NHS
University Hospitals
Coventry and Warwickshire
NHS Trust

University Hospitals
Coventry and Warwickshire NHS Trust

Green Plan 2023 – 2026

Together Towards Net Zero

Contents

Foreword

This updated UHCW Green Plan shows how University Hospitals Coventry and Warwickshire NHS Trust will move towards net zero in 2045 as part of the Greener NHS programme. This will see us work towards acheiving:

- An 80% reduction of emissions we control directly net zero by 2028-2032
- An 80% reduction of emissions net zero we can influence by 2036-2039

This plan, which sets out our actions for 2023-2026, is constantly updated and approved by the Trust Board annually. The plan forms a core component of our Organisational Strategy "*More than a hospital*" where Sustainability is one of the core five purposes.

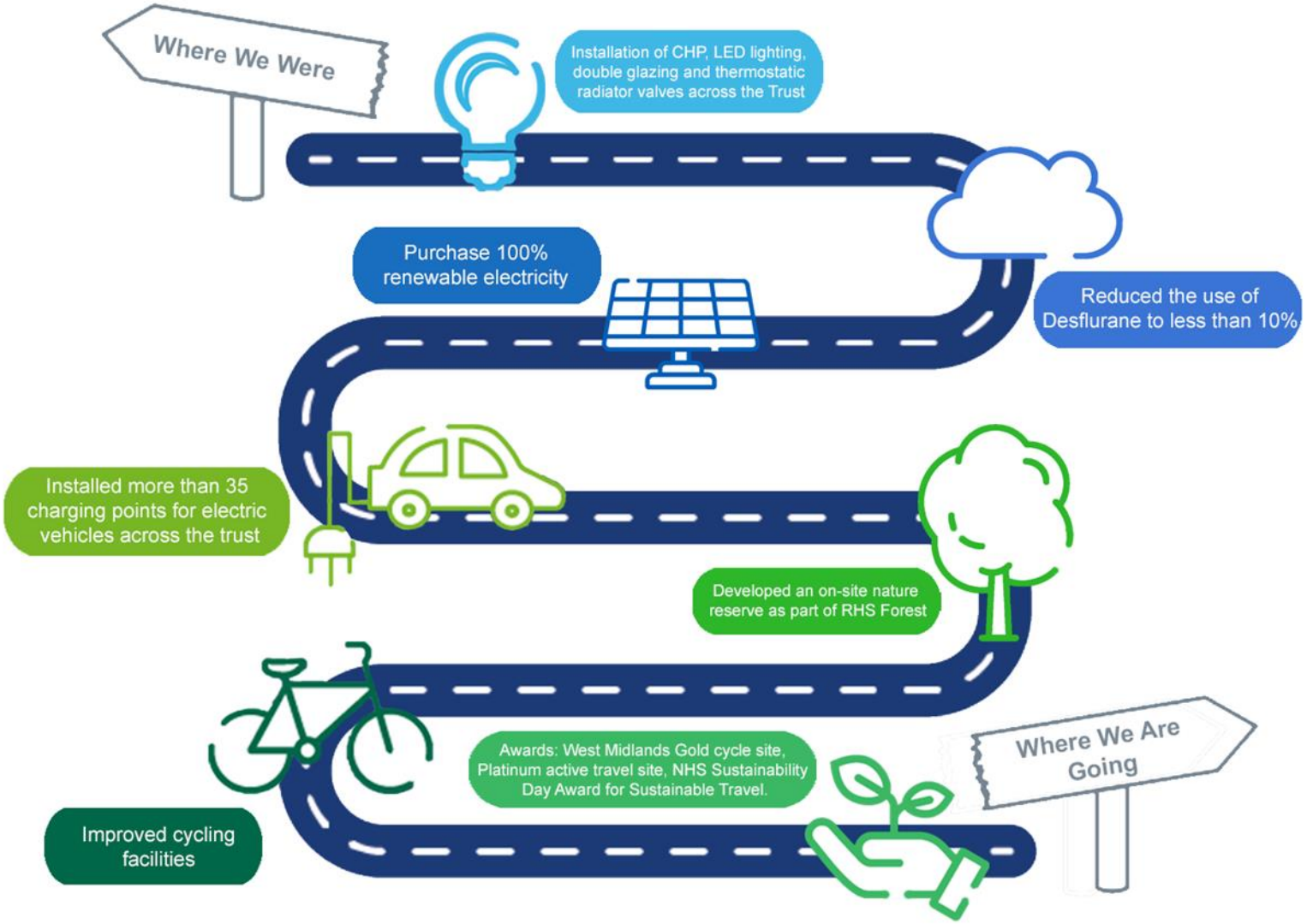
Within our organisation, we have a number of ways we are making sure our sustainability commitment is delivered and each business decision has our green agenda at the forefront of our thinking. This delivery focus includes collaborative leadership from our Net Zero Delivery Group, with representatives from across different areas supported by a range of Green Champions, making differences wherever they work. We are already seeing remarkable results coming through that not only are better choices for the planet but also improving costs and efficiencies in the way we deliver our services.

As a large employer in Coventry and Warwickshire responsible for the health services of our population, it is essential that we invest in solutions that will benefit our health now and for future generations.

Professor Andy Hardy
Chief Executive Officer

Tracey Brigstock,
Chief Nursing Officer and Senior Responsible Officer (SRO) for Net Zero

Highlights


Where We Were
Installation of CHP, LED lighting, double glazing and thermostatic radiator valves across the Trust
Purchase 100% renewable electricity
Reduced the use of Desflurane to less than 10%
Installed more than 35 charging points for electric vehicles across the trust
Developed an on-site nature reserve as part of RHS Forest
Awards: West Midlands Gold cycle site, Platinum active travel site, NHS Sustainability Day Award for Sustainable Travel.
Improved cycling facilities
Where We Are Going

Introduction

University Hospitals Coventry and Warwickshire (UHCW) NHS Trust is proud to share our Green Plan, which seeks to embed sustainability and low carbon practice in the way we offer vital healthcare services and help the NHS to become the first health service in the world with net zero greenhouse gas (GHG) emissions.

The climate crisis is also a health crisis. Rising temperatures and extreme weather will disrupt care and impact the health of our patients and the public, especially the most vulnerable in our society.

People with mental health issues may experience a higher degree of ‘climate anxiety’, and there may be co-morbidities associated with the physical impacts of climate change and a deterioration in mental health. UHCW has a central role to play in reducing health inequalities and helping the NHS to reach net zero.

This Green Plan serves as the central document for UHCW’s sustainability agenda and provides the rationale for sustainability at the Trust. Through this Green Plan, UHCW will work with our staff, patients and partners to take powerful sustainable development and climate action as part of our commitment to offer the highest quality care to our communities.

The UHCW Green Plan has been developed in consultation with experts from many disciplines across the Trust and external partners to workshop the plan in the Innovation Hub. Leads for Sustainability and Innovation working in partnership developed the main structure of the Green Plan to ensure the details were accurate and targets achievable with an appropriate time scale. The engagement with internal and external partners helped to inform sustainability priorities and identify areas for productive collaboration.

UHCW NHS Trust in 2019/20

Number of employees (FTE):
10,000

Key Services:
General, Acute & Specialised Hospital Care

Footprint of Sites:
173,900m²

Geography:
University Hospital, Hospital of St Cross, Clay Lane Health Centre, City Of Coventry NHS Healthcare Centre

Number of Sites:
4 – General acute hospital x2, Non inpatient

Patient Numbers:
800,000

Specialised services:
Cardiology, neurosurgery, stroke, joint replacements, in vitro fertilisation (IVF) and maternal health, diabetes and kidney transplants, designated Major Trauma Centre and cancer Centre.

Key Resources

Building Energy
86 GWh

Baseline year for Plan
2019/2020

Waste Arisings
3339 tonnes

Procurement Activity
£206,937,395

Water Supplied
342,034 m3

Business Travel
Including staff commuting
44,290,152 km

Patient/Visitor Travel
62,862,294

Organisational Vision

These core values are embedded within our strategic objectives and are integral to our Green Plan to achieve sustainable, person-centred care in a safe and quality-focused way.

Our Vision

To be a national and international leader in healthcare rooted in our communities. This means delivering the best care for our communities, being exception in everything we do, creating the best experiences and opportunities for our staff and being an outstanding partner in local care.

Our fundamental purpose is to deliver the best possible care for our local communities. We will achieve this through our five interconnected purposes which are:

- Local integrated care
- Valuing and enabling our people
- Centres of excellence
- Sustainability
- Research, innovation and teaching

Our Green Plan adds further environmental and social dimensions to the delivery of care, especially in terms of the widely accepted climate and ecological crisis.

Our Green Plan Vision

Net Zero: resource consumption and Greenhouse Gas (GHG) emission reductions that align with NHS net zero targets

Climate Resilience: reducing the environmental impact of our activities and provide a basis for us to become a climate change-resilient organisation

Social Value: actions that leverage our role as a place-based anchor institution to accomplish social value

Our Green Plan has **nine areas of focus** that appraise our status and set actions to be achieved within the next three years:

1. Workforce and systems leadership
2. Sustainable models of care
3. Digital transformation
4. Travel and transport
5. Estates and facilities
6. Medicines
7. Supply chain and procurement
8. Food and nutrition
9. Adaptation

Helen Wilkins, Emergency Department Consultant and Green ED Lead

Our Drivers for Change

UHCW is committed to deliver the NHS Long Term Plan, Standard Contract, as well as the recommendations in the Priorities and Operational Planning Guidance and '*Delivering a Net Zero NHS*'- report, which have all informed our Green Plan and shape our Vision.

We will work through this Plan to fulfil sustainable development requirements from the NHS (as shown in Figure 2) and other relevant legislation (as listed on the next page in Figure 3) that are aligned with the relevant United Nations (UN) Sustainable Development Goals (SDGs). This includes obligations to minimise adverse impacts on the environment and secure wider social, economic and environmental benefits for our communities.

We also commit to review our progress and participate in regional partnerships and strategies related to sustainable development wherever appropriate.

NHS Long Term Plan (LTP)	2.18 Take action on healthy NHS premises. 2.21 Reduce air pollution from all sources. 2.24 Take a systematic approach to reduce health inequalities. 2.3 Improve preventative care. 2.37 Commission, partner with and champion local charities, social enterprises and community interest companies. 4.38 Make the NHS a consistently great place to work – promoting flexibility, wellbeing and career development. 4.42 Place respect, equality and diversity at the heart of workforce plans. 16 Play a wider role in influencing the shape of local communities. 17 Lead by example in sustainable development and in reducing use of natural resources and the carbon footprint of health and social care: A shift to lower carbon inhalers will deliver a reduction of 4%, with a further 2% delivered through transforming anaesthetic practices. Additional progress in reducing waste, water and carbon will be delivered by ensuring all trusts adhere to best practice efficiency standards and adoption of new innovations. Key to this will be delivering improvements, including reductions in single use plastics, throughout the NHS supply chain 18 Create social value in local communities as an anchor institution.
NHS Standard Contract 21/22 (SC18)	**18.1** Take all reasonable steps to minimise adverse impact on the environment. **18.2** Maintain and deliver a Green Plan, approved by the Governing Body, in accordance with Green Plan Guidance. 18.2.1 provide an annual summary of progress on delivery of that plan to the Coordinating Commissioner 18.2.2 nominate a Net Zero Lead and ensure the Coordinating Commissioner is kept informed at all times of the person holding his position **18.3** Within its Green Plan, the Provider must quantify its environmental impacts and publish in its annual report quantitative progress data, covering as a minimum greenhouse gas emissions in tonnes, emissions reduction projections and an overview of the Provider's strategy to deliver those reductions **18.4** As part of its Green Plan the Provider must have in place clear, detailed plans as to how it will contribute towards a 'Green NHS' with regard to Delivering a 'Net Zero' National Health Service commitments in relation to: **18.4.1** air pollution, and specifically how it will, by no later than 31 March 2022: **18.4.1.1** take action to reduce air pollution from fleet vehicles, transitioning as quickly as reasonably practicable to the exclusive use of low and ultra-low emission vehicles; **18.4.1.2** take action to phase out oil and coal for primary heating and replace them with less polluting alternatives; **18.4.1.3** develop and operate expenses policies for Staff which promote sustainable travel choices; **18.4.1.4** ensure that any car leasing schemes restrict high emission vehicles and promote ultra-low emission vehicles. **18.4.2** climate change, and specifically how it will, by no later than 31 March 2022, take action: **18.4.2.1** to reduce greenhouse gas emissions from the Provider's Premises in line with targets in Delivering a 'Net Zero' National Health Service **18.4.2.2** in accordance with Good Practice, to reduce the carbon impacts from the use, or atmospheric release, of environmentally damaging gases such as nitrous oxide and fluorinated gases used as anaesthetic agents and as propellants in inhalers, including by appropriately reducing the proportion of desflurane to sevoflurane used in surgery to less than 10% by volume, through clinically appropriate prescribing of lower greenhouse gas emitting inhalers, by encouraging Service Users to return their inhalers to pharmacies for appropriate disposal;

NHS Standard Contract 21/22 (SC18)	18.4.2.1 to reduce greenhouse gas emissions from the Provider's Premises in line with targets in Delivering a 'Net Zero' National Health Service 18.4.2.2 in accordance with Good Practice, to reduce the carbon impacts from the use, or atmospheric release, of environmentally damaging gases such as nitrous oxide and fluorinated gases used as anaesthetic agents and as propellants in inhalers, including by appropriately reducing the proportion of desflurane to sevoflurane used in surgery to less than 10% by volume, through clinically appropriate prescribing of lower greenhouse gas emitting inhalers, by encouraging Service Users to return their inhalers to pharmacies for appropriate disposal; 18.4.2.3 to adapt the Provider's Premises and the manner in which Services are delivered to mitigate risks associated with climate change and severe weather. 18.4.3 single use plastic products and waste, and specifically how it will, no later than 31 March 2022 take action: 18.4.3.1 to reduce waste and water usage through best practice efficiency standards and adoption of new innovations; 18.4.3.2 to reduce avoidable use of single use plastic products, including by signing up to and observing the Plastics Pledge; 18.4.3.3 so far as clinically appropriate, to cease use at the Provider's Premises of single-use plastic cutlery, plates or single-use cups made of expanded polystyrene or oxodegradable plastics; 18.4.3.4 to reduce the use at the Provider's Premises of single use plastic food and beverage containers, cups, covers and lids; 18.4.3.5 to make provision with a view to maximising the rate of return of walking aids for re-use or recycling, and must implement those plans diligently. 18.5 The Provider must ensure that with effect from the earliest practicable date (having regard to the terms and duration of and any rights to terminate existing supply agreements) all electricity it purchases is from Renewable Sources. 18.6 The Provider must, in performing its obligations under this Contract, give due regard to the potential to secure wider social, economic and environmental benefits for the local community and population in its purchase and specification of products and services, and must discuss and seek to agree with the Coordinating Commissioner, and review on an annual basis, which impacts it will prioritise for action.
Planning Guidance (PG21 & PG22)	21/22: C1 Where outpatient attendances are clinically necessary, at least 25% should be delivered remotely by telephone or video consultation 22/23: A1 Investment in Workforce - Develop the workforce required to deliver multidisciplinary care closer to home, including supporting the rollout of virtual wards and discharge to assess models 22/23: D2: Transform and build community services capacity to deliver more care at home and improve hospital discharge: develop robust digital strategies to support improvements in care delivery, especially out-of-hospital care 22/23: H. Exploit the potential of digital technologies to transform the delivery of care and patient outcomes – meet a core level of digitisation by March 2025
Estates 'Net Zero' Carbon Delivery Plan (NZCDP)	**1**. Make every kWh and m^3 count **2.** Run on 100% clean renewable energy - Investing in no-regrets energy saving measures (thermal efficiency upgrades etc) - Prepare buildings for electricity-led heating - Switch to non-fossil fuel heating - Increase on-site renewables **3.** Increase resource productivity **4.** Reduce volumes of residual waste **5.** Use Ultra Low Emission Vehicles (ULEV) and Zero Emission Vehicles (ZEV)

NHS Estates 'Net Zero' Carbon Delivery Plan (NZCDP)	5. Use Ultra Low Emission Vehicles (ULEV) and Zero Emission Vehicles (ZEV) 6. Establish EV ready Estates 7. Ensure our suppliers meet the minimum standards expected on net zero and social value 8. Ensure all our construction and capital spend is net zero carbon and all tenders include a minimum of a 10% weighting for social value 9. Increasing healthier, more sustainable menu choices 10. Prepare our estates for severe weather events 11. Support and encourage our staff to make lower carbon travel choices
NHS Greener NHS / Net Zero Plan (NZ)	Net zero by **2040** for the NHS Carbon Footprint, with 80% reduction by 2028 to 2032. Net zero by **2045** for the NHS Carbon Footprint '*Plus*', with an ambition for an 80% reduction by 2036 to 2039.
NHS NHSE/I Sustainable Supplier Evergreen Framework (SSF)	**2022** - Launch of Sustainable Suppler Evergreen Framework **April 2022** - NHS will adopt PPN 06/20 so that all NHS tenders include a minimum 10% net zero and social value weighting **April 2023** - NHS will adopt PPN 06/21 so that all contracts above £5m will require suppliers* to publish a carbon reduction plan for their direct emissions as a qualifying criterion **April 2024** - All suppliers* will be required to publicly report emissions and publish a carbon reduction plan aligned to the NHS' net zero target for their direct emissions, irrespective of contract value **April 2027** - All suppliers* will be required to publicly report emissions and publish a carbon reduction plan aligned to the NHS' net zero target, for both their direct and indirect emissions (Scope 1, 2, and 3) **April 2028** - New requirements will be introduced overseeing the provision of carbon footprinting for individual products supplied to the NHS **April 2030** - All suppliers will be required to demonstrate progress in-line with the NHS' net zero targets, through published progress reports and continued carbon emissions reporting **2045** - Net Zero supply chain / Net Zero NHS
NHS Third Healthcare Adaptation Report (3HA)	**SD1.** Build the capacity and resilience of primary, secondary, and social care services to anticipate and respond to the impacts of climate change through long-term adaptation planning and identification of sites at risk.

