District heating network

Antwerp & Arcadis

Project design

Antwerp needed an innovative solution to meet its climate goals, aiming to reduce emissions by 50-55% by 2030 (vs. 2005 baseline). Buildings were a key challenge, with a 90% fossil fuel mix used to heat buildings. The city developed a sustainable district heating network with the aim of connecting the equivalent of 35,000 homes by 2030.

Results of the integrated approach

Residual heat from industry will capture a valuable resource that currently is not utilized, at the same time replacing the use of fossil fuels and lowering the overall need to generate energy for heating.

"We are talking here about the blueprint for our future heating policy... This project will allow us to create a large-scale heating link between the port and city. In the long term, we will be able to help tens of thousands of families say goodbye to CO_2 ." – Tom Meeuws, Antwerp Alderman for the Environment

Key facts

- District heating from waste sources
- Reduced peak demand for electric heat
- 10% of Antwerp's heating requirements will be met by 2030
- Helping the city reach its goal of 50–55% CO₂ reduction by 2030
- 71-kton CO₂ reduction by 2030

Project archetype

Campus/Office decarbonization



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