

## 2021/22 Annual carbon emissions report for the University of Cambridge

Reporting period:	1 August 2021 - 31 July 2022
Our reporting boundary has been defined under:	The Operational Control Approach. Please refer to our Methodology Statement for full details of how we have compiled the figures in this report.
Emissions scopes included in our report:	We have measured our scope 1 and 2 emissions, with the exception of fugitive emissions, and some of our scope 3 emissions. We do not currently have robust data for all of our scope 3 emission sources.
Our carbon reduction target(s):	We have adopted a Science Based Target, which commits us to reduce our scope 1 and 2 emissions to absolute zero by 2048 (with an interim target to reduce emissions by 75% against 2015/16 levels by 2030). All figures are reported as tonnes carbon dioxide equivalent (tCO <sub>2</sub> e)

### Reporting year

Emission source	Reporting year		Commentary, including specific exclusions
	2021/22	2020/21	
	tCO <sub>2</sub> e	tCO <sub>2</sub> e	
<b>Scope 1</b>			
Gas	19,573	22,982	
Oil	252	243	
Biomass	1	3	The carbon conversion factors used for these calculations only account for the nitrous oxide and methane emissions from biomass combustion; the carbon dioxide emissions value is set to zero to account for the carbon dioxide absorbed by fast-growing bio-energy source during their growth.
Fuel used in owned vehicles	231	236	
Fugitive emissions			We do not currently measure fugitive emissions from our estate; we are exploring options for quantifying this emissions source in future.
<b>Scope 2</b>			
Electricity - Location-based emissions	27,911	29,843	
Electricity - Market-based emissions	3,553	2,432	20/21 figures were updated to be in line with our methodology as per our restatement policy, outlined in our methodology statement.
Purchased heat and steam	1,157	1,799	
<b>Total scope 1 and 2 emissions</b>			
Scope 1 and 2 - Location-based emissions	49,124	55,106	
Scope 1 and 2 - Market-based emissions	24,766	27,695	
<b>Scope 3</b>			
Purchased good and services	310,742	365,961	We use an externally produced tool to estimate our supply chain emissions. This tool estimates emissions on a simple economic input-output basis, so these figures should be regarded as an order of magnitude estimate, rather than an accurate calculation of our supply chain emissions.
Capital goods			Not quantified
Fuel and energy related activities not included in scope 1 or 2	145	156	These are emissions associated with our use and disposal of water. 20/21 figures were updated to be in line with our methodology as per our restatement policy, outlined in our methodology statement.
Upstream transportation and distribution			Not quantified
Waste generated in operations	133	117	
Business travel	5,364	508	
Employee commuting	5,683	3,263	Commuting figures include staff commuting only; we do not currently quantify emissions from student commuting. A 2015 survey found that 91% of students commute by walking or cycling.
Upstream leased assets			Not quantified
Downstream transportation and distribution			Not quantified
Processing of sold products			Not quantified
Use of sold products			Not quantified
End of life treatment of sold products			Not quantified
Downstream leased assets			These are emissions from buildings that the University owns, and leases to a third party. Where the University has operational control over the building, these emissions have been included in our scope 1 and 2 figures.
Franchises			Not quantified
Investments			Not quantified
<b>Out of scope emissions</b>			
Direct carbon dioxide emissions from biomass consumption	48	70	These do not form part of our emissions but we have reported them for transparency.

### Notes:

In 2019 the University entered into a Power Purchase Agreement (PPA). As the PPA meets the Greenhouse Gas Protocol's 8 quality criteria for reporting market-based emissions, it results in a genuine carbon reduction; this is reflected in our market-based emissions figure. In line with best practice ([https://ghgprotocol.org/scope\\_2\\_guidance](https://ghgprotocol.org/scope_2_guidance)), in reporting progress against our SBT, we continue to report both our location-based and market-based emission figures.

### Reasons for change in emissions:

Both our location-based and market-based carbon emissions decreased by approximately 10% in 2021/22 compared to the previous year. This was primarily due to a reduction in heat demand due to a milder than normal winter season. The effects of the Covid-19 pandemic lessened over the course of the reporting year and so both staff commuting and business travel activity rebounded somewhat, though remained below pre-pandemic levels. Waste emissions increased, mainly due to an increase in construction waste and a proportion of waste collected outside of the University's central waste contract going to landfill.