Figure 1 NHS Environmental Drivers

Legislative Drivers	UK guidance; those driven by UK Guidance
Civil Contingencies Act 2004	National Policy and Planning Framework 2012
Climate Change Act 2008 (as amended)	Department of Environment, Food and Rural Affairs (DEFRA) The Economics of Climate Resilience 2013
Public Services (Social Values) Act 2012	Department for Environment, Food and Rural Affairs (DEFRA) Government Buying Standards for Sustainable Procurement 2016
Mandatory; those mandated within the NHS	The Stern Review 2006; the Economics of Climate Change
Standard Form Contract requirements	Health Protection Agency (HPA) Health Effects of Climate Change 2012
HM Treasury's Sustainability Reporting Framework	The National Adaptation Programme 2013; Making the country resilient to the changing climate
Public Health Outcomes Framework	Department of Environment, Food and Rural Affairs (DEFRA) 25 Year Plan
International	**Health Specific Requirements**
Intergovernmental Panel on Climate Change (IPCC) AR5 2013	Delivering a Net Zero National Health Service 2020 and Greener NHS guidance
UN Sustainable Development Goals (SDGs) 2016	Five Year Forward View 2014
World Health Organisation (WHO) toward environmentally sustainable health systems 2016	Sustainable Development Strategy for the Health and Social Care System 2014-2020
World Health Organisation (WHO) Health 2020	Adaptation Report for the Healthcare System 2015
The Global Climate and Health Alliance. Mitigation and Co-benefits of Climate Change	The Carter Review 2016
	National Institute for Clinical Excellence (NICE) Physical Activity; walking and cycling 2012
	Health Technical Memoranda (HTM)'s and Health Building Notes (HBN)'s
	Sustainable Transformation Partnerships (STP) Plans

Figure 2 Legislative Drivers with UK Guidance

The UN Sustainable Development Goals

UHCW is **working meaningfully towards the United Nations (UN) Sustainable Development Goals (SDGs) through our Green Plan, which we have aligned to relevant SDG targets.**

The SDGs underpin a global action framework to 2030, adopted by every UN member country to address the biggest challenges facing humanity.

Each goal has targets and indicators to help nations and organisations prioritise and manage responses to key social, economic and environmental issues.

UHCW will work to ensure:
Meaningful alignment to SDG Targets within each Green Plan area of focus
The establishment of effective partnerships for the goals within our region and beyond
Awareness of and links to the SDG's global context, wherever appropriate.

"The NHS belongs to all of us" *(NHS Constitution)*

The NHS and its people contribute to multiple SDGs through the delivery of its core functions, for example, target 3.8, to achieve universal health coverage. Established on 5th July 1948, the UK's National Health Service is the world's first modern fully universal healthcare system free at the point of use and celebrating its 75th year in 2023.

Linking our Green Plan to NHS Net Zero

Contributing around 4% of the country's carbon emissions, and over 7% of the economy, the NHS has an essential role to play in meeting the net zero targets set under the Climate Change Act. Two clear and feasible net zero targets for NHS England are outlined in the 'Delivering a 'Net Zero' National Health Service'-report (aka NHS Net Zero Report):

- **The NHS Carbon Footprint** for the emissions we *control* directly, net zero by **2040**
- **The NHS Carbon Footprint 'Plus'** for the emissions we can *influence*, net zero by **2045**.

All NHS trusts are to align their Green Plans with NHS England's net zero ambitions. We have calculated those emissions from all the sources listed in the NHS Net Zero Report to be reduced by approximately 4% year-on-year (akin to Science Based Targets) until each of the target dates, respectively.

Greenhouse Gas Emissions

Greenhouse gas emissions are conventionally classified into one of three 'scopes', dependent of what the emission source is and the level of control an organisation has over the emission source. They are reported in 'tonnes of carbon dioxide equivalent' (t CO_2e). The emission sources and their 'scope' are shown in the infographic (Figure 3).

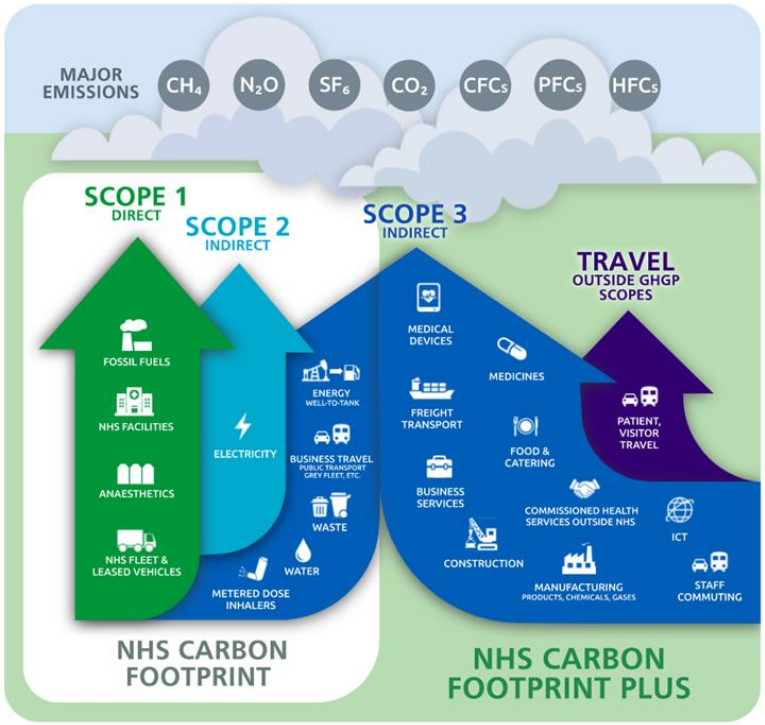


Figure 3 Greenhouse gas emission sources, and their 'scopes'

Data and methodology

The result of a GHG emissions calculation varies in accuracy depending on the data set provided. The more accurate the data supplied, the more accurate the result, which will subsequently allow for better targeting of areas where improvements can be made.

UHCW's GHG Emissions footprint has been calculated according to and aligned with the GHG Protocol for Corporate Reporting and ISO 14064:1 and incorporates the seven main greenhouse gases as per the Kyoto Protocol. We have used the Department of Environment, Food and Rural Affairs (DEFRA) emission factors used to calculate tCO2e. This methodology has been supported by the detailed carbon factors annex in the NHS's 'Trust Contributions to the NHS Carbon Footprint Plus' document which details the emission factors used by NHS England.

UHCW has included other Scope 3 emission factors for building energy use and vehicle emissions. This includes transmission and distribution losses in the provision of electricity and well-to-tank emission factors associated with all fuels. The reporting of these Scope 3 emissions is voluntary but is recommended standard practice by UK Government. Some changes in emission factors lead to altered data for previous years but has made our carbon footprint more accurate.

We have calculated UHCW's carbon footprint from 2019/20 to 2021/22 in terms of building energy and delivery of care, travel, and supply chain, as per the categorisations in the NHS Net Zero report. Primary data has been sourced from utility billing information, prescribing data, waste data and expenses.

We have used the NHS' Health Outcomes of Travel Tool (HOTT) to estimate emissions from staff commuting, patient and visitor travel and our published procurement expenditure to derive spend-based emission values for categories within our supply chain. We are using 2019/20 as our baseline year to set targets again.

UHCW's net zero ambitions

UHCW fully commits to reducing our greenhouse gas emissions to Net Zero to prevent the worst impacts of climate change and meet NHS Net Zero commitments. This plan outlines high-level emissions reductions and enabling actions for each area of focus. This means UHCW needs to act now to reduce our emissions from a variety of direct and indirect sources; from our estate to the care we deliver and beyond, each year from now until we achieve net zero.

We are using this Green Plan to improve our net zero-related data collation, carbon footprint and reporting capacity over time.

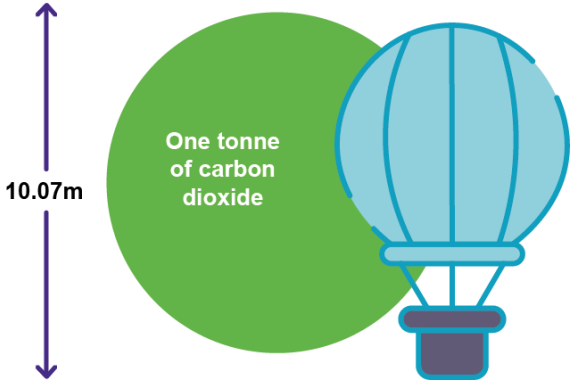
This includes:

Determining weaknesses in our current reporting processes and taking remedial action to ensure robust data is collected.

Developing processes to measure/record emissions we have not previously tracked, such as emissions related to volatile anaesthetics and our supply chain.

Identifying reduction actions for categories we cannot yet easily measure.

An emissions-reduction trajectory for each emission source has been given in each area of focus (if applicable) for the next three years until 31st March 2025. To achieve these emission reductions, we have listed a series of actions in each area of focus. There will be residual emissions at both the 2040 and 2045 target dates, and these will need to be 'offset' or sequestered (which is not in scope for this plan).



What does one tonne of carbon dioxide look like?

One tCO_2e can be visualised as a volume of gas the size of a hot air balloon – a sphere about 10 metres in diameter.

The average three-bedroom semi-detached home emits around one tCO_2e per year from electricity consumption and almost two tCO_2e from the use of natural gas for heating and cooking.

Our Current Position

Our Carbon Footprint in 2019/2020 was 171,709 tCO2e
To meet the NHS Net Zero commitments, we need to avoid over 4,000 tCO2e from all sources each year until 2040/45.

The NHS Net Zero report states most of our emissions, 80%, come from sources we have little or no control over: 75.7% from our supply chain, and a further 4.3% from patient and visitor travel.

The remaining 20% arise from sources we can control or strongly influence: 13.1% of our emissions came from the operation of our buildings, 2% from our prescription of inhalers and volatile anaesthetics and 2.7% from transport associated with the delivery of care (including staff commuting).

See Figure 4 for the split of each emission category, as per the NHS Net Zero report categorisation. Data shown relate to emissions in tCO_2e and their relative proportion of our footprint.

Key:
Delivery of Care:
Personal Travel:
Supply Chain:
Commissioned Services:

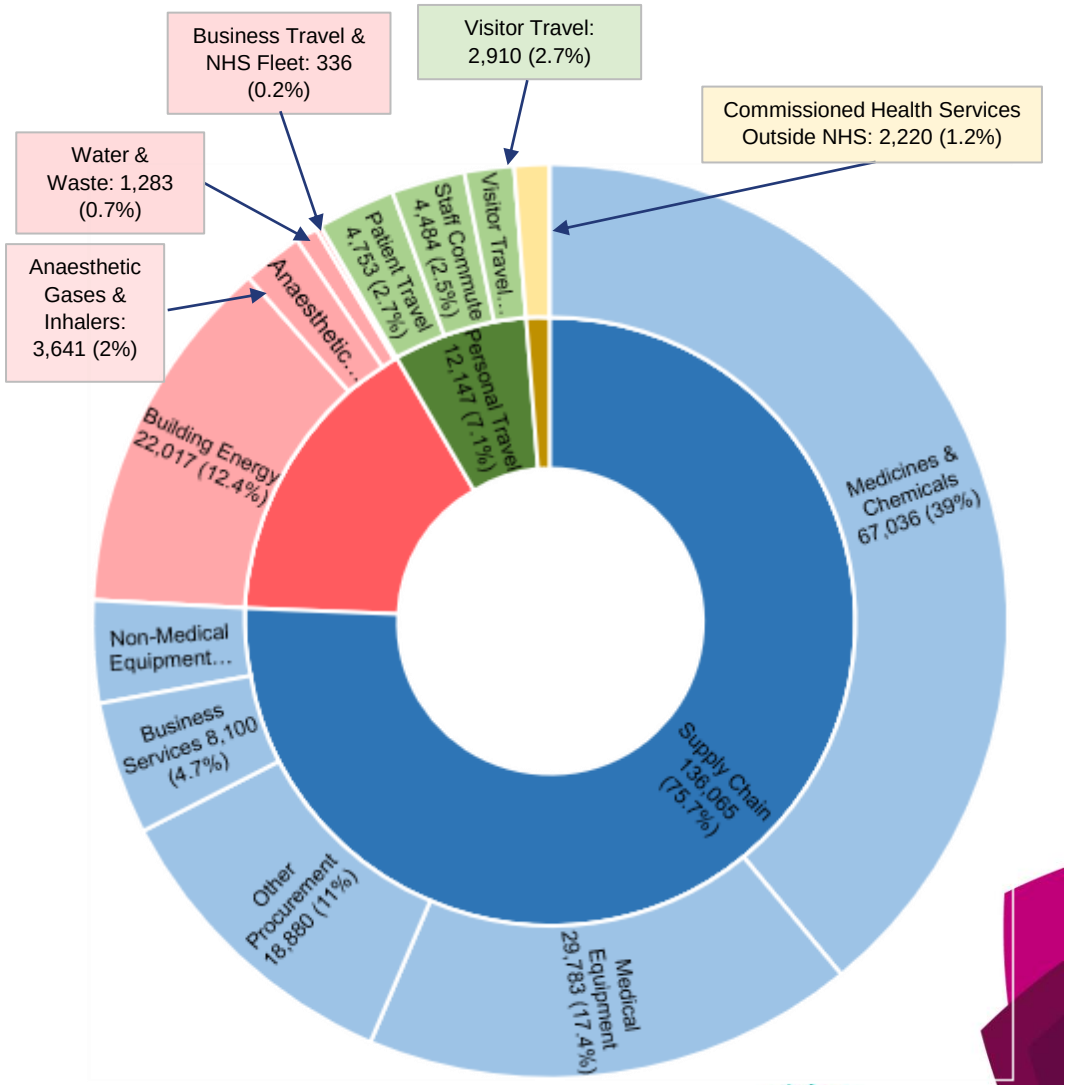


Figure 4 UHCW total carbon footprint breakdown in 2019/20

Emissions from our built environment are shown in Figure 5, and a more detailed breakdown of emission sources for the financial year 2019/20 (Figure 6).

Figure 5 Emissions from our built environment in 2019/20

Our Emissions-reduction trajectory

We have grouped emission sources together and calculated yearly emission reduction targets to 2025/26 (Figure 8).

We need to reduce our total emissions by 23,535 tCO_2e from our 2019/20 baseline (taking into consideration the recent procurement of renewable electricity), by 2025/26.This roughly equates to **3922 tCO_2e** per annum.

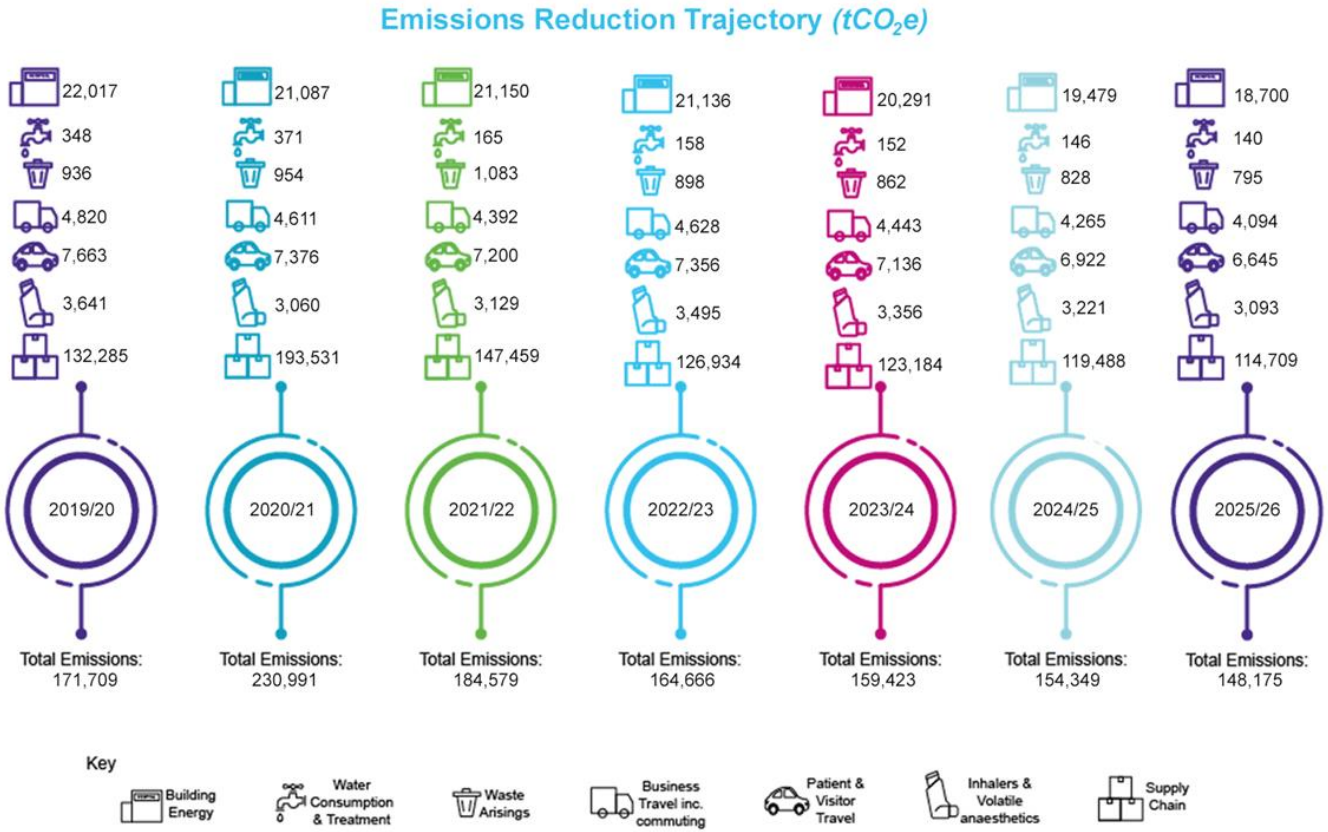


Figure 6 UHCW's Estimated GHG Reduction Target for three years by activity to meet 'Delivering a Net Zero NHS'

Areas of Focus Contents

The following ‘Areas of Focus’ give an overview of our current performance/status and an Action Plan.

The Action Plans state individual actions to achieve our Green Plan goals over the next three years. Individual actions are to be monitored and evaluated routinely, and progress status changed accordingly.

We have given indicative costs and emission reductions. These are very high-level assumptions. A key is given below.

Key:

Indicative Cost to achieve:

- £ No or low cost
- £ Moderately expensive
- £ Significantly expensive

Indicative Emissions reduction:

- Low or incremental reduction
- Moderate reduction
- Significant reduction
- Not applicable

Workforce and Systems Leadership

We will build our Green Plan into our strategic planning and governance, including our clinical and operational policies and procedures to ensure sustainable development is a part of our daily work and how we measure success.

This is a shared journey, and we ask our colleagues to be a part of it.

We have an Executive Net Zero lead, who will oversee the resourcing and delivery of this Green Plan. We will also seek internal and third-party funding to support the roll-out of Green Plan actions.

