

2023/24

# Annual Sustainability Report



# Introduction

At Ulster University we recognise the nature of change and the need to live and work within a world of ever-increasing complexity. Climate change is intensifying social, ecological, and economic crises across the world, making urgent action to address a range of sustainability issues more critical than ever. By adopting a peoplecentred partnership approach we are delivering real-world sustainability outcomes across our campuses, our curricula, research, and outreach into local, national, and global communities.

In 2023/24 as part of putting people at the centre of our sustainability outcomes we completed a double materiality assessment to better understand what sustainability means to the university and its stakeholders. Key groups of stakeholders were consulted for the materiality assessment: the Leadership Team, Sustainability Steering Group, Staff, Students and External Stakeholders using a range of engagement approaches including exploratory workshops, surveys, and interviews. The materiality assessment identified key sustainability topics and classified these into a priority matrix indicating high or low materiality to the University along with recommendations for those topics of highest priority.

#### Campus

Like many organisations we acknowledge our operations need to go low-carbon and high-nature to tackle the twin crises of climate change and biodiversity loss together. We do this through our campus and nature positive outcomes.

In 2023/24 we commenced a campus Net Zero Buildings Project to outline options, costs, and carbon reductions for a representative sample of University building types. This project aims to inform the wider campus decarbonisation masterplan. In conjunction with this project, we implemented a Capital Development and Retrofit Sustainable Design Procedure to provide a consistent approach for ensuring our capital development and retrofit building projects are aligned with the institutional drive for net zero, delivering buildings free of direct emissions and fossil fuel heating and cooling.

By placing sustainability at the heart of our institution, we are delivering real-world sustainability outcomes across our campus environment and experiences, curricula, research outputs and impact, and university and local communities.

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Professor Ian Montgomery
Dean of Sustainability and
Corporate Social Responsibility

A Natural Capital Assessment and Account for our Coleraine campus was completed during the year which included an ecological footprint baseline and valuation of the ecosystem services provided by our campus grounds, woodlands, and wildflower meadows. The project outcome included the creation of a natural capital account and balance sheet and a proposed enhancement plan to increase campus biodiversity.

#### **Curriculum**

As part of our approach to Academic Excellence Ulster University has an ongoing commitment to embed Education for Sustainable Development across the academy in curriculum design, graduate attributes and through a broad range of sustainability learning outcomes. At Ulster we worked on reaching more students and educators during the 2024 Students Organising for Sustainability SDG Teach-In campaign with Ulster placed 3rd in the UK for the number of educators taking part in the campaign and placed 8th in the UK for the number of students reached.

Ulster University Business School made an official commitment to integrating sustainability into its business

curriculum and research endeavours, by joining a global network of likeminded business schools around the world, marking a milestone in the University's Principles for Responsible Management Education (PRME) journey.

### **Community and Research Impact**

In 2023/24 we launched our new Research Strategy 2023-2028. The strategy commits to a research-led approach to inform colleagues, communities, policy makers and businesses on ways we can make the best use of our resources and tackle major societal challenges such as climate change, energy, food and water security, and social inclusion and deprivation along with new technologies and solutions to build the sustainable world.

Ulster University was the highest-ranking UK university and joint fifth in the world for university outreach activities in the Times Higher Education Impact Rankings 2024 in recognition of Ulster's extensive, ongoing outreach activities. Additionally, in the category related to Sustainable Development Goal 17: Partnership for the Goals, Ulster was ranked joint 20th, with a relative position in the Top 1%.



JOINT TOP 20
GLOBALLY
FOR SDG 17: PARTNERSHIP
FOR THE GOALS
THE IMPACT RATINGS (2024)



### The year ahead

For academic year 2024/25 our campus, curricula, and community and research impact commitments will focus on:

- Integrating results from the materiality assessment into sustainability strategy, planning, and reporting;
- Developing a mix of net zero building projects to include increasing campus based renewable energy provision through ground and roof mounted PV schemes and geothermal feasibility investigations for ground source heating.
- Seeking accreditation to the Students Organising for Sustainability Responsible Futures Framework, the only framework of its kind that maps out the organisation enhancement required to achieve whole institution engagement with sustainability learning.

 Delivering research activities and events aligned with the five new strategic research themes: Challenging inequality and division; Building the sustainable world; Accelerating data futures; Transforming health and Inspiring creativity and innovation.



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Our Sustainability Report presents just a selection of the work undertaken by our students, staff, and partners over the last year; showcasing how the University continues to enrich lives and shape a fairer world where everyone can thrive without compromising the future of our planet or its inhabitants.



Marie-Louise Gaile
Head of Sustainability



### **PEOPLE**

AN INCLUSIVE UNIVERSITY: EVERYONE MATTERS



Stakeholder
Engagement
and Materiality
Assessment
held at Ulster



Two
Athena Swan
Bronze
Awards



Gold Safe Employer Workplace Charter Award



**'Best Student Wellbeing' award** for UU
Residential Life
Team



'Team of the Year' award for UU Student Money Team at NASMA



### **PLANET**

A CLIMATE POSITIVE UNIVERSITY: PROTECTING NATURE



Natural Capital Biodiversity Assessment completed



On-campus
Wind and
Solar
Renewables



Two new
BREEAM
'Excellent'
Buildings



Platinum
Award in BITC
Environmental
Benchmarking
Survey



Certified to
ISO 14001
Environmental
Standard



Launched the
Ulster
University
Researh
Strategy
2023-2028



Top 3
Institution
-SDG
Teach-In



Two
National
Teaching
Awards



Top 10% for Student Positivity for Studies



Green Key Certificate for Academy Restaurant



Dean appointed as
Chair of the Derry
and Strabane
Sustainability
and Climate
Commission



Ranked
Joint 5th
for Outreach
in THE Impact
Rankings



£4.625m secured for the 'Future Island-Island' project



Co-designed the
Ending Violence
Against
Women and
Girls Strategic
Framework



UUBS launched the 'Centre for Sustainable Family Enterprise'



PLACE

AN INNOVATIVE UNIVERSITY: CREATING OPPORTUNITIES



**PARTNERSHIPS** 

A CONNECTED UNIVERSITY: CONTRIBUTING TO SOCIETY

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## PEOPLE

People are at the heart of this University, together we continue to build a culture in which we can all flourish and where brave thinking and values-led behaviour is encouraged; a University in which we are all proud to work and study.



### STAKEHOLDER ENGAGEMENT - MATERIALITY ASSESSMENT

Sustainability is a central feature of our strategic plan – People, Place and Partnership: Delivering Sustainable Futures for All.





Our strategic plan encompassess everything from addressing the funding challenges facing the higher education sector to our role in addressing climate change and providing leadership in achieving sustainability goals.

Through the Sustainability Steering Group and with the support of SUMS Consulting, a not-for-profit membership organisation providing advice to the higher education sector, we embarked on a double materiality assessment to rank and prioritise the sustainability topics that matter most to our stakeholders. This was done through focused interviews, workshops and surveys. A materiality matrix was developed based on these collective responses which includes the perspectives of the Senior Leadership Team.

The materiality assessment identified 18 key sustainability topics and classified them into four groups, according to their relative change to outward and inward impact of and on the University.

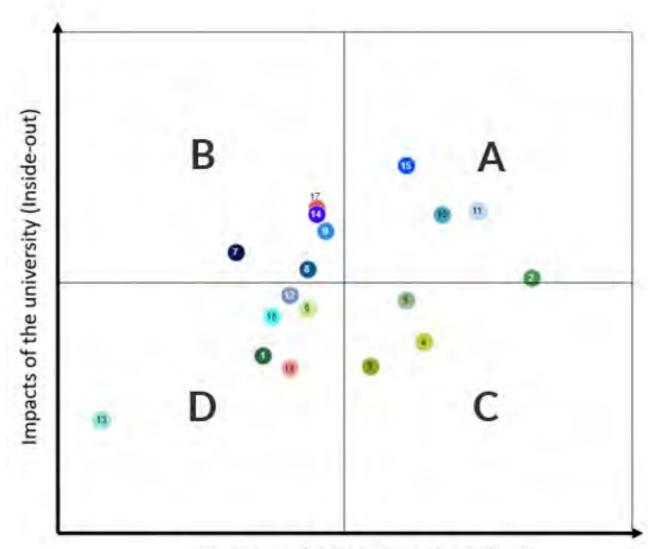
Outward impacts being those impacts that the University creates on the outside world, both positive and negative and inward impacts as those that the outside world exerts on the University in forms such as trends, events, risks, and opportunities.

