#### London's Zero Carbon Strategy

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## London's Zero Carbon Strategy: A Brief Introduction

- The global context: the C40 Mayors
- The national context: legislative commitment, independent advisory committee
- The London Mayor's strategy
- Localisation: The example of Islington



We are committing to provide the swiftest and strongest possible rebound for our citizens and reaffirm our commitment to the principles of the Global Green New Deal

https://www.c40.org/other/agenda-for-a-green-and-just-recovery



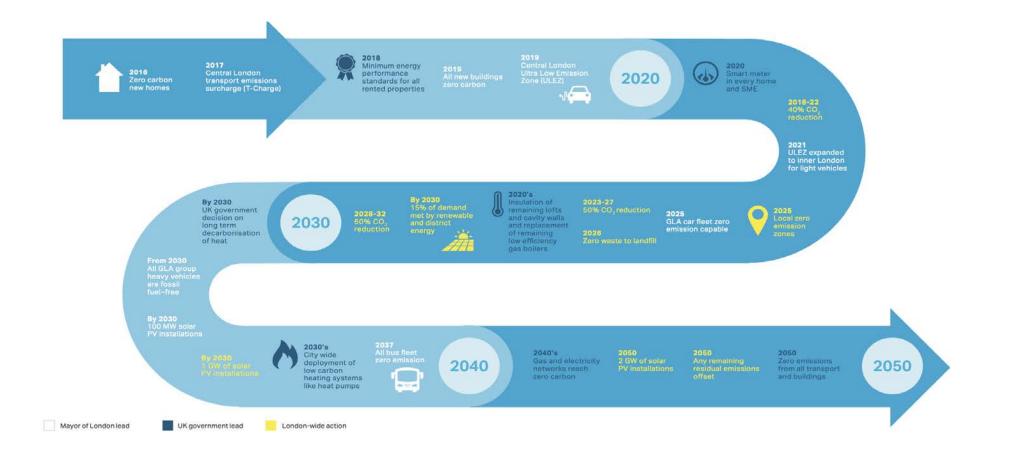
#### Zero carbon London: A 1.5°C compatible plan

December 2018



Greater London Authority, December 2018. Zero Carbon London: A 1.5<sup>o</sup>C compatible plan https://www.london.gov.uk/sites/default/files/1.5\_action\_plan\_amended.pdf

## Zero Carbon City by 2050



#### https://www.london.gov.uk/sites/default/files/1.5 action plan amended.pdf, p.7

#### Modelling approach

Identify suite of policy measures needed to transition to a zero emissions transport network and enable a shift to public transport, cycling and walking

Identify suite of policy measures needed to improve energy efficiency in London's buildings<sup>1</sup>

Use the modelled transport and energy efficiency measures to develop four scenarios for achieving a zero carbon energy and transport system to 2050<sup>2</sup> The four scenarios rely on a different mix of technologies:

1 - Decentralised energy focus on heat networks

2 - High electrification heat pumps dominate (electric heating)

**3 - Decarbonised gas** Hydrogen replaces gas in the gas grid. Relies on carbon capture and storage

> 4 - Patchwork Combination of heat pumps, heat networks and a partial hydrogen network

Identify further measures required to meet the 2050 zero carbon target

Set carbon budgets for the next 15 years to get us on the right path

#### https://www.london.gov.uk/sites/default/files/1.5\_action\_plan\_amended.pdf, ,p.8.

## National Level: Committee on Climate Change

An independent, statutory body established under the Climate Change Act 2008.

Our purpose is to advise the UK and devolved governments on emissions targets and to report to Parliament on progress made in reducing greenhouse gas emissions and preparing for and adapting to the impacts of climate change.

Strategic priorities

In fulfilling this role our focus is to:

- Provide **independent advice** on setting and meeting carbon budgets and preparing for climate change
- Monitor progress in reducing emissions and achieving carbon budgets and targets
- Conduct independent analysis into climate change science, economics and policy
- Engage with a wide range of organisations and individuals to share evidence and analysis
- The Government and national authorities may also request specific **advice** from the Committee on an ad-hoc basis.

https://www.theccc.org.uk

# Building a resilient recovery from the COVID-19 crisis (CCC letter to Boris Johnson, 6 May 2020)

"Six principles for a resilient recovery.

