

Travel Survey 2024 Report

Introduction

Sustainable travel planning at University of Birmingham began in 2008. From the very beginning, understanding how our community commutes has been essential to our plans.

With the University having more ambitious sustainability goals than ever before, our biennial travel survey has never been more important. It's a chance for University staff and students to tell us how they travel, and provide crucial feedback to help us make sustainable travel even more accessible.

The 2024 Travel Survey is the seventh survey we've undertaken – and it had two main functions: to gauge current commuting behaviours and to guide our future work to enable and encourage sustainable choices.

Engagement with the survey was excellent, with over **6,000 responses** split equally across staff and students. We reached over **one in four staff** and over **3,000 students**.

Category	Count	Response rate
Undergraduates	2,145	8.8%
Postgraduates	1,106	8.2%
Academic and other related staff	1,909	28.4%
Professional Services staff	783	31.5%
Other	33	-
Not specified	38	-
Grand total	6,014	12.6%

The results are summarised in four sections:

- 1 How does the University of Birmingham community commute in 2024/25?
- 2 Mapping University of Birmingham commuting
- 3 What would enable staff students to choose sustainable travel?
- 4 Evaluating sustainability at University of Birmingham

Sustainable travel at University of Birmingham

Over the past 17 years, the sustainable travel plan for commuting has developed to include a wide range of programmes and measures. It is a team effort: some measures are delivered by partner departments, such as Payroll and Security Services, and the University enjoys a productive relationship with National Express West Midlands and Transport for West Midlands.

Headlines of the current plan include:

- New 20% discount for student monthly and four-week bus passes.
- Support for an independent bike repair shop on campus.
- Ultra-low emissions vehicle (ULEV) lease scheme via salary sacrifice.
- Student hire bike scheme.
- Supported 25% discounts on staff bus passes.
- Free D-locks for student cyclists.
- Interest-free loans for staff train tickets
- Cycle-to-Work scheme capped at £4,000, and a gateway staff loan bike scheme.
- Travel advice on the staff and student intranet, via email, and at key welcome and induction events.

You can read more about these initiatives on our <u>sustainable travel SharePoint pages</u> and through the <u>student intranet</u>.



Travel Survey 2024



responses from staff and students

Commuting accounts for

tonnes carbon emissions:

48% Solo car

25%

19%

Train

Percentage of the University's total emissions

45% prioritise action on public transport costs



You said, we did

We've already introduced discounted student monthly and four-week bus passes



90% of students on campus on average weekday





Students commute further 8.3km (2024) vs 7.0km (2022)

16.0km average staff commute







3.3km average cycling commute

Priorities for cyclists:



Safer roads

Cycle storage on campus





Over **19,000** people walk to campus every day

Average walking distances to campus:



Students 1.1km

Staff 2.1km





University community travel by train

 \odot up 2.0% from 2022

19.2% train

Student rail and bus journeys are at an all-time high

18.8% bus



Bus journeys up to

17.0% from 12.7% (2022)



The number of students travelling by bus has more than doubled since 2018



4.0% fall in staff solo car journeys since 2022



Solo car journeys account for $4x\ more$ CO, emissions than train journeys

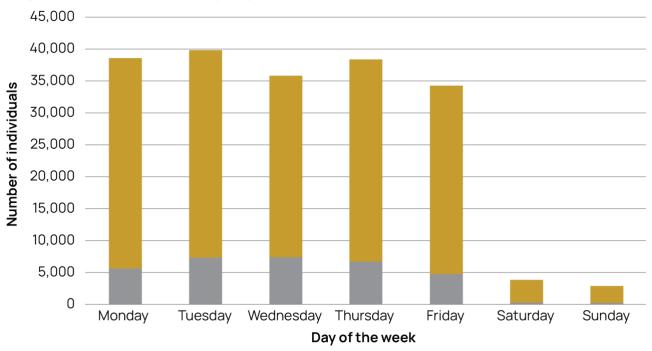
◆ 4.4% students drive - lowest rate ever

How does the University of Birmingham community commute in 2024/25?

Presence and work patterns

Work patterns and presence on site have been broadly stable since the last survey in 2022, when post-pandemic behaviours and practices were crystallising. The average staff member still works on campus, or at another University site, three and a half days per week – as in 2022. The most common weekly patterns on site are three days (over one in three staff), followed by five days (one in four staff). Students use campus facilities more regularly: 90% are on site at some point during a normal weekday, as was the case in 2022, and just under one in ten are on-site over the weekend.