Quadrant A topics are of the highest priority for the University due to their high assessment for both outward and inward impacts:

- Skills and Human Capital
- Equality, Diversity, and Inclusion
- Health and Wellbeing
- Carbon Emissions

From the ranked 18 sustainability topics we will develop specific ambitions through our sustainability plans.

### **Materiality Matrix**







The sustainability topics are listed and coloured according to their primary dimension: environmental (green), social (blue), economic (red).

### **HEALTH AND WELLBEING**

Ulster University remains steadfast in fostering a healthy, supportive environment that prioritises the physical, mental, and emotional wellbeing of students and staff. This dedication has been widely recognised through awards, initiatives, and ongoing support systems.









The Residential Life team won the Best Student Wellbeing in Accommodation Award at the 2023 Global Student Living Awards for providing 24/7 support, including events, peer assistance, health and safety services, and ensuring a powerful sense of community.

The Student Money Team won 'Team of the Year' at the annual National Association of Student Money Advisers conference. The award recognised the positive impact the team had on students at Ulster and their excellence in working to support and advise students managing their finances.

Ulster University received the Onus Gold Safe Employer Workplace Charter Award

in recognition of our commitment to fostering a safe and supportive environment. We were the first Higher Education Institution in Northern Ireland to gain the White Ribbon Accreditation, and commit to White Ribbon's Listen, Learn and Lead Action Plan.



Gareth Kennedy, Head of Residential Life

This award recognises the quality of the support provided to our students and their wellbeing while living in student accommodation on our campuses.



The Employee Wellbeing team remained dedicated to prioritising staff health and wellbeing delivering health screenings and regular initiatives like Wellbeing Wednesdays which encouraged staff to take meaningful breaks and connect with colleagues.

Ulster University remained committed to promoting awareness of critical health issues and prioritising mental health

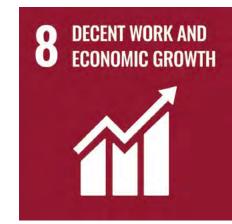
through partnerships with Employee Wellbeing, including a Menopause Awareness workshop on nutrition, lifestyle, and physical activity for World Menopause Day in collaboration with the Women's Network, and mental health awareness training, stress management sessions, self-care activities, on-campus massages and yoga and Pilates classes in partnership with Mindwise.

Through these initiatives, Ulster University continues to champion wellbeing, fostering a thriving, supportive community for all.

### EQUALITY, DIVERSITY, AND INCLUSION

Ulster University remains committed to promoting equality, diversity, and inclusion across its campuses and beyond. Through meaningful initiatives, partnerships, and advocacy, the University continues to foster an inclusive environment where all students and staff feel valued and supported.











The School of Education and the Employability and Graduate Futures Department at Ulster University have both achieved the Athena Swan Bronze Award, reflecting their commitment to gender equality and inclusivity.

The School of Education was recognised for its strong female representation in leadership, with 66% of Professors and Senior Lecturers being women, and its efforts to improve gender balance among staff and students. Meanwhile, the Employability and Graduate Futures Department became the first Careers Service to receive this award, having submitted its application as part of the Athena Swan pilot group. Their initiatives include a robust action plan for gender equality and flexible working policies. These achievements align with Ulster University's broader commitment to gender equality, as seen in its institutional Athena Swan Silver Award earned in 2023 and its ongoing Athena Swan Action Plan for 2024-2029.

A Race Equality Charter Self-Assessment Team was established, which is gathering data on staff and student inequalities as a step towards achieving the Race Equality Charter Bronze Award.

#### **An 'International Diversity Celebration'**

was hosted at the Derry~Londonderry campus celebrating cultural diversity through cuisine, performances, and art from students and local artists. The event fostered unity and cultural awareness, with attendees reflecting on the value of diversity.

Through these initiatives, Ulster University continues to champion equality, diversity, and inclusion, fostering a welcoming and supportive community for all.

Mehvish Ashfaq,
Assistant Director and Head
of Global Opportunities
and Experience

Ulster University is home to students from over 70 countries. Our commitment to diversity and inclusion is a lived experience, where students from every corner of the globe come together to learn, grow, and thrive as global citizens.





### CARBON - OUR PATHWAY TO NET ZERO

Utilising carbon emissions baseline assessment to model pathways to net zero.

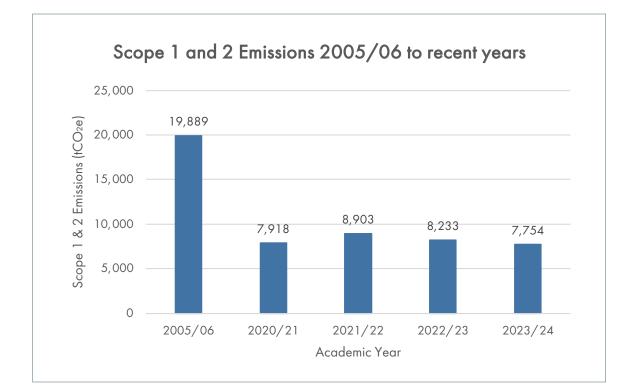






### Measure, reduce, and mitigate our carbon emissions

Ulster University contributes to carbon emissions arising directly and indirectly from its business activities including from campus heating (Scope 1), campus electrical usage (Scope 2) and indirect emissions (Scope 3) from e.g., student and staff commuting and staff business travel, construction, waste, and embedded carbon in purchased goods.



The University has made excellent progress in reducing campus operational carbon emissions (Scopes 1 and 2) to date reducing from 19,889 tCO2e in 2005/06 to 7,754 tCO2e in 2023/24, exceeding the target within its last carbon management plan.

The University has completed a carbon emission **baseline assessment** across all its activities using the 2018/19 academic year and understands its baseline emissions data across Scope 1, 2, and 3 emissions.

The emissions baseline provided the foundation for conducting a **net zero modelling project** which presented a series of decarbonisation pathways to reach net zero with different target dates using a mix of varying investment and project interventions across the University's entire value chain emissions.

In 2023/24 we commenced a campus Net Zero Buildings Project to outline options, costs, and carbon reductions for a representative sample of university building types. This project was used to inform the wider campus decarbonisation masterplan by identifying the suitability of net zero campus projects to be delivered in phases.

In conjunction with these projects, we have implemented a Capital Development and Retrofit Sustainable Design Procedure to provide a consistent approach for ensuring our capital development and retrofit building projects are aligned with the institutional commitment for net zero, delivering buildings free of direct emissions and fossil fuel heating/cooling.



PLANET: CARBON - NET ZERO -----

From the baseline assessment the university has identified the **top three scope 3 emissions** as Purchased Goods and Services including Construction, Staff and Student Commuting, and Business Travel.

- In 2023/24 Ulster University engaged in a Higher Education sector pilot of a **Net Zero Carbon Supplier Tool** which aims to decouple supply chain emissions from expenditure and utilise supplier carbon emissions to calculate scope 3 supply chain emissions. The project is at initial stages with those suppliers that currently hold an existing contract with Ulster invited to submit their scope 1 and 2 emissions data on the tool.
- The University campus Travel Plans outline a range of active and sustainable travel options for commuting to and from campus along with a programme of communications and incentives. In 2023/24 the University commenced a project to develop a consolidated travel plan to cover all campuses together.
- The University understands that emissions from business air travel are greater than emissions from business car travel. In 2023/24 a Sustainable Travel for Business Review Group was established to design a set of business air travel principles to reduce carbon emissions associated with business travel and to review existing business travel policies.