This Green Plan is approved by our Board of Directors and will be reviewed (and revised if necessary) at least annually to keep us on track with the NHS net zero and UHCW's own targets. These reviews and our progress against the actions in the Green Plan will be submitted to our Coordinating Commissioner.

In this area our Trust has already made considerable progress from a governance standpoint. The Trust has appointed a Sustainable Development lead and subsequently includes sustainable development as part of our annual reports. The Trust also has a Health and Wellbeing Lead which supports the physical and mental wellbeing of our colleagues. Membership of the Coventry and Warwickshire ICS Sustainability Group allows us to share best practice with other Trusts across Coventry and Warwickshire.

Liz Fitzhugh
Clinical Lead Net Zero

NHS LTP 2.24, 17

NHS SC 13.9, 13.10, 18.2, 18.

NHS NZ 4.2.3

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Target 13.3 Build knowledge and capacity to meet climate change

System Leadership: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
01	Review and approve the plan at our Board level, monitoring delivery at Board meetings and relevant committees.	21/22		£	✕	Board of Directors	**SC** 18.2
02	Nominate and empower a Climate Change Adaptation Lead and keep the Co-ordinating Commissioner informed at all times of the persons holding these positions.	21/22		£	✕	Board of Directors	**LTP** 2.24,17 **SC** 18.2.2
03	Identify budgets for the delivery of each 'area of focus' and the Green Plan as a whole.	21/22		£		Board of Directors	**LTP** 2.24,17
04	Streamline data collection processes and produce a comprehensive monthly data report with relevant Green Plan metrics.	21/22		£		Estates	**NZ** 3.1.1, 3.1.2
05	Produce an annual granular carbon account in line with HM Treasury's 'Public sector annual reports: sustainability reporting guidance', with the intention of widening its scope and data quality, when possible, along with an annual review of the progress against the Green Plan actions / emission reduction targets.	21/22		£		Estates	**SC** 18.3
06	Develop and increase the Net Zero Champions network.	21/22		£	✕	Net Zero Delivery Group	**SC** 18.1
07	Ensure staff are resourced to undertake Green Plan duties and nominate a lead person or department for each Green Plan area of focus to develop and coordinate action through the existing Sustainability Steering Group.	23/24		£		Board of Directors	**LTP** 2.24,17
08	Ensure the Green Plan delivery is reflected in our corporate risk register.	23/24		£		Board of Directors	**LTP** 2.24,17

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
09	Review procurement plan at Board level to achieve a net zero supply chain. Fulfilling our role as an anchor institution to achieve social value and wider benefits for our communities, particularly for our care groups.	23/24		£		Board of Directors	**LTP** 2.24,17
10	Identify and action ways to engage patients and community in Green Plan delivery, including links between health inequality and climate action.	24/25		£		HR	**LTP** 2.24,17
11	Create a Net Zero Council.	24/25		£	⊗	Board	**SC** 18.1
12	Create a Net Zero Champion award.	24/25		£	⊗	Net Zero Delivery Group	**SC** 18.1
13	Create a Net Zero Hub which includes active communications to staff.	24/25		£	⊗	Communications	**SC** 18.1
14	Share carbon hotspots within the Trust.	24/25		£	⊗	Net Zero Delivery Group	**NZ** 3.1.1
15	Identify internal and third-party funding to enable key Green Plan actions.	On-going		£		Estates	**LTP** 2.24,17
16	Work in partnership with neighbouring NHS trusts and public authorities to enhance the delivery of the Green Plan and share best practice.	On-going		£		Board of Directors	**LTP** 2.24,17
17	Ensure quarterly Greener NHS Data Collection uploads are made.	On-going		£	⊗	Estates	**NZ** 3.1.1, 3.1.2

Figure 7 Green Plan actions for system leadership

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

Workforce

The NHS is the biggest employer in Europe and the world's largest employer of highly skilled professionals and the NHS Long Term Plan aims to ensure it is a rewarding and supportive place to work.

A 2018 national survey of NHS staff showed that 98% of those surveyed thought it was important that the health and care system works in a way that supports the environment, and UHCW will enable our colleagues to lead the way to achieve a greener NHS.

However, we need to embed our Green Plan within our culture and recognise that our people are the core of the NHS. Building on our experience of leading a person-centred trust, we will empower our colleagues to deliver this Green Plan at all levels of our organisation. To do this, we will further utilise the Greener NHS "One Year On" Communications Toolkit, currently used for general messaging and press releases.

Engagement is pivotal to reaching our net zero target. Therefore in 2021, we started our Net Zero Champions network and Council, which continues to expand and helps the Trust to deliver our goals.

Green Plan Launch Event with UHCW Staff

NHS LTP 4.1, 4.3, 4.39, 4.42, 4.43, 4.7

NHS SC 13.1 through 13.10

NHS

8 DECENT WORK AND ECONOMIC GROWTH

Target 8.5 Full employment and decent work with equal pay

13 CLIMATE ACTION

Target 13.3 Build knowledge and capacity to meet climate change

16 PEACE, JUSTICE AND STRONG INSTITUTIONS

Target 16.B Promote and enforce non-discriminatory laws and policies

Workforce: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
01	Incorporate the Green Plan into the Sustainability Steering Group agenda.	21/22		£	✕	People & OD	**LTP** 4.1, 4.3, 4.39, 4.42 **SC** 13.1 to 13.10
02	Incorporate the Green Plan into the Essential Mandatory Training and Induction policies.	21/22		£		Education Services	**NZ** 4.2.1
03	Create Green Plan intranet pages for staff access and external webpages for other stakeholders; upload Green Plan content and progress updates accordingly.	21/22		£	✕	Sustainability Manager Infrastructure services	**NZ** 4.2.1
04	Use the Green NHS 'ONE YEAR ON' Communications Toolkit and/or the 'Healthier Planet, Healthier People' Toolkit to create and share communications about our Green Plan.	21/22		£		Communications & Engagement	**NZ** 4.2.1
05	Encourage staff actively participate in the Greener NHS community and other forums such as the Greener AHP Hub, Centre for Sustainable Healthcare and related workspaces on the FutureNHS platform.	21/22		£		Communications & Engagement	**NZ** 4.2.1
06	Consult, explore and action how clinical and non-clinical staff can best participate in our Green Plan delivery, ensuring this is incorporated into workplans, work-time allocations, performance reviews, and collaborating with other trusts where appropriate.	21/22		£		Sustainability Manager Infrastructure services	**NZ** 4.2, 4.2.1, 4.2.2, 4.3.3

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
07	Work with our suppliers to ensure that onsite workers are subject to the Real Living Wage, fair working practices and protection against discrimination.	23/24		£	⊗	Procurement & People & OD	**LTP** 4.1, 4.3, 4.39, 4.42
08	Develop online sustainability training, pledge platforms for staff and investment in staff to support sustainability.	24/25		£		Communications & Engagement	**NZ** 4.2.1
09	Develop a platform for staff training, engagement and investment in the UHCW Net Zero.	24/25		£		Education Services	**NZ** 4.2.1
10	Increase net zero champion network by 10%.	24/25		£		Communications & Engagement	**NZ** 4.2.1
11	Building on our current practice, review our policies and processes against NHS aims to ensure: ○ rewarding, flexible and supportive work and ○ positive action on promoting equalities, including through the Workforce Race Equality Standard and new Workforce Disability Equality Standard, and ○ regular reporting against the NHS Model Employer Strategy.	On-going		£	⊗	People & OD	**LTP** 4.1, 4.3, 4.39, 4.42 **SC** 13.1 to 13.10

Figure 8 Green Plan actions for workforce

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

"Over 83% of our 10,000 employees live and work in Coventry and Warwickshire – with their involvement in the net zero agenda for UHCW , the results of their commitment will be far reaching, beyond the boundaries of our hospitals."

Sustainable Models of Care

The NHS Long Term Plan updates the NHS service model, with a focus on preventative care in communities and tackling health inequalities, now and in the future. This has been linked to emissions reductions and greener activities.

Our Trust delivers both emergency and elective care to a population of 950,000 people across Coventry and Warwickshire. We have two main hospitals, University Hospital, Coventry, and the Hospital of St Cross, Rugby. The University Hospital site is one of the most modern healthcare facilities in Europe with 1,100 beds and 26 operating theatres. We are equally proud of our facility in Rugby which has 130 beds and six operating theatres, including one mobile theatre.

The National Patient Safety Improvement Programmes and the Investment Impact Fund indicators (IIF) provide underpinning principles for sustainable models of care, such as preventative care interventions and reducing health inequalities. Staff training and empowerment, as detailed in the previous sections, are critical to enhancing sustainable models of care.

Our home-based treatment and early intervention services allow us to provide excellent preventative care. Adhering to the Getting it Right First-Time programme (GiRFT) helps to avoid additional hospital bed days and patient and visitor travel to our clinics, and their associated environmental impacts. Strong interagency partnership working enhances GiRFT, providing a better care package.

Our Trust will commit to linking GHG reductions with our delivery of the Long-Term Plan sustainable care model.

Hospital @ Home service keeping people well in their home environment.

NHS LTP 1.43, 1.44, 1.53, 2.26, 5

NHS SC 13.9.1, 13.9.2, 13.9.10, 18.4.2.1

NHS NZ 4.1.1, 4.1.2, 4.1.3, 4.1.4

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

3 GOOD HEALTH AND WELL-BEING

Target 3.4 Reduce mortality from non-communicable diseases and promote mental health

10 REDUCED INEQUALITIES

Target 10.2 Promote universal social, economic and political inclusion

Sustainable Models of Care: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
01	Appoint a Health Inequalities Lead to coordinate delivery of an updated Health Inequalities Action Plan.	21/22		£	✕	Board of Directors	**LTP** 2.26 **SC** 13.9.2, 13.10 **NZ** 4.1.3
02	Follow Greener NHS guidance or support the development of GHG emissions reduction metrics linked with sustainable care actions, including establishing links between better health outcomes and reduction in emissions from avoided care and travel.	23/24		£	✕	Estates	**SC** 18.4.2.1 **NZ** 4.1.1, 4.1.2
03	Work to engage suppliers related to sustainable care in relevant emissions reduction and health equalities activities.	23/24		£	✕	Procurement & service providers	**NZ** 4.1.3
04	Build on current efforts (GiRFT, National Safety Improvement Programme and CMPP) to reduce health inequalities and improve early intervention, linking this work to potential emissions reductions.	On-going		£		Board of Directors and relevant clinical leads	**LTP** 2.26 **SC**13.9.118.4.2.1 **NZ** 4.1.3
05	Use the Embedding Public Health into Clinical Services Programme's toolkit and Sustainability in Quality Improvement (SusQI) framework to ensure the best possible health outcomes with minimum financial and environmental costs, while adding positive social value at every opportunity.	On-going		£		Board of Directors and relevant clinical leads	**LTP** 2.26 **SC**13.9.118.4.2.1 **NZ** 4.1.3

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
06	Continue to collaborate with other trusts and public authorities on the population's health.	On-going		£		Board of Directors	**LTP** 1.53 **SC** 18.6 **NZ** 4.1.3
07	Ensure care delivery is standardised in reducing unwanted variations and the number of bed days.	Ongoing		£		Clinical leads	**NZ** 4.1.1
08	Decarbonise care pathways where appropriate and prioritise methods with a lower carbon impact as default.	Ongoing		£		Board of Directors and relevant clinical leads	**LTP** 2.26 **SC**13.9.118.4.2.1 **NZ** 4.1.3
09	Include staff and patients in service design by inviting them to planning meetings.	Ongoing		£		Board of Directors and relevant clinical leads	**LTP** 2.26 **SC**13.9.118.4.2.1 **NZ** 4.1.3
10	Explore new ways of delivering care at or closer to home, meaning fewer patient journeys to hospitals.	On-going		£		Clinical leads	**NZ** 4.1.1

Figure 9 Green Plan actions for Sustainable care models

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

Not applicable

"The Covid-19 pandemic saw UHCW put into action new ways of working such as patient appointments using telephone and video for some appointments, saving time and money for those who don't need to be in a hospital setting for some of their care. This is not only kinder for the planet but can deliver better patient experience."

Digital Transformation

The NHS Long Term Plan commits all NHS bodies to focus on digital transformation by establishing a ‘digital front door’, enabling digital first care. The NHS App is one example of this, providing patients with a simple and secure way to access NHS services on their smartphone.

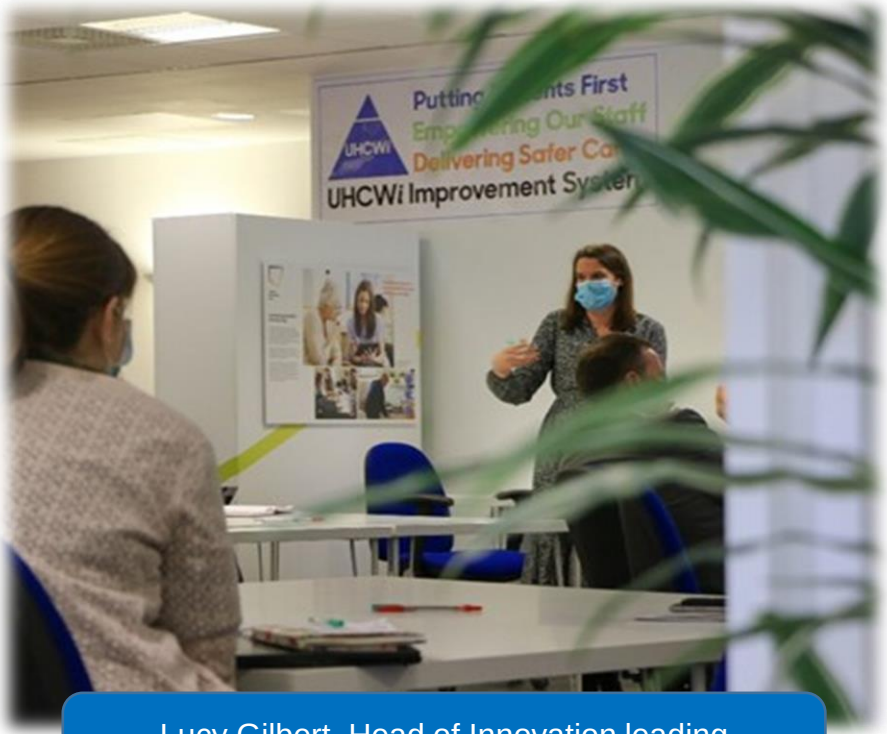
The NHS Planning Guidance requires that at least 25% of all clinically necessary outpatient appointments should be delivered remotely by telephone or video consultation. Streamlining and digitising administrative functions also reduces paper waste and expedites processes.

Our Trust is committed to promoting innovation and is an advocate for digital transformation, which is reflected in our Innovation Hub. We have an expert team looking at digital technology and systems to streamline service delivery and support functions, while improving the associated use of resources and reducing carbon emissions.

The Government’s Greening ICT and Digital Services Strategy 2020-2025 is also taken into consideration when looking at the improvement of our digital care services.

The ‘What Good Looks Like’ framework’, designed to guide Trusts towards the successful integration of digital care systems, neatly summarises:

“The pandemic enabled us to achieve a level of digital transformation that might have otherwise taken several years. As we move into the recovery period, it is critical that we build on the progress we’ve made and ensure that all health and care providers have a strong foundation in digital practice.”



Lucy Gilbert, Head of Innovation leading a session on developing ideas for our Green Plan

Digital Services

Our digital services complement and link to our in-person services. We are in the process of implementing an Electronic Patient Record (EPR) and increasing the number of virtual appointments that we offer. Since the beginning of the pandemic, we have started recording the number of face-to-face, telephone and video consultations. The Trust has put provisions of care closer to home in place. However, there will always be a need for face-to-face appointments and consultations for some of our patient groups.

The Covid-19 pandemic has led to a blended working approach, especially for our administrative staff – a mixture of office and home-based working. However, we must be cautious not to 'outsource' these environmental impacts to our staff.

"Our new Electronic Patient Record system which goes live in 2023 will be a major opportunity for us to transform the way we work, eradicating unnecessary paper processes and improving patient care."

Dr Andrew Kelly, Consultant Anaesthetist and EPR Deputy Chief Clinical Information Officer

NHS LTP 1.43
NHS SC 28
NHS NZ 4.1.4

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

10 REDUCED INEQUALITIES

Target 10.2 Promote universal social, economic and political inclusion

9 INDUSTRY, INNOVATION AND INFRASTRUCTURE

Target 9.4 Upgrade all industries and infrastructures for sustainability

Digital Transformation: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
01	Offer more digital and remote appointments: set targets against the baseline recorded in June 2021.	21/22		£		Care Groups	**PG** C1
02	Use the What Good Looks Like Framework, the Greening Government: ICT and Digital Services Strategy 2020-25 and The Technology Code of Practice as guides to ensure the Trust has robust ICT systems in place to deliver on digital transformation.	23/24		£		ICT	**NZ** 4.1.4
03	Develop electronic patient records (EPR) with ICT to transfer paper-based systems such as prescribing, bed state, observations, ward state, referrals and expense claims forms.	23/24		£		ICT	**LTP** 1.43, 1.44, 5
04	Planned migration of data systems to cloud-based systems. Adoption of staff and patient portals. Continued cyclical replacement programme of IT hardware, including the provision of smart phones to all front-line staff.	23/24		£		ICT& Business & Value	**LTP** 1.43, 1.44, 5
05	Develop a Green Ward Programme through the Centre for Sustainable Healthcare.	24/25		£			

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead /department	NHS Requirement
06	Reduce outpatient attendances where possible by expanding digital patient clinics. Staff to record and report on the number of virtual clinics.	24/25		£			
07	Build on our current practice and current online patient guidance, participate in delivery of the Long-Term Plan commitments for digital first primary care and an NHS digital front door, linking this to potential emissions reductions.	On-going		£	⊗	ICT	**LTP** 1.43, 1.44, 5 **NZ** 4.1.4
08	Follow NHS guidance on information collection, including any subsequent process for GHG emissions reduction metrics linked with digital-first care actions, such as the CSH's Carbon Calculator for Avoided Patient Travel	On-going		£	⊗	Sustainability manager & Infrastructure services.	**SC** 28
09	Build on current practice of engaging staff and care groups in digital care channels, meaning fewer patient journeys.	On-going		£		ICT	**NZ** 4.1.4 **PG** C1
10	Increase the number of digital patient clinics to reduce emissions from parking, decrease demand for parking spaces, and improve quality of life.	On-going		£		ICT	

Figure 10 Green Plan actions for digital transformation

Indicative cost:

£ No or low cost
£ Moderately expensive
£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction
Moderate reduction
Significant reduction
⊗ Not applicable

Travel and Transport

Due to insufficient data for our baseline year, we are using 2021/22 to illustrate total emissions from travel and transport, which amounted to 11,592 tCO_2e, as shown in Figure 11. Out of this, 117 tCO_2e was emitted by staff undertaking their work duties using their own vehicles (grey fleet), travelling just over 600,000 kilometres.