Projected numbers at UoB by day



	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday
Students	32,509	32,727	28,627	31,783	29,654	3,519	2,626
Staff	6,114	7,204	7,317	6,633	4,710	197	129

Modes of transport

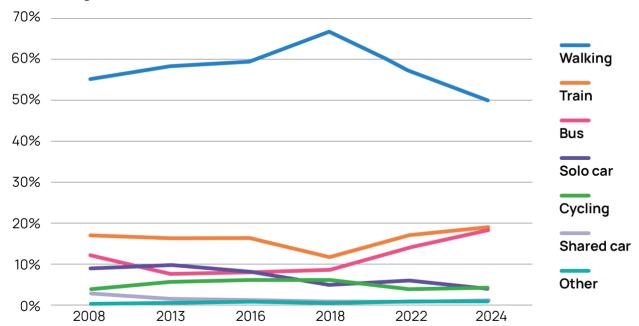
The main modes of transport chosen by the University community have seen some major changes in the past two years. Walking remains by far the most popular mode of transport. Nearly 20,000 staff and students walk, whilst almost all others will complete their journey on foot from University Station, a bus stop, or a car park, which underlines that we are, first and foremost, a community that walks.

Mode of transport	Numbers using (2024)	2024	2022
Walking	19,393	40.9%	46.9%
Train	9,722	20.2%	18.2%
Bus	8,057	17.0%	12.7%
Car as a single occupant	5,244	10.6%	12.7%
Shared car journey	1,426	2.9%	2.3%
Bicycle	2,511	5.2%	5.8%
Remote work / study	898	1.9%	-
Other	642	1.3%	1.3%
Grand total	47,894	100.0%	100.0%

The 2024 survey also showed that the University community is commuting by public transport in ever-greater numbers – a trend first seen in 2022. Major changes in student commuting primarily drive the trend, but the number of staff on public transport has increased moderately too. Both rail and bus journeys are at an all-time high for students since our first survey in 2008, with **19.2% using the train and 18.8% using the bus**. In 2018, only **8.7% took the bus**; student usage has more than doubled in six years.

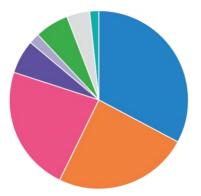
Student car driving is at the lowest it's ever been at 4.4%. However, there has been a drop in the number of students who walk to campus, with the proportion who commute on foot below 50% for the first time. Changes that might account for this, such as living location and longer commute distances, are discussed later in this report.

Main transport mode over time: all students



Main travel modes

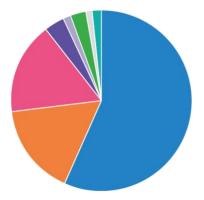
Postgraduate students



- Walking 32.9%
- Train 24.3%
- **Bus** 22.9%
- Car as a single occupant 6.2%
- Shared car journey 1.8%
- **Bicycle** 6.2%
- Remote work / study 4.2%
- Other 1.4%

Main travel modes

Undergraduate students



- Walking 56.8%
- Train 16.3%
- **Bus** 16.6%
- Car as a single occupant 3.4%
- Shared car journey 1.4%
- Bicycle 2.9%
- Remote work / study 1.1%
- Other 1.5%

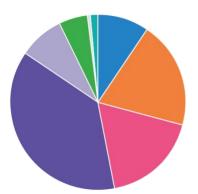
Postgraduate and undergraduate students still show significant differences as commuter populations. Postgraduates rely comparatively more heavily on public transport, with nearly half taking the bus or train. Only a third walk. Those proportions are broadly reversed for undergraduates, with a heavier weighting on walking.

Staff solo car journeys have fallen 4.0% (to 36.0%) from 2022, when journeys were at an all-time high of 40% following the pandemic. Car sharing (8.4%), bus travel (9.4%), train travel (24.5%) and walking (10.6%) are all significantly more common amongst staff, rising between 0.5% and 1.5% each – a significant slice of these relatively minor transport modes.

There is a pronounced difference between Professional Services (Grades 2-5) and academic and other related (grade 6 and above) staff members' commuting choices compared to 2022 – when the only major point of difference was in the relative weight of bus and bicycle travel, which were almost exactly reversed. In 2024, the major discrepancies were: solo car usage is two points higher for Professional Services staff; the rate of bus patronage is nearly triple amongst Professional Services; and, whilst over a quarter of academic and other related staff take the train, under a fifth of Professional Services staff do.

