

South Cambridgeshire District Council Annual Greenhouse Gas Emissions Account 2021/22

Contents

1. Introduction
2. Greenhouse Gas (GHG) emissions from the Council's estate and operations
 - Table 1: Overall GHG emissions for 2021-22
 - Table 2: GHG emissions for 2021-22 by Scope
3. About the Council
4. Reporting period
5. Approach
6. Organisational boundary
7. Operational scopes
8. Conversion/emissions factors used
9. Geographical breakdown
10. Baseline year
11. Baseline recalculation policy
12. Intensity measurement
13. External assurance statement
14. GHG Emissions avoided
15. Amount of electricity generated from owned or controlled sources
16. Amount of heat generated from owned or controlled sources

1. Introduction

These accounts have been compiled to better understand the impact of the Council's estate and operations on climate change, and to inform action to mitigate this impact by reducing emissions. They have been drawn up according to the [Environmental Reporting Guidelines](#) issued by the Government's Departments for Environment, Farming and Rural Affairs (DEFRA), and Business, Energy and Industrial Strategy (BEIS), updated March 2019.

The guidelines provide procedures and principles for accounting and reporting environmental impacts drawn from the internationally recognised Greenhouse Gas Protocol Corporate Accounting and Reporting Standard from the World Resources Institute and World Business Council for Sustainable Development, known as the "GHG Protocol Corporate Standard". These principles are that the accounts should be relevant, quantitative, accurate (insofar as is practical), complete (with any exclusions specified, disclosed and justified), consistent, comparable and transparent.

Under the GHG Protocol, emissions are defined in three different Scopes.

- Scope 1: direct GHG emissions from activities owned or controlled by the organisation.
- Scope 2: Indirect emissions associated with consumption of purchased electricity, heat, steam and cooling.

- Scope 3: Indirect emissions that are a consequence of the organisation's actions, but which occur at sources not owned or controlled by the organisation.

2. GHG Emissions from the Council's Estate and Operations

Table 1: Overall GHG emissions for 2021-22 showing the percentage change from the baseline year

	GHG Emissions (tCO ₂ e) 2021-22	GHG Emissions (tCO ₂ e) 2018-2019 (baseline year)	Percentage change from baseline year
Scopes	2021-22	2018-19	
Scope 1 (direct emissions)	1,349	1,360	-0.8%
Scope 2 (indirect emissions, electricity)	236	383*	-38.3%
Scope 3 (indirect emissions, other)	82	135**	-39.3%
Total gross emissions	1,667	1,878 (adjusted baseline)	-11.2%
Population ¹	160,904	157,519	
Intensity measurement (tonnes of CO ₂ e per person)	0.01036	0.01192	-13.1%
Electricity generated from Council owned sources and exported to the grid	1.4	0	-
GHG Emissions Avoided (Green electricity Tariff)	202.3	0	-
Total Net Emissions	1,464	1,878	-22.0%

*scope 2 emissions figure is different to that reported in 2018-19 due to the baseline recalculation of electricity 50% shared with Cambridgeshire County Council at the Waterbeach depot.

** scope 3 emissions figure is different to that reported in 2018-19 due to the baseline recalculation using the 'unknown' fuel type conversion factor

¹ Based on Office for National Statistics 2020 Mid-Year Population Estimates released June 2021:

<https://www.ons.gov.uk/datasets/mid-year-pop-est/editions/mid-2020-april-2021-geography/versions/1>

Table 2: Greenhouse Gas Emissions for 2021-22 – by scope showing the percentage change from the baseline year