Business travel attributed to rail and air transport by staff emitted 13 tCO_2e and just over 48 tCO_2e was emitted by the small fleet of Trust vehicles.

Using the NHS' Health Outcomes Travel Tool (HOTT), most transport-related emissions (11,413 tCO_2e) can be linked to staff commuting and patient/visitor travel.

"With nearly a million journeys to our hospitals each year, the way that people travel can really make a difference to our carbon footprint."

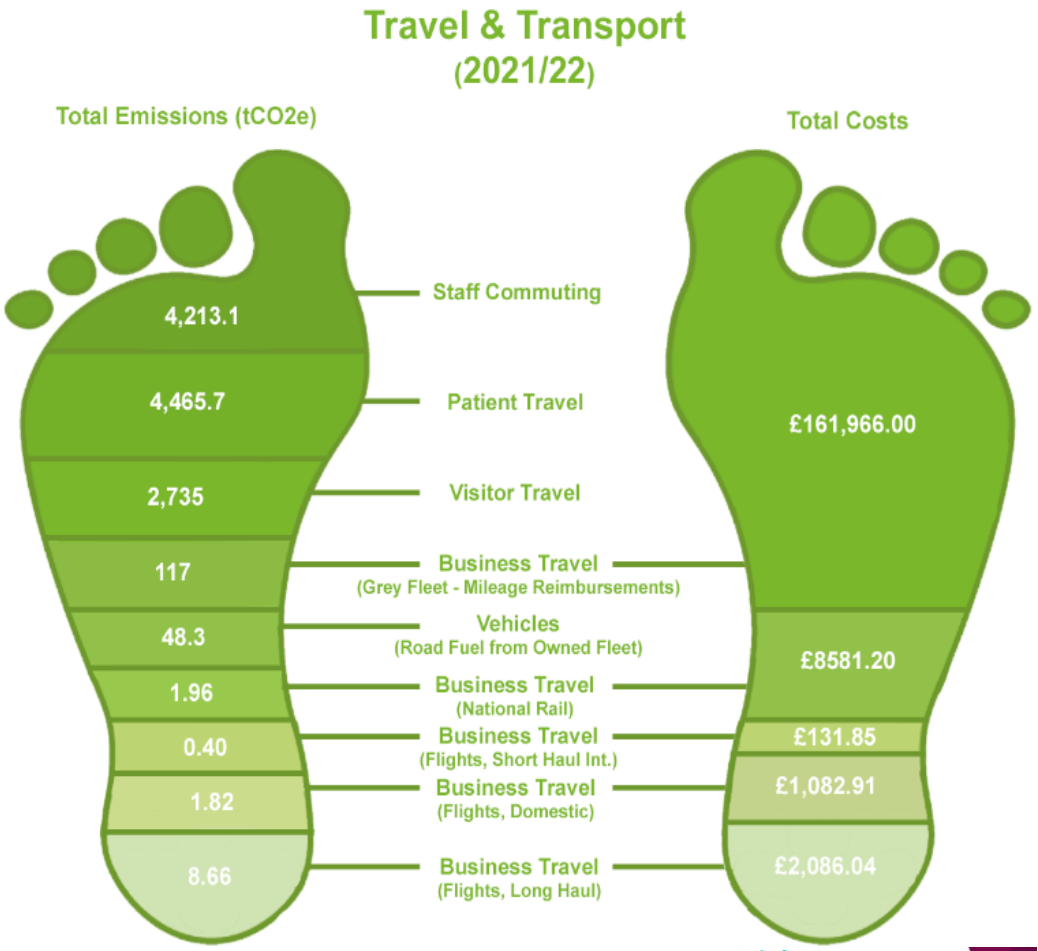


Figure 11 Travel Carbon Footprint Infographic. Please note figures within this graphic are estimated and may not reflect true values (based on the NHS HOTT Tool).

UHCW Fleet Vehicles

We operate a fleet of 28 vehicles, ranging from cars to small, medium and large vans. These vehicles are used by our Estates department for the maintenance and operation of our sites; the secure transportation of patients; and for transporting goods between sites.

In 2019/20 fleet vehicles travelled just over 300,000 kms, emitting 94 tCO2e.

The new NHS Non-Emergency Patient Transport Services (NEPTS) target is to have:

- From 2023, **50%** of all fleet vehicles to be of the latest emissions standards, Ultra-low Emission Vehicles (ULEVs, such as plug-in electric hybrid), or Zero Emission Vehicles (ZEVs, such as electric cars)
- From 2025, **75%** of all fleet vehicles to be of the latest emissions standards, ULEVs or ZEVs
- From 2030, **100%** of all fleet vehicles to be ULEVs or ZEVs, including a minimum of 20% ZEVs

At present, ULEV and ZEV large vans are limited, though more are coming onto the market.

ULEV and ZEV small vans and cars are becoming commonplace, with many options available.

We need to undertake a fleet review to see how our vans and large vans are being used, and whether suitable ULEVs and ZEVs are available. Additionally, we must review the choice of company cars on offer and change the specifications to reflect the targets within the NEPTS.

If we changed all our fleet vehicles to ZEVs, based on 2019/20 data and using **100% renewable** electricity, we would see a likely 89% drop in emissions (emissions associated with electric vehicles are due to transmission and distribution losses in the national grid). This would result in total emissions dropping to around 10 tCO_2e per year, with the added benefit of no tail pipe emissions.

Aside from the electrification of transport, we need to reduce emissions from our fleet by 14 tCO_2e by 2025/26, equating to just over three tCO_2e per year.

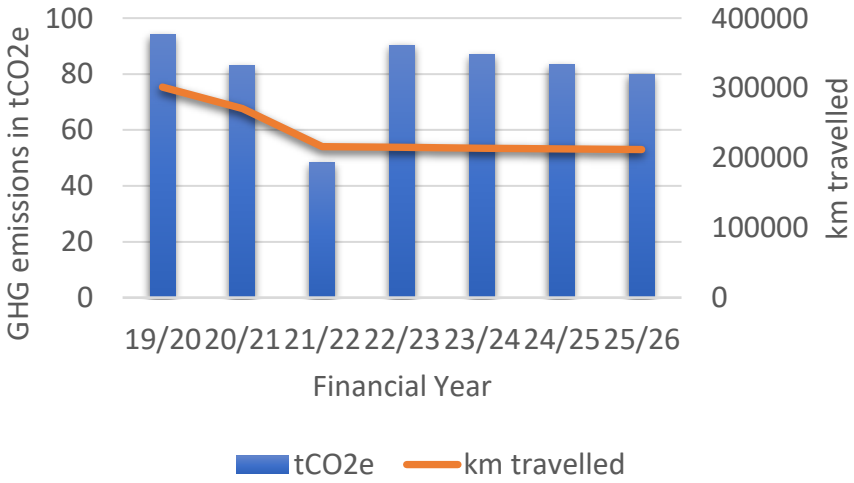


Figure 12 Emissions from fleet vehicles and emissions reduction trajectory to 2025/26

Other Lease Vehicles

Staff have the option to lease personal vehicles through the NHS Fleet Solutions Salary Sacrifice Scheme. We have 59 vehicles available in this scheme, 32 of which are EVs and seven hybrids/plug-in hybrids as of 2021/22.

Emissions from these vehicles (for staff's personal use) are outside of the scope of this report (though do somewhat impact on emissions arising from commuting). However, as a Trust, we can limit the availability of vehicles on offer based on their engine size and emissions. Furthermore, we can incentivise staff to choose Ultra Low Emission Vehicles (plugin hybrid cars) or Zero Emission Vehicles (electric cars).

Goods and Services Delivery Consolidation

The Trust is also reviewing the transport of goods and services commissioned by the Trust to maximise efficiencies, with local specialty teams, working with suppliers to reduce journeys to site.

New staff car park opened March 2022 with one of the largest number of Electric Charging points for any hospital in England

Grey Fleet

We have an extensive ‘grey fleet’ within our Trust.

Grey fleet refers to employees’ own vehicles and/or hire cars used for business purposes. As a Trust that provides care in the community, emissions associated with our grey fleet are sizeable.

We reimburse staff and bank staff for the fuel used in line with their duties through our expenses system. In 2019/20, we reimbursed £277,945 for mileage claims, which equates to roughly 334 tCO_2e and just over one million km.

It is worth noting that in 2020/21, with working styles changed by the pandemic, this had dropped to £170,000 in mileage claims and 204 tCO_2e respectively. The residual figure reflects our core provision of community care. However, the drop can be associated with the negation of other business-related travel, such as attending physical business meetings.

In reference to sustainable models of care and digital transformation, this significant drop in emissions (and cost) illustrates that these changes in working practice should continue.

As the electrification of transport continues, the emissions will reduce accordingly. This also brings forth the issue of providing additional electric vehicle charge points in the future.

Using 2019/20 as a baseline, we aim to reduce emissions from our grey fleet by 35 tCO_2e, to 199 tCO_2e in 2025/26, as shown in Figure 13.

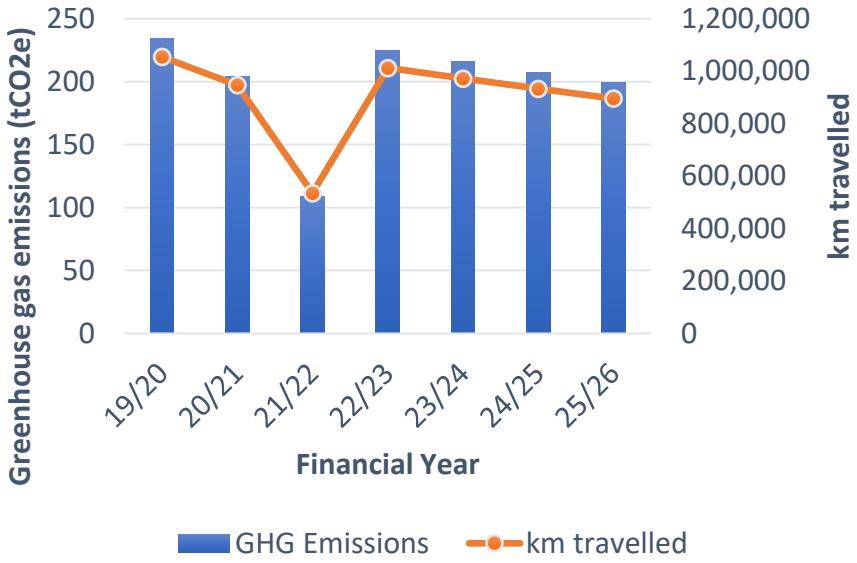


Figure 13 Emissions from our Grey Fleet and emissions reduction trajectory to 2025/26

Electric Vehicle Charging Infrastructure

We have 34 electric vehicle charge points at the University Hospital with infrastructure for expansion to 80 in the staff car park. These are available for both public and staff use.

We do not have any electric vehicle charge points at our other site, although we will address this as electric vehicles become more common in the coming years.

Business Travel (public transport)

We only have taxi data for 2019/20, however in 2021/22, our staff took 328 train journeys, nine flights and travelled by taxi/underground and bus emitting a total of 14 tCO_2e, as shown in Figure 14.

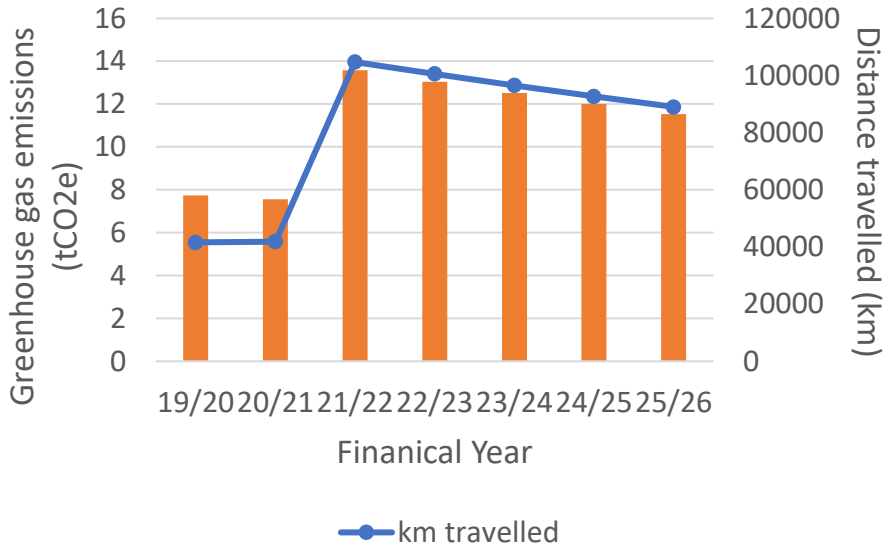


Figure 14 Bar chart to show total emissions from business travel and reduction trajectory to 2025/26

Commuting, Visitor, Patient Travel

The Trust has a Green Travel Plan in place which is being reviewed to reflect the net zero targets.

Cycling has been encouraged by the University Hospital by increasing secure cycle parking to accommodate 80 bikes and covered storage for 188 bikes. The Hospital of St Cross have also increased their numbers to now accommodate 10 secure cycle parking and 20 covered spaces.

The Trust has been an active travel partner within the West Midlands and Warwickshire transport networks; having been engaged in improving sustainable travel solutions on site and within the region, to provide lower CO_2 travel. We will continue to encourage active transport at our sites through the improvement of shower/changing facilities and offering other incentives for active travel.

University Hospital also has excellent bus transport links. We have increased the number of bus stops and created a bus interchange providing support for 16 bus services across the West Midlands, Warwickshire and Leicestershire. We also work with three transport providers to offer discounted bus passes for staff.

Public transport provision to or near our sites remains a vital service to the communities we serve and helps to reduce health inequalities.

We have used the NHS' HOTT Tool to estimate the emissions associated with staff commuting and patient and visitor travel. The HOTT Tool uses national and regional datasets to generate figures for transport mode, distances, and emissions from a 2019/20 baseline and projections into the near future (shown in Figure 15).

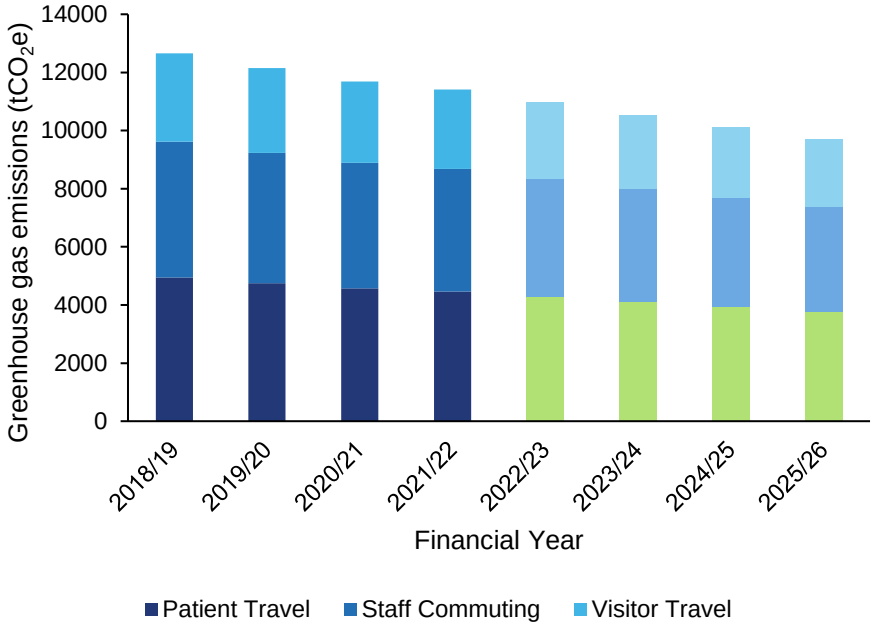


Figure 15 Stacked bar chart to show total emissions from patient, visitor and staff travel and emissions reduction trajectory to 2025/26

Air Quality

Air quality forms a direct link between climate change and health outcomes, and the NHS Net Zero plan calculates that reaching UK ambitions on emissions reductions in line with Paris Agreement targets could save 38,000 lives with improved air quality.

According to the World Health Organisation (WHO), poor air quality leads to over 7 million deaths globally and that nine out of 10 people worldwide breathe polluted air.

Travel is a key contributor to air pollution, and with as many as one in 20 road journeys in the UK attributable to the NHS, our activity has enormous potential impact both on our communities' air quality and our ambition to reduce emissions. Additionally, our gas-fired boilers contribute to air pollution, and the decarbonisation of heating will address these pollutants in the future.

We commit to tackling this issue through investment and engagement with staff, patients and our partner local authorities. We will give special consideration to the air quality surrounding our estate and opportunities to improve its impacts on our care groups.

The Trust is looking at every avenue to improve air quality on and around its sites through enhanced digital care such as virtual clinics, removing the need for patient travel and sustainable travel options.

