



Midlothian Council  
**Midlothian  
Heat  
Network**

Case Study

## The Project

The scheme is the development of a DHN which utilises the heat produced by an Energy from Waste plant located at Millerhill. A planning requirement for the EfW plant was to have a Heat Plan to maximise the environmental aspects of the scheme.

The scheme was developed to serve a new build residential area of c3000 new homes known as Shawfair in phase 1, with phases 2 and beyond including other new build residential plots as they develop, the university and the large local hospital. The first project will be a fourth generation, innovative low carbon district heating network to the new Shawfair town in the north of the council area on the outskirts of Edinburgh.

The network will benefit from heat supplied by FCC Environment, which operates the councils' (Edinburgh and Midlothian) state of the art energy from waste facility (EfW) near Millerhill. The EfW is fuelled by residual waste collected by the local councils of Midlothian, Edinburgh and East Lothian. This first project is expected to save over 2,000 tonnes of CO2 per year, the equivalent of taking 1,200 petrol/diesel cars off the road.

This first phase of the project will benefit from the financial support of up to £7.3m from the Scottish Government's Low Carbon Infrastructure Transformation Project, which is partly funded by the European Regional Development Fund. The council also benefits from a close working relationship on the project from Scottish Futures Trust.

Midlothian Council, which recently declared a Climate Emergency, has appointed Vattenfall, the leading Swedish state-owned energy company, as preferred bidder to become its energy partner. Vattenfall will work with the council to set up an innovative new Energy Services Company (ESCo). This partnership, which will be a 50/50 joint venture, will focus on delivering a wide range of energy projects across the area.

In addition to setting up a long term ESCo, Midlothian Council aims to sign a 40-year agreement with the ESCo to supply heat to the new public buildings to be built at the new Shawfair town. Vattenfall will negotiate final contracts with its main initial partners, FCC Environment and Shawfair LLP. FCC will supply the low carbon heat and Shawfair LLP will facilitate the connections to new domestic and commercial developments in the town.

The benefit of this structure to MCC is to retain an equity stake in the project and secure long term revenues whilst appointing an industry leading partner is fully incentivised to ensure that the ESCo is profitable.

## Our Role

We have been commercial advisors to Midlothian Council for a number of years, initially our role was to analyse and update a previously completed feasibility study to refine assumptions and present recommendations to the Council – liaising with all main stakeholders, negotiating initial Heads of Terms for a Thermal Purchase Agreement, and Heat Supply Agreement suitable for all parties. Ener-Vate then led on behalf of the Council on market engagement, with six major UK suppliers to gauge their interest in providing services to the scheme and/or becoming an investor partner.

Due to our success as advisor in the previous capacities, Ener-Vate were selected as commercial adviser to the Council for the OJEU procurement of an energy partner to Midlothian Council. Our primary function was to develop a shadow commercial model, which helped to design certain commercial parameters set in the tender document, as well as being a tool to test/analyse returned commercial models against what we perceive to be a market acceptable position.

## End Result

Ener-Vate was instrumental in the strategic decision to enter into a Joint Venture partnership with an energy partner, and supported in the OJEU procurement process to select Vattenfall as the appointed partner – ensuring value for the end-users of the network and value to Midlothian Council was maintained at all stages of the procurement.