

ENERGY NEWS



Spring 2021

The newsletter of the Midlands Energy Hub



‘Educate, Enable, Enact to deliver Net Zero’

Michael Gallagher, Regional Energy Projects Manager

Welcome to the spring edition of the Midlands Energy Hub newsletter. With the start of a new financial year, I am happy to inform you that the Midlands Energy Hub has received continuation funding to 2023; enabling us to continue our work with you and our other stakeholders across the Midlands and beyond.

March heralded the completion of a number of projects including the exciting and informative [Low Carbon & Environmental Goods and Service Sector Report](#), the report is already being utilised by our stakeholders to good effect; a big thank you to K-Matrix and SWM for their hard work. It has also been great to see the Parish Carbon Calculator IMPACT tool developed by CSE and University of Exeter, funded by BEIS through the Midlands Energy Hub, reach completion. The tool has been very well received by parish council communities.

[National Grid ESO](#) revealed that Great Britain’s electricity grid was the greenest it has ever been at 1pm on Monday 5th April. However, to give us the best chance of transitioning to Net Zero we need more people to be Carbon Literate, so it has been positive to hear that the [Leicester and Leicestershire Enterprise Partnership](#) (LLEP) successfully worked with De Montfort University and University of Leicester to deliver Carbon Literacy Training to all LLEP staff.

As we start charting our course through 2021, we are lining up some exciting projects which I look forward to sharing with you all as they progress over the year. Currently, I am looking forward to working with Local Authorities across the Midlands on the [Local Authority Delivery Phase 2](#) programme and with Local Authorities across England and Wales on the Private Rental Sector MEES Enforcement Competition.

The Midlands Energy Hub is funded by the Department for Business, Energy and Industrial Strategy (BEIS) as part of the Clean Growth Strategy. It is supported by Nottingham City Council who are the accountable body.

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News

New data hub to help decarbonise Birmingham

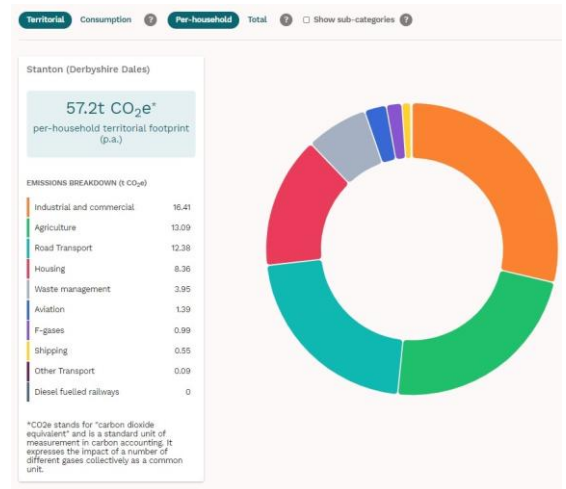
The [Centre for Sustainable Energy](#) (CSE) has released their new [3D data hub](#) for Birmingham. The hub combines a range of different datasets for Birmingham, including open data on housing, travel, waste, energy and emissions. The data is brought together on a single, easy-to-use website, with features to help with data visualisation.

This initiative is part of the 3D project, run by CSE in collaboration with [Birmingham City Council](#) and the [Route to Zero Taskforce](#); it is funded by the [ICLEI Action Fund](#). The 3D project aims to put data at the heart of Birmingham’s decarbonisation journey over the next decade. As well as continuing to add to and improve the data hub, CSE can offer support to local organisations keen to make use of data to plan, initiate and improve projects that cut carbon across the city. A funding competition, offering £100,000 to ten community-based low-carbon initiatives will launch over the summer. Sign up to the [project newsletter](#) to stay updated.

IMPACT - The Parish Carbon Calculator

A new carbon foot-printing tool is now available. The [Impact tool](#) has been developed by the [CSE](#) and the [University of Exeter](#), with help from Parish Councils from across England. The project was funded by BEIS via the Midlands Energy Hub, CSE's charitable reserve, and the UKRI Strategic Priorities Fund.

The aim of [Impact](#) is to give small communities (parishes and towns) usable data on their carbon emissions that is easy to understand, easy to share, and which gives them a clear idea of their main 'impact areas' i.e. those places where focused community-based action can make the biggest contribution to cutting local emissions. It will help parishes avoid low impact projects, and assist them in supporting district and county councils through well-targeted activity. For rural communities, this could mean applying to the [Rural Community Energy Fund](#) to develop low carbon energy generation projects.