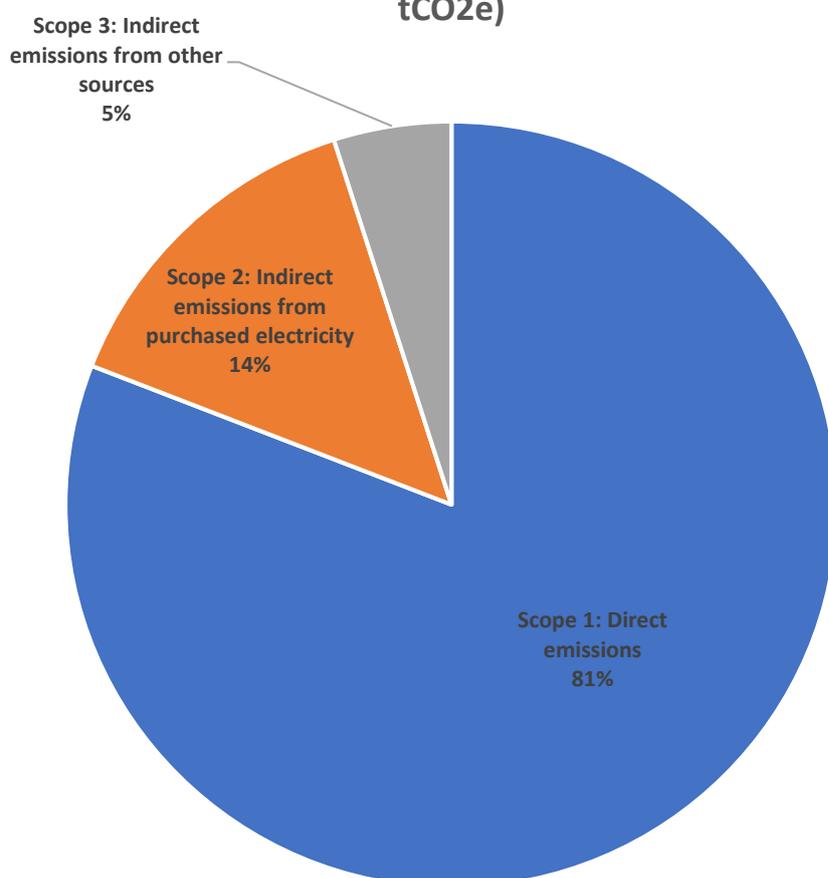
	GHG Emissions (tCO ₂ e) 2021-22	GHG Emissions (tCO ₂ e) 2018-2019 (baseline year)	Percentage change from baseline year
Scope 1			
Gas consumption	232	271	-14.4%
Fleet	1,117	1,089	+2.57%
Process emissions	n/a	n/a	-
Fugitive emissions	n/a	n/a	-
Total Scope 1	1,349	1,360	-0.8%
Scope 2			
Purchased electricity	236	383*	-38.3%
Total Scope 2	236	383*	-38.3%
Scope 3			

Business Travel	82	135**	-39.3%
Transmission and Distribution losses	Not included	Not included	-
Employee commuting	Not included	Not included	-
Procured goods and services	Not included	Not included	-
Waste Disposal	Not included	Not included	-
Total Scope 3	82	135**	-39.3%
Total gross emissions	1,667	1,878	-11.2%

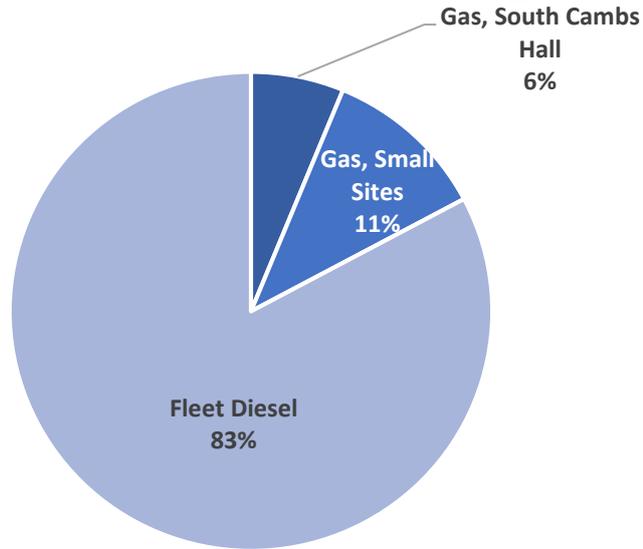
*scope 2 emissions figure is different to that reported in 2018-19 due to the baseline recalculation of electricity shared 50% with Cambridgeshire County Council at the Waterbeach depot.