- Use climate investments to support the economic recovery and jobs
- Lead a shift towards positive long-term behaviours.
- Tackle the wider 'resilience deficit' on climate change
- Embed fairness as a core principle.
- Ensure the recovery does not 'lock-in' greenhouse gas emissions or increased climate risk.
- Strengthen incentives to reduce emissions when considering fiscal changes.

As president of the COP26 UN climate talks in Glasgow and with incoming presidencies of the G7 and G20 the UK, together with Italy, can help to steer a positive global response."

https://www.theccc.org.uk/publication/letter-building-a-resilient-recovery-from-the-covid-19-crisis-to-prime-minister-boris-johnson/

## CCC Investment Priorities, 25 June 2020

- 1. Low-carbon retrofits and buildings that are fit for the future. There are vital new employment and reskilling opportunities across the country if Governments support a national plan to renovate buildings and construct new housing to the highest standards of energy and water efficiency, to begin the shift to low-carbon heating systems, and to protect against overheating. Roll-out of 'green passports' for buildings and local area energy plans can begin immediately.
- 2. Tree planting, peatland restoration, and green infrastructure. Investing in nature, including in our towns and cities, offers another quick route to opportunities for highly-skilled employment, and outcomes that improve people's lives. By making substantial changes in our use of land, which are needed to meet the UK's Net Zero target, we will bring significant benefits for the climate, biodiversity, air quality, and flood prevention.
- 3. Energy networks must be strengthened for the net-zero energy transformation in order to support electrification of transport and heating. Government has the regulatory tools to bring forward private sector investment. New hydrogen and carbon capture and storage (CCS) infrastructure will provide a route to establishing new low-carbon British industries. Fast-tracked electric vehicle charging points will hasten the move towards a full phase out of petrol and diesel cars and vans by 2032 or earlier.
- 4. Infrastructure to make it easy for people to walk, cycle, and work remotely. Dedicated safe spaces for walking and cycling, more bike parking and support for shared bikes and e-scooters can help the nation get back to work in a more sustainable way. For home working to be truly a widespread option, resilient digital technology (5G and fibre broadband) will be needed.
- 5. Moving towards a circular economy. Within the next five years, we can not only increase reuse & recycling rates rapidly but stop sending biodegradable wastes to landfill. Local authorities need support to invest strategically in separated waste collections and recycling infrastructure and to create new regional jobs.
- https://www.theccc.org.uk/2020/06/25/covid-19-can-be-an-historic-turning-point-in-tackling-the-global-climate-crisis/

## The Greater London Authority (GLA) Estate

#### FOI request to the Greater London Authority submitted on 3 May 2016 Request submitted during Mayoral term 2012-2016 (Boris Johnson) #0172

Could you please provide the total gross internal floor area of all the buildings in the GLA's estate in as much detail as possible. For example, by building type, use, age, location and functional body (TfL etc).

#### The Greater London Authority's response sent 31 May 2016

City Hall is 18,000 square metres.

For information on other functional bodies please contact:

#### Transport for London:

(FOI Case Management Team, Information Governance, Transport for London, Floor 7, Windsor House, London SW1H 0TL Email: foi@tfl.gov.uk) London Fire and Emergency Planning Authority (LFEPA)