IMPACT – Community carbon calculator

The tool has been designed with a simple user interface and dynamic visual representation of data that is easy for a layperson to interpret. The project team has produced a short [video](#) on how to use the tool and welcome any [feedback](#) or suggestions for additional features.

WMCA approve ambitious Net Zero Plan

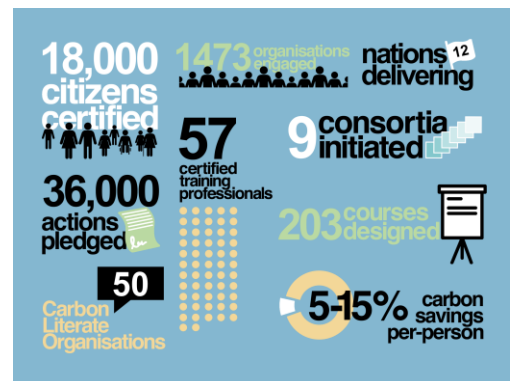
The West Midlands Combined Authority have [approved](#) a [Five Year Delivery Plan](#) for their #WM2041 Climate Change Strategy, with £5.1m of investment committed by local authority leaders to enable the delivery of this plan. The funding has secured the future of the [Energy Capital](#) team to enable them to continue delivering the West Midlands Regional Energy Strategy. With climate and energy issues remaining reserved matters of central government, Energy Capital remains committed to securing the devolution of responsibility for aspects of the Net Zero energy transition to local government. The West Midlands therefore aims to become a [Net Zero Pathfinder](#) region. This has been recognised by the Secretary of State for BEIS in an invitation to engage on how these devolution asks might be progressed and aligned with national objectives; learning which will be shared widely in the run up to [COP26](#). For further details, please contact [Cheryl Hiles](#), Director Energy Capital.

Features

Leicester and Leicestershire become Carbon Literate

Gavin Fletcher – Midlands Energy Hub

As we all get to grips with the changes needed to respond to the Climate Crisis there is an increasing need to ensure that everybody understands the global impacts, challenges, solutions and choices that we face from both a personal and a professional perspective. The [Carbon Literacy Project](#) is a training package supporting people and organisations to understand this and to develop pledges to tackle the climate crisis. By designing a training approach, which leads people through the science associated with rising greenhouse gases, along with developing an understanding of the carbon impacts of the decisions we take, Carbon Literacy offers a recognised and standardised approach.



Carbon literacy in numbers

The [Leicester and Leicestershire Enterprise Partnership](#) (LLEP) recently worked with De Montfort University and University of Leicester to deliver Carbon Literacy Training to its entire staff and two board members making the LLEP the first Bronze accredited [Carbon Literate LEP](#) in the UK. The training, developed in coordination with LLEP staff and the two universities, started with the core framework of Carbon Literacy. It then encouraged staff to reflect upon their particular areas of work,

and examined what the LLEP would need to understand and action in light of climate change commitments. By developing a training package that can be easily adapted and delivered, this has paved the way for other LEPs to follow suit.

Phil Korbel – Director of Advocacy for The Carbon Literacy Project said: 'Mobilising businesses to act at the scale and speed necessary to resolve the climate crisis is nothing short of essential. Climate change brings such substantial and rapidly changing risks and opportunities to business that embedding new core competencies such as Carbon Literacy needs to be a high priority. This is why it's such good news for us to accredit the first ever Carbon Literate LEP so that this new and vital capacity can spread fast - delivered by the business community for the business community'.

For the LLEP it is about more than accreditation, they will use Carbon Literacy as the basis to support Net Zero within the organisation. The LLEP is now consulting staff on a Zero Carbon Action Plan and developing a suite of low carbon support that can be delivered with local businesses, as well as using the influence it has to initiate change. The first part of this work was a recent [Board Blog](#), which committed the LLEP to support the local Climate and Nature Emergency declarations.

Commercial Air Source Heat Pumps

Chris Aldred – Commercial Director Asset Plus

Air Source Heat Pumps (ASHPs) have long been a solution to decarbonise heating but the high upfront costs and the likely increase in annual utility bills along with the potential disruption associated with installation, has held deployment back. However, with continuing improvements in technology and large-scale support from Government grants such as the [Public Sector Decarbonisation scheme](#), they are finally coming of age.

ASHPs absorb heat from the outside air to generate heat, which can then be used to provide space heating and hot water. They are able to extract several times more heat energy from the surrounding environment than the electrical energy they consume. This factor is referred to as the [Coefficient of Performance](#) (COP). COPs are influenced by several factors such as the size of emitters or radiators, the existing pipe arrangement and the thermal properties and use of the building.