Main travel modes

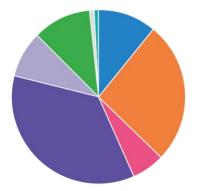
Professional Services staff



- Walking 9.5%
- **Train** 19.7%
- **Bus** 17.9%
- Car as a single occupant 37.6%
- Shared car journey 8.3%
- Bicycle 5.1%
- Remote work / study 0.6%
- Other 1.3%

Main travel modes

AOR staff



- Walking 11.0%
- Train 26.3%
- **Bus** 6.2%
- Car as a single occupant 35.5%
- Shared car journey 8.5%
- Bicycle 11.1%
- Remote work / study 0.6%
- Other 0.8%

The average crow-flies commuting distance is 8.3km (+1.3 km vs. 2022) for students and 16km for staff (unchanged from 2022). As expected, the average commute distances by transport mode varies considerably. Rail journeys tend to be long distance, averaging 25km for students and 29km for staff.

Solo car journeys are a long-distance option for students at 26.2km on average, but an all-round option for staff. A staff member's average solo car commute is 18.2km, closer to the average commute across all modes, but the slight rise since 2022 suggests that some staff members closer to campus have changed how they commute. Cycling commutes average 3.3km. On average, staff walk significantly further (2.1km) than students (1.1km).

Commuting is responsible for over 11,000 tonnes of carbon dioxide emissions, at a conservative estimate: 48% from solo car journeys, 25% from train journeys, and 19% from bus journeys. Proportionally, as well as in absolute terms, solo car journeys are the most polluting. The average emissions per kilometre per person when driving a car alone is four times greater than by train and 1.7 times greater than by bus.

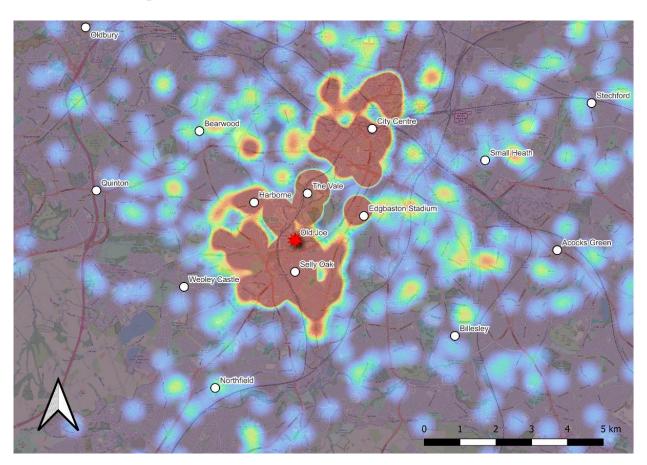
Mode of transport	Annual carbon emissions (t)	Average distance (km)	Annual carbon emissions per commuter (t)	Annual carbon emissions (%)
Car as a single occupant	5,456	19.2	1.16	48%
Shared car journey	809	9.2	0.66	7%
Train	2,826	26.9	0.30	25%
Bus	2,140	5.5	0.28	19%
Bicycle	0	3.8	0.00	0%
Other	97	16.4	0.17	1%
Walking	0	1.5	0.00	0%
Grand Total	11,329	11.7	0.25	100%

Mapping University of Birmingham commuting

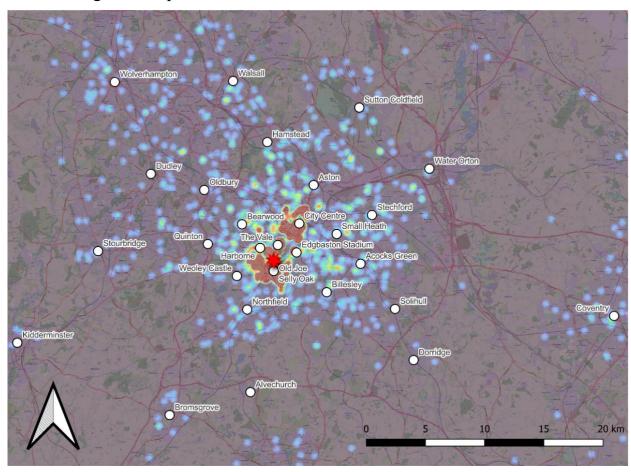
For the 2024 edition of the travel survey, we have produced heatmaps of where our community's commutes start from. Students are densely concentrated immediately around our Edgbaston campus in the neighbourhoods of Selly Oak, Weoley Castle, Harborne and the city centre. Many students commute from further afield across the West Midlands region and beyond.