New cycle highway between Binley and UHCW

LTP 2.21, 3.82, 17

SC 18.4.1.1, 18.4.1.3, 18.4.1.4, 18.4.2.1

NZ 3.2, 3.2.1, 3.2.2

3 GOOD HEALTH AND WELL-BEING

Target 3.9 Reduce illnesses and deaths from hazardous chemicals and pollution

11 SUSTAINABLE CITIES AND COMMUNITIES

Target 11.6 Reduce the environmental impacts of cities, focusing on air quality and waste

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Travel and Transport: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Undertake a Green Fleet review (including grey fleet) of our fleet vehicles to ascertain usage and distance travelled, with view to integrating ULEVs and ZEVs.	23/24		£	✕	Sustainability Manager	Trust
02	Increase the number of electrical vehicle charging points at the University Hospital, Coventry.	22/23		£	✕	Estates and Facilities	**SC**.18.4.1.1, 18.4.1.4 **NZ** 3.2.1
03	Introduce an electric bike loan scheme for staff.	22/23		£	✕	Estates and Facilities	**NZ** 3.2, 3.2.2
04	Increase the number of cycle racks on site.	22/23		£	✕	Estates and Facilities	**NZ** 3.2, 3.2.2
05	Enhance the business travel expense system to capture the to- and from-destinations for rail, air, bus and taxi journeys and report on fleet and business mileage on a regular basis.	23/24		£	✕	Finance	**NZ** 3.2, 3.2.2
06	Embed an updated sustainable travel plan, with new modal shift targets to be supported by an active travel expenses policy and a facilities review.	22/23		£		Estates	**LTP** 2.21, 3.82, 17 **SC** 18.4.1.3 **NZ** 3.2, 3.2.2
07	Review existing staff lease scheme and incorporate additional incentives for the uptake of ultra-low emission (ULEV) and zero emission (ZEV).	23/24		£		Finance	**NZ** 3.2, 3.2.2

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
08	Ensure that any new vehicle purchased or leased are ULEV or ZEV from 2023, in line with the latest NHS non-emergency transport guidance.	23/24		£		Estates	**SC**.18.4.1.1, 18.4.1.4 **NZ** 3.2.1
09	Enhance the staff mileage reimbursement system to collate vehicle type/engine size and fuel type data to allow more accurate emissions foot printing, monitoring and reduction targets.	23/24		£	✕	Finance	**NZ** 3.2, 3.2.2
10	Improve stores provision and work with our suppliers to consolidate goods orders through better planning wherever possible, reducing transport emissions.	23/24		£		Procurement	**NZ** 3.2, 3.2.2
11	Work with staff currently home-working to explore voluntary blended working.	23/24		£		HR	**NZ** 3.2, 3.2.2
12	Use the clean air hospital framework to develop a clean air action plan.	23/24		£	✕	Estates and Facilities	**SC**.18.4.1
13	Reduce carbon intensive business travel by 30%.	24/25		£		Net Zero Delivery Group	**SC**.18.4.1.3
14	Install electric vehicle charging points at the Hospital of St Cross, Rugby.	24/25		£	✕	Estates and Facilities	**SC**.18.4.1.1, 18.4.1.4 **NZ** 3.2.1

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
15	Shift to Net Zero fleet by 2032 (80% reduction by 2028).	25/26		£		Net Zero Delivery Group	**SC**.18.4.1.1, 18.4.1.4 **NZ** 3.2.1
16	Incentivise staff to use electric vehicles, with increased access to them.	25/26		£	⊗	Net Zero Delivery Group	**SC**.18.4.1.1, 18.4.1.4 **NZ** 3.2.1
17	Conduct annual Travel Plan surveys to quantify staff commuting and visitor travel and verify HOTT Tool outputs.	Ongoing		£	⊗	Sustainability Manager	**NZ** 3.2, 3.2.2
18	Improved cycling facilities across both sites.	Ongoing		£	⊗	Estates and Facilities	**NZ** 3.2, 3.2.2
19	Digitise prescriptions to reduce unnecessary paper use (e-prescriptions).	Ongoing		£		Net Zero Delivery Group	Trust
20	Work with partners to develop cycle routes.	Ongoing		£		Estates and Facilities	**NZ** 3.2, 3.2.2
21	Work with bus operators to improve services to site.	Ongoing		£		Sustainability Manager	**NZ** 3.2, 3.2.2
22	Work with partners to support Very Light Rail to University Hospital, Coventry.	Ongoing		£		Estates and Facilities	**NZ** 3.2, 3.2.2

Figure 16 Green plan actions for Travel, Logistics and Air Quality

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

Estates and Facilities

As an NHS Trust, the carbon footprint of our built environment is significant. Overall, the health and care system in England is responsible for an estimated 4-5% of the country's carbon emissions.

As we provide critical services 24 hours a day, our energy and resource consumptions are substantial. Therefore, we need to optimise energy use in our buildings and move away from using fossil fuels to meet NHS Net Zero goals.

The Trust has been working on reducing carbon emissions from buildings and infrastructure for many years, with a focus on the older Hospital of St Cross, replacing lighting with LED, upgrading the Building Management System (BMS) and grant monies applied for to introduce solar PV and air source heat pumps. A Combined Heat and Power plant has been installed at University Hospital supplying half of the electricity to site.

The Trust is working with its PFI partners to improve energy efficiency and reduce energy usage across the estate, including decarbonising heating and hot water systems.

We will be following the four-step approach within the NHS' 'Estates 'Net Zero' Carbon Delivery Plan' to address our estate:

1. **Making every kWh count:** Investing in no-regrets energy saving measures
2. **Preparing buildings for electricity-led heating:** Upgrading building fabric
3. **Switching to non-fossil fuel heating:** Investing in innovative new energy sources
4. **Increasing on-site renewables:** Investing in on-site generation

Estates & Facilities: Energy

22,017 tCO_2e emitted from buildings across our estate in **2019/20**

We have procured 100% renewable electricity since April 2021

We need to reduce energy consumption by over **just under 1 million** kWh per year to achieve the emissions target of **10,982 tCO_2e** in **2025/26**

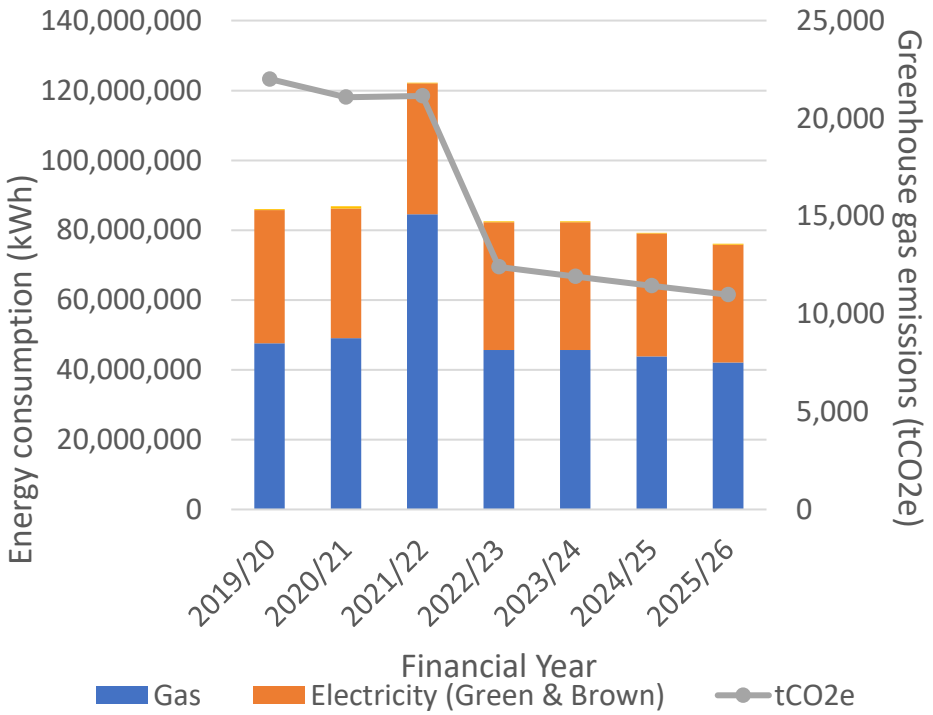
Energy and emissions

In 2019/20, we had two active sites where we were directly responsible for procuring the energy supply contracts. Buildings under our ownership can be targeted for energy efficiency improvements.

Figure 17 shows the total emissions liberated from electricity, oil and gas use from 2019/20 to 2021/22. We need to reduce emissions by 5,738 tCO_2e by 2025/26 from our 2019/20 baseline (this includes the reduction in emissions from procuring renewable electricity).

University Hospital energy consumption is significant at 87,516,090kWh in 2019/20 with an emission of 22,332 tCO_2e.

Figure 18 shows the energy consumption and emissions from our two sites as bubble graph. The size of the bubble relates to the combined emissions arising from both gas and electricity use at each site. The 'x' axis represents the amount of gas consumption, and the 'y' axis represents electricity use.



NHS LTP 17

NHS SC 18.4.1.2, 18.5

NHS NZ 3.1.1, 3.1.2

7 AFFORDABLE AND CLEAN ENERGY

Target 7.2 Increase global percentage of renewable energy

Target 7.3 Double the improvement in energy efficiency

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Target 13.3 Build knowledge and capacity to meet climate change

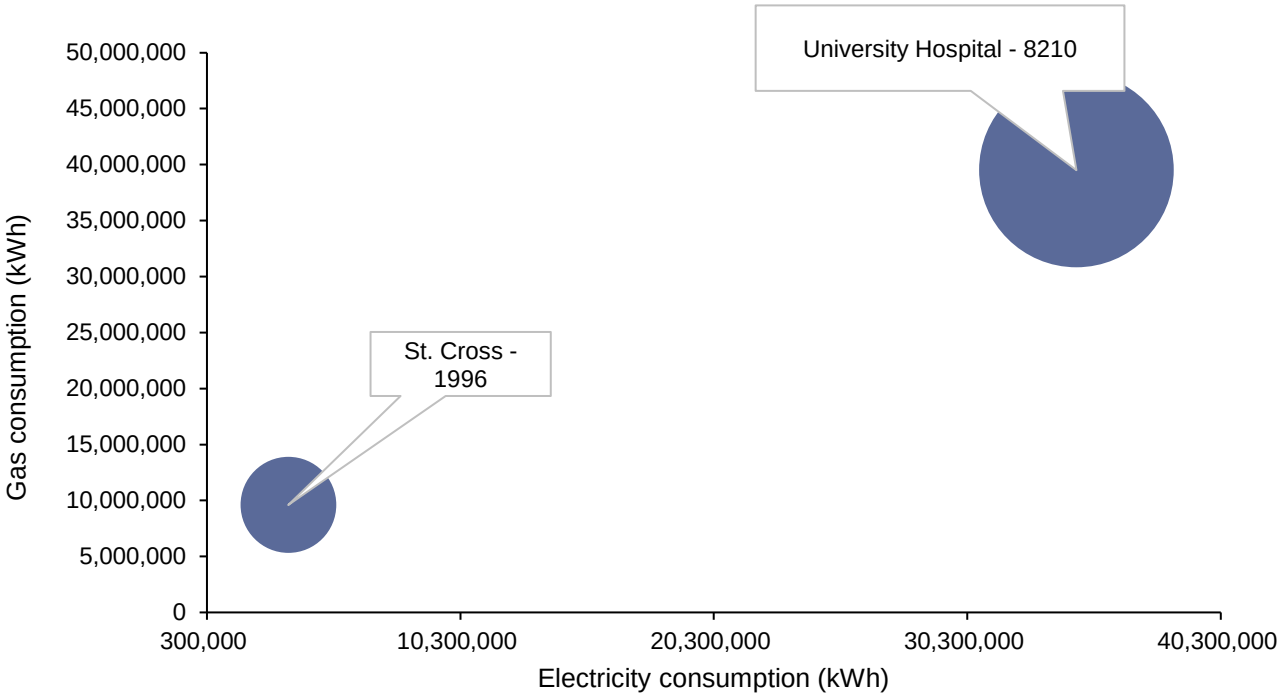


Figure 18 Bubble graph showing building energy consumption at our sites in 2019/20. The size of the 'bubble' is relative to the GHG emissions

Since April 2021, the Trust has procured 100% renewable electricity, resulting in an 80% reduction in emissions arising from procured electricity. The emission reductions from this are illustrated in Figure 18.

Despite the negated emissions from renewable electricity procurement, we must still reduce both our electricity and gas consumption at all our sites, at a rate of 3,500,644 kWh per year.

The Trust has been working on reducing carbon emissions from buildings and infrastructure for many years, with a focus on the older Hospital of St Cross, replacing lighting with LED, upgrading the Building Management System (BMS) and grant monies applied for to introduce solar PV and air source heat pumps. A Combined Heat and Power plant has been installed at University Hospital supplying half of the electricity to site.

The Trust sets out to achieve comfortable room / space temperatures for its service users, employees, and visitors. Predominantly, target space temperatures range between 18-28°C as set out for general areas in HTM03-01, Part A. Comfort heating and cooling is delivered using various techniques, utilising underfloor heating, radiant ceiling panels, traditional thermostatic controlled radiators, air handing systems, fan coil units, Variable Refrigerant Flow (VRF) systems and split air conditioning systems.

However, we need to continually improve and upgrade our estate.

More than £4 million is to be invested on a host of energy-saving measures at the Hospital of St Cross, Rugby, thanks to a major Government grant.

As well as improving air quality and making the Barby Road site more energy efficient, the improvements will lead to financial savings that can be pumped back into patient care.

Funding has been secured from the Department for Business, Energy and Industrial Strategy (BEIS) as part of the Public Sector Decarbonisation Scheme (PSDS), delivered by Salix Finance.

The Trust will install low carbon heating solutions to replace fossil fuel-fired equipment as part of its aim to reach net zero by 2045.

Plans also include installing a 200KW air source heat pump, thermal insulation measures and the removal of a fossil fuel-fired plant. To enable site-wide utilisation of heat from the air source heat pump, the work will include the installation of a district heating network to interconnect the heating loads of the three areas of the site currently served by three separate energy centres.

A solar array of 1,250 solar panels will also be placed across roof spaces. Overall, the scheme will save more than 600 tonnes of carbon per year.

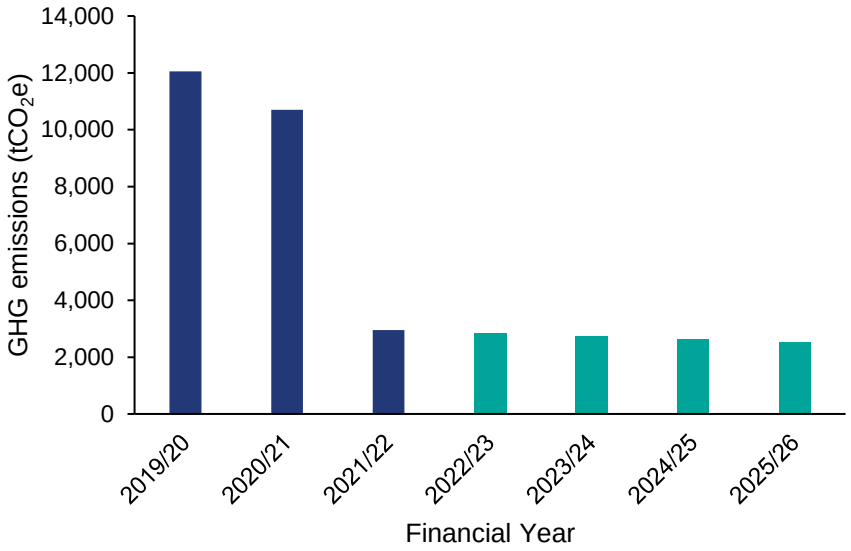


Figure 19 Emissions from electricity consumption and emission reduction trajectory to 2025/26 (note the difference following the procurement of 100% renewable electricity in April 2021)

Estates and Facilities: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Enhance Planned Preventative Maintenance (PPMs) of our facilities and assets to be proactively energy--focused and to identify opportunities to upgrade equipment/plant.	22/23		£		Estates	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1.2
02	Procure 100% renewable electricity with Renewable Energy Guarantees of Origin (REGO) certificates backed by Npower.	22/23		£		Estates	**SC** 18.5
03	Access the NHS Energy Efficiency Fund (NEEF) to upgrade all lighting to LED alternatives.	22/23		£		Estates	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1.2
04	Follow Estates 'Net Zero' Carbon Delivery Plan guidance on efficiency and decarbonisation protocols for the built environment.	22/23		£		Estates	**NZCDP** **NZ** 3.1.1, 3.1.2
05	Read solar photovoltaic meters and collate a monthly generation report.	22/23		£		Estates	**NZCDP** **NZ** 3.1.1, 3.1.2
06	Review the Estates Strategy in line with Net Zero Targets and include low emission building design.	22/23		£		Estates and Facilities	**NZCDP**
07	Develop an energy reduction policy into the Trusts Estate Strategy.	22/23		£		Estates and Facilities	**NZ** 3.1.1
08	Optimise energy use by embedding networked Automatic Meter Readers (AMRs) across the Estate with appropriate controls to reduce energy consumption, and report sub-metered data monthly.	23/24		£		Procurement	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1.2

Figure 16 Green plan actions for Travel, Logistics and Air Quality

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
09	Conduct detailed building energy surveys to identify further energy/thermal efficiency opportunities, including the installation of heat recovery systems on Air Handling Units (AHUs).	23/24		£		Estates	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1
10	Look to procure 'green gas' through the Green Gas Certification Scheme as and when existing energy contracts are due for renewal.	23/24		£		Procurement	**SC 18.5**
11	Incorporate energy conservation into staff training and education programmes and deliver behaviour-based energy saving campaigns.	23/24		£		HR	**NZ** 3.1.1
12	Develop communication materials for our patients that highlight energy efficiency projects, discuss plans with the local community, including exploring potential community energy projects.	23/24		£	⊗	Estates & HR	**NZ 3.1.1**
13	Explore how the Trust can implement an ISO 50001 Energy Management System.	24/25		£		Estates	**NZ** 3.1.1
14	Develop a Net Zero project application to estimate carbon output.	25/26		£	⊗	Estates and Facilities	Trust
15	Develop a Decarbonisation of Heat Plan that focuses on the phase-out of existing gas-fired boilers and replacement with low-carbon alternatives, where feasible.	On-going		£		Board of Directors	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1
16	Explore the possibility of creating District Heat Networks with neighbouring partners.	On-going		£		Infrastructure Services	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1
17	Install double-glazing at the Hospital of St Cross, Rugby.	On-going		£		Estates and Facilities	**LTP** 17 **SC** 18.4.2.1 **NZ** 3.1.1, 3.1

Figure 20 Green Plan action table for Energy and Emissions from the built environment

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

Capital Projects

The Built Environment of the NHS influences both the quality of our care and our environmental impact.

How we design and construct our buildings in the future will play a decisive role in our collective ability to achieve net zero.

Buildings have significant environmental impacts in terms of emissions resulting from the use of gas, electricity and water. Improving the energy efficiency of a building is pivotal to reducing these impacts. However, there are embodied carbon emissions within materials, such as cements, steel and glass which are used in the construction of buildings. These indirect 'Scope 3' emissions are generally much greater than emissions caused by the operation of a building.

Cement and concrete production on its own accounts for a huge 8% of all global greenhouse gas emissions from all sources, according to the Dutch Environmental Assessment Agency.

Our Trust, furthering a previous commitment to ensure all capital development complies with the Building Research Establishment Environmental Assessment Method's (BREEAM) 'Excellent' or above, ensures that our plans will focus on the reduction of building emissions from all sources.

Estates & Facilities: Capital Projects

- Building energy efficiency standards should be considered for new builds and refurbishments. For example, BREEAM 'Excellent' rating, the Zero Carbon Hospital Standard, and implementation of on-site renewables.
- Construction supplier alignment to net zero commitments, such as on-site contractor measures on waste reduction and low emission construction plans.
- Low carbon substitutions and product innovation, such as lower embodied carbon construction materials.