** scope 3 emissions figure is different to that reported in 2018-19 due to the baseline recalculation using the 'unknown' fuel type conversion factor

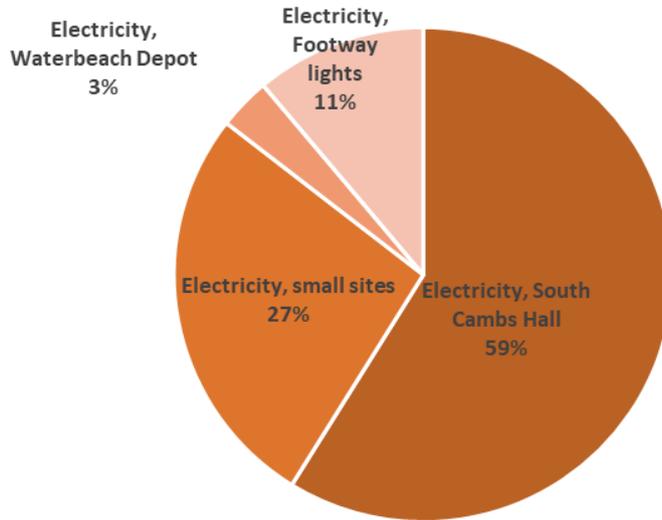
GHG emissions from SCDC Estate and Operations 2021/22 (1,667 tCO2e)



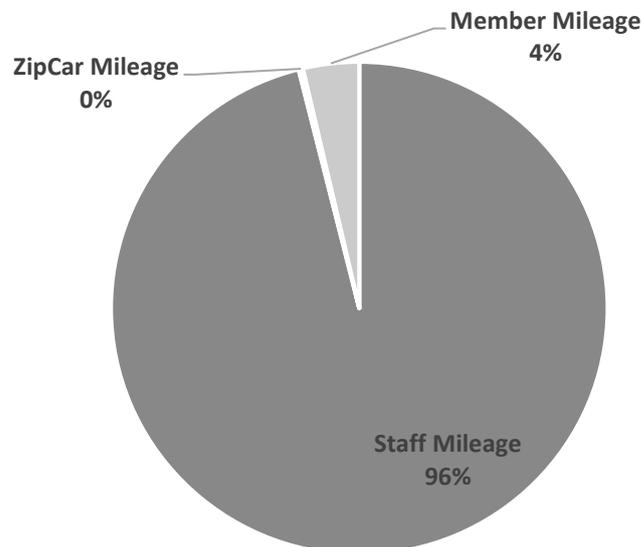
Scope 1: Direct emissions (1,349 tCO₂e)



Scope 2: Indirect emissions from purchased electricity (236 tCO₂e)



Scope 3: Indirect emissions from other sources (82 tCO₂)



3. About the Council

South Cambridgeshire District Council is a non-metropolitan district authority and is responsible for providing a range of services to residents of South Cambridgeshire, visitors to the district, and businesses and other organisations based in the district. Services include housing, refuse and recycling collections, licensing, planning and building control, Council Tax collection, and environmental health services. The Council serves a population of 160,904 living in 106 parishes and settlements, has 45 elected Members; and employed 655 members of staff as of 31 March 2022. Further information about the Council can be found on our website at www.scambs.gov.uk.

4. Reporting Period

1 April 2021 – 31 March 2022.

5. Approach

We have followed Government guidance, published by Defra at <https://www.gov.uk/guidance/measuring-and-reporting-environmental-impacts-guidance-forbusinesses>.

6. Organisational Boundary

We have defined our organisational boundary following the Financial Control approach which means we have included operations which the Council owns and controls. Further detail on which operations or activities have been included within our organisational boundary for the purposes of compiling this greenhouse gas report is provided under 'Operational Scopes' below.

7. Operational Scopes

We have included Scope 1 and Scope 2 emissions for all properties and vehicles that we fully own and control and for properties that we lease from others, where the Council is delivering a service.

We reported Scope 3 emissions where we have access to comprehensive and reliable data; and where we have a degree of control over the operation/ activity in question. See the table below for details:

Table 4: Rationale for Inclusion and Exclusion of Emissions.

Source of Emissions	Included in reporting?	Reason for exclusion where applicable
Source 1 (Direct)		
Gas consumption in buildings we own and control	Yes	This includes our main office buildings, our three hub offices and our sheltered housing community rooms.