100kW Air Source Heat Pump

You must always be aware of the large differential of cost between 1kWh of electricity and 1kWh of gas. If your electricity is three times as expensive as your gas, you will need a COP of '3' or more to prevent your annual energy bill from increasing. Hence, by maximising the COP, the viability of an ASHP scheme will be much improved.

After considering these factors, if you think an ASHP is suitable as a direct replacement for existing heat-generating plant, such as a gas boiler, you must then consider the differences in the way and level at which ASHPs generate heat. A detailed assessment of the following factors should be undertaken before proceeding:

- Location of the Heat Pump – External units can be quite large especially for commercial use. Will planning permission be required, is there a noise issue, and is there a convenient electrical supply?
- Electrical Infrastructure - Many older buildings have little spare capacity within their electrical supply to support a significant load from a Heat pump. Is [grid capacity available](#) if it is necessary to upgrade the supply to the building? Is there any potential for demand side reduction measures (e.g. LED Lighting) to be carried out to provide additional electrical capacity?
- Radiators – Heat pumps tend to run at much lower temperatures than gas boilers, so existing systems may not be able to distribute the heat as efficiently.
- Do you need to replace the existing boilers completely? If the boilers are operational and any of the above are restrictive, it may be sensible to install an ASHP to work alongside the existing system. This would give benefits during periods of low demand and additionally provide security during times of peak load.

ASHPs are a great technology to decarbonise heat if operated and installed correctly, they can still be expensive with long financial paybacks, and as such, we would always recommend that they be considered as part of a wider energy reduction programme.

[Asset Plus](#) is currently installing heat pumps for many local authorities under Energy Performance Contracts, including [Dudley Metropolitan Borough Council](#) and Nottingham City Council

Funding News

Green Homes Grant Local Authority Delivery Phase 2

The Midlands Energy Hub is distributing £59.95m as part of [Phase 2 of the LAD](#) scheme. To assist delivery, two Dynamic Purchasing Systems (DPS) to enable Local Authorities to procure both Installers and Professional Services have been set up. A 'DPS' is a method of buying commonly used goods, works or services. It combines a pre-qualification process for suppliers, similar in effect to a 'select' or 'approved' list, with elements of electronic tendering to reduce the workload for both buyers and suppliers. Suppliers can continue to sign up to the [Professional Services DPS here](#) (a link for installers will be available soon).

Users will need to request the [access agreement\(s\)](#), sign and return, in order to access the DPS. It will initially be a managed system with Nottingham City Council (NCC) running the call-offs. Users will need to contact NCC with details of the works they wish to procure and provide specifications. Templates will be made available and there will also be an officer to provide support. Access to the DPS can be granted for evaluation purposes. For further information, contact the [LAD project team](#).

Rural Community Energy Fund

The [RCEF](#) is a scheme to support rural communities across England who want to set up renewable energy projects. Funding is split into two stages. Stage one grants provide up to £40,000 for feasibility studies and stage two grants provide up to £100,000 for business development and planning. The scheme is administered in the Midlands by the Midlands Energy Hub. If you are based in a rural area and have a project that could benefit from the RCEF, contact the team [here](#).

Local Government Support Programme

The [Local Government Support Programme](#), delivered by EST, is fully funded by the Department for Transport to provide support to Councils in England who are developing sustainable mobility strategies. The programme focuses on the deployment of Electric Vehicle Charging Infrastructure and can deliver a range of support including workshops, training, policy and strategy reviews, as well as a range of tailored support, including help with funding applications. This free and impartial support is flexible and can be tailored to meet the needs of individual authorities or groups of authorities working together. The EST has been working with the Midlands Energy Hub to deliver a number of workshops to help district councils develop EV charge point strategies and to upskill officers at a county level.

Partners

Sustainability West Midlands

All outputs from the recently completed Midlands wide study into the [Low Carbon Goods & Environmental Services Sector](#) (LCEGS) are now available. These include a detailed analysis of the sector at LEP and local authority level, analysis of the impact of Covid-19 on the sector, and a recommendations report based on feedback from over 200 stakeholders across the region. Download the reports [here](#).

[Sustainability West Midlands](#) is working with the West Midlands Combined Authority to support the [West Midlands Net Zero Business Pledge](#). Commitment to the pledge will help you reduce your environmental impact, save costs, and position your business as a leader in the net zero carbon economy. SWM will provide you with support and guidance including access to business networks and you will receive an official pledge logo to use in your publicity. Make your pledge [here](#).

Hub Partners

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