Staff are more scattered, with high concentrations in south Birmingham suburbs and lower numbers across the wider region. Hot spots indicate the value of public transport infrastructure, such as the cross-city line for connecting places like Sutton and Bromsgrove to University of Birmingham.

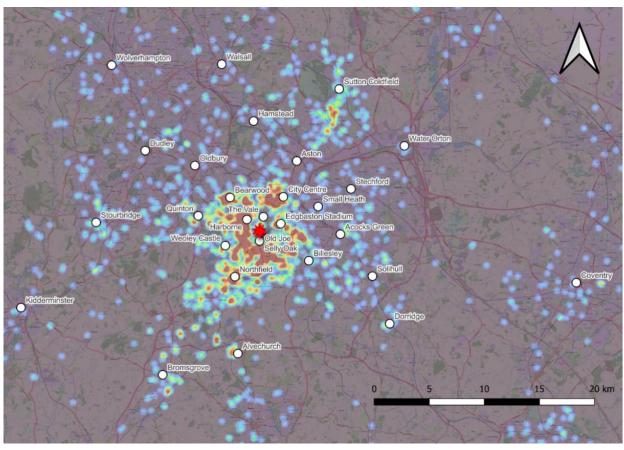
Students local map



Students regional map



Staff regional map

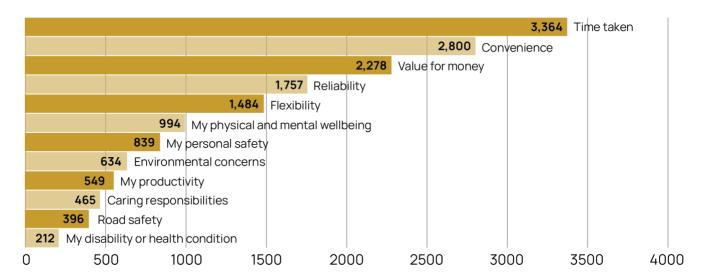


Enabling and encouraging sustainable travel

Commuting needs

Respondents were asked to pick three factors that decide how they commute. The most popular factors show a similar profile across different segments of the Univeristy population. At the top end, time, convenience and value for money decide whether a commute works for a member of our community. Mapping analysis has shown that journeys by bus and train are generally slower than by car, so there is an uphill challenge there. These priorities are virtually identical to 2022, save for the promotion of caring responsibilities, which featured as an option for the first time in 2024.

Factors affecting commuting choices – all respondents



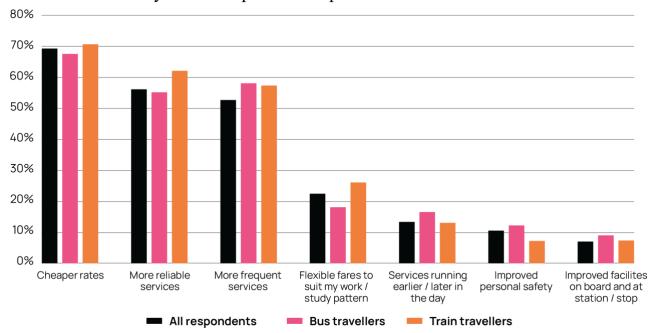
Enabling sustainable choices

Respondents then had to identify up to three factors that would enable and encourage them to commute more sustainably or continue to do so if they do already. The questions were very similar to 2022's Travel Survey, however, this time round respondents could choose up to three answers to give us a wider scope of priorities.

Public transport

Overall, cheaper fares made it top of the list, especially for train users. More frequent and more reliable services are significant factors too; bus users slightly favour the former, whilst train users value the latter comparatively more.

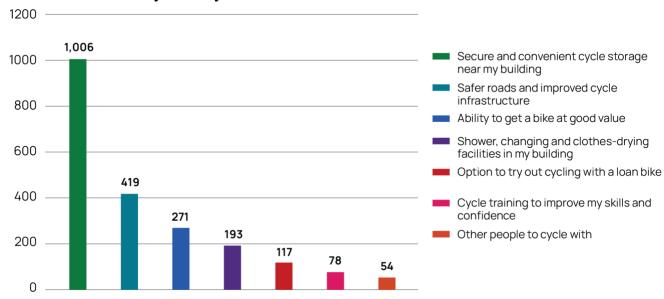
What would enable you to take public transport?