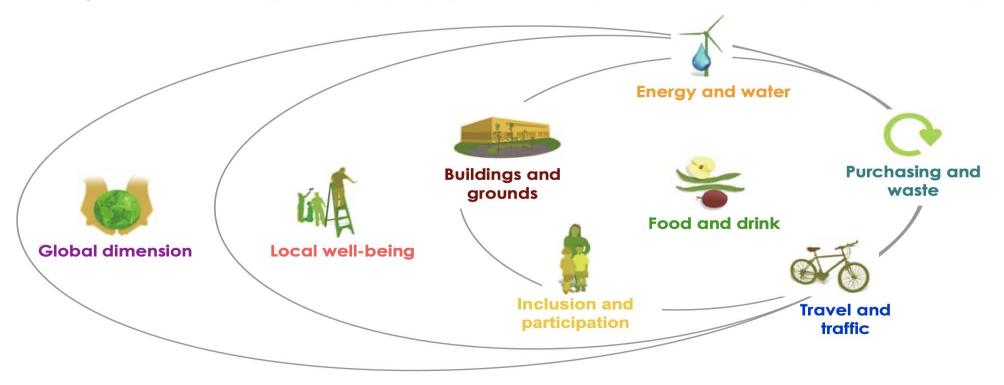
(informationaccess@london-fire.gov.uk)

London Legacy Development Corporation (LLDC) foi@londonlegacy.co.uk :

Queen Elizabeth Olympic Park https://www.queenelizabetholympicpark.co.uk

## Schools, and 'doorways' (from SDC, 2007)

Diagram: The 'doorways' or sustainability themes of the National Framework for Sustainable Schools



http://www.sd-commission.org.uk/data/files/publications/Publish\_Schools\_Carbon\_Strategy.pdf, p.8.

## **TEC-LEDNet Joint Statement on Climate Change**

London Councils' Transport and Environment Committee (TEC) and the London Environment Directors Network (LEDNet)

- **#1 Retrofit London**: Retrofit all domestic and non-domestic buildings to an average level of EPC B. Programme timescale: 2020 2 2030.
- **#2 Low-carbon development:** Secure low carbon buildings and infrastructure via borough planning. Programme timescale: 2020 2022.
- **#3 Halve petrol and diesel road journeys**: Halve road journeys made by petrol and diesel via combined measures that can restrict polluting journeys and incentivise sustainable and active travel options. Programme timescale: 2020 2030.
- **#4 Renewable power for London**: Sec??? e 100%? ene? able ene? g? fo? London?? p? blic? ec? o? no? and in the future. Programme timescale: 2020? 2030.
- **#5 Reduce consumption emissions**: Reduce consumption emissions by two thirds, focusing on food, clothing, electronics and aviation. Programme timescale: 2020 2030.
- **#6 Build the green economy**: De? elop London??? Io? ca? bon ? ec? o? and g? een o?? b? oade? economy. Programme timescale: 2020 ? 2030.

#### • **#7** Creating a resilient and green London

https://www.londoncouncils.gov.uk/sites/default/files/Policy%20themes/Environment/TEC-LEDNet%20Joint%20Statement%20on%20Climate%20Change%20FINAL%20-%20March%202020\_0.pdf

# Adopted by London Borough of Islington

- **Retrofit London**: Retrofit all domestic and non-domestic buildings to an average Energy Performance Certificate level of EPC B (2020–2030)
- Low-carbon development: Secure low carbon buildings and infrastructure via borough planning (2022–2030)
- Halve petrol and diesel road journeys: Halve road journeys made by petrol and diesel via combined measures that can restrict polluting journeys and incentivise sustainable and active travel options (2020–2030)
- **Renewable power for London**: Secure 100% renewable energy for London's public sector now and in the future (2020–2030)
- **Reduce consumption emissions**: Reduce consumption emissions by two thirds, focusing on food, clothing, electronics and aviation (2020–2030)
- Build the green economy: Develop London's low carbon sector and green our broader economy (2020–2030)

https://www.islington.gov.uk/~/media/sharepoint-lists/publicrecords/Communications/Publicity/Publicconsultation/20192020/20200327IslingtonZeroCarbonStrategy20201

## Additional references

Warum Deutschland ein (richtiges) Klimaschutzkomitee braucht

Von Johanna Schiele & Hanns Koenig

Top tips for sustainability in schools. Ref: DFE-32056-2012 <u>https://www.gov.uk/government/publications/top-tips-for-sustainability-in-schools</u>

Sustainable Development Commission with the Department for Children, Schools and Families (2007) Carbon Emissions from Schools: Where they arise and how to reduce them.