NHS LTP 16

NHS SC 18.4.2.1, 18.4.2.3

NHS NZ 3.1.1, 3.3.1

8 DECENT WORK AND ECONOMIC GROWTH

Target 8.5 Full employment and decent work with equal pay

9 INDUSTRY, INNOVATION AND INFRASTRUCTURE

Target 9.4 Upgrade all industries and infrastructures for sustainability

13 CLIMATE ACTION

Target 13.1 Strengthen resilience and adaptive capacity to climate-related disasters

Target 13.2 Integrate climate change measures into policy and planning

Capital Projects: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Explore options to achieve emissions reductions in smaller works and projects in our acute and primary care estate.	22/23		£		Estates	**NZ** 3.1.1
02	Encourage and measure local subcontractor and supply chain spend as part of our anchor institution approach.	22/23		£		Procurement	**NZ** 3.3.1
03	Ensure capital development accounts for risks identified in climate adaptation plans and addresses these in design/delivery.	23/24		£	⊗	Estates	**SC** 18.4.2.3
04	Work with our Procurement team to enable specification of low and zero carbon materials and designs, as well as achieving waste reduction and other opportunities through contractor engagement.	23/24		£		Procurement	**NZ** 3.3.1
05	Continue to ensure our design process is informed by staff, patients and community views for capital projects.	23/24		£	⊗	Estates, Procurement & HR	**LTP** 16 **SC** 18.4.2.1 **NZ** 3.1.1
06	Ensure public and staff engagement on large projects.	2026		£	⊗	**Estates and Facilities**	**Trust**
07	Implement the upcoming Net Zero Hospital Building Standard in any new builds and BREEAM (Building Research Establishment Environmental Assessment Method) 'Excellent' rating for any major refurbishments.	On-going		£		Estates	**LTP** 16 **SC** 18.4.2.1 **NZ** 3.1.1
08	All capital projects to require sustainable assessment, showing whole life cost.	23/24		£	⊗	Estates and Facilities	**NZCDP**
09	Create Net Zero agreement with private finance initiative (PFI) partners.	23/24		£	⊗	Estates and Facilities	**SC** 18.1
10	Develop more green space as part of new builds to improve wellbeing.	28/29		£	⊗	Estates and Facilities	**NZ** 3.5
11	Ensure staff are trained in the use of energy saving features of new builds and refurbishments.	23/24		£		Estates and Facilities	**NZ** 3.1.1

Figure 21 Green Plan action table for Capital Projects

Indicative cost:

£ No or low cost
£ Moderately expensive
£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction
Moderate reduction
Significant reduction
⊗ Not applicable

Water Efficiencies

In 2019/20, we used 342,03m^3 of water, which cost a total of £672,351.

There are emission impacts associated with the supply of fresh water and treatment of wastewater, equating to 348 tCO_2e in 2019/20 (see Figure 22).

Although the emissions are low compared to those produced by energy use, being water efficient is important to prevent and alleviate water stress.

Water conservation and sustainable drainage shall also be explored. Rainwater harvesters collect rainwater for non-potable purposes, such as for flushing toilets. They will help reduce water stress and potentially alleviate flooding by attenuating surface water run-off in storm events.

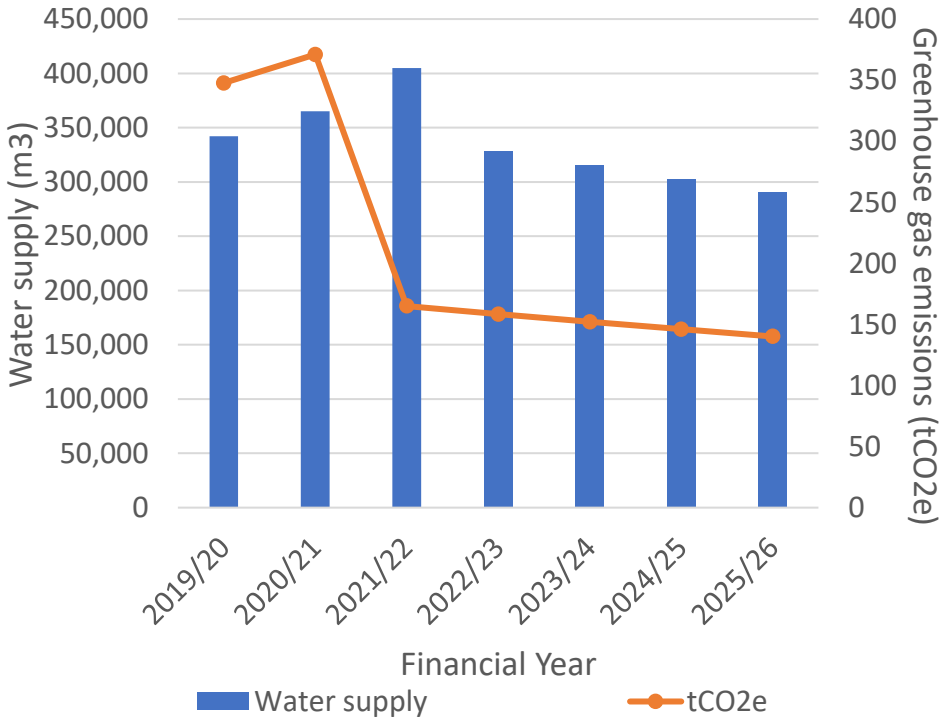


Figure 22 Bar chart to show total water emissions from supply and wastewater treatment, and emissions reduction trajectory to 2025/26.

Estates & Facilities: Water

We used **342,034m^3** of water in 2019/20 – enough water to fill **137** Olympic-size swimming pools

348 tCO_2e was attributed to the supply of water and wastewater treatment

We need to reduce water consumption by **60,623m^3** by 2025/26

Water efficiency and sustainable drainage will become ever more important in the future

NHS LTP 17

NHS SC 18.4.3.1

NHS NZ 3.1

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

6 CLEAN WATER AND SANITATION

Target 6.3 Improve water quality, wastewater treatment and safe reuse

Water Efficiency: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Incorporate water efficiency measures within our climate change adaptation work with the local community.	23/24		£	✕	Business Continuity	**NZ** 3.1
02	Develop new water intensity metrics and incorporate these into our greenhouse gas emissions reporting.	22/23		£	✕	Estates and Facilities	**NZ** 3.1
03	Collate water data via Automatic Meter Reader to determine water use patterns and aid leak detection, and report monthly.	23/24		£		Estates and Facilities	**NZ** 3.1
04	Utilise the most water efficient technologies, such as low flow taps throughout our estate, when replacing equipment and developing new sites.	23/24		£		Estates and Facilities	**NZ** 3.1
05	Explore where rainwater harvesting and grey water systems can be installed and utilised.	23/24		£		Estates and Facilities	**NZ** 3.1
06	Look to consolidate the suppliers across the estate to choose one or two that can provide the service, price, and efficiency we expect.	On-going		£	✕	Estates and Facilities	**LTP** 17
07	Work with our staff and patients by communicating the importance of water efficiency.	On-going		£	✕	Estates and Facilities	**NZ** 3.1
08	Explore and implement water efficiency targets on areas of the highest impact in our estate and delivery of care.	On-going		£		Estates and Facilities	**LTP** 17 **SC** 18.4.3.1 **NZ** 3.1

Figure 23 Green Plan action table for Water

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

✕ Not applicable

Waste and Recycling

We collect five main waste types: general, clinical/offensive, confidential paper, dry mixed recycling and electrical and electronic equipment (WEEE) waste. We have collections for other waste streams, such as metal, fluorescent lamps and waste cooking oil (which is recycled and used as biofuel), though amounts collected are not reported.

Figure 24 shows the total waste arisings (all recorded waste streams, and Figure 26 shows emissions emanating from the waste streams.

The waste management has been improved across both UHCW sites, with significant investment in infrastructure to improve segregation and recycling.

Food waste removed by our waste contractor is treated in an anaerobic digester.

We have also introduced reusable sharps containers. These containers have a 10-year life span. The life cycle assessment (LCA) projected over a 10-year period concludes that the containers will reduce CO_2e by 2,053 tonnes equating to a 92% reduction when compared to single use bin.

Some of our clinical waste is incinerated at a waste to energy plant (sharps), whilst other types are ultra-high temperature processed (alternative treatment) before being further recycled. Offensive waste is combined with clinical waste.

Estates & Facilities - Waste

- **3,339 tonnes** of waste were produced, emitting **936 tCO_2e** in 2019/20
- General waste and food waste is taken by a waste contractor
- General waste is taken to a Dirty MRF for segregation
- Food waste is treated in anaerobic digester

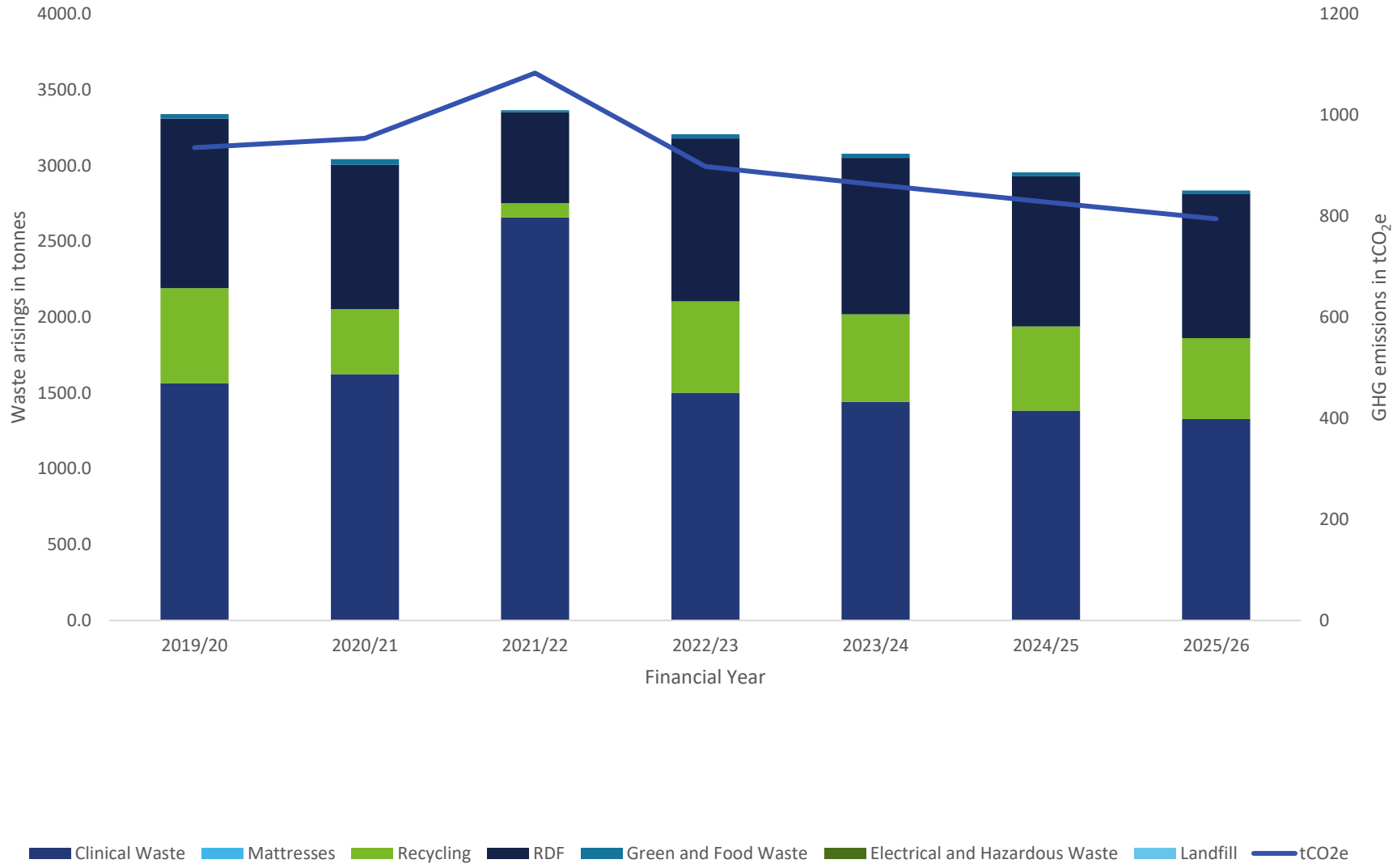


Figure 24 Emissions associated with our waste streams and emission reduction trajectory to 2025/26

We are aware we need to segregate waste to improve our recycling rates. We can tackle this issue in two ways: installing recycling bins with clear signage of what can be recycled will improve recycling rates and help reduce waste processing costs and changing the terms of our waste contract to ensure that general waste is sorted at the waste handling centre, with recyclable materials being segregated and non-recyclable waste incinerated (as Refuse Derived Fuel (RDF)) instead of going to landfill.

The Covid-19 pandemic has led to an increase in the usage of single-use plastic items; a necessary response to managing the crisis. This led to over 70% increase in waste incineration in 2020/21 compared to the previous year.

We are mindful of the environmental impacts of single-use items throughout their lifecycle, such as the crude oil used in their manufacture to the difficulty in recycling them at the end-of-use.

Innovations are coming on to the market for reusable Personal Protection Equipment (PPE), such as face masks and aprons, that meet the various clinical safety standards. These alternatives should be explored to help reduce waste arisings.

The waste hierarchy of Reduce, Reuse, Recycle, Recovery (energy from waste) before disposal (landfill) must be embedded to ensure we are maintaining our waste duties of care and circular economic principles. Shoring up our waste handling processes will ultimately reduce greenhouse gas emissions from waste treatment, other negative environmental impacts and landfill disposal costs.

NHS LTP 17

NHS SC 18.4.3, 18.4.3.1 to 18.4.3.5

NHS NZ 3.2, 3.2.1, 3.2.2

11 SUSTAINABLE CITIES AND COMMUNITIES

Target 11.6 Reduce the environmental impacts of cities, focusing on air quality and waste

12 RESPONSIBLE CONSUMPTION AND PRODUCTION

Target 3.9 Reduce illnesses and deaths from hazardous chemicals and pollution

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Waste and Recycling: Action Plan

No.	UHCW Green Plan Actions	Target year	Progress	Indicative Cost to Achieve	Indicative Emissions Reduction	Responsible Lead/Dept.	NHS Req.
01	Collate *all* waste stream data from *all* sites (including sites we are not responsible for waste collection) and produce monthly reports.	22/23		£	✕	Estates	**NZ** 3.1
02	Ensure that single-use items in catering adhere to current legislation and elect to use sustainable alternatives as listed by NHS Supply Chain.	22/23		£		Estates	**LTP** 17 **SC** 18.4.3.1 **NZ** 3.1
03	Install Dry Mixed Recycling (DMR) bins across all sites and start DMR collections.	23/24		£		Estates	**LTP** 17 **SC** 18.4.3.1 **NZ** 3.1
04	Install food waste bins across all remaining sites and start food waste collections.	23/24		£		Estates & Catering	**NZ** 3.1
07	Explore whether reusable alternatives to single-use PPE items (aprons, wipes, face masks) are clinically appropriate.	23/24		£		Clinical Teams & Procurement	**NZ** 3.1
08	Explore how the Trust can implement an ISO-14001 Environmental Management System.	23/24		£		Estates & HR	**LTP** 17 **SC** 18.4.3.1 **NZ** 3.1
06	Work with our staff and patients by communicating the importance of waste segregation.	On-going		£	✕	Estates & HR	**NZ** 3.1
07	Develop new ways to engage with staff about waste information.	24/25		£		Education Services	**NZ** 4.2.1

Figure 25 Green plan action table for Waste

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

✕ Not applicable

Biodiversity and Greenspace

Greenspace and nature are important for the health and wellbeing of patients and colleagues alike. At a global scale, greenspace affects the planet's ability to absorb carbon dioxide.

"Access to green spaces have positive mental and physical health impacts, and these beneficial effects are greatest for those from socioeconomically disadvantaged groups. However, these groups also have the least access to greenspaces." – **Delivering a Net Zero NHS**

The Trust, in partnership with the Centre for Sustainable Healthcare, created a nature reserve at University Hospital to give staff, patients, visitors and the local community access to a green space to promote positive mental and physical health. The hospital was chosen to be one of two Big Lottery-funded projects, known as Outer Space.

The hospital site contains a wetland area called the Swales, which forms part of the surface water drainage system. The area was already a very rich natural habitat, with some simple mown paths around the pools, before the Outer Space project began.

The initial work involved improving access, general seasonal maintenance, the installation of benches and signage and a wildlife and species survey carried out by schools and community groups. University Hospital has green roofs which have over time become habitats for plants and insects whilst bringing green space closer to patient recovery areas.

Our Trust will promote access to green spaces, considering areas of operations where this may be lacking.

We will also consider opportunities and risks for biodiversity in the areas we operate, for example priority woodland areas in our region.

NHS LTP 17

NHS SC 18.4.3, 18.4.3.1 to 18.4.3

NHS NZ 3.1.1, 3.3.2

11 SUSTAINABLE CITIES AND COMMUNITIES

Target 11.6 Reduce the environmental impacts of cities, focusing on air quality and waste

3 GOOD HEALTH AND WELL-BEING

Target 3.9 Reduce illnesses and deaths from hazardous chemicals and pollution

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Biodiversity: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Review our policies and practices around green space and biodiversity to identify opportunities for improvements and provide safe and easy access to green space, where appropriate.	23/24		£	⊗	Estates	**LTP** 17 **SC** 18.1 **NZ** 3.5
02	Engage with regional partners to ensure that adequate green space and identified native species are considered and supported in planning and operations of our estates wherever possible. This includes supporting bees and other pollinators.	23/24		£		Estates	**SC** 18.1 **NZ** 2.2, 3.5
03	Work to better understand biodiversity and habitat risks and opportunities in our procurement. Where possible, apply evidenced standards or engage with our suppliers to address issues, such as food production and provenance of meat, avoiding Palm Oil or limiting to RSCO-certified Palm Oil in food and cleaning products.	23/24		£		Procurement	**SC** 18.1
04	Continue to engage our staff, patients, and communities in green space initiatives.	On-going		£	⊗	Clinical leads & HR	**NZ** 2.2, 3.5
05	To improve and enhance the existing natural spaces on site, for patients, staff, visitors, and the community.	On-going		£	⊗	Estates and Facilities	**Trust**

Figure 26 Green Plan action table for Greenspaces

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

Medicines – Volatile Anaesthetic Gases and Inhalers

In addition to carbon dioxide emissions, NHS' clinical activity and prescriptions, such as using inhalers, nitrous oxide and volatile inhaled anaesthetics like desflurane, contribute a considerable proportion of the NHS' GHG footprint.