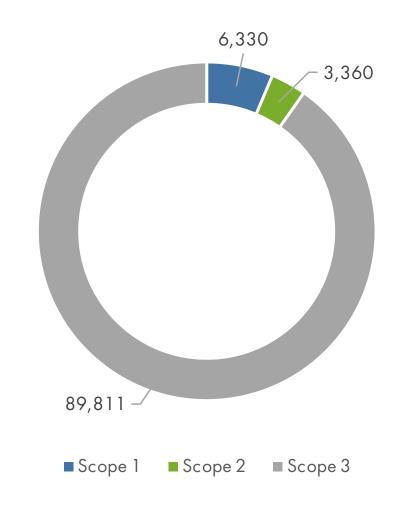




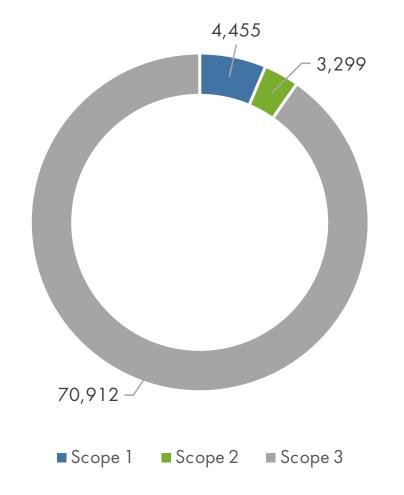
### Carbon Footprint Baseline 2018/19 and Two-Year Trend for Academic Years 2022/23 and 2023/24

- C- · · -		· · · · · · · · · · · · · · · · · · ·	2018/19	2022/23	2023/24
Type of Emissions	Emission Sources		Carbon emissions Tonnes of Carbon equivalent (tCO2e)	Carbon emissions Tonnes of Carbon equivalent (tCO2e)	Carbon emissions Tonnes of Carbon equivalent (tCO2e)
<b>SCOPE 1</b> Direct Emissions from our activities.		GAS AND FUELS Use to heat and operate our buildings.	6,330	4,843	4,455
<b>SCOPE 2</b> Indirect emissions from our electricity use.	<i>77</i>	<b>ELECTRICITY</b> Use for lighting, IT, ventilation, etc.	3,360	3,390	3,299
SCOPE 3 Indirect emissions associated with our activities and supply chain.		STAFF/STUDENT TRAVEL Commuting to campus.	28,319	20,418	20,925
		BUSINESS TRAVEL Air, car, and hotels.	5,237	2,266	2,995
		FUEL AND ENERGY RELATED ACTIVITIES (FERA) Extraction, processing and transport of fuels and electricity to campus.	1,728	1,930	1,848
		TRANSPORT AND DISTRIBUTION Transport, storage and mail services.	378	124	81
		WASTE generated on campus.	97	42	36
	$\Diamond$	WATER consumed.	28	12	11
		GOODS AND SERVICES  Everything we purchase, including for construction.	54,024	42,127	53,819

#### 2018/19 Baseline Carbon Emissions



### 2023/24 Carbon Emissions by Scope



# ENERGY AND WATER - AN EFFICIENT ESTATE AND RENEWABLE ENERGY SOURCES

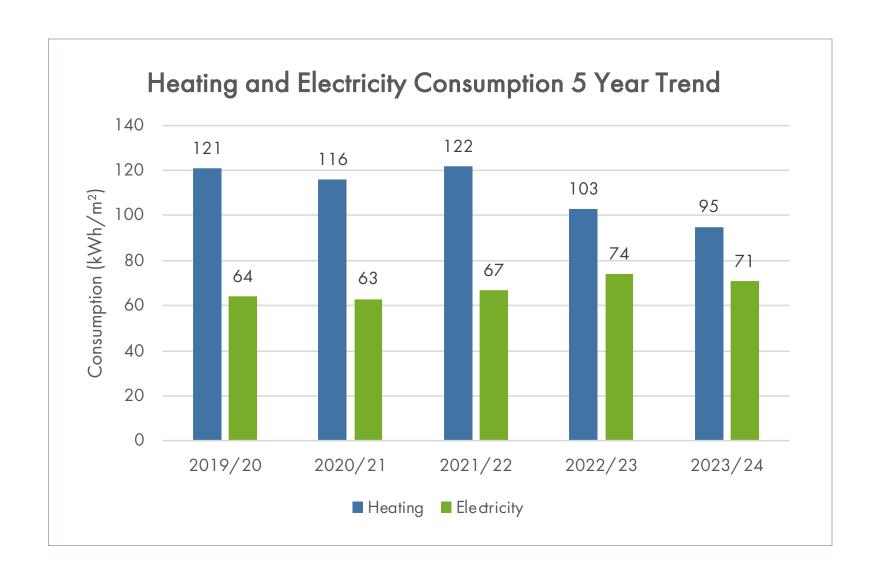


The effective management of energy has been a key strategic objective within the University for many years, having been at the heart of its Estate Strategy for the past two decades.

Energy usage (including electricity and heating) per m<sup>2</sup> for 2023/24 was 166 kWh/m<sup>2</sup>, displaying a decrease of 7% from 2022/23 and a 19% reduction over the past five years. This results in Scope 1 and 2 emissions of 7,754 tCO<sub>2</sub>e, a 5.8% decrease from 2022/23, saving 479 tCO<sub>2</sub>e.

The reduction in gas consumption was driven by energy efficiency measures, such as boiler upgrades and the switch to electric heating for domestic hot water demand during the summer months at the Coleraine campus. This resulted in carbon emission savings of 73 tCO<sub>2</sub>e. We have continued to reduce activity at Jordanstown, leading to a 35% reduction in annual energy intensity to 111 kWh/m<sup>2</sup>.

Electricity consumption reduced by 15% at Jordanstown as non-essential supplies were isolated.



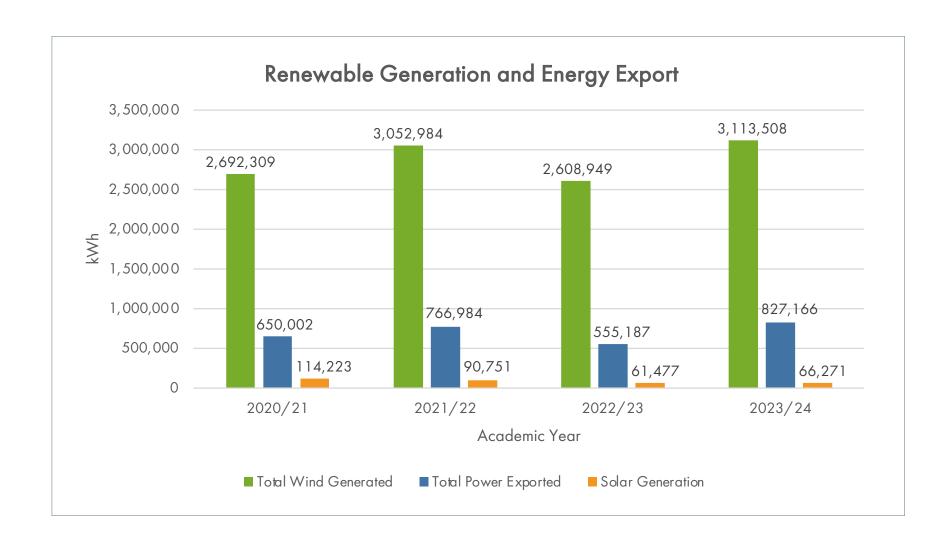






At Coleraine, electricity consumption reduced by 10% due to increased renewable generation and the implementation of several energy efficiency projects including upgrading inefficient boilers and the replacement of an inefficient external air conditioning system at the Riverside Theatre.

Electricity consumption increased by 1% at Derry~Londonderry due to the acquisition of new properties. Energy saving projects completed on campus included boiler replacements and replacements of outdated floodlights with energy efficient LEDs, featuring colour-changing lights to illuminate the building during special events.



### Driving high energy efficiency standards continues to be a key aspect of how we design new buildings and building retrofits.

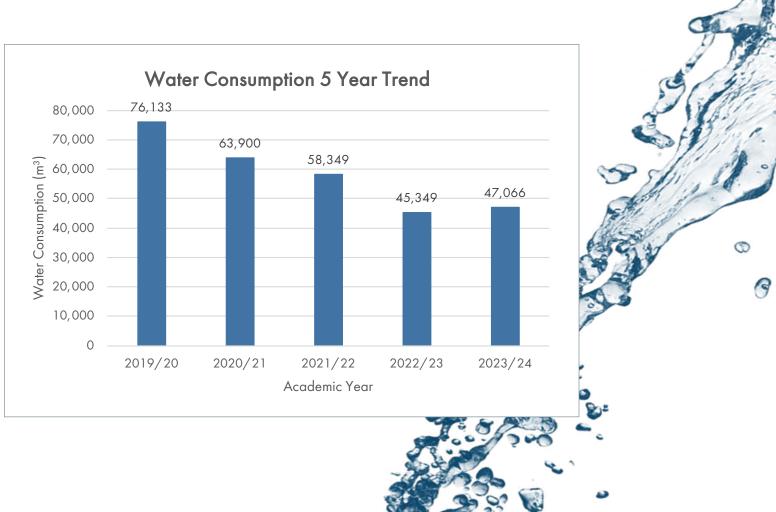
The BC and BD buildings at Belfast received BREEAM Excellent status, an acknowledgement of their exceptional sustainability, energy efficiency, and environmental performance. With an annual energy intensity of 120 kWh/m², they remain the top performing campus buildings.

