

Broadwater Farm DE Feasibility

The Broadwater Farm housing estate was originally supplied from a communal heating system that provided heating and hot water to the residents. All of the residential blocks, with the exception of the two tower blocks, were taken off the communal system and fitted with individual gas boilers in the early 1990s. The two tower blocks and a number of communal areas continue to be supplied from the communal system.

This detailed feasibility study explores a district heating scheme to supply the whole Broadwater Farm estate and other local authority controlled buildings in the vicinity.

Option A: An estate-wide DE scheme (gas CHP engine) that includes the two tower blocks, eleven low-rise blocks, an inclusive learning campus, community centre, health centre and sheltered housing block.

Option B: A scaled down version of the estate-wide district heating scheme, that supplies only the two tower blocks and the inclusive learning campus (biomass boiler). The capital investment to use the existing network would be lower than re-installing across the entire site, however a lower CO2 reduction would be achieved.

- The most viable option is A, however, this has a significant funding gap. The size of the funding gap and therefore the viability of the scheme is heavily dependant on the availability of low cost finance and required rates of return, and the value of electricity generated from the CHP engine.
- LBH should investigate the means by which Option A could be funded from public sources, prudential borrowing and European Investment Bank loans.
- If suitable funding cannot be identified for the gas CHP engine to supply the entire estate, then Option B to install a biomass boiler to supply the reduced scale scheme should be progressed. The viability of this project is dependant on the level of subsidy available through the RHI.