

2024/2025

# Environmental Management System Report

Prepared By

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*October 2025*



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## Introduction and Scope

The University of East Anglia (UEA) proudly maintains certification to ISO 14001:2015, the internationally recognised standard for Environmental Management Systems (EMS). This certification underscores the university's commitment to effective environmental management and defines the scope as all physical estates and operations within the NR4 7TJ campus.

The EMS aims to support continuous improvement in environmental performance, ensure compliance with relevant legislation, deliver financial and operational benefits, and enhance transparency in environmental reporting—aligning with the UEA's Sustainability Strategy and contributing to the long-term sustainability goals.

Ownership of the EMS sits with the **Estates and Facilities Directorate**, but the system is reviewed at least annually by senior management to ensure its suitability, adequacy, and effectiveness.

This report provides an assessment of the UEA's environmental performance for the period from 1 August 2024 to 31 July 2025. It addresses all elements specified in the ISO 14001 standard and will be accessible to the public through the UEA sustainability website.



Figure 1 UEA Campus Map

## EMS Management

### Environmental Policy

The Environmental Sustainability Policy is reviewed annually as part of the Sustainability Committee meeting, in conjunction with the review of progress of environmental objectives. The latest review took place in June and the updated policy was signed off on 27 June 2025; it reflects alignment with the UEA 2030 Sustainability Strategy and 2045 Net-Zero Goals.

To access the latest version go to [Strategy and Policies page](https://www.uea.ac.uk/strategy-and-policies) on [www.uea.ac.uk](https://www.uea.ac.uk).

### EMS Management Structure

The EMS is overseen by the Estates and Facilities division to ensure consistent implementation across the University's physical estate and operations. This approach supports UEA's ongoing efforts to enhance its environmental performance.

The reporting structure for implementing the EMS, shown in the Figure 2 below, highlights how Estates and Facilities Directorate interact both internally and externally with interested parties and how information regarding the EMS is integrated across the three relevant functions, i.e. Estates and Facilities Leadership Team, Estates and Facilities Management Team and Relevant Estates Staff.



Figure 2 EMS Management Structure

### Management Review

The Management Review is the responsibility of the Estates and Facilities Leadership Team (ELT) and the last review was held on 1 July 2025 where the ELT reviewed the proposed targets and the suitability of the EMS to help deliver and improve the university's environmental performance.

## Legislation Updates

From the 2024-2025 period the UEA has identified the most relevant UK legislation updates and policies that could impact UEA's environmental performance. These legislations are:

|  |   |
|--|---|
| <p>Separation of Waste (England) Regulations</p> | <p>From 31 March 2025 workplaces in England with <b>10 or more employees</b> are required to separate waste into at least: <b>dry recyclables</b> (plastic, metal, glass, paper/card), <b>food waste</b>, and <b>residual</b> (non-recyclable waste).</p> <p>The UEA updated signage to inform staff and students and to ensure correct waste segregation and reduce waste contamination.</p>                     |
| <p>Water (Special Measures) Act</p>              | <p>This Act strengthened regulation of water companies and introduced requirements for Pollution Incident reduction Plans (PIRPs) from water companies.</p> <p>Although not a direct impact, this has raised UEA's expectations of Anglian Water and highlighted the need for timely, accurate incident reporting to mitigate potential liability or reputational risk.</p>                                       |
| <p>UK Pesticides National Action Plan (NAP)</p>  | <p>This <a href="#">plan</a> was launched in March 2025 and set out the UK government's strategy to manage pesticide use sustainably and supporting land managers to increase their use of nature-based techniques.</p> <p>The NAP introduces a domestic target for pesticides in the UK to reduce each of the 20 metrics of Pesticide Load Indicator by at least 10% by 2030, using 2018 as a baseline year.</p> |

## Audit Results and Non-conformances

### External Audit

As part of maintaining the ISO accredited EMS, the UEA is on a 3-year recertification cycle with annual surveillance audits. The external auditor is Interface NRM ([About Us - Interface NRM - UKAS Accredited Certification \(interface-nrm.co.uk\)](https://www.interface-nrm.co.uk)), which is a UKAS Accredited Certification body, providing ISO 9001, ISO 14001, ISO 45001, FSC® and PEFC Certification.

A recertification audit was completed in April 2024 and a surveillance visit took place in April 2025. All previous 'non-conformances' had been closed out and no new findings were noted in the surveillance visit.

### Internal Audits

The EST Sustainability Team, with support from Estates and Facilities staff, conducts several internal audits covering a range of topics aligned with UEA's identified environmental aspects and impacts. A new Environmental Manager was appointed in January 2025 and assumed responsibility for the established audit programme in February 2025.