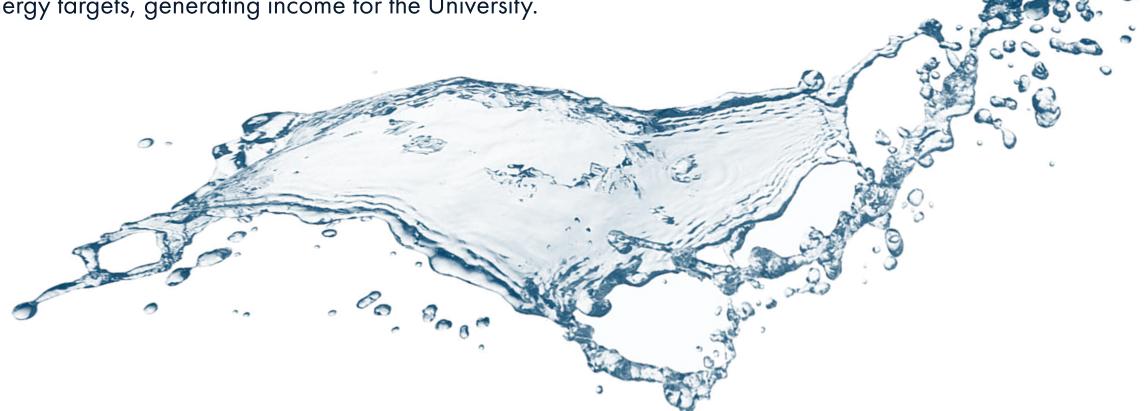
#### **Renewable Energy Generation**

In 2023/24, significant renewable energy was generated across Coleraine and Derry~Londonderry, with a total of 3.18 million kilowatt hours produced—97.9% of which came from wind. Renewable energy accounted for 17.4% of total electricity demand and 43.7% of Coleraine campus' demand. We exported 827,000 kilowatt hours to the grid and claimed 3,180 Renewable Obligation Certificates, which can be traded or sold to electricity suppliers to help them meet renewable energy targets, generating income for the University.

#### **Water Consumption**

Water use at Jordanstown decreased by 45% in 2023/24, due to the reduced activity. Water consumption across the other campuses has remained consistent with 2022/23 levels.





### CIRCULARITY - INCREASE IN RESOURCE EFFICIENCY

We apply circular economy principles that optimise and conserve resource use and minimise waste and environmental impact.

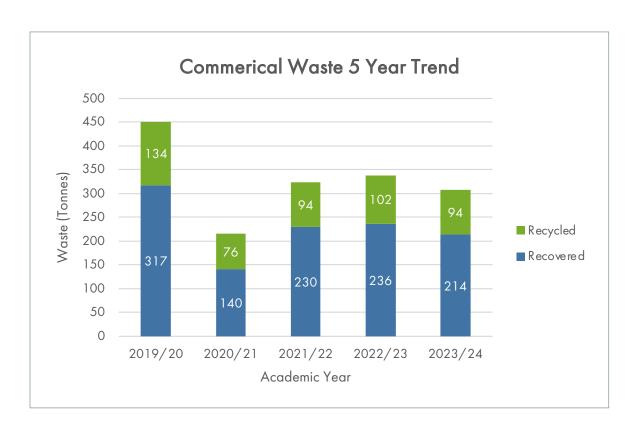


Ulster's total routine office and commercial waste volume in 2023/24 was 308 tonnes. This represents a decrease of 30 tonnes from the previous year. 100% of routine office and commercial waste was recycled or recovered with zero waste to landfill.

### A sustainability initiative at Jordanstown focused on reusing, upcycling, donating, and selling items no longer needed.

Reusable furniture, including over 500 chairs and 100 tables, was donated to charities, and redistributed through Warp It, while remaining items were auctioned by Mid Ulster Auctions.

Collaborating with International Synergies NI Ltd's Resource Matching Service, we diverted waste from landfill, supported the circular economy and ensured responsible disposal of all waste.



We tackled plastic waste and climate change with the installation of an art piece that also functions as a recycling bin at Belfast. In collaboration with Keep Northern Ireland Beautiful and the Department of Agriculture, Environment and Rural Affairs (DAERA), the "Single-Use Plastic Bottle Bin," raises awareness of plastic pollution and promotes recycling. Designed by local artist Peter Lorimer, the 6ft sculpture resembles a soft drink bottle.



The University provides vital research output and learning on the transition to a circular economy. This installation will further improve awareness and encourage action.



Marie-Louise Gaile, Head of Sustainability



### TRAVEL - REDUCE EMISSIONS ASSOCIATED WITH COMMUTING AND BUSINESS TRAVEL







### Sustainable and Active

### Travel to campus

The University have developed and implemented campus Travel Plans which aim to reduce the environmental and neighbourhood impacts of staff and students commuting to campus.

Engagement and collaboration are continuing with external agencies on public transport, walking and cycling improvements to our campuses, including improved pedestrian safety and priority for students and staff accessing the Belfast campus, representation on the Public Transport Taskforce set up by Derry City and Strabane District Council and engaging on the proposed cycleway along the Cromore Road at Coleraine campus.

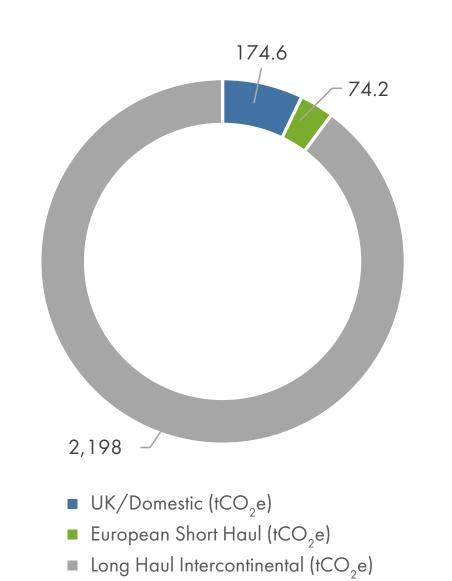
Ulster University topped the leader board in the **Active Travel Challenge**, with over 1,400 journeys logged. Staff were encouraged to walk, cycle, and take public transport during the month of June 2024 with events including cycle rides to and from campus and lunch time walks.

In 2023/24 an Electric Vehicle Infrastructure strategy was developed for Ulster University campuses to consider the electric vehicle infrastructure requirements to support and encourage the transition to electric vehicles. We completed the installation of EV charging units at six locations across the University.

### **Business Air Travel**

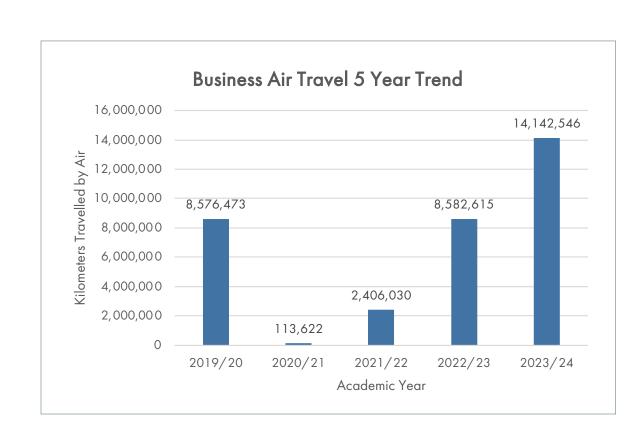
During 2023/24, there were 14, 142, 546 kilometres travelled by air by University representatives for business activities with associated carbon emissions of 2,446 tonnes, a significant increase on the previous year which saw 8,582,615 kilometres travelled and 1,317 tonnes of carbon emissions. 88% of business travel emissions arose from air travel with 90% of air travel emissions from long haul intercontinental flights.

