### Concrete specification

**RC40/50XF Equivalent**  
Minimum Cement Content = 360kg/m\(^3\)  
Maximum w:c ratio = 0.45  
Cement type = CEM1 52.5N  
Coarse Aggregate = Aggregate Industries  
Fine Aggregate = Cemex

The use of an RC40/50XF equivalent concrete ensures suitability for use in XF4 conditions as defined in BS 8500-1:2013

**Freeze-thaw attack (XF classes - where concrete is exposed to significant attack from freeze-thaw cycles whilst wet)**

<table>
<thead>
<tr>
<th>Class designation</th>
<th>Class description</th>
<th>Informative examples applicable in the United Kingdom</th>
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</table>
| XF4               | High water saturation with de-icing agent or sea water (G)                        | Horizontal concrete surfaces, such as roads and pavements, exposed to freezing and to de-icing salts either directly or as spray or run-off.  
Concrete surfaces subjected to frequent splashing with water containing de-icing agents and exposed to freezing. |

The units are unreinforced and have a design working life of 100 years as defined in BS EN1990:2002+A1:2005

ASR - the total alkali content of the concrete is calculated as:  
380 x 0.75/100 = 2.7kg/m\(^3\) Na\(_2\)O equivalent

Limiting value 3.5kg/m\(^3\) for normal reactivity aggregates (BS EN 8500-2 Annex B)

### Lifting points

All units are provided with a central galvanized TERWA Spherical Head Lifting Anchor recessed into the concrete surface

### Quality Management

All products are manufactured under a Factory Production Control System equivalent to that required by EN1917, BS5911-3 and BS5911-6

Concrete products made with maximum 1% organic materials in the concrete composition may be declared as being in accordance with fire class A1 without the need for testing. Concrete products which include organic materials in the concrete composition greater than 1% by mass or volume shall be tested and classified according to EN 13501-1