

## Estopper CJ/EJ

### Centrally Placed PVC Waterstop

#### Description

**Estopper CJ/EJ** waterstop is extruded from a high-quality Polyvinylchloride compound, which has been formulated to provide excellent flexibility and longevity characteristic.

They are available as straight lengths and factory produced intersections.

**Estopper CJ/EJ** centrally placed Polyvinylchloride waterstops are suitable for use in contact with potable water.

**Estopper CJ/EJ** have been tested by **SIRIM BHD**, in accordance to **BS ISO 37** on **Tensile Strength and Elongation at Break Test**, **ISO 868** on **Indentation Hardness Determination** and complied with the specification in this data sheet.

#### Uses

They are used typically in the following type of structures: -

- Basements and underground structures
- Swimming pools/reservoir/water tank
- Tunnels and subways
- Water excluding structures
- Water retaining structures
- R C Flat Roof / Bridge Deck
- Dams/Culverts/Canals/Spillways

#### Advantages

- Simple on-site jointing
- 4 bulbs profile for excellent performance
- Reinforced eyeleted for positive fixing
- Full range profile for every needs
- Factory fabricated intersections available
- Suitable for potable water usage

#### Standards Compliance

- **BS ISO 37**
- **ISO 868**

#### Selection of Waterstop Size

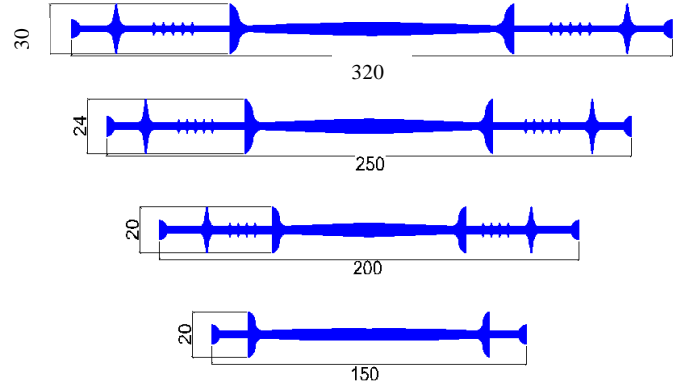
The appropriate waterstop width depends upon the concrete thickness. The width of waterstop should not be greater than the thickness of the concrete.

#### Estopper PVC Waterstop Sections

##### Centrally Placed Waterstops:

Plain Web sections are used in contraction and construction joints

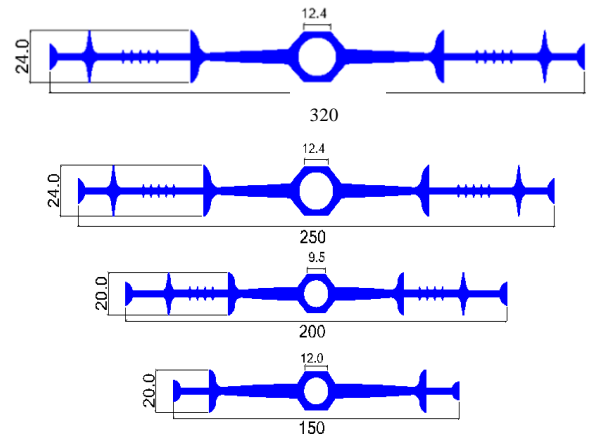
- **Estopper CJ 150**
- **Estopper CJ 200**
- **Estopper CJ 250**
- **Estopper CJ 320**



Above measurements are in mm unit.

Centre bulb section is used in expansion, contraction and construction joints

- **Estopper EJ 150**
- **Estopper EJ 200**
- **Estopper EJ 250**
- **Estopper EJ 320**



Above measurements are in mm unit.

All centrally placed **Estopper CJ/EJ** waterstops incorporate an eyeleted, reinforced edge flange; enable them to be positioned easily by wiring to surrounding reinforcement.

**Estopper CJ** and **EJ** Range of waterstops are compatible to other **Estopper Rearguard C & E** Range of waterstops.

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## Physical Properties

Compound	
Tensile Strength	> 13.5 N/mm <sup>2</sup>
Elongation at Break	> 300 %
Shore A Hardness	75 ± 5
Profiles	
Form	Extruded thermoplastic sections
Colour	Black

## Heat Jointing Equipment (220 V)

Heat welding equipment is available from Estop Sdn Bhd. Ensure the heat welding equipments are earthed by the green wire.

## Installation Instructions

Waterstops must be installed so that they are securely held in their position while the concrete is being placed. Concrete must be fully compacted around the waterstops to ensure that no voids or porous area remain.

The brass eyelets used for securing the waterstops are located outside the edge bulbs so as not to create water paths around the profile.

## Site Jointing Instructions

Jointing of **Estopper CJ/EJ** Range waterstops is carried out using Estop Heat Welding Equipment. The ends to be joined are cut square and held in alignment. The ends are then pressed to both side of a special heated blade, until an even, molten bead of PVC appears around the section.

The heated blade is then removed and the molten ends pressed fully together. The PVC cools to form a strong fusion welded joint.

An experienced technician would perform the jointing of the waterstops to satisfaction, subject to prior training and approval by Denka Technical Department.

## Packing & Size

<b>Estopper CJ150</b>	150mm x 20m roll
<b>Estopper CJ200</b>	200mm x 15m roll
<b>Estopper CJ250</b>	250mm x 12m roll
<b>Estopper CJ320</b>	320mm x 12m roll

<b>Estopper EJ150</b>	150mm x 20m roll
<b>Estopper EJ200</b>	200mm x 15m roll
<b>Estopper EJ250</b>	250mm x 12m roll
<b>Estopper EJ320</b>	320mm x 12m roll

## Technical Support

Denka offers a technical support package to specifiers, end-users and contractors, as well as on site technical assistance.

## Storage

**Estopper CJ/EJ** waterstops should be stored under covered condition. The product has a shelf life of 36 months.

## Precaution

Hot weld jointing of PVC waterstops results in the liberation of hydrogen chloride mist and vapour. The OEL (operational exposure limit) of 5 ppm can be exceeded in still air confined space, therefore ventilation must be provided.

## Additional Information

**Denka Construction Solutions Malaysia Sdn Bhd** offers a wide range of complementary products which includes waterstops, waterproofing products, grouts, anchors, specialized flooring products. In addition, a wide range of products formulated for repair and refurbishment of spalled concrete are available.



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