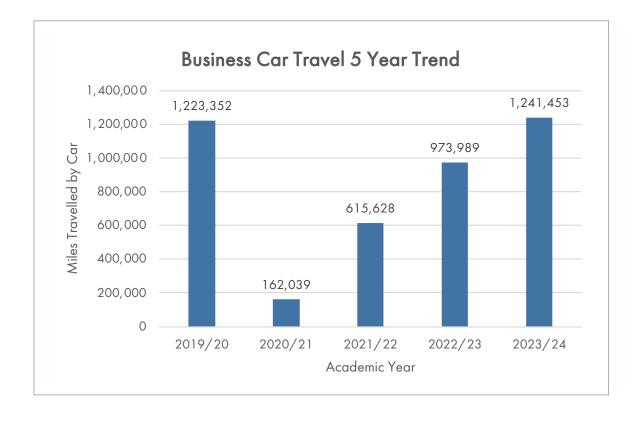
Conducting a comprehensive assessment of business travel would provide an institutional approach to balancing the need to travel for business purposes with the imperative to reduce carbon emissions. An assessment would be cognisant of the geographical challenges associated with travelling to and from Northern Ireland and take into consideration equality and diversity matters and individual staff circumstances associated with a novel approach to business travel.



### **Business Car Travel**

During the reporting year, staff travelled a total of 1,241,453 miles by car on University business, which resulted in approximately 330 tonnes of carbon emissions. This is an additional 267,464 business car miles travelled than the previous year and the third consecutive annual increase since 2020/21, the period during the COVID-19 pandemic.





### NATURE POSITIVE – ENHANCE BIODIVERSITY

Pride in the natural capital of our estate.







Ulster University has made a Nature Positive Pledge through the Nature Positive Universities Alliance which commits the University to start a nature positive journey, incorporating a biodiversity baseline, targets, actions, and annual reporting.

In 2023/24 Natural Capital Solutions Ltd completed a Natural Capital Baseline Assessment and Account for Ulster University's Coleraine campus as part of our nature positive journey.

By understanding how the University makes use of its natural capital assets, decisions can be taken to better manage them and provide the added value to the university, our students, staff, the public, and society. Natural Capital in combination with financial, environmental, and socio-economic information, can reveal the benefits and value of nature to the University and the valuation of the University's (positive and negative) impacts upon it.



The baseline assessment involved evaluating the value of natural resources and ecosystem services on the campus, such as clean air, water, and biodiversity, that support human wellbeing and economic activities and identifying the impact of operations on the environment and identified opportunities to protect, restore, or enhance natural assets.

The project outcomes included the creation of a natural capital baseline assessment, account and a proposed enhancement plan to maintain and increase natural capital.

#### **Baseline Assessment - Habitat**

In the Coleraine baseline the main habitat types are amenity grassland (18%) and improved grassland for agriculture (18%). Woodland covers 21% (13.6ha broadleaved, 10.7ha mixed, 0.3ha coniferous) and built-up areas and infrastructure (buildings, car parks, roads, pavements) also take up a significant area (17%).

The approximate number of trees on the campus is 35,000, is an estimate based on the typical number of trees per hectare from Forestry Commission Forest Yield tables. All the woodland at Coleraine was planted when the campus was created in the 1970's, so was likely to follow standard forest planting practices.



#### Treemap of baseline assessment of habitat distribution at Coleraine campus:

Baseline



Treemap of habitats.
Values shown in hectares (ha).



### Baseline Assessment - Monetary Value

Ecosystem services (environmental benefits) for the Coleraine sites were mapped, quantified, and the monetary value of the ecosystem services estimated.

In total, the baseline value of the benefits delivered by the natural capital assets for the Coleraine campus is £472,000 annually, with a present value of £12.2 million over 50 years.

The highest annual value comes from the amenity value of the trees (£247,000), with a present value over 50 years<sup>1</sup> of £6.0 million. It is followed by recreation (£143,000, PV £3.5 million), health benefits (£42,000, PV £1.5 million) and air quality regulation (£37,000, PV £1.3 million).

Public access-driven services—amenity, recreation, and health—account for the majority of the total value. Recreation and health benefits were calculated based on the estimated number of users of a woodland walk through the campus woodlands. Conservative estimates suggest the true value may be even higher.

The total annual net carbon balance has a negative annual value of minus £35,000, with a negative present value over 50 years of minus £1.2 million. This value is driven by the carbon emissions from the farmland which is higher than the carbon sequestration of the existing woodland.

<sup>1</sup>Present value (PV) is the sum of all benefits delivered over a 50-year period (annual value times 50), discounted to reflect their value today. Discounting

is a standard practice and accounts for the lower value people place on future benefits in comparison to present benefits. Different discount rates (a rate by which future annual benefits are reduced) are used depending on the type of ecosystem service, following standard Government guidance.

Baseline annual monetary value of ecosystem services (£ in thousands)				
Net carbon balance <sup>1</sup>	-35			
Carbon Sequestration	68			
Agricultural emissions <sup>2</sup>	-103			
Air quality regulation	37			
Noise reduction	20			
Timber/woodfuel production	8			
Water flow regulation by woodland	7			
Water quality regulation by woodland	3			
Recreation	143			
Human health benefits from nature	42			
Amenity value	247			
Total	472			

<sup>1</sup>A negative net carbon balance indicates net emissions (overall emissions are greater than overall sequestration), whereas a positive value indicates net sequestration.

<sup>2</sup>The negative value for Coleraine campus is from the operation of the farmland, which is based on the estimated emissions from farming practices, inputs, fuel use, crop residues, and release of gases from agricultural soils, and the high value comes specifically from the use of the anaerobic digester. While anaerobic digestion can be an effective method for breaking down organic matter and harnessing the biogas that comes from this process, it still involves carbon emissions.

The tree assessment identified trees of significance including a 19m tall Copper Beech with a trunk diameter of 1.37m. The tree is estimated to remove 1.3kg of air pollution per year, valued at £44. Annual carbon sequestration is valued at £12. The amenity value is £45,778 and the total carbon storage value is £2,040.

### Proposed Enhancement Plan

The proposed enhancement plan would increase annual and net present values through a variety of enhancement activities, including removal of invasive species, reducing amenity grassland and converting to semi-natural grassland, and planting new hedgerows and trees. Woodland planting could see the largest improvements in increasing carbon sequestration, air quality, and biodiversity and planting along the river could also increase water quality, bank stability, and reduce flood risk.

Other nature-positive activities during 2023/24 included:

- Staff and students planted sunflower seeds at Derry~Londonderry, creating a 'Campus of Hope' in support of the Derry City and Strabane District Council's District of HOPE initiative, promoting optimism, resilience, and progress.
- Earth Day was celebrated with the official opening of the Students' Union 'Wellbeing Garden' at Coleraine campus, encouraging a deeper connection with nature.
- Ambassadors from the One Young World Summit planted wildflower seeds on the Belfast campus, creating a rooftop 'One Young World Garden' to commemorate the Summit's visit to Belfast.



### ENGAGEMENT AND ACCREDITATION -

Promoting and adopting sustainable practices.







Ulster University is a proud participant in the Net Zero Challenge, a cutting-edge digital sustainability platform that empowers students and staff to drive meaningful change. This prestigious initiative incentivises bold action for staff and students; whether mastering carbon literacy, embracing active travel, reducing meat consumption, or tackling litter headon. The community has now delivered over 10,000 impactful sustainability actions, instilling a culture of sustainability.

Ulster University has been awarded the 'Platinum' level in the Business in the Community Environmental Benchmarking Survey, recognising our leadership in sustainability across operations, research, teaching, and community engagement. This achievement reflects our ongoing efforts to reduce our environmental footprint and drive positive change.

In addition, we maintained our ISO 14001 accreditation, the international standard for Environmental Management Systems.

The certification reflects our dedication to improving sustainability practices, reducing waste, and fostering a culture of environmental stewardship. Through intentional engagement with our supply chain the University is empowering local organisations to adopt more sustainable practices, supporting their transition to greener business models.





# PLACE

Our students, graduates and staff all have an impact, both in this place and around the world. We widen minds through teaching, push the boundaries of knowledge through research, and work in partnership to enhance the potential of everyone through education.

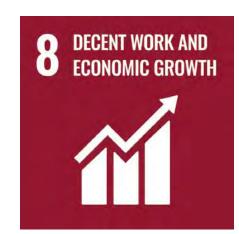


### **TEACHING AND LEARNING**

Ulster University is committed to delivering excellence in teaching and learning, ensuring students receive an education that is innovative, inclusive, and aligned with global sustainability goals.







Ulster University received several accolades for teaching and learning. Ulster was named Best UK University and ranked first for careers services and job prospects in the Student Crowd University Awards 2024. Additionally, the University ranked in the top 10% for student positivity in the National Student







We were delighted that Ulster University was named Training Provider of the Yeara testament to the hard work and partnerships that the university has delivered.



Abbie McKenna,
Head of Centre for Apprenticeships
Skills and Flexible Education

Ulster University began offering Action
Renewables Funded Scholarships to

students studying an MSc in Energy Storage. Action Renewables aims to mitigate the effects of climate change, and this new scholarship is intended to support students in that goal.