In the 2024-2025 period the following areas were audited:

Energy & Carbon, Water, Waste, Transport and Biodiversity aspects.

The UEA identified 4 major non-conformities (NCs), 4 minor non-conformities, 7 observations and 6 Scope for Improvement (SFI) and of these 21 findings 18 items have been closed; 3 major NCs, 2 Minor NCs and all the observations and SFIs.

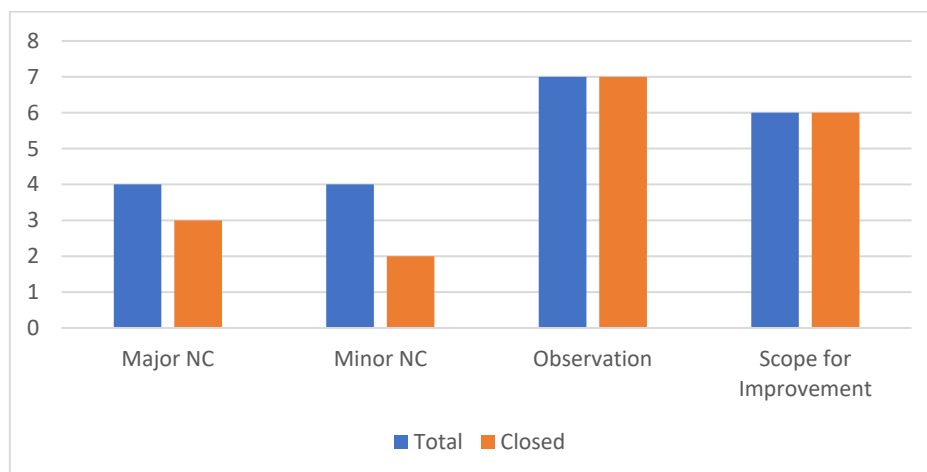


Figure 3 Graph showing closure of internal audit findings for period 2024-2025

Relevant parties have received the 2025-2026 internal audit calendar, which commenced in August 2025. The scheduled dates are as follows:

- **Energy and Carbon** – 6th to 7th August 2025
- **Waste and Nuisance** – 9th to 10th October 2025
- **Water and Biodiversity** – 2nd to 3rd December 2025
- **General Environment** – 12th to 13th February 2026

Note that dates may change if auditees or auditor availability become limited by an emergency.



## Environmental Performance

In July 2025 the UEA approved its Environmental Sustainability Strategy 2030, which sets out the long-term strategic visions under four key aims:

- Aim 1: Sustainability and Sustainable Education
- Aim 2: Sustainability and Sustainable Research
- Aim 3: Sustainable Operations
- Aim 4: Sustainable Society

The strategy outlines the objectives and actions to deliver these aims through workplans developed by implementation teams consisting of topic SMEs, other UEA staff and a student representative.

All data shown in this section is aligned with the latest HESA report ([HESA - Experts in higher education data and analysis](#)) for the period 2023-2024.

### Carbon Emissions

UEA has published an update to its Carbon Management Plan for 2025, which states the calculated carbon emissions for the latest HESA reporting year of 2023/2024. Scope 1 & 2 emissions are reported; as well as the scope 3 categories that we currently collect data for: staff & student commuting; university owned vehicles; waste disposal; water and wastewater.

A summary of reported scope 1 & 2 emissions is presented here:

| Emission sources              | 2023-24<br>(kg CO <sub>2</sub> e) | Historical Data (kg CO <sub>2</sub> e) |                   |                   | Baseline<br>2014-15 | %              |
|-------------------------------|-----------------------------------|--|-------------------|-------------------|---------------------|----------------|
|                               |                                   | 2022-23                                | 2021-22           | 2020-21           |                     |                |
| Grid electricity <sup>1</sup> | 2,011,436                         | 1,184,641                              | 1,483,460         | 1,817,951         | 13,220,000          |                |
| Gas oil                       | 26,577                            | 1,028                                  | -                 | 5,705             | 35,000              |                |
| Natural gas                   | 12,827,586                        | 16,276,234                             | 17,487,816        | 16,131,460        | 12,047,000          |                |
| Vehicle diesel                | 16,288                            | 38,553                                 | 39,017            | 26,379            | 55,400              |                |
| Vehicle petrol                | 9,986                             | 9,814                                  | 16,225            | 9,871             | 4,800               |                |
| <b>Total</b>                  | <b>14,891,873</b>                 | <b>17,510,270</b>                      | <b>17,543,058</b> | <b>17,991,366</b> | <b>25,362,200</b>   | <b>-41.28%</b> |

Table 1 Scope 2 and 2 Emissions - UEA

The reduction in carbon emissions for the 2023/24 period was mostly due to a decrease in the quantity of natural gas consumed. This decrease resulted from the gas-fuelled Combined Heat and Power (CHP) generators running less than usual over the period because of maintenance issues.