Cycling

Adding secure cycle storage on campus is a clear priority for encouraging cycling. Over 1,000 respondents selected this, including both cyclists and non-cyclists. The sustainable travel plan is delivering new secure storage facilities on campus. Safer roads remain a significant factor for cyclists and those considering cycling.

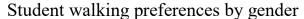
What would enable you to cycle?

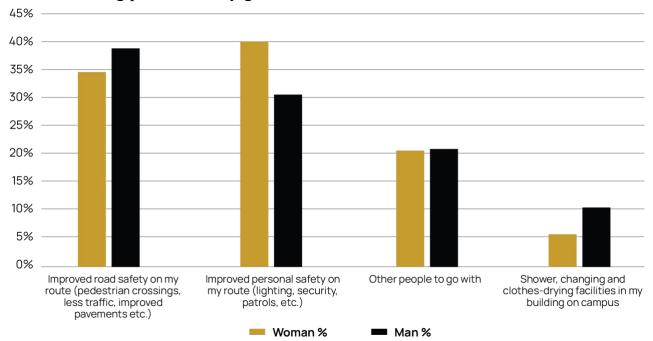


Walking

Personal safety is most important for students, with the majority saying they would walk more if this was improved, followed closely by road safety. There are significant gender differences within that, however: 40% of female students selected personal safety, well above the 30% rate for men.

With 42% of selections, road safety is key for staff. Staff members also had a comparatively greater preference for better shower and changing facilities in their building, which accounted for 17% of their selections.



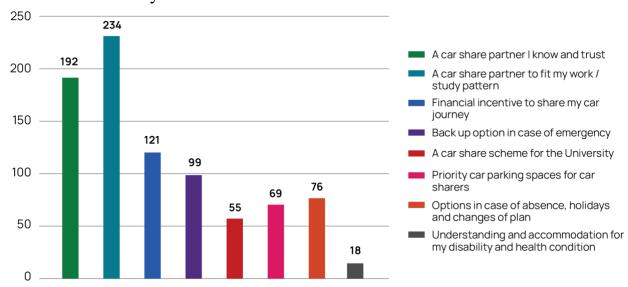


Carpooling

The most important thing to enable staff members to carpool is having the right person to share with, whether on a personal or practical level. It is therefore essential to attract as many staff as possible to join a lift-sharing scheme to raise the chances of forming compatible carpools.

Other factors, notably financial incentives and back-up options, are secondary, though they can help make a scheme attractive. Current solo staff car drivers value day-to-day practicality more than other staff, with higher numbers selecting a car-share partner to fit their work pattern and give them options if plans change.

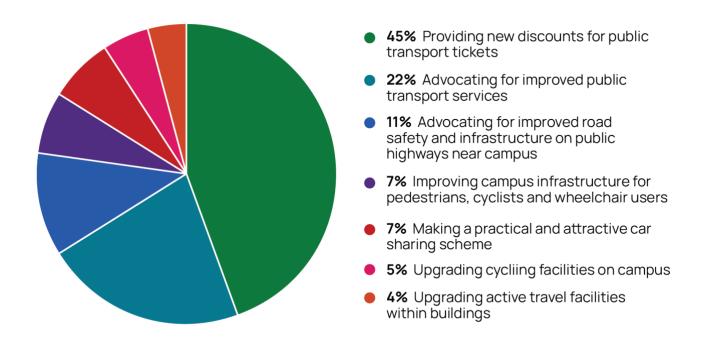
What would enable you to car share? – staff solo car drivers



Main priority

We asked respondents to give a single priority they would like us to focus on. There was a consistent hierarchy of priorities between staff and students and across the main modes of transport. Exclusive discounts, an area where there has been considerable work already, is a major priority at 45%, followed by advocacy for better public transport and improvements in road safety locally.

We are committed to making our University an excellent place for sustainable travel. What would you most like us to focus on?



Demographics

The major addition to the 2024 Travel Survey was an optional set of questions gathering demographic data. The dual aims were to check that the survey had engaged the full breadth and depth of the University community, and to identify any populations with significantly different travel habits or challenges.