The Long Term Plan commits the NHS to reduce GHG emissions from anaesthetic gases by 40% (which on its own could represent 2% of the overall NHS England carbon footprint reduction target the NHS must meet under Climate Change Act commitments) and significantly reduce GHG emissions by switching to lower global warming potential (GWP) inhalers.

Medicines: Volatile anaesthetics and inhalers

We used over 5,009,950 litres of Nitrous oxide, emitting **2,466 tCO_2e** in 2019/20.
Volatile anaesthetic use emitted 762 tCO_2e, of which Desflurane use emitted **577 tCO_2e** in 2019/20.
Inhaler prescriptions emitted **414 tCO_2e** in 2019/20
25% of all inhalers prescribed were DPIs – below the NHS target of 30%.

Nitrous oxide

Our use of Entonox (50/50 medical grade oxygen and nitrous oxide) and medical grade nitrous oxide, combined, contributed 2,466 tCO_2e in 2019/20, as shown in Figure 27.

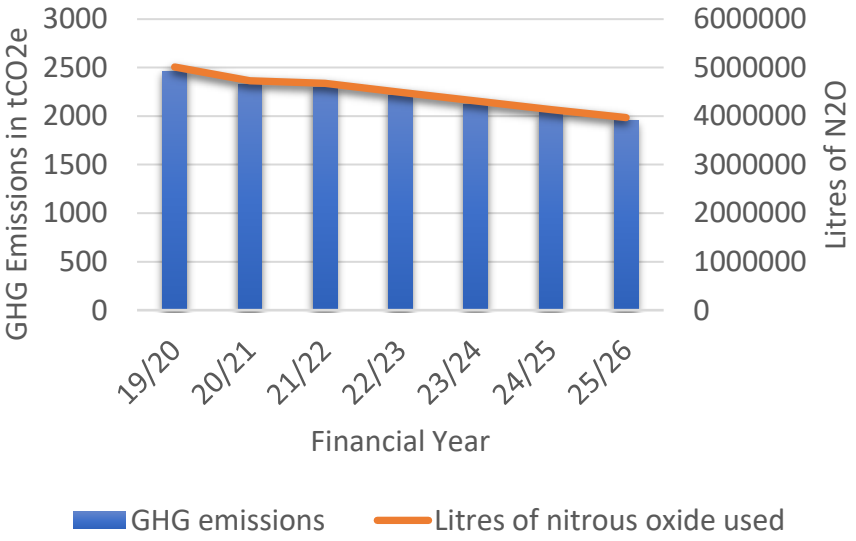


Figure 27 Nitrous oxide usage from 2019/20 to 2021/22 with reduction trajectory to 2025/26

There are innovations in capturing and catabolising exhaled nitrous oxide, including ‘cracking’ devices. Such devices are being trialled by other NHS Trusts, and if rolled out, will dramatically reduce the amount leaking into the atmosphere.

Furthermore, nitrous oxide use is steadily falling in surgery, as more efficacious anaesthetic and analgesic agents are superseding its use. However, Entonox still plays an important role in maternity.

We could use methoxyflurane (Penthrox™) pen-inhalers to treat moderate to severe pain associated to trauma in our Accident and Emergency department. Methoxyflurane can be self-administered under medical supervision, in a similar fashion to nitrous oxide. It has a lower global warming potential (GWP) than nitrous oxide and switching to methoxyflurane would lessen emissions at point-of-use.

However, this comes at a cost, as methoxyflurane is delivered in non-reusable 3ml inhaler pens, creating additional non-recyclable waste.

Desflurane

Desflurane is a fluorinated volatile anaesthetic. Like many fluorinated compounds (such as refrigerants and propellants), it has a very high GWP. Desflurane has a GWP rating of 2,540, which means it is 2,540 more potent as a greenhouse gas than carbon dioxide.

Other volatile anaesthetics, such as sevoflurane and isoflurane have far lower GWP ratings, 130 and 510 respectively. Shifting away from desflurane to these alternatives will significantly reduce emissions. However, both sevoflurane and isoflurane use will still have an impact on the atmosphere.

The Trust has a Net Zero lead in place for Pharmacy and for Anaesthetic gas reduction. The Trust is also taking action to reduce carbon emissions related to prescribing and use of medicines and medical products. The reduction of Desflurane and change to lower carbon inhalers is supported by additional leads within the specialist departments.

Across UHCW in 2019/2020, we used 155 litres (646 bottles) of Desflurane, accounting for 22% of the volume of all inhalational anaesthetic agents used in the Trust, as shown in Figure 28. In September 2021, following a departmental discussion, we removed Desflurane from routine use in all anaesthetic rooms and operating theatres. Desflurane is no longer in use and we are offering training on alternative anaesthetic techniques such as total intravenous anaesthesia.

The NHS Standard Contract and engagement efforts with clinicians have targeted a reduction of desflurane as a percentage of all volatile gas use by volume, from 20% in 2020/21 to 10% in 2021/22 across all NHS providers.

UHCW has achieved a successful discontinuation of the usage of desflurane, exceeding the NHS Standard Contract reduction target.

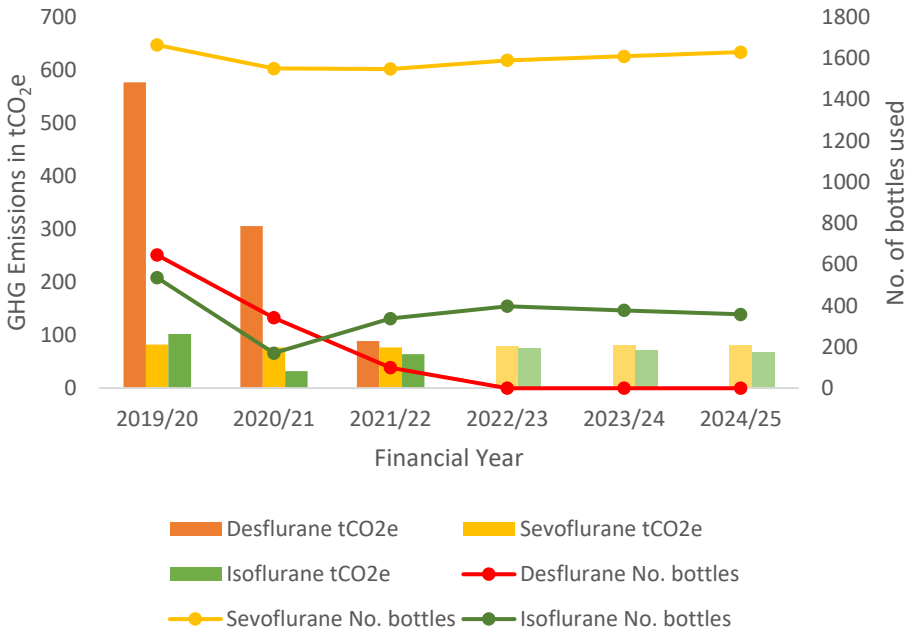


Figure 1 Volatile anaesthetic use, emissions and reduction trajectory to 2025/26

Inhalers

We do prescribe both Dry-powder (DPI) and Metered Dose Inhalers (MDI). Metered dose inhalers use fluorinated gases as the propellant: in 2019/20, the prescription of 9,836 MDIs contributed to 410 tCO_2e, whereas the 3,222 prescribed DPIs equated to around four tCO_2e.

The NHS Standard Contract stipulates that 30% of all inhalers prescribed across NHS England should be DPIs, potentially saving 374 $ktCO_2e$ per year, according to the NHS Net Zero report.

New Impact and Investment Fund (IIF) indicators which have been released provide an additional steer on prescribing lower-carbon inhalers.

Dry-powder inhalers are an appropriate choice for many patients and contain as little as 4% of the GHG emissions per dose compared with MDIs. Fluorinated gases in MDIs mean that each 10ml to 19ml inhaler cannister has the equivalent emissions of 30 to 80kg of carbon dioxide!

Dr Laura May, Consultant Anaesthetist

In 2019/20, DPIs accounted for 25% of all inhalers prescribed by the Trust – 5% below the target rate. The Trust will work with other care providers to aim for 30% of all inhalers prescribed being DPIs (from 3222 to 3888 prescriptions per year), to save an additional 18 tCO2e (see Figure 29).

At the end of use, inhalers still contain as much as 20% of high-GWP propellant. Greener disposal of these items, where residual fluorinated gases are captured and destroyed, is therefore another key priority. Lastly, overuse of inhalers leads to 250,000 tonnes of equivalent carbon emissions (250 ktCO2e) annually across the UK, according to a new study .

UHCW will work across our Trust to address disposal and overuse, and work with our clinical staff and patients through the NICE Patient decision aid to help increase the uptake of low-carbon inhalers wherever clinically appropriate.

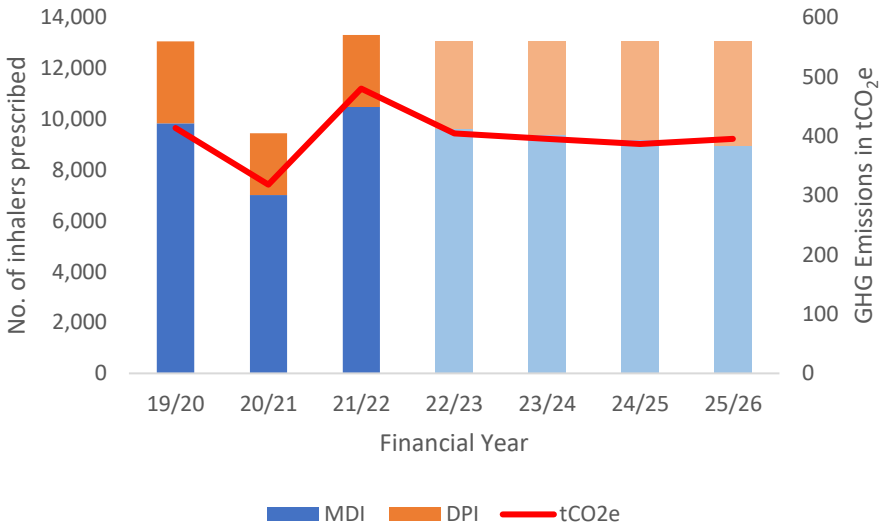


Figure 29 Graph to show emissions and emissions reduction trajectory associated with a 30% total of all inhalers being DPIs until 2025/26

NHS LTP 17
NHS SC 18.4.2.2
NHS NZ 3.4.1

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Medicines: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Collate inhaler prescribing data and report quarterly.	22/23		£	✕	Clinical Pharmacy Team	**LTP** 17
02	Collate volatile anaesthetic gas use data and report quarterly.	22/23		£	✕	Clinical Pharmacy Team	**LTP** 17
03	Reduce the use of Nitrous Oxide.	22/23				Clinical Pharmacy Team	**LTP** 17 **SC** 18.4.2.2 **NZ** 3.4.1
04	Working with external partners to trial anaesthetic capture system and 'cracking' devices.	22/23		£		Procurement	**LTP** 17 **SC** 18.4.2.2 **NZ** 3.4.1
05	Change from primarily IV paracetamol to oral in Theatres.	22/23				Clinical Pharmacy Team	**LTP** 17 **SC** 18.4.2.2 **NZ** 3.4.1
06	Switch to methoxyflurane (Penthrox) in preference to nitrous oxide analgesia/anaesthesia where clinically appropriate.	23/24		£		Clinical Pharmacy Team	**LTP** 17 **SC** 18.4.2.2 **NZ** 3.4.1
07	Work with our anaesthetists and pharmacy to significantly reduce the use of desflurane in surgical procedures to less than 10% of total volatile anaesthetic gas by volume.	23/24		£		Clinical Pharmacy Team	**SC** 18.6 **NZ** 3.4.1

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
08	Set a target of prescribing at least 50% DPIs for all inhaler types.	23/24		£		Clinical Pharmacy Team	**NZ** 3.4.1
09	Set a goal to reduce MDIs to 25% of all non-salbutamol inhalers by prescribing DPIs and soft mist inhalers, where clinically appropriate	24/25		£		Clinical Pharmacy Team	**IIF** ES-01 **LTP** 17
10	Set a goal of reducing the average emissions from salbutamol inhalers to 11.1kg per inhaler, where clinically appropriate	24/25		£		Clinical Pharmacy Team	**IIF** ES-02 **LTP** 17
11	Reducing medicines waste.	On-going					
12	Medicines optimisation.	On-going					
13	Lower carbon alternatives.	On-going					
14	Collate methoxyflurane (Penthrox) use data and report monthly.						

Figure 30 Green Plan action table for inhalers

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

Not applicable

Supply chain and procurement

The NHS is a major purchaser of goods and services, with NHS England alone procuring around £30 billion of goods and services annually. Procurement has major potential social, economic, and environmental impacts both locally and globally.

This includes the power of using local suppliers, the climate performance of our equipment and estate, and preventing modern slavery in supply chains.

UHCW is committed to engage with our suppliers to meet the Green Plan and support the sustainable procurement objectives of NHS England wherever practicable.

Procurement and Climate Action

Our supply chain emissions represent a huge portion of UHCW's overall carbon footprint. We have baselined our estimated supply chain emissions for 2019/20 utilising the GHG Protocol 'Scope 3' spend-based method. Spend-based emissions change yearly with total spend and will not help measure progress initially. However, they will help UHCW to identify our carbon hotspots to plan for actions.

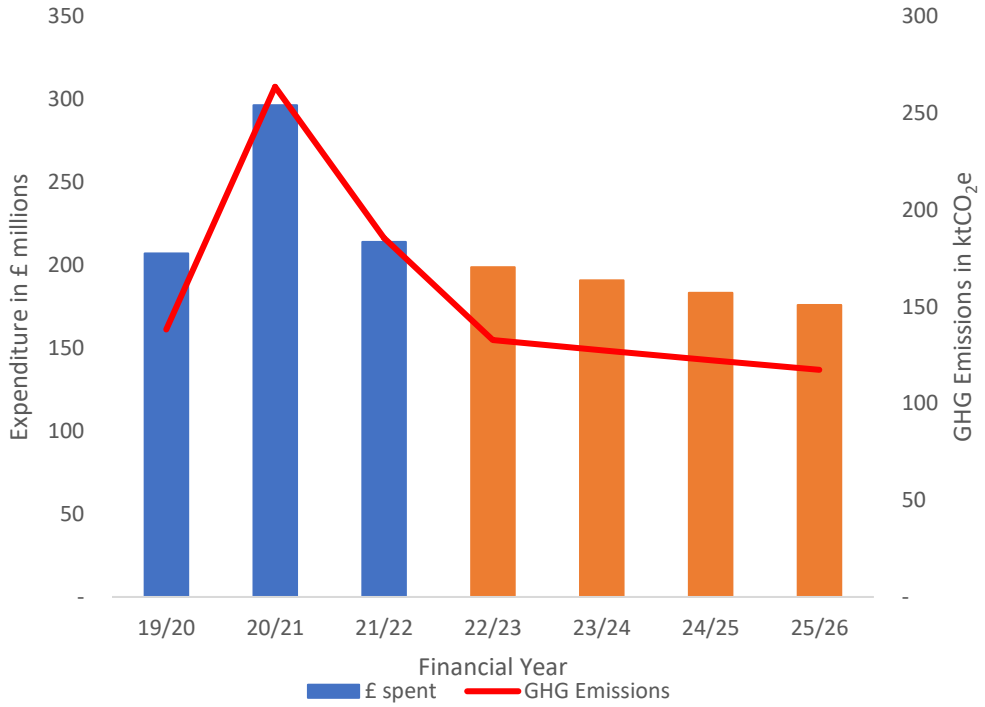


Figure 31 Emissions from our supply chain with reduction trajectory to 2025/26. Note: emissions are listed in kilo-tonnes of CO_2e ($ktCO_2e$).

Supply Chain and Procurement

- Emissions from our supply chain were estimated to be **132,285 tCO_2e** in 2019/20
- The NHS Sustainable Suppler Framework requires all suppliers to publish progress reports and continued carbon emissions reporting by 2030
- An ISO 20400 Sustainable Procurement Strategy would enhance the environmental and social performance of the Trust's supply chain
- We will ensure tenders adopt the new social value procurement note PPN 06/20 and carbon management PPN 06/21 in major contracts in April 2022 and 2023 respectively
- Reusable items such as face masks and aprons would reduce waste (as per the Waste section)
- Reclaiming mobility aids and other devices from patients will prevent waste and save money

As a Trust, we procure most items and services through centralised NHS/government frameworks, such as NHS Supply Chain. These centralised frameworks already provide best value through bulk purchasing power and consolidation of orders. We cannot control or influence the sustainability aspects of these routes of procurement and will benefit from the decisions made in how these frameworks operate.

In addition, the Trust is a signatory of the NHS Single Use Plastics Pledge and aims to reduce plastic catering consumables as much as possible.

The NHS, in line with recent government requirements, is mandated to adopt a new social value and environmental standard in the future. A new Sustainable Supplier Framework was launched in January 2022, and from April 2022, all NHS tenders will include a minimum 10% net zero and social value weighting (as per Policy Procurement Note 06/20).

Introducing Sharpsmart for better recycling of sharps in clinical areas.

From April 2023, tenders for contracts above £5 million will require suppliers to publish a carbon reduction plan for their direct emissions as a qualifying criterion (as per Policy Procurement Note 06/21).

By 2030, all suppliers will be required to demonstrate progress in line with the NHS' net zero targets, through published progress reports and continued carbon emissions reporting.

PPN 06/020 & PPN 06/021 are procurement policy notices that relate to Central Government Departments, their Executive Agencies and Non-Departmental Public Bodies, UHCW as an organisation is not yet directly in scope.

These additional requirements will enable us to determine the carbon and social impact of the products and services we buy more accurately, and ensure suppliers are reducing the emissions associated with their operations and products.

In the interim, we will explore ways to reduce single-use plastic items and research how we can incorporate reusable items, such as masks and aprons, into our clinical practice.

