

MIDLANDS ENGINE OBSERVATORY ACADEMIC INSIGHTS

Progress against Net Zero pledges



The summary comes from [this article](#)

Theme:

Delivery of Green Growth goals

Area of Focus:

Progress has been made against three net zero pledges, but more work is required

Key Findings:

Three key pledges around transport, electricity and heating are essential to helping the UK reach Net Zero. Whilst funding and policies support these goals, the government needs to do more.

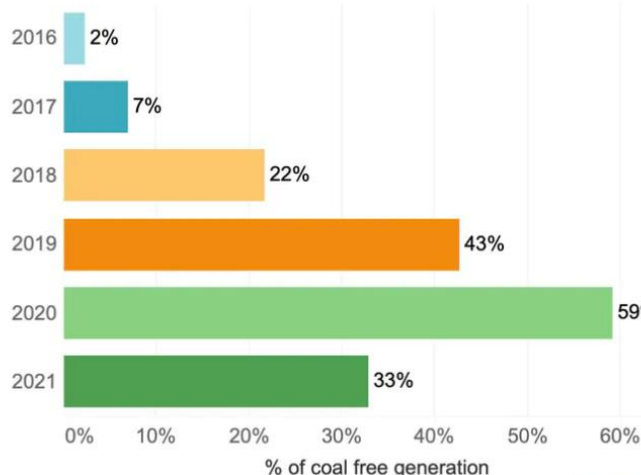
Transport: Petrol and diesel cars will be phased out by 2030 and replaced with electric vehicles (EVs). The charging network is growing, reaching 5,000 rapid chargers, an increase of 2,000 from 2018.

However, many people don't have driveways on which to charge an EV, and commercial EV van grants need to be increased. There are also concerns over a shortage of materials, skills, and parts to make new EVs as demand increases.

Electricity: The government has committed to stop burning coal for electricity by October 1, 2024. The use of coal has declined dramatically, with coal making up 1-2% of electricity between 2019 and 2021. Coal is now used to fill gaps when other fuel sources like gas or wind are struggling. However, to fully eliminate coal, the electric grid needs to be able to handle declines in other sources like wind.

Heating: All new heating systems in UK homes will be low carbon by 2035. Heat pumps, which transfers warm air from outside to a higher temperature inside, use just one-third of the energy a gas boiler would. However, this is expensive and government grants are insufficient. An alternative is hydrogen boilers, but these would require new infrastructure. Further investment in hydrogen research is also needed. Unfortunately, all of these measures are ineffective unless the energy efficiency of homes is dramatically improved.

Britain's electrical generation was coal free for % of the year



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Midlands Engine Impact:

- Gigafactories will be needed to meet the demand for EV batteries. Sites across the Midlands, including Coventry, will support the region's auto sector and economy.
- Wind power, like that generated in the Humber, will be essential to the future of the UK's electric supply. The Humber should be supported to innovate and lead the way in wind power.
- Regional businesses such as Worcester Bosch will help support the roll out of hydrogen boilers and other low carbon heating systems.
- Innovations from the region's universities can lead the way for a Net Zero future.

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