### Energy Consumption

Total gas consumption over the 2023/24 period was markedly reduced compared to the previous year. This is almost entirely attributed to a reduction in operating hours of the on-site CHP generators, due to reliability and maintenance issues. Non-CHP gas consumption, used primarily for heat generation, would normally be expected to increase to compensate for lower CHP output. However, there was

<sup>1</sup> UEA purchases electricity through a '100% green' electricity tariff, which is considered zero-carbon under some reporting standards. Emissions stated here reflect the standard UK grid electricity carbon factor, as used in HESA EMR reports.

also a small reduction in this category, most likely explained by temperatures being warmer over the year and a slight reduction in total floor space, reducing the overall heating demand.

Total electricity consumption has remained largely consistent over the last few reporting periods, although the balance between grid electricity supply and on-site CHP generation has fluctuated year-on-year to compensate for the availability of the CHP generators.

| Energy Consumption Source                            | 2023-24<br>(kWh)  | Historical Data - Emissions |                   |                   | % Change       |
|--|-------------------|-----------------------------|-------------------|-------------------|----------------|
|  |                   | 2022-23                     | 2021-22           | 2020-21           |                |
| Natural gas (excl that used as input for a CHP unit) | 26,139,386        | 27,417,987                  | 7,877,422         | 8,554,169         | -4.89%         |
| Natural gas (as input for a CHP unit)                | 43,995,035        | 61,557,216                  | 87,925,230        | 79,518,883        | -39.92%        |
| <b>Total natural gas consumption</b>                 | <b>70,134,421</b> | <b>88,975,203</b>           | <b>95,802,652</b> | <b>88,073,052</b> | <b>-26.86%</b> |
| Electricity consumed from onsite CHP                 | 19,454,000        | 23,600,000                  | 23,752,657        | 21,490,890        | -21.31%        |
| Grid electricity                                     | 9,714,734         | 5,720,969                   | 7,671,217         | 8,561,912         | 41.11%         |
| Onsite photovoltaic                                  | 138,074           | 324,927                     | 228,537           | 141,276           | -135.33%       |
| <b>Total electricity consumption</b>                 | <b>29,306,808</b> | <b>29,645,896</b>           | <b>31,652,411</b> | <b>30,194,078</b> | <b>-1.16%</b>  |

Table 2 Energy Consumption

Our highest energy consumption building is the Sainsbury's Centre for Visual Arts with an annual consumption of 6.51GWh, this counts for 6.55% of total energy consumption on site. Although there have been some slight changes in order, the ten buildings that consume the most energy on campus have remained largely the same. Norfolk Terrace and Arts (Teaching Wall) previously featured in the list but are currently closed for refurbishment.

| No. | Building                       | Annual Energy<br>(kWh) | Percentage of<br>site | Change |
|-----|--------------------------------|------------------------|-----------------------|--------|
| 1   | Sainsbury's Centre Visual Arts | 6,508,684              | 6.55%                 | ↑      |
| 2   | Sportspark                     | 5,577,026              | 5.61%                 | ↑      |
| 3   | BMRC                           | 4,728,684              | 4.76%                 | ↓      |
| 4   | Village Substation             | 4,660,875              | 4.69%                 | ↑      |
| 5   | Environmental Sciences         | 4,638,415              | 4.66%                 | ↓      |
| 6   | Library                        | 3,330,463              | 3.35%                 | ↑      |
| 7   | Chemistry                      | 3,108,588              | 3.13%                 | ↓      |
| 8   | Colman House Block F           | 2,827,163              | 2.84%                 | ↑      |
| 9   | Biology                        | 2,709,674              | 2.72%                 | ↓      |
| 10  | Bob Champion Building          | 1,878,063              | 1.89%                 | ↔      |

Table 3 - Top 10 Energy Consuming Buildings

The Energy Implementation Team was convened in 2024, with the objective of reducing energy consumption and energy related carbon emissions. The team is currently working on a decarbonisation strategy to achieve these objectives.