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Professor Philip Griffiths, Ulster University Centre for Sustainable Technologies

This scholarship provides a life-changing opportunity to a student and caters to the growing demand for green jobs in Northern Ireland and beyond.

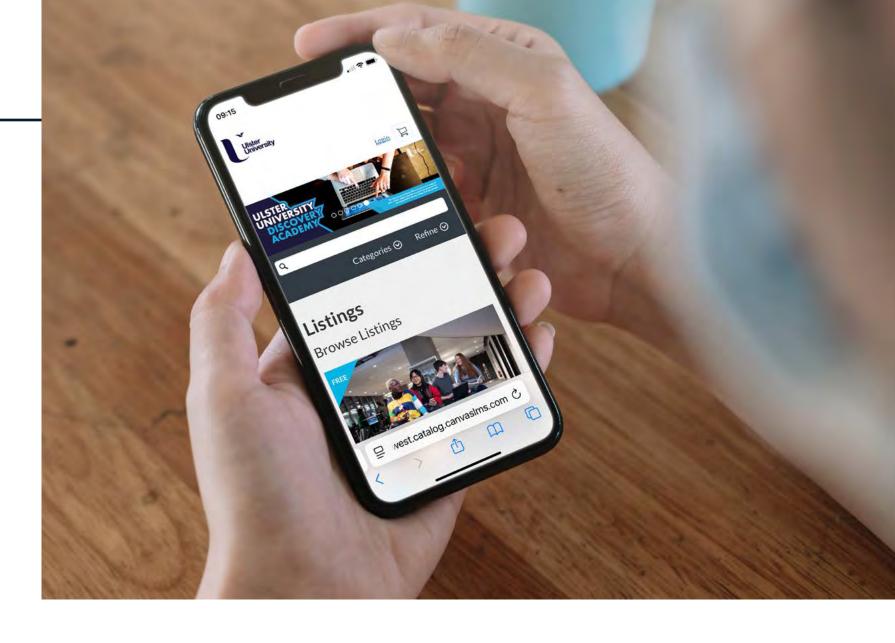








The University received the Responsible **Technology Innovation Award** at the Responsible Business Awards for our Discovery Academy, an innovative Virtual Learning Environment expanding access to higher education. The Discovery Academy removes logistical and socioeconomic barriers, offering free university pathway courses to students.









The Academy allows young people to catalyse their potential, equips them to make their personal impact on the world, widen their horizons, raise their aspirations, remove barriers, and improve their future employment prospects.

Professor Ruth Fee, Dean of Flexible Education and Widening Participation



Ulster University Business School and PwC Operate were honoured with the Business and Academic Partnership Award in the 2024 Learning Excellence Awards.

This award reflects a shared commitment to education, research, innovation, and employability.

Associate Dean (Development and Partnerships – Domestic)

PLACE: TEACHING AND LEARNING 2

The University received two national teaching excellence awards: a Senior Lecturer from the Department of Management, Leadership and Marketing received a National Teaching Fellowship for his work on inclusive employability development. Additionally, the Person-centred Collaborative Operational Group, a formal collaborative focused on advancing knowledge, skills, and expertise in personcentred practice, won the Collaborative Award for Teaching Excellence.





Let us strive for a brighter future, where every learner thrives regardless of their background or abilities.



**Dr Paul Joseph-Richard,**Senior Lecturer in Human
Resource Management

The Academy Restaurant, part of the Ulster University Business School (UUBS), became the first restaurant in the UK and Ireland to receive the Green Key certificate. This recognition highlights the Academy's commitment to sustainability and environmental stewardship. The restaurant prioritises the use of locally sourced, seasonal ingredients and emphasises sustainability in its operations, aligning with the University's broader sustainability goals.

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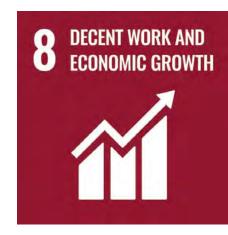
**Lisa Kennedy,**Business Manager at Academy

The Green Key Certificate is a key indicator of our commitment to embedding sustainable practices and providing the future of hospitality with the knowledge to implement them.







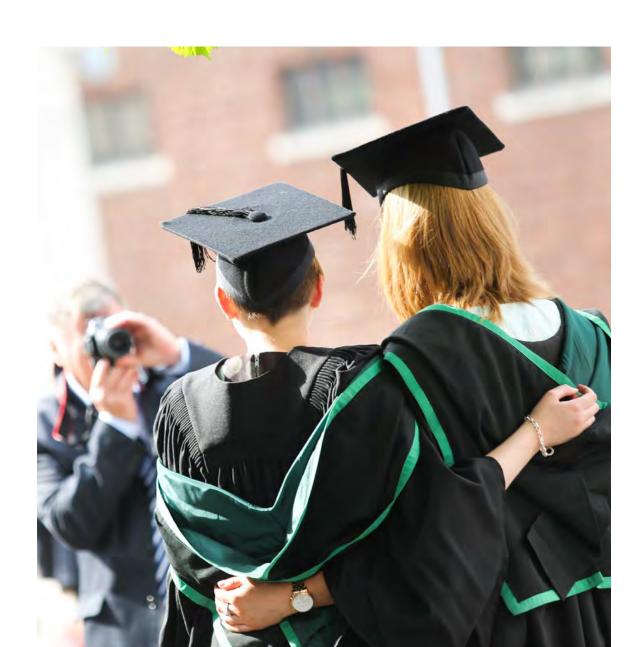


We commemorated the graduation of the first cohort from The Community Scholarship Programme this year. The

Community Scholarship Programme, launched in 2021, removes financial barriers by covering tuition fees for students who may otherwise be unable to attend university through support from local businesses across Northern Ireland.

We celebrated **50 years of delivering Community Youth Work programs**,

equipping students with the qualifications necessary for professional careers in youth work. This milestone reflects the University's long-standing commitment to fostering positive social change.





The Educational Alliance for Research in Sustainability project assessed sustainability education's effectiveness in **preparing students** for green frameworks and the UN's Sustainable Development Goals. Running from January to March 2024, the project informed new postgraduate sustainable business programmes and established an international forum for ongoing collaboration.

The Women's Network and UUBS hosted an International Women's Day event at the Belfast campus. The event featured a Professor of Women's Studies from the Transitional Justice Institute as the keynote speaker, who discussed the need for greater inclusion for women.

Through these efforts, Ulster University continues to enhance teaching and learning, ensuring that students are well-equipped with the skills, knowledge, and values necessary to create a sustainable and inclusive future.



Amanda Calderwood, PhD Researcher

Our voices matter, and we don't need permission to use them. This emphasises the strength of community, the value of inclusivity, and the ongoing fight for gender equality.



### RESEARCH

Ulster University remains at the forefront of research excellence, pioneering innovative projects that address critical global challenges. Through innovative studies and impactful collaborations, the University continues to drive progress in fields ranging from environmental sustainability to public health and social justice.





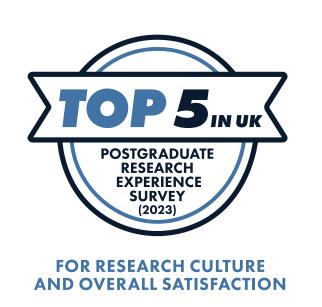














We pride ourselves in creating a vibrant research environment and supportive culture, equipping researchers with collaborative skills and the knowledge needed to excel in their future careers.

