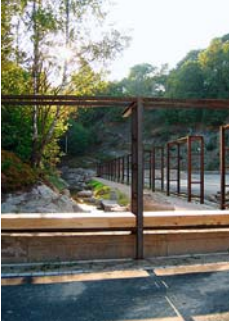


Daylighting of Alna River in Hølaløkka, Oslo



The newly daylighted river Alna is followed by a footpath, which in part has pergola niches for lingering and enjoying the river.



Right after the official opening, local residents claimed the park as their own and take particular delight in being able to go for a refreshing swim!



The river Alna is one of the main feeders of the Oslo Fjord. In many parts, the river has been severely degraded. An overall master plan has been developed for the sustainable improvement of the total river watershed area.

A silent consequence of urban expansion, particularly since World War II, has been the disappearance of many small streams from European cities. Culverted out of sight and out of mind of city residents, most streams have ended up as sewer canals. This is the case even in Oslo, capital city of Norway, a country of streams, waterfalls and lakes of enormous natural beauty.

The City Administration realized the extent of growing pollution of Oslo's fjords and increasing pressure on the city watershed. A master plan was developed for the phased restoration of Oslo's biggest river, the Alna, and improvement of the whole greater Oslo watershed area. Atelier Dreiseitl was selected with a local partner, Norwegian landscape architects 13.3, to design and supervise the construction of a pilot demonstration project to generate attention and interest in this long-term and large-scale restoration initiative.

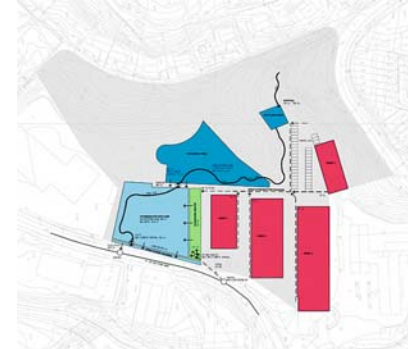
A site located between an industrial business park and a housing estate where a section of the Alna could be day-lighted was identified by the city. A clear aim of the project was to combine a technical water management system, where ecological and hydrological needs were met, with a design that maximizes the potential of an appealing outdoor space. The technical aspects of the water management system are integrated with flair and transparency into the attractive and relaxed atmosphere of the park.

In a more wild and natural corner of the park, the Alna is released into a newly created river bed, which is widened at one point to create a natural settling basin. From here, the stream rounds a corner and feeds into an open swimming pond. Like every river, the flow rate of the Alna can vary significantly with rainfall. A retaining wall on one side of the pond holds back flood waters, specially designed slits allow a reduced outflow with increasing

water levels. The adjacent meadow serves the double purpose of an informal relaxing area and a flood meadow. The sum of reducing flooding and increasing water quality in decentralised interventions such as this is the most effective way of achieving the large-scale goals of the master plan.

The retaining wall is a bridge to the other side of the park and the junction point where stormwater run-off from the adjacent industrial park joins the lower part of the system. The roof, surface and road run-off from the industrial park is conveyed via surface drainage detailing to a cleansing biotope (planted sand filter with mineral additives). Intense cleansing and pollutant break-down of the stormwater run-off occurs here, before the water is released to a subsequent wetland area for final polishing. Almost immediately after completion of works, a significant reduction of pollutants was confirmed by city scientists, a trend which is expected to increase and stabilize in the long run. The wetland area also has detention capacity.

The local youths from the adjacent housing estate were the first to discover this new park and turn it into their favourite hang-out.



Behind the park design is an innovative and comprehensive water management concept. A rainwater canal is opened, the water returned to the surface, cleansed and released back into the Alna.

