URBAN ECOSYSTEM SERVICES

BJERKEDALEN NEIGHBOURHOOD PARK

REOPENING OF THE HOVIN STREAM

Bjerkedalen Park is a neighbourhood park in the Bjerke district of Oslo and was opened in October 2013. The park includes a reopened section of the Hovin Stream, with footpaths along its banks and a swimming pond with a sandy beach. The example of Bjerkedalen Park illustrates how enhancing the quality of ecosystem services in a local area can affect local property prices.

THE SITUATION

The Bjerkedalen housing association, with 290 flats, dates back to the 1950s and surrounds the park area. As a result of the stream being reopened and the park upgraded, the area now provides a number of new ecosystem services. These include supporting services such as habitat for biodiversity, regulating services, such as contributing to water attenuation and flood prevention as well as purifying the flowing water, local noise reduction, climate regulation, pollination and increased CO2 storage. The park has also improved the quality of cultural services by facilitating recreational activities and walks along the river. The park also offers an aesthetically welcoming and green environment that encourages activities like picnics, jumping from stone to stone across the river and other play, or just sitting on a bench and gazing at the water. The park is a great place to observe, play and learn about nature, which contributes to cognitive development. Today, Bjerkedalen Park is an important part of the district's identity and profile.

THE CHALLENGE

Previously, the park was a uniform green area (green desert) with a paved water retention basin area and a paved area for ball games, with the Hovin Stream running through pipes beneath.

THE SOLUTION

The Hovin Stream was re-opened, and now flows for 300 metres through Bjerkedalen Park. Small rapids, pools and waterfalls, as well as new trees, shrubs and perennials have created habitats for flora and fauna and an attractive park environment.

IMPACT ON LOCAL PROPERTY VALUE

RISE IN VALUE OF FLATS NEAR THE PARK

NOK **2,145**
per m² as of autumn 2014

RISE IN VALUE FOR THE ENTIRE BJERKEDALEN HOUSING ASSOCIATION

NOK **48 MILLION**
as of autumn 2014

RISE IN VALUE AFTER REOPENING THE HOVIN RIVER

NOK **18 MILLION**
as of autumn 2014

METHOD

Hedonic pricing

Oslo kommune FRAMTIDENS BYER OpenNESS VISTA ANALYSE NINA

** Figures are based on Vista Analyses report "The value of urban ecosystem services: Four examples from Oslo", report no. 2014/46.*

WHAT ARE URBAN ECOSYSTEM SERVICES?

> ECOSYSTEM SERVICES ARE THE SERVICES AND BENEFITS PRODUCED BY NATURE THAT ARE ESSENTIAL FOR HUMAN LIFE

In an urban environment, ecosystems will be composed of a mosaic of green parks, lush backyards, allotment gardens, urban forests, wetlands, streams, rivers, lakes and old trees – all of which will improve the quality of life for city residents. In addition, urban ecosystems are important habitats for the rich biodiversity we find in the city. The Oslo area has the greatest number of different species in the country: 12,009 species have been found, of which 1,230 are considered threatened.

IMPORTANT SERVICES

Ecosystems provide us with a range of vital services that we call ecosystem services. These include provisioning services such as food, water and wood; regulating services such as flood control, water, soil and air purification; cultural services like recreation and learning; as well as supporting services such as primary production and a habitat for biodiversity. Well-functioning ecosystems are thus essential for peoples physical and mental health. Vegetation improves air quality by capturing pollutants. Green areas provide opportunities for rest and recreation in a bustling urban environment, while also promoting physical activity. Many scientific studies have linked access to green areas to stress reduction and improved mental health.

MAJOR CONSEQUENCES

Any loss of urban ecosystems and biodiversity could result in significant costs in terms of reduced quality of life and poorer health for residents. In addition, the city will become less attractive for business and tourism. Natural ecosystem services, such as the purification of water, air and soil, as well as rainwater retention, can be complex and costly to replace, and in some cases it is absolutely impossible.