

MBR Berlin - Margaretenhöhe, Germany

Task

Turnkey project / Design, supply, installation and commissioning of the MBR compact plant in Berlin-Margaretenhöhe. Client: Berliner Wasserbetriebe. Commissioning in 01 / 2006

Inlet

The membrane bioreactor plant receives the flows into the screening stage from a pressure drainage system (dedicated sewer). Approx. 250 residents are connected to the system.

Process Description

The raw water passes through a 3 mm perforated screen to the biological treatment. The biological process combines enhanced biological phosphorus and nitrogen removal in a post-denitrification step. Afterwards the biological treated wastewater is pumped to a flow splitting box feeding the three filtration cells. The filtrate passes through the membranes via filtrate pumps. The structure also comprises filtrate collection, sludge storage and a machine room with work place.



Design Data

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| Population Equivalent (PE) | 250,0 |
| Average flow (m ³ /d) | 12,0 |
| Peak flow (l/s) | 0,2 |
| No. of siClaro® Filter | 2,0 + 1,0 |
| Installed membrane surface area (m ²) | 150,0 + 75,0 |
| Aeration tank volume (m ³) | 10,0 |