## Water Consumption

UEA has set a water reduction target of 14% by 2032, compared to a 2019 baseline, in-line with national and regional targets. Water consumption in 2023/24 was similar to the baseline year despite an increase in student numbers of approximately 13%.



| Water                             | 2023-24<br>(m3) | Historical Data |                |                | Baseline<br>2018-19 | % Change     |
|-----------------------------------|-----------------|-----------------|----------------|----------------|---------------------|--------------|
|                                   |                 | 2022-23         | 2021-22        | 2020-21        |                     |              |
| Non-residential water consumption | 188,939         | 124,225         | 121,413        | 72,641         | 186,202             |              |
| Residential water consumption     | 129,366         | 90,666          | 92,087         | 128,131        | 130,496             |              |
| <b>Total water</b>                | <b>318,305</b>  | <b>214,891</b>  | <b>213,500</b> | <b>200,772</b> | <b>316,698</b>      | <b>0.51%</b> |

Table 4 Water Consumption - UEA

## Biodiversity

In 2024, the UEA was awarded the prestigious Green Flag Award ([Award Winners - Green Flag Award](#)) for the eighth consecutive year, a testament to its well-managed green spaces.

This achievement is thanks to the efforts of a dedicated EST Grounds and Maintenance Team, responsible for the university's 145 hectares of campus, with 50 hectares included in the higher-level stewardship scheme. Located on the outskirts of Norwich, the campus features extensive woodlands that support over 5,700 species of wildlife.

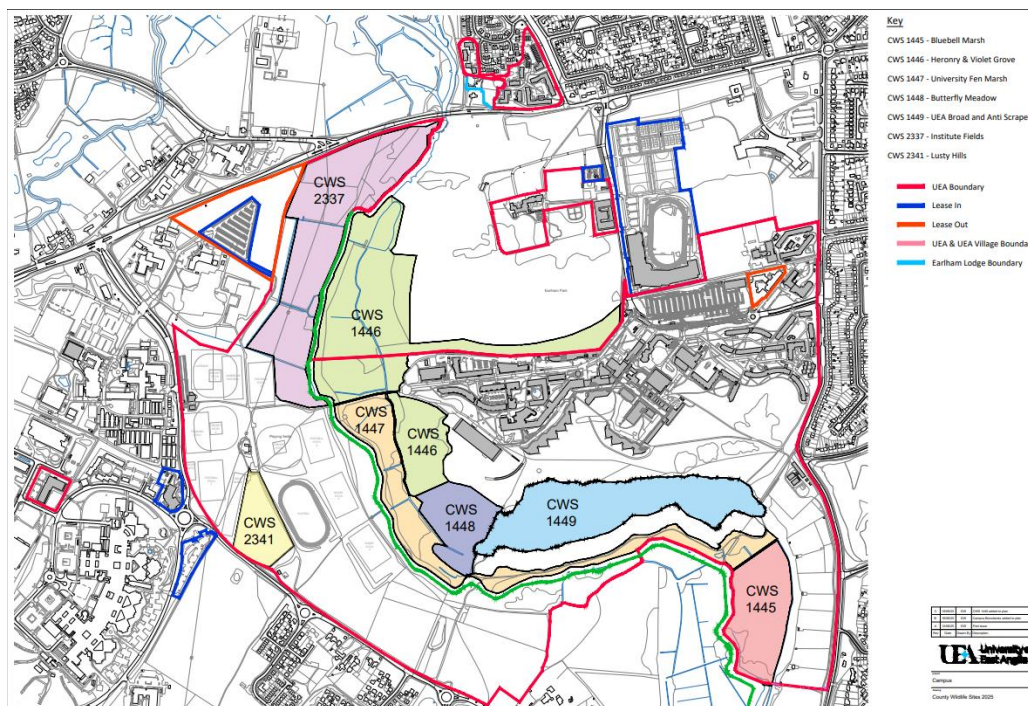


Figure 4 UEA Campus Wildlife Sites

Estates and Facilities and the Grounds and Maintenance Team are implementing the **Green Infrastructure Strategy (GIS)**, which was approved by the UEA Sustainability Committee in late 2023. The primary function of the GIS is to provide an integrated and sustainable approach to land use management at the UEA.

A Biodiversity and Community coordinator was appointed in September 2024 with the specific aim of managing the GIS. With this role the UEA has been able to deliver more ambitious biodiversity projects and community engagement opportunities, including those listed below:

- **Bluebell Marsh Restoration Project** – Work to restore the ditch network, which have a crucial role in maintaining the wet character of this marshland and increase habitat for important species such as water vole.
- **Compost Bays** – Three large bays installed, enabling the UEA to create its own compost to use around the campus and improve sustainability.
- **County wildlife Site Designation** – Two further sites approved as new County Wildlife Sites (CWS) recognising their value for nature and enabling the UEA to work with Norfolk Wildlife Trust to monitor the biodiversity of these two areas.
- **Pollinator Push Project** – This project increased the ‘no mow’ areas around campus to provide improved habitat and nectar for insects.
- **UEA Biodiversity Heros** – The UEA has begun a new volunteer group to bring together staff, students and the local community to enhance biodiversity.