Profile of respondents

Overall, we met with success in reaching a diverse sample of staff and students. The main underrepresented category is men, for both staff and students.

Staff

Gender	Count
Woman	60.5%
Man	36.0%
Other*	3.5%

Ethnicity	Count
White, UK	67.8%
Non-white, UK	32.2%

^{*}including none, non-binary, and gender fluid

Disability	Count
No known impairment, health condition or learning difference	71.8%
Known impairment(s) health condition(s) or learning difference(s)	26.2%

Students

Gender	Count		
Woman	66.0%		
(vs 56.4% @ University of Birmingham)			
Man 30.4%			
Other*	3.6%		

Ethnicity	Count	
White, UK	42.7%	
Non-white, UK	57.3%	
(vs 57.7% BAME @ University of Birmingham)		

^{*}including none, non-binary, and gender fluid

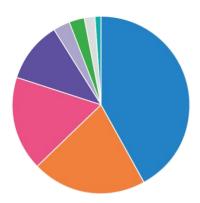
Disability	Count
No known impairment, health condition or learning difference	72.8%
Known impairment(s) health condition(s) or learning difference(s)	27.2%
(vs. 15.2% @ University of Birmingham)	

Demographics and transport modes

Gender

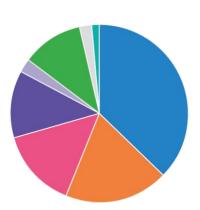
There are marked differences in the way men and women travel. Notably, men are nearly four times more likely to cycle, and they take solo car journeys more frequently. Meanwhile, women are 5% more likely to use public transport or walk than men.

Main travel modes Women



- Walking 42.1%
- Train 21.0%
- **Bus** 17.1%
- Car as a single occupant 11.1%
- Shared car journey 3.0%
- Bicycle 3.0%
- Remote work / study 1.8%
- Other 1.0%

Main travel modes Men

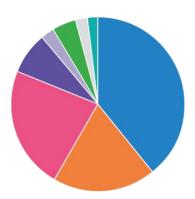


- Walking 37.3%
- Train 19.0%
- **Bus** 14.4%
- Car as a single occupant 12.1%
- Shared car journey 2.6%
- **Bicycle** 11.2%
- Remote work / study 2.2%
- Other 1.2%

Ethnicity

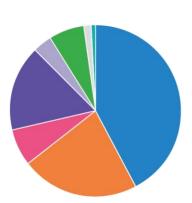
Likewise, transport modes differ by broad categories of ethnicity. Non-white UK respondents are three times more likely to take the bus, but half as likely to take a solo car journey. Taking the train, cycling and walking are more common for white UK staff and students, compared to their non-white UK counterparts.

Main travel modes Non-white UK



- Walking 39.4%
- Train 19.1%
- **Bus** 22.7%
- Car as a single occupant 7.8%
- Shared car journey 2.6%
- **Bicycle** 4.5%
- Remote work / study 2.2%
- Other 1.7%

Main travel modes White UK

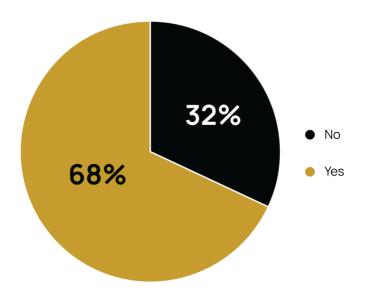


- Walking 42.3%
- Train 22.3%
- **Bus** 6.9%
- Car as a single occupant 16.2%
- Shared car journey 3.6%
- **Bicycle** 6.6%
- Remote work / study 1.4%
- Other 0.7%

Evaluating University of Birmingham sustainability

Finally, we repeated a question from 2022's survey on respondents' perceptions of the University's progress towards meeting sustainability goals. Positive responses are up 8% in two years, reflecting the effort of colleagues across the University. This gap has mainly been made up by the better opinion of staff, who were split 53%/47% last time. Student responses are broadly level with 2022.

Do you believe the University is doing enough to meet its sustainability goals?



The 2024 Travel Survey shows good progress on many fronts, most notably the fall in solo car commutes. The survey highlights that student living locations are changing and, more than ever, the University community is relying on train and bus services. The results also give clear priorities, especially to work to influence and improve public transport. These priorities will dictate our plan of action for the next two years, which will be published in spring 2025.