**Professor Sonja McIlfatrick,**Dean of the Doctoral College



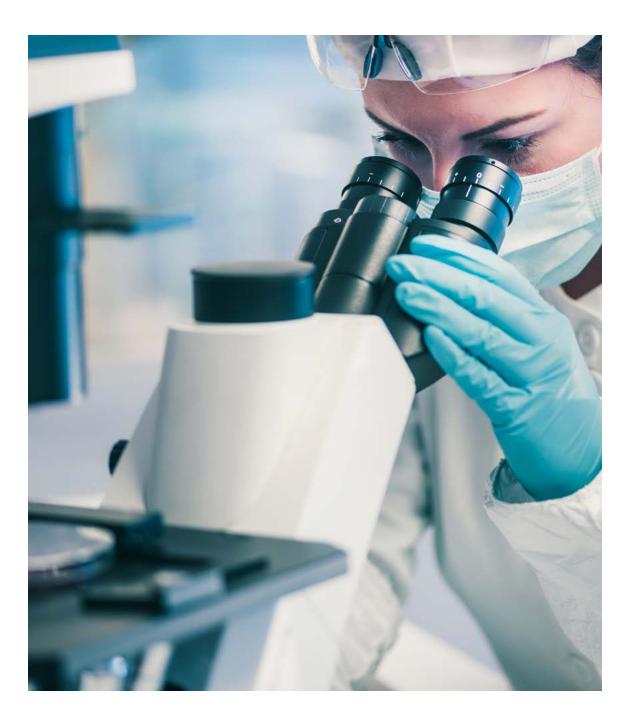




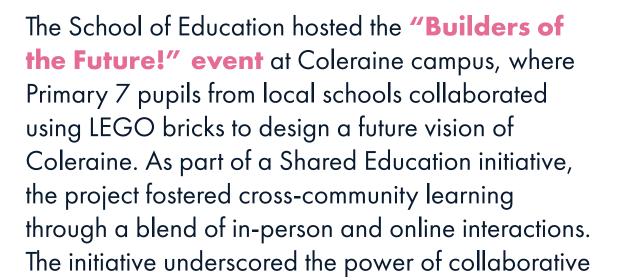








A graduate and team from Ulster University won the Pollution Mitigation Initiative of the Year Award at the 2023 UK Water Industry Awards for their research on an innovative treatment method to remove antibiotics from wastewater. This work addresses antimicrobial resistance, a major global health challenge, and shows potential as a sustainable, affordable solution to combat antibiotic resistance.



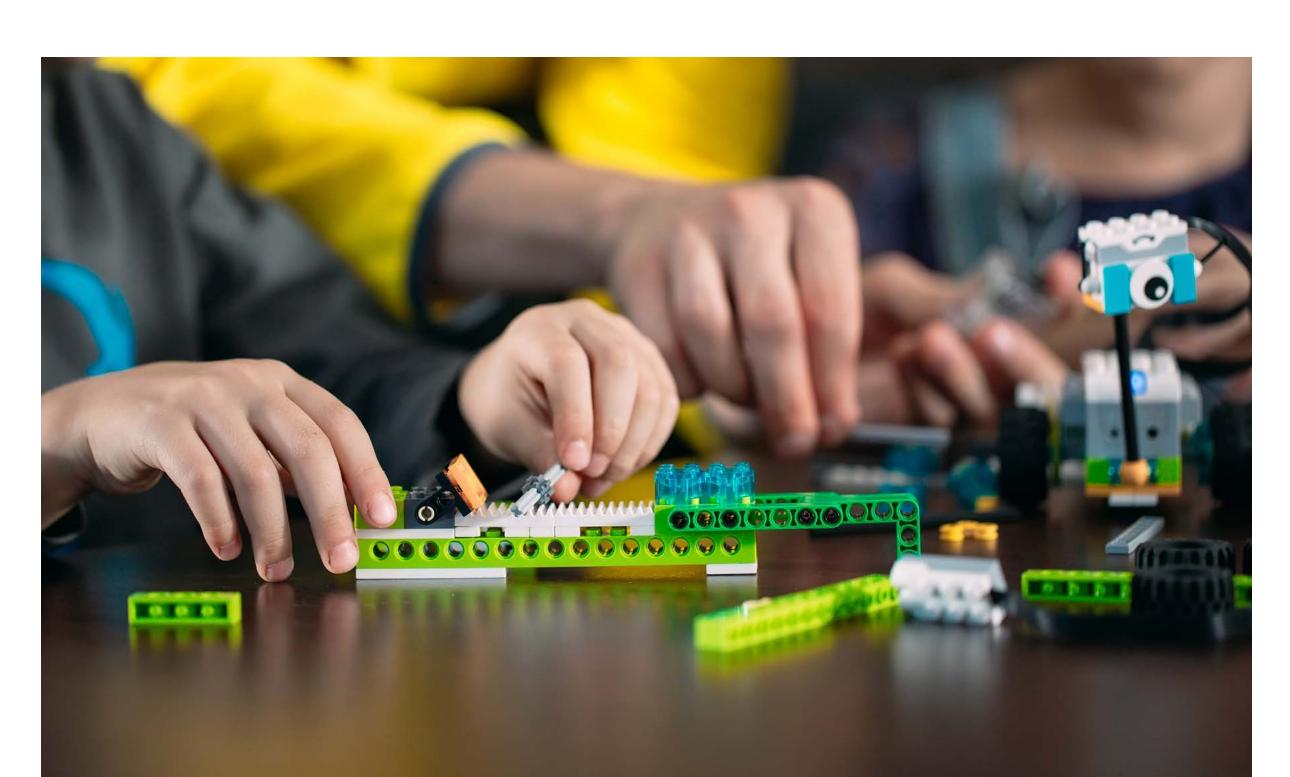
learning in strengthening community ties.



Professor Roger Austin,
Emeritus Professor of Education

The process of working together in cross-community teams encouraged the two classes to consider how to create a welcoming place for everyone.







Ulster University were a part of a consortium awarded £6.5 million to establish the 'Land Use for Net Zero' Hub, aimed at bridging science and policy to achieve net zero by 2050. Co-led by The James Hutton Institute and the University of Leicester, the hub will provide governments with evidence on land use, including renewable energy, soil carbon, and green finance.



We are thrilled that Ulster
University will play a role in
influencing policy on the road
to Net Zero by addressing
issues and making use of our
expertise in data science,
artificial intelligence, soil
carbon, and renewable energy.



Professor Jim Harkin,
Head of the School of Computing,
Engineering, and Intelligent Systems

The University launched a project to harness
Northern Ireland's untapped geothermal
energy for industrial use. In partnership
with Causeway GT, Atlantic Hub and Enisca
and funded by Invest NI, the initiative explored
geothermal potential alongside wind and solar
energy, assessing distribution, harvesting, and
policy needs for sustainable development.

The School of Psychology is part of a £8.23 million Economic and Social Research Council-funded research team establishing the Centre for Early Mathematics

Learning. The centre aims to close the numeracy gap, especially for disadvantaged children, and address learning setbacks worsened by COVID-19. The research explores cognitive, social, and environmental influences on maths learning to drive impactful educational change.

Ulster University is part of a £21.3 million UK research partnership to decarbonise the maritime sector. The HySAFER centre in Northern Ireland will receive £630,000 to focus on marine fuel storage, safety, and explosion-free self-venting fuel tanks. The UK-MaRes Hub aims to reduce maritime emissions while exploring economic and social benefits.





An Ulster University study, funded by DAERA, mapped 193 years of coastal change in Northern Ireland using historical maps, aerial photos, and LiDAR surveys. The research identified key erosion and land advancements, influenced by both natural and human factors. The findings will support coastal management, with data accessible via the Northern Ireland Coastal Observatory.

Ulster University's SPIRE 2 project acquired an electric vehicle to support essential research that aims to tackle the identified challenges and better inform policymakers and stakeholders and give direction to further research on the impact of electric vehicles on existing power distribution networks.



Ulster University is conducting world leading research that will change the way individuals, and businesses, use energy in the future.

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Professor Neil Hewitt,
Professor of Energy and Director of
Centre for Sustainable Technologies

Ulster University unveiled a new Research and Innovation strategy to increase the excellence, intensity, and value of research and impact. The strategy is focused on the development of the research community and culture, providing a supportive environment for all our researchers and investing in infrastructure.

It aims to focus on contribution to global challenges such as climate change, inequality, and social deprivation and ensure research aligns to societal needs – both locally, on the Island of Ireland and on a global scale.

The research initiatives and collaborations at the University drive meaningful change, addressing societal challenges and fostering a culture of innovation. Through these projects, the University continues to enhance knowledge, improve lives, and contribute to a sustainable future for all.



PARTNERSHIPS

Ulster University continues to make significant contributions toward sustainability, equality, and impactful research, aligning with the United Nations Sustainable Development Goals. Through partnerships, innovative initiatives, and expert leadership, the University is fostering a future that prioritises sustainability, inclusion, and global collaboration.



### **INDUSTRY AND GOVERNMENT**







The University secured £4.625 million in funding from the Arts and Humanities Research Council for the 'Future Island-Island' project, one of the UK's four new Green Transition Ecosystems, in partnership with Queen's University Belfast. Focused on reducing plastic pollution, upcycling waste, and improving waste management, the project engages local communities, including Rathlin Island, to support its Net Zero 2030 strategy.