## Waste

The UEA Waste Implementation team has been advancing multiple initiatives aligned with the waste hierarchy to eliminate, reduce, reuse, and recycle waste before disposal. Updates and extensions to the waste procedure now better reflect current regulatory requirements and working practices. Other achievements during the 2023/2024 period include:

**Waste awareness:** The UEA has updated its waste information posters in public areas to raise awareness and encourage better recycling and the impact of donations to UEA’s charity partners, including the British Heart Foundation.

**Waste contamination:** The Cleaning Services team has focused their effort on reducing waste contamination through active engagement and improved signage, including bin stickers.

**Waste segregation:** Segregation operations have been further increased in the biomass waste yard and a green waste skip was introduced to ensure improved disposal of UEA green waste that was not sent to the compost bays.

| Waste streams disposal  | 2023-24<br>(t)  | Historical Data |                 |               |
|-------------------------|-----------------|-----------------|-----------------|---------------|
|                         |                 | 2022-23         | 2021-22         | 2020-21       |
| Recycled                | 499.16          | 674.30          | 601.00          | 333.11        |
| Incinerated             | -               | -               | -               | -             |
| Composted               | -               | -               | -               | -             |
| Anaerobic digestion     | 106.64          | 108.69          | 75.00           | 71.11         |
| Landfill                | 1,330.24        | 12.74           | 7.00            | -             |
| Used to create energy   | 535.09          | 924.59          | 683.00          | 505.56        |
| <b>Total waste mass</b> | <b>2,471.13</b> | <b>1,720.32</b> | <b>1,366.00</b> | <b>909.78</b> |

*Table 5 UEA Waste Disposal*

The UEA saw an increase in total waste from 2022-23, driven by a major building project that generated a large amount of asbestos contaminated concrete, which had to be disposed to landfill. If construction waste is excluded, the total waste mass from normal operations decreased from 1,720t in the previous period to 1,141t – a drop of more than 33% despite an increase in student population numbers.

## Transport

Work to support more sustainable transport options has continued over the past year, aligning with the goals set out in the Sustainability Strategy. A small team has led this initial phase, focusing on reducing emissions and improving modes of travel. Notably, the year-round Park & Ride service — originally introduced for students — has been expanded to include staff, with growing demand expected across both the University and the Norfolk and Norwich University Hospital (NNUH).

Other key improvements include:

- **Electric Buses** – First Bus introduced electric buses in 2024, strengthening sustainable travel options and reducing emissions, even when idling at stops.
- **Night Bus Service** – A trial launched in September 2024 has been highly successful, with nearly 24,000 journeys. The service will now continue for another year without subsidy.
- **EV Charging** – All UEA electric vehicles now use standard key fobs, enabling charging at any on-site station.
- **ANPR Parking** – Main and staff car parks have been upgraded to Automatic Number Plate Recognition, improving data collection and enabling us to target specific user groups with sustainable travel alternatives.
- **Travel survey** – Together with a third-party sustainability transport partner the staff travel survey has provided insight into staff and student travel behaviours and provided useful scope 3 emissions data.
- **Team Structure** – The team structure and working practices have been reorganised to support ANPR operations, and a (part-time) enforcement officer has been reinstated.
- **Dr Bike Contract** – Since reopening in October 2024, 351 bike health checks have been completed. Discounts on safety equipment and participation in cycling events have grown, with cycle safety now a regular feature of the annual events calendar.

UEA continues to support the Cycle to Work scheme to encourage a sustainable mode of commuting and runs a short-term cycle hire service for students, with plans to expand this over the summer.

## Conclusion

Following the successful amendment to the EMS scope and recertification to ISO 14001:2015 in 2024, the completion of a surveillance audit with no non-conformances demonstrates the resilience, and effective management of the EMS. This achievement reflects the vital contributions of the Estates and Facilities Sustainability Team, supported by the Estates Leadership Team.

Building on recent successes, the team is implementing further improvements to strengthen the EMS and support the university's Sustainability Strategy. Efforts will focus on embedding sustainability more deeply across university operations. This includes expanding documented procedures and collaborating with implementation teams to meet environmental goals. In addition, the university is placing a stronger emphasis on the collection, analysis, and dissemination of environmental performance data. This data will be shared more transparently across the institution, supporting informed decision-making and fostering a culture of continuous improvement in environmental stewardship at the UEA.