JP Concrete

DESIGN | SUPPLY | INSTALL

CAST-IN RETAINING WALL

www.jpconcrete.co.uk

Expert advice

Our product specialists will advise on the most cost-effective precast solution for your project.

Quality Assured

We are proud to hold ISO: 9001, 14001 & 18001 Constructionline Silver Membership & SSIP

Precast solutions

Our skilled teams of engineers, groundworkers & precast installers cover the entire project life-cycle.

CAST-IN **RETAINING WALL**

Cast-in retaining wall units are a versatile product which can be used to store and retain a wide variety of materials.

- Retaining Wall Heights 1.0m to 5.0m
- 90 Degree Corner Units
- 20kN/m^2 Surcharge Capacity
- C50 Concrete Mix Strength
- Installation Service Available

Features

Cast-in retaining wall units are available in two profiles; tapered or straight stem, depending on the surcharge capacity required.

Mastic application, or other sealing systems, can be applied to joints to make the cast-in retaining wall units suitable for storing liquids.

Wall units are manufactured under factory-controlled conditions, designed to relevant British standards and are CE marked.

The cast-in retaining wall units are suitable for a wide range of applications including:

- Salt Barns
- Waste Transfer Stations
- Silage Clamps
- Slurry Lagoons
- Bund Walls
- Material Storage Bays

We provide a full design, construction & installation service for all of our products, enabling us to offer turnkey solutions. Call the team today to discuss your project. 01158 220 282

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PRODUCT **SPECIFICATIONS**

Below is a table outlining the characteristics of the cast-in retaining wall units.

Here you can find information on concrete strength, material density and surcharge capacity.

Wall units are manufactured under factory control, have been designed to relevant British (BS) standards and are CE marked.

If you require any further details please contact us and one of our product experts will be happy to provide more information.

See webpage for full spec details - www.jpconcrete.co.uk/precast-cast-in-retaining-wall/

Concrete Strength C50	**Material Density** 18	**Surcharge Capacity** 10*	**Design Life** 50*
Compressive strength of concrete after 28 days of curing.	Maximum material density of retained material, measured in kN/m^3.	Maximum surcharge capacity of precast element, measured in kN/m^2	Number of years precast element has been designed for.
Connection	**Edge Detail**	**Concrete Finish** A*	**Fire Resistance** N/A
Precast elements have flat sides & do not interlock.	Square edges enable close alignment & reduced movement joints between units.	Smooth mould finish Type A to precast element, defined in British Standards.	Number of minutes precast element would provide fire resistance.
Reinforcement Cover 30	**Tolerances** 6	**Foundation Type** RC	**Retained Face** DL
Minimum cover to steel reinforcement in precast element, measured in mm.	Typical manufacturing tolerances & dimensional variations +/- in mm.	A reinforced concrete (RC) foundation is required for installation.	Double Load - Precast element is suitable for retaining material on both faces.

* These are the maximum values that can be achieved with the cast-in retaining wall. The surcharge capacity will vary depending on the overall wall height. Concrete panel finish is class A to the front face and hand trowel finish to the back face.

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PRODUCT **RANGE**

The main product dimensions, unit weights and sizes available in the cast-in retaining wall range can be found below.

Cast in retaining walls are designed for situations where a new reinforced concrete floor will be poured. The units are manufactured with reinforcement extending from the toe, so you can tie them into the mesh of a reinforced concrete floor slab. Once the units are cast into the concrete slab, no additional support is required, making them the perfect solution if you have no existing steelwork to fix to.

Height (mm)	Length (mm)	Width (mm)	Unit Weight (kg)
1000	1000	700	830
1500	1000	700	920
1750	1000	700	1000
2000	1000	700	1120
2550	1000	700	1320
3200	1000	900	1620
3800	1000	900	1770

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PRODUCT **SPECIFICATIONS (HD)**

Below is a table outlining the characteristics of the heavy duty cast-in retaining wall units.

Here you can find information on concrete strength, material density and surcharge capacity.

Wall units are manufactured under factory control, have been designed to relevant British (BS) standards and are CE marked.

If you require any further details please contact us and one of our product experts will be happy to provide more information.

See webpage for full spec details - www.jpconcrete.co.uk/heavy-duty-retaining-wall/

Concrete Strength C50	**Material Density** 18	**Surcharge Capacity** 20*	**Design Life** 100*
Compressive strength of concrete after 28 days of curing.	Maximum material density of retained material, measured in kN/m^3.	Maximum surcharge capacity of precast element, measured in kN/m^2	Number of years precast element has been designed for.
Connection	**Edge Detail**	**Concrete Finish** A*	**Fire Resistance** 180*
Precast elements have flat sides & do not interlock.	Square edges enable close alignment & reduced movement joints between units.	Smooth mould finish Type A to precast element, defined in British Standards.	Number of minutes precast element would provide fire resistance.
Reinforcement Cover 30	**Tolerances** 6	**Foundation Type** RC	**Retained Face** DL
Minimum cover to steel reinforcement in precast element, measured in mm.	Typical manufacturing tolerances & dimensional variations +/- in mm.	A reinforced concrete (RC) foundation is required for installation.	Double Load - Precast element is suitable for retaining material on both faces.

* These are the maximum values that can be achieved with the heavy-duty retaining wall. The surcharge capacity will vary, depending on the overall wall height. Extending the design life to 100-years will also reduce the capacity of the wall. Concrete finish is class A to the front face and hand trowel finish to the back face.

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PRODUCT **RANGE**

The main product dimensions, unit weights and sizes available in the heavy duty retaining wall range can be found below.

Heavy duty cast in retaining walls are designed for situations where a higher surcharge capacity is needed. The units are manufactured with reinforcement extending from the toe, so you can tie them into the mesh of a reinforced concrete floor slab. Once the units are cast into the concrete slab, no additional support is required, making them the perfect solution if you have no existing steelwork to fix to.

Height (mm)	Length (mm)	Width (mm)	Unit Weight (kg)
1000	1000	750	910
1500	1000	750	1210
2000	1000	750	1510
2500	1000	750	1810
3000	1000	750	2110
3500	1000	750	2410
4000	1000	750	2710
4500	1000	750	3000
5000	1000	750	3310

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