

A whole-systems approach to Climate Action, Health and Thriving Communities: Jobs, Education and Skills



Key Points:

- Climate actions can produce co-benefits as well as unintended consequences.
- Participatory systems mapping can help local authorities explore wider impacts.
- We highlight education and skills training – which may be overlooked but are critical for effective climate action.

To limit climate change, we need to reduce our greenhouse gas emissions to meet legally binding targets.¹ To do this we need to get more energy from renewable sources, particularly for heating and transport where we use the most. This means shifting from gas boilers and petrol or diesel vehicles, towards cleaner alternatives which produce less pollution.

At a community and individual level, we can also make changes by insulating more homes, using cars less often, adopting plant-based diets, and recycling more waste.

However, none of these changes happen in isolation – many of them require behaviour and service changes that have both positive and negative effects.

There are clear links between climate action and some council services, such as housing and transport, but links to others may not be obvious. By moving towards a “whole systems approach”, we can find these links and help prevent policy clashes.

The WM-Net Zero study team has worked with local authority officers, using participatory systems mapping to explore the relationships between climate actions and other local policy priorities.² We have identified some areas not typically associated with climate action but very relevant for its success.

Providing the workforce with educational and skills development is key for enabling climate action, particularly for construction. Improved transport links can also increase access to training and employment opportunities.

Participatory Systems Mapping

Participatory Systems Mapping is a research method where people with different perspectives are brought together to create a causal diagram (map) of the connections in a “system” of interest. Systems maps support policy design and analysis by revealing key leverage points (potential targets for maximally effective intervention) and trade-offs.

Explore insights from our
Participatory Systems Mapping for
delivering

🔗 [‘Thriving Net Zero Communities in the West Midlands’](#)

What does climate action mean for Jobs, Education and Skills?

Relevant areas of statutory responsibility:

- Economic growth
- Education and related services

One of the benefits of climate investment is the creation of jobs. Housebuilding and property retrofitting have the potential to create more jobs, but people with relevant skills are needed to meet this increased demand.

Access to, and support for training is important. This includes being able to find and apply for relevant courses, travelling to training locations, and financial help for the costs of living. Plus, reassurance that training will lead to a new job.

Traditional training courses for the construction sector may not cover newer technologies (such as heat pumps) that are relevant to climate action. It is important that the education provided in a local area prepares trainees with the necessary skills to meet demand created by climate investment.³

Expanding and improving rail, tram and bus services can improve access to a wider pool of jobs while also reducing polluting car trips.

This is especially important for those with disabilities or are long-term unemployed who are less likely to be able to drive or afford a car.⁴



A more physically active population (due to increased active travel) is more likely to be fit for work and require fewer days off for illness.⁵

Existing employment in heavy industries can be a local barrier to climate action, particularly where such industries have been at the core of the community for many generations.⁶ The near-term loss of jobs risks a negative local impact which can feel more tangible than the expected benefits of reducing greenhouse gas emissions.

Achieving a “just transition” – a movement which originated in the coal industry – highlights the need for people working in heavy industries to be given opportunities to re-train, earn equal (or better) salaries, and work in safer and healthier environments.⁶

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