Lawrence Barker, Head of Medical Engineering and Biomedical Supplies

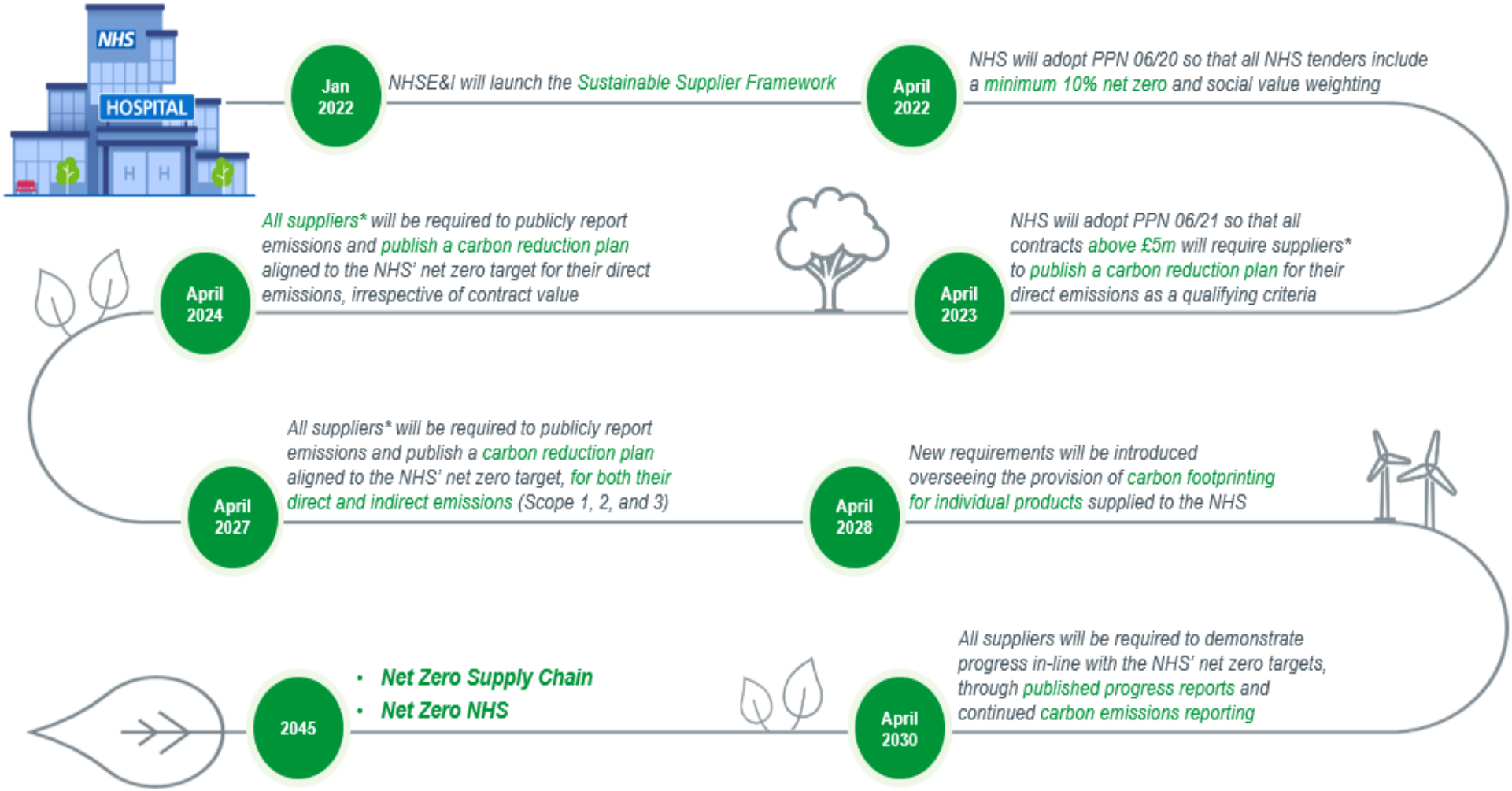


Figure 32 Building net zero into NHS Procurement – shows how NHS England will require all suppliers to provide carbon and social value reporting by 2030

Product retainment and lifecycle extension

Procuring well, ensuring best value for money and social and environmental benefits, will remain a core principle for the wider NHS and our Trust.

However, keeping products in service for as long as possible, through maintenance and repair, is fundamental to a circular economy and drives down waste.

Critical care medical products are kept in good working order at our Trust, as per manufacturer's and the Medical and Healthcare Products Regulatory Agency's (MHRA) guidance. Only when an item is no longer supported by the manufacturer, or is beyond economic repair, do we consider disposal.

Most 'obsolete' working medical equipment is sent to an auctioneer, where it is sold on, often abroad, for continued use, which has both social and environmental benefits. Equipment that is beyond repair is disposed of through the appropriate waste channels, and components recycled.

Mobility aids, such as walking frames and wheelchairs, are given to outpatients where appropriate. Unfortunately, once issued, these items are no longer under our control. Though many outpatients will use mobility aids for the long term, many are only used for weeks or months, and we have no way of reclaiming these mobility aids. Ultimately, these items end up in outpatients' domestic waste. Mobility aids are robust pieces of kit, with long service lives.

We operate a reuse scheme to re-purpose walking aids which minimises the number of items ending up in outpatient domestic waste. We also have a swap shop for furniture and equipment which further reduces waste and procurement costs.

Reduction of paper-based systems: *moving from paper-based filing systems to a new Electronic Patient Record system from 2023, with information available to staff treating patients wherever they are – quicker for decision making about their care*

Anchor trust

Our role as an anchor trust involves identifying opportunities for regional Small and Medium-sized Enterprises (SMEs), and engaging suppliers to ensure wider community benefits are met.

While we cannot reserve spend locally, we do take proactive steps to support inclusive growth, including a policy on the payment of the Real Living Wage for our service suppliers.

NHS England Sustainable Procurement Objectives		
Net Zero	Modern Slavery	Social Value
Achieve the NHS Supply Chain Net Zero Targets	Eliminate Modern Slavery in the NHS supply chain both domestically and abroad	Ensure NHS procurement is a force for good helping local economies and improves wider determinants of health

Figure 33 Official NHS Sustainable Procurement Objectives Source: website

NHS LTP 6.17, 17, 18

NHS SC 18.6

NHS NZ 3.3, 3.3.1

8 DECENT WORK AND ECONOMIC GROWTH

Target 8.3 Promote policies to support job creation and growing enterprises

Target 8.7 End modern slavery, trafficking, and child labour

12 RESPONSIBLE CONSUMPTION AND PRODUCTION

Target 12.7 Promote sustainable public procurement practices

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

Supply Chain & Procurement: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Consolidate products that will be used together into a single layer of packaging to reduce single use plastic.	Ongoing		£		Procurement	**SC** 18.6
02	Adhere to the requirements of the NHS Sustainable Supplier Framework.	January 2022		£		Procurement	**SC** 18.6
03	Ensure tenders adopt the new social value procurement note PPN 06/20 and carbon management PPN 06/21 in major contracts from April 2022 and 2023 respectively.	April 2022		£		Procurement	**NZ** 3.3, 3.3.1
04	Ensure the purchase of 100% closed-loop recycled paper and reduce reliance on paper by 50%.	24/25		£		Estates	**SC** 18.6
05	Ensure tenders adopt the carbon management PPN 06/21 in major contracts in April 2023.	April 2023		£		Procurement	**SC** 18.6
06	Review our sustainable procurement approach to find relevant links that enable our Green Plan and work closely with NHS Supply Chain and NHS Improvement to promote their sustainability programmes.	Ongoing		£		Procurement	**LTP** 6.17, 17
07	Identify wider social, economic and environmental benefits for the local community and population when considering the purchase and specification of products and services, discussed and agreed with the Coordinating Commissioner.	23/24		£		Procurement	**SC** 18.6
08	Work with NHS Supply Chain to address Modern Slavery and domestic and international supply chain environmental, and human rights risks, including those linked to PPE.	23/24		£		Procurement	**SC** 18.6
09	Identify carbon hotspots in the supply chain.	23/24					
10	Explore the creation of an ISO 20400 Sustainable Procurement Strategy.	23/24		£		Procurement	**SC** 18.6
11	Create a new system for cataloguing and reclaiming mobility aids and other devices from patients and expand walking aid refurbishment scheme, 40% of all walking aids refurbished in the next five years.	24/25		£		Physio and Occupational Therapy	**NZ** 3.3, 3.3.1

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
12	Engage a key supplier on plans to align their operations and delivery with NHS Net Zero targets over time. Leverage NHS England and NHS Improvement Supplier Engagement Strategy approach for fostering partnerships.	23/24		£	⊗	Estates	**NZ** 3.3, 3.3.1
13	Work to identify impactful future supply chain emissions reductions opportunities and links to climate adaptation and other Green Plan commitments in procurement specifications and through contract delivery.	24/25		£	⊗	Procurement	**NZ** 3.3, 3.3.1
14	Reduce clinical single use plastics by 10%.	24/25					
15	No longer purchase from suppliers that do not meet the net zero commitment.	26/27					
16	Ensure green champions review procured items in their ward/department and move to lower carbon alternatives where possible.	26/27					
17	Develop a whole-life costing for new purchases.	26/27					
18	Enable procurement to support Social Value and Anchor Institution NHS aims, e.g., understanding and increasing local, SMEs and social enterprise spend or collaborating with suppliers to promote positive action in equalities or to collaborate on innovation or climate action.	Ongoing		£	⊗	Procurement	**LTP** 18
19	Reduce the use of clinical and non-clinical single use plastic items.	On-going					

Figure 34 Green Plan actions for supply chain management and procurement

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

Food and nutrition

Food illustrates the links between climate change and public health. The NHS Long Term Plan commits us to promote plant-forward diets and reduce unhealthy options like sugary drinks on NHS premises. Not only will these actions help prevent obesity and non-communicable disease, but they will also play a role in reducing our greenhouse gas emissions and environmental impact.

Food production accounts for up to 26% of global greenhouse gas emissions. Food and livestock production has a huge impact on biodiversity as well, and according to research collected by Our World in Data "of the 28,000 species evaluated to be threatened with extinction on the IUCN Red List, agriculture and aquaculture is listed as a threat for 24,000 of them".

While promoting healthier foods and reducing emissions, the NHS can also source more food from local and regional producers where possible, increasing the positive economic impact for our communities and reducing the emissions associated with food transport.

UHCW will work to fulfil Long Term Plan priorities for food provision on our premises, promoting plant-forward diets, higher welfare and more sustainable food options, and supporting regional producers wherever we can.

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[1] https://ourworldindata.org/environmental-impacts-of-food

[2] Source: Poore, J., & Nemecek, T. (2018). Reducing food's environmental impacts through producers and consumers. *Science*, 360(6392), 987-992. Via https://ourworldindata.org/environmental-impacts-of-food

We offer a wide choice of meals for inpatients, including vegetarian and vegan options and other dietary requirements.

Menus are changed in association with the dietetic and SALT teams on site, tasting sessions and review of menus take place, this includes analysing nutritional contents of menu items to ensure it meets patient needs and exceeds requirements.

After signing the NHS' Single Use Plastics Pledge in 2019, we removed all the single-use plastic products from our catalogue. We also use Vegware containers across our sites.

Wards use EPOS (electronic ordering) and a paper version dependant on the ward. Menu booklets are in place on each ward describing the main menu and special diet choices which were replaced by menu mats in August 2022.

Jo Whateley, Clinical lead for service development - Healthcare NHS

NHS LTP 2.18, 17
NHS SC 19.1, 19.2,19.3
NHS NZ 3.3.2

2 ZERO HUNGER

Target 2.2 End all forms of malnutrition (including obesity)

3 GOOD HEALTH AND WELL-BEING

Target 3.4 Reduce mortality from non-communicable diseases and promote mental health

13 CLIMATE ACTION

Target 13.2 Integrate climate change measures into policy and planning

14 LIFE BELOW WATER

Target 14.4 Sustainable Fishing

Food and Nutrition: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Explore a digital meal system for at least one NHS site to enable accurate meal planning and reduce food waste.	22/23		£		Estates & Catering Services	**NZ** 3.3.2
02	Reduce the number of vehicles to site.	23/24					
03	Phase in more Plant-forward diets and other updated NHS requirements and explore greater seasonal menu changes.	23/24		£		Procurement & Catering Services	**LTP** 2.18
04	Limit sugary drinks sales at our facilities and fulfil other updated NHS requirements.	23/24		£		Catering Services	**SC** 19.3
05	Work with NHS Supply Chain to ensure positive impacts from contract management and maintain updates to Government Buying Standards sustainable food criteria.	23/24		£		Procurement & Catering Services	**SC** 19.3
06	Ensure all food providers meet or exceed the requirements outlined in Report of the Independent Review of NHS Hospital Food.	23/24		£		Facilities & Procurement	**SC** 19.3

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Cost to achieve	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
07	Review internal and NHS strategies for sustainable food procurement, including sustainable fish, elimination of palm oil or limit to RSPC-certified palm oil and Fairtrade items where relevant.	23/24		£		Procurement	**LTP** 17
08	Continue to work with patients and partners on the link between food, health and obesity, as well as the emissions impact.	On-going		£	⊗	TBC	**LTP** 2.18 **SC** 19.1, 19.2 **NZ** 3.3.2
09	Reduce overall food waste by 20%.	On-going					
10	Review food and catering to explore opportunities to push forward Long Term Plan plans to address obesity, benefit UHCW's local area, and reach Net Zero emissions.	On-going		£	⊗	Catering Services	**LTP** 2.18, 17 **SC** 19.1, 19.2 **NZ** 3.3.2
11	Work with regional partners to identify opportunities for local and SME food producers.	On-going		£		Procurement	**NZ** 3.3.2

Figure 35 Table to show Green Plan actions for food and nutrition

Indicative cost:

£ No or low cost

£ Moderately expensive

£ Significantly expensive

Indicative emissions reduction:

Low or incremental reduction

Moderate reduction

Significant reduction

⊗ Not applicable

Adaptation

Climate change will make extreme weather, such as heatwaves, droughts and flooding, more prevalent. Sea-level rise and increased risk of Vector Borne Diseases, such as Lyme's Disease, may also impact our local communities.

The changing climate poses risks for vulnerable populations in our community, but also impacts our Trust's estate, ability to operate and supply chain.

We already engage with other public authorities and partners in tackling extreme weather events, such as heat waves and flooding. UHCW will analyse these risks and develop actions for our care delivery, estate planning and management, including flood risks across our estate and service area. This is led by the Director of Estates and Facilities, who has the authority to make long-term decisions over forthcoming building design, refurbishments and new builds, adapting design to meet the need for future resilience and energy efficiency.

The Trust has severe weather plans in place which are being reviewed to take a wider view of services affected by climate change.

Climate change has serious implications for our health, wellbeing, livelihoods, and society. Its direct effects result from rising temperatures and changes in the frequency and strength of storms, floods, droughts, and heatwaves — with physical and mental health consequences (The Lancet, 2017)

The NHS Long Term Plan reinforces the requirement to embed resilience and sustainability into our healthcare services.

Climate change adaptation is critical to achieving this. The impacts of climate change on our health, services, infrastructure and our ability to cope with extreme weather events will place significant additional demands on our services in the future.

Climate change adaptation in the NHS is about organisational resilience and the prevention of avoidable illness, embracing every opportunity to create a sustainable, healthy and resilient healthcare service. Reducing our impact on the environment may not only help to mitigate against climate change, but reduce our organisational running costs, ensure business continuity, and reduce health inequalities. Above all, it's about ensuring that the NHS, our buildings, services, staff and patients are prepared for what lies ahead.

Climate Change Adaptation

"As climate change accelerates globally, in England we are seeing direct and immediate consequences of heat waves and extreme weather on our patients, the public and the NHS. Adaptation is the process of adjusting our systems and infrastructure to continue to operate effectively while the climate changes. It is critical that the NHS can ensure both continuity of essential services, and a safe environment for patients and staff in even the most challenging times."

- **Greener NHS**

NHS LTP 17
SC 18.4.2.3
NHS NZ 7

1 NO POVERTY

Target 1.5 Build resilience to environmental, economic and social disasters

3 GOOD HEALTH AND WELL-BEING

Target 3.3 Fight communicable diseases.

11 SUSTAINABLE CITIES AND COMMUNITIES

Target 11.5: Reduce the adverse effects of natural disasters

13 CLIMATE ACTION

Target 13.1: Strengthen resilience and adaptive capacity to climate-related

Adaptation: Action Plan

No	UHCW Green Plan Actions	Target Year	Progress	Indicative Emissions reduction	Responsible lead/dept.	NHS Req.
01	Monitor and report instances of internal temperatures above 28°C to NHS England, and review findings.	22/23				
02	Incorporate Climate Change Risk Assessment on the corporate risk register and manage appropriately.	23/24		£	Business Continuity	**SC** 18.4.2.3 **NZ** 1
03	Appoint a Climate Change Adaptation lead and follow the recommendations of the third Health and Social Care Sector Climate Change Adaptation Report.	23/24		£	Board of Directors	**LTP** 17 **SC** 18.4.2.3 **NZ** 1
04	Create an ISO14090 Climate Change Adaptation Plan, including plans for adapting our premises to mitigate climate change and extreme weather risks, using a recognised methodology, that is routinely reviewed considering the changing climate and scientific advancements.	23/24		£	Business Continuity	**SC** 18.4.2.3 **NZ** 1
05	Work with NHS Supply Chain to better understand the climate change risks in our supply chain and proactively seek to make our supply chain 'climate-ready'.	23/24		£	Procurement	**SC** 18.4.2.3 **NZ** 1
06	Embed and adapt existing health-related contingency planning, such as Heat Wave Plans to reflect predicted climate change impacts.	23/24		£	Business Continuity	**SC** 18.4.2.3 **NZ** 1
07	Incorporate newly emerging climate-related health care risks into our contingency planning, such as the increasing prevalence of Vector Borne Diseases.	23/24		£	Business Continuity	**SC** 18.4.2.3 **NZ** 1
08	Review the effects of flooding and heatwaves on the infrastructure, patients, and staff and put in place actions to mitigate negative outcomes.	On-going				
09	Update the climate change risk assessment annually.	On-going				

Figure 36 Table to show Green Plan actions for climate adaptation

Conclusion

This Green Plan is a living document and will be regularly reviewed for progress against the action plans. As such, actions and targets may be revised where necessary.

Adequate budgets and resources will be allocated to achieve our goals and deliver sustainable care. We will look to achieve the ‘quick wins’ first, although significant investment will be required in future years, especially in making our buildings ‘climate-ready’.

Climate Change poses many threats to our care population and how we deliver care. This Green Plan will enable us to become an adaptable and resilient organisation. It will help steer our direction of travel with other local anchor institutions, bolstering our ability to provide a continued critical service.

Our dedicated workforce is core to our care provision and delivery of this Green Plan. With the necessary structures in place, our colleagues and service users will drive the changes to make us a more sustainable organisation. We will continue to have an open dialogue with all stakeholders to improve our Green Plans and the care we deliver.

University Hospitals Coventry and Warwickshire NHS Trust

Contact Details

All the information contained in this report is, to the best of our knowledge, accurate at the time of publishing.

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