are set up in default lengths of 30 feet (360 inches) but can be factory configured in lengths to suit applications. To order a specific aisle length then please add the relevant dimension to submittal drawing S00017980 and sign and date the drawing as confirmation. The aisle will be shipped to site to the pre configured dimension as per your request.

# Aisle Containment System

## Specification Text

### Specification Example

The aisle containment system shall be designed to secure to data room floor and cabinet structure and shall be supported independently of the data room wall or ceiling structure. It shall provide a retro fit-able solution allowing the aisle containment to be added to two rows of adjacent cabinets configured in a hot aisle and cold aisle layout. The aisle containment will be mounted to the cabinet without the need to drill extra holes in the cabinet structure.

The end of aisle containment shall comprise of sliding door assemblies which can be adjusted to suit aisle widths ranging from two to three tile spaces. The end of aisle containment shall also accommodate both imperial and metric tile configurations. The end of aisle containment shall provide flexibility to allow a minimum of two inches or adjustment above and below the minimum and maximum aisle tile spacing. The structure shall incorporate clear panels allowing high levels of light to penetrate the contained aisle space. The clear panels will also provide adequate provision to monitor activity in the contained aisle space from a safety and security standpoint.

The overhead aisle containment shall be supported and secured to the top two rows of the adjacent cabinets. It shall be secured to both the cabinet and the end of aisle containment and shall be fixed without the need to drill holes into the cabinet structure. The structure will accommodate rows of up to fifteen 24" wide cabinets in a single span and shall incorporate a clear roof membrane allowing light to penetrate into the contained aisle space. The overhead containment shall incorporate some form of thermal fusing facilitating automatic opening in the event of a fire. The overhead containment structure shall not impede the operation of any fire suppression system within the contained aisle space.

For More Information -

- Check <http://www.cooperblinc.com/commdata/>
- Contact your local B-Line representative.
- Contact B-Line Sales Engineering at 618-654-2184
- E-mail B-Line at [blincus@cooperindustries.com](mailto:blincus@cooperindustries.com)

## Further Resources

- V-Line Aisle Containment Product Launch Presentation – ***V-Line Aisle Containment\_Launch Presentation\_Final.pptx (also available in pdf format)***
- V-Line Aisle Containment Sliding Doors Submittal Drawing – ***S00017979.pdf***
- V-Line Aisle Containment Roof Pod Submittal Drawing – ***S00017980.pdf***
- V-Line Aisle Containment Sliding Doors Assembly Instructions – ***BLVCAESDMAN-11.pdf***
- V-Line Aisle Containment Roof Pod Assembly Instructions – ***BLVCAERPMAN-11.pdf***
- V-Line Aisle Containment Pricing Sheets – ***BLAC\_PRICE\_SHEET.xls***

*Details or specifications subject to change without notice.*