Northern Ireland's first Ending Violence
Against Women and Girls Strategic
Framework in collaboration with government
and societal representatives. The Framework
addresses the root causes of gender-based violence,
informed by university-led research. Academics
contributed to 'Every Voice Matters! Violence
Against Women in Northern Ireland' and 'It's Just
What Happens,' which surveyed girls aged 1217 on their experiences of violence. Additionally,
Ulster researchers shaped the strategy through
their work on 'Unseen at Uni,' a report on sexual
violence among students in Northern Ireland.



**Dr Susan Lagdon,**Lecturer at the School of Psychology

We have a duty of care to ensure that this issue no longer remains behind closed doors nor the repeat item on the agenda for change.



UUBS hosted the **Principles for Responsible Management Education Launch Event,** 

marking its commitment to embedding sustainability in business education and research and positioning itself as a leader in responsible management education. The event focused on practical strategies for integrating sustainability into courses while celebrating the contributions of local businesses, signalling the start of a transformative journey to shape future business leaders with a strong commitment to sustainability.



PARTNERSHIPS: INDUSTRY AND GOVERNMEN'









Ulster University launched the **BRAVE** (Bold, Resilient, Authentic, Versatile and Empowering) Women in STEM programme, funded by the Department for the Economy, to equip women in STEM with the skills, knowledge, and mentorship needed for leadership roles. Addressing the underrepresentation of women in STEM leadership, the programme tackles key challenges and biases while fostering a supportive network.

A partnership between a Professor of Data Analytics, Research Director from the School of Computing and Horrible Brands has led to the development of Klimeo, an innovative Net Zero software by Aethergy. This groundbreaking project helps companies quantify and track their climate impact, providing Al-augmented analysis for actionable insights into their environmental footprints.





We are pleased to be working towards Net Zero and sustainability, making a mark on the global initiatives.











A panel discussion, 'The E-waste Problem:
Conversations Across Academia and
Industry,' was held in the Belfast campus,
focusing on sustainability and electronic waste
(e-waste) management. The event brought
together experts from both academia and industry
to explore innovative solutions to e-waste,
emphasising the importance of interdisciplinary
collaboration in tackling this complex issue.

The Dean of Sustainability and Corporate Social Responsibility has been appointed to the Board of Trustees of the Environmental Association of Universities and Colleges (EAUC). The EAUC is the UK and Ireland's leading sustainability body for higher education, helping shape sustainability policies and ensure regulatory compliance. This appointment underscores Ulster's commitment to embedding sustainability across its operations.



As the world grapples with the environmental consequences of digital and electronic-enabled life, such cross-sectoral conversations are crucial in driving sustainable change.





This is a great opportunity to contribute to the national debate on sustainability, develop climate action agendas across the UK, Ireland, and beyond, alongside enriching our own University towards a sustainable future for all.

An Academic from the School of Psychology has joined the Department of Health's Steering Group to help advance student mental health strategies within the Mental Health Strategy 2021-31.

Faculty members have actively engaged in addressing the Lough Neagh algae crisis, contributing to Climate NI's Steering Group, and speaking at the Islands in Climate Crisis conference, underscoring the University's leadership in tackling environmental challenges.

Through these diverse initiatives and collaborations, Ulster University exemplifies its commitment to creating a sustainable, inclusive, and impactful future, reinforcing its role as a leader in addressing global challenges.





### COMMUNITY

Ulster University has been deeply committed to fostering positive social, environmental, and educational change, contributing to a variety of global goals through its numerous initiatives. These activities cover a broad range of sectors, from improving mental health and empowering women, to supporting sustainability and addressing social inequalities.













Ulster University was awarded joint fifth position in the world for outreach in the Times Higher Education Impact Ranking,

in recognition of our extensive, ongoing outreach activities, and follows the Heist Gold Award in 2023 for Best Community Outreach in the UK. The University delivers a variety of initiatives, such as sports programmes promoting physical activity among underprivileged groups and schemes supporting disadvantaged young men, at-risk youths, and individuals with mild to moderate intellectual or physical disabilities.



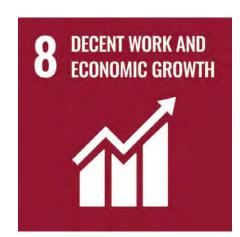
Sustainability plays a critical role in everything we do as custodians of the future. We aim to contribute meaningfully towards a sustainable planet, sustainable local regions, sustainable academic disciplines, and this recognition reflects our commitments.















The University's Dean of Sustainability and Corporate Social Responsibility was invited to take the role of Chair of the Derry City and Strabane District Council Sustainability and Climate Commission, which aims to achieve a sustainable, net zero, and climate resilient City and District.

We promoted community engagement through our Library Civic Access Borrower Scheme, enhancing public access to educational resources in partnership with Libraries NI. Additionally, we contributed to the launch of EPIC Futures NI, a £4.8 million initiative focused on tackling economic inactivity and promoting fair, meaningful employment opportunities.



We seek to challenge economic inactivity in Northern Ireland by removing the barriers that people face to fair and meaningful employment.



#### Professor Kristel Miller,

Co-Director of the Epic Futures NI and Professor of Entrepreneurship and Small Business Development





UUBS launched the Centre for Sustainable
Family Enterprise at the Family Business
Conference, hosted by the Northern Ireland Family
Business Forum in partnership with Harbinson
Mulholland. The Centre aims to empower Northern
Ireland's family businesses by offering resources,
research, and education for long-term success,
positioning itself as a leading hub for family firms
and transgenerational entrepreneurship in the region.

We hosted the 'Women of the World' (WOW) bus, where 40 young women took part in a workshop focused on building resilience, wellbeing, and mental health. In partnership with the WOW Foundation, the workshop provided valuable tools and skills to support mental wellbeing, while fostering a supportive environment that emphasised the importance of empowering women in leadership roles.









### In partnership with local schools, we provided valuable learning experiences for students and teachers.

- The School of Pharmacy and Pharmaceutical Sciences hosted post-primary teachers from across Northern Ireland, equipping them with strategies to enhance A-level curriculum delivery.
- The School of Geography and Environmental Sciences led an outreach event on sustainable solutions such as solar PV, wind, and geothermal energy for schools.
- The School of Sport welcomed 180 pupils to the Belfast and Derry~Londonderry campuses for the British Association of Sport and Exercise Sciences Outreach Hub, offering workshops on mental preparation, exercise, and nutrition.
- The SistersIN event, in collaboration with the School of Nursing and Paramedic Science and the School of Medicine, connected sixthform girls with female healthcare leaders, fostering confidence and career aspirations.
- An Inter-Professional Education Day at Derry~Londonderry welcomed 80 pupils from local schools, displaying the collaborative nature of health-related degrees through practical workshops in medicine, nursing, paramedic science, social work, sport, and occupational therapy.

- School pupils explored hands-on experiments in the Built Environment laboratories at the Belfast campus.
- The School of Education celebrated World Oceans Day with a three-day STEM event, including a two-day CPD course for 25 primary school teachers on human nutrition and sustainable development. The event also featured the 'Bring Your Grown-up' programme, which engaged 40 adults and 40 children from schools in Derry~Londonderry and the Causeway Coast.

Our commitment to social responsibility was displayed through various charitable initiatives, including a 'Boycott Your Bed' event, which raised over £2,000 for Action for Children, a cycle event supporting Mission Christmas provided gifts for disadvantaged children, the Women's Network raised awareness and funds for White Ribbon NI, the Development and Alumni Relations Office raised £550 for the 'Mind Your Mood' campaign for student mental health through graduation flower sales, and the Belfast campus hosted the 'Art for Life' Charity Exhibition and Art Sale, raising over £6,000 for 'Ukrainians in Northern Ireland,' funding a fully equipped ambulance which was sent to Ukraine.

The University further contributed to public health awareness, supporting initiatives such as Vascular Disease Awareness Week, World Diabetes Day, and the Restart a Heart event, which increased awareness of cardiac arrest and the importance of CPR. Every year, an alliance of partners all over the world come together to promote Restart a Heart, by organising and facilitating training events and by providing opportunities for people to learn CPR and defibrillation digitally in the safety and comfort of their workplaces or in their own homes.



# HOW TO GET INOLVED

We all have a role to play in managing our impact and creating a sustainable University.

Collectively all of our small steps add up to a significant group of actions.

During the next academic year there will be more opportunities for all University staff, students, and stakeholders to get involved as we increase engagement activities and further progress actions towards delivering on sustainability.

### Get involved and find out more:



ulster.ac.uk/sustainability



sustainability@ulster.ac.uk

