

Construction

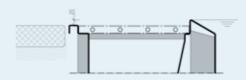
Pool wall construction



The top end of the pool wall encloses a canted surface outwards by 30° that is also the handhold. Built onto this is the overflow gutter where the side against the pool is inclined by 12° to prevent outgassing of the draining pool water and minimise the outflow noise. This overflow gutter is dimensioned so that it requires no associated drainage line and meaning that just two overflow drain nozzles are required as for a sports swimming pool, for example.



On the outer side of the wall is a groove to house the overflow gutter cover grate. The water level is 5 cm above the pool surround, the height of the handhold is also 5 cm.



If the pool surround is to be raised to the water level as far as possible, the bracket for the grate, if the groove is not present, should be raised so that the height of the handhold is reduced to the minimum dimension of 2.0 cm.



With diving pools, a cover grate inclined towards the pool by 3% reduces water loss considerably.

This overflow gutter is covered with an UV and pool water resistant PP grate and houses pool equipment such as starting block, water depth signs, line holders, touch panels, time measurement systems, ladder stiles, etc.

On the outside of the top end of the pool wall, a stainless steel bracket is securely welded on as required (indoor pool) to accommodate the sealing between the stainless steel pool and the pool surrounding concrete slab.



In the renovation of tiled sport pools, the tiles are normally stopped at the end walls up to the standing ledge to observe the specified competition dimensions. This is sufficient space for the 50 mm thick stainless steel construction. On the lengthwise walls, a reduction in pool width of 100 mm in total is normally accepted.

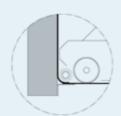
With diving pools, the strip foundations run to a water depth of 2.2 m. These are cladded with stainless steel panels. If the diving pit projects into groundwater, a concrete tub should be manufactured to keep the groundwater out.











A standing ledge is attached with water depths over 1.35 m at a depth of 1.2 m.

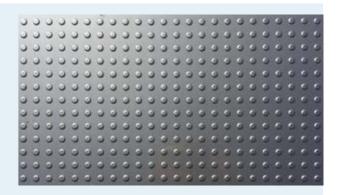
The attachment of the remaining wall is fixed above this ledge to avoid any weld seam on the standing ledge blocking the path of suspended materials falling to the floor.



The swimming pool wall is rounded at the lower end.

The floor is then enclosed so that no dirt trap is created and the floor cleaning device can easily remove all materials that has sunk to the bottom.

The stainless steel floor is securely welded to the walls. It consists of welded, large-format panels and has either a smooth or an anti-slip surface.



Clean water system / floor channel



The treated pool water is conveyed solely via floor channels running in the bottom of the pool. These are gutters open at the top that are covered with removable covers including inlet nozzles.

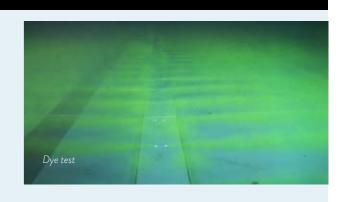
The surface of this cover is smooth or anti-slip the same as the pool floor.

The seal between the channel and cover is provided by a securely fastened, all-round EPDM seal. Two sealing lips guarantee a 100% seal.

This ensures that the water inlet is carried out solely via the nozzles. Its shape ensures the exceptionally flat water outlet at the floor, and therefore accesses the entire floor.



There are no secondary flows directly upwards to interrupt an even flow.



Construction

Whirlbeds

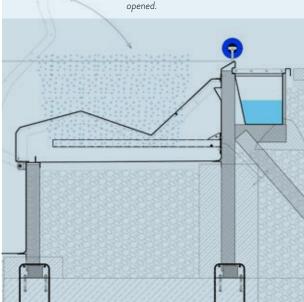


In the comfortable whirlbeds, the recliner places are clearly indicated by the ergonomic hole pattern. The air rising from the air supply lance underneath flows through these perforations around the pool guests who are

relaxing. Due to the distance of the air lance to the reclining area, the air has sufficient time to adopt the pool water temperature. In the neck area, an air-filled pillow ensures comfort.

The diameter of the individual slots in the hole pattern is smaller than $8\ \text{mm}$ and ensures that no body jewellery can be lost.

The whirlbeds are constructed as an enclosed structural body. To minimise cleaning work, the whirl beds can be opened.

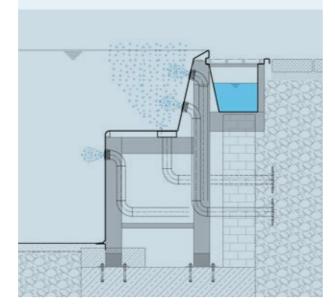


Massage seats

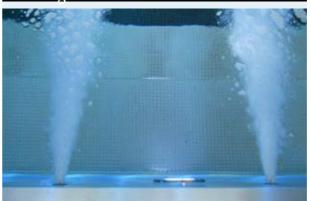


Massage seats are designed as enclosed structural bodies. Massage nozzles for air supply, water supply or air/water supply into the backrest, in the rear seat area or in the calf zone ensure the highest quality massage. The nozzle elements are flush with the wall.



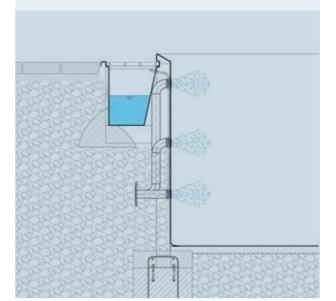


Massage nozzles



Standing massage positions are integrated into the pool wall flush with the wall at different heights. Loading with air, water or a water/air mixture is obligatory.





Stairs and access points





Stairs, whether straight or curved, are prefabricated to a transportable size, and access points are integrated flush into the wall element. The anti-slip surface is achieved via small bumps that are arranged radially in the case of curved steps.



Overwintering



The overwintering of stainless steel pools outdoors is restricted to draining of not frost-proof pipings. No precautions are required for the stainless steel pool itself. It can remain filled. An ice layer is formed that, thanks to the physical properties of the water and metal does not cause any damage to the stainless steel pool.





Stainless steel pools are welded constructions that are manufactured from cold-rolled, thin panels (wall thicknesses between 1.5 / 2.0 / 2.5 / 5.0 mm).

Our production plants are designed exclusively for the processing of stainless steel for the construction of stainless steel pools, primarily in-house and custom developments. This coupled with the accurate planning of precise work preparations



and optimally trained craftsmanship guarantees the high quality that hsb is known for.

Our aim is the greatest possible pre-production and adaptation in production, so that the large components can be fitted on the construction site without reworking.

hsb manufactures solely in Vöcklamarkt (AUT) and Berlin (GER)









The assembly process is divided primarily into 4 stages.

1. Pool wall assembly, 2. Assembly of the pool hydraulics,

3. Pool floor assembly, 4. Completion (supply and assemble all equipment components).

The corresponding services to be carried out by the customer are performed between these steps.

The accuracy of dimensions required in the swimming pool cannot be achieved using the standard constructional tolerances. We think in millimetres, and the construction industry in centimetres. This quality level and precision is achieved via the perfect, high degree of prefabrication and harmonised worksteps.