Gas consumption in buildings we lease to others	Partially	We have only included emissions arising from energy used in the communal areas of some of the buildings that we lease out (energy used in communal areas is provided and paid for by the Council). We have not included data on energy used in Council housing, Ermine Street Housing (the Council's private sector housing company), or in the commercial building, 140 Cambridge Science Park owned by the Council.
Gas consumption in buildings we lease from others	No	The Waterbeach Depot is the only building we lease from others. No gas is consumed on these premises.
Fuel consumption in owned transport	Yes	Includes Shared Waste Services transport, e.g. refuse vehicles, operating in South Cambridgeshire; excludes Shared Waste Services transport operating in the City Council.
Process emissions	No	Not applicable.
Fugitive emissions, e.g. from air conditioning units	No	Excluded due to difficulty and/or cost of obtaining data.
Scope 2 (Indirect, energy)		
Purchased electricity; in buildings we own, occupy and control	Yes	This includes our main office buildings, our three hub offices, our sheltered housing community rooms and the two traveller sites- Whaddon and Blackwell.
Purchased electricity in buildings we lease to others	Partially	We have only included emissions arising from energy used in the communal areas of some of the buildings that we lease out (energy used in communal areas is provided and paid for by the Council). We do not have access to data on energy used by our tenants.
Purchased electricity in buildings we lease from others	Yes	Waterbeach depot,
Purchased electricity used in street lighting owned by the Council	Yes	1,809 streetlights.

Scope 3 (indirect, other)		
Purchased goods and services	No	Excluded due to difficulty and/or cost of obtaining data.
Business travel	Yes	This includes mileage claimed by staff and Members; and travel using the Zipcar.
Commuter travel	No	Excluded due to difficulty and/or cost of obtaining data.
Waste disposal	No	Excluded due to difficulty and/or cost of obtaining data.
Water usage	No	Excluded due to difficulty and/or cost of obtaining data.
Outsourced activities	No	

8 Conversion/ Emissions Factors Used

The emissions factors used to calculate the emissions in this Greenhouse Gas Report are those provided by BEIS (Department for Business, Energy & Industrial Strategy) and Defra (Department for Environment Food & Rural Affairs) titled: 'UK Government GHG Conversion Factors for Company Reporting' which is available at:

<https://www.gov.uk/government/publications/greenhouse-gas-reporting-conversion-factors-2021>

9. Geographical Breakdown

All of our operations and activities are carried out in the UK.

10. Baseline Year

1 April 2018 - 31st March 2019

11. Base Year Recalculation Policy

For consistent tracking of performance over time, the Council may need to recalculate the baseline year to compare current emissions with historic emissions. The reasons for change are documented in Part 9 of the Guidance on how to measure and report your greenhouse gas emissions provided by DEFRA. For example, changes in calculation methods or improvements in the accuracy of emission factors or activity data that result in a significant impact on the base year emissions data. Since the 2018 -19 report was published, a survey identified the number of footway lamps in use to be 1,796, not 1,677 as reported. Although the figure of 1,796 was used in 2019-20, this number changed again for 2020-21 to 1,803, and to 1,809 in 2021-22 due to the identification of some more footway lamps not captured in last year's survey. Due to the very small difference in numbers and the fact that a small number of streetlamps are due to be disconnected, a second baseline recalculation is not necessary.

Further baseline recalculations have been made to reflect 50% of the electricity shared with Cambridgeshire County Council at the Waterbeach depot and the amendment to the fuel conversion factor from 'diesel' to 'unknown' which is used for the business fuel consumption.

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/69282/pb13309-ghg-guidance-0909011.pdf

12. Intensity Measurement

We have included an intensity ratio of 0.01036 tonnes of CO_{2e} per resident of South Cambridgeshire, which is based on mid-year population statistics, produced in June 2020.

The dataset is at:

<https://www.ons.gov.uk/peoplepopulationandcommunity/populationandmigration/populationestimates/datasets/populationestimatesforukenglandandwalesscotlandandnorthernireland>

13. External Assurance Statement

The Authority's Internal Audit service have had opportunity to review the reported emissions figures, supporting calculations and sample test available source data and have provided assurances on the figures provided.

14. Avoided GHG Emissions

For South Cambridgeshire Hall and the Council owned small sites, a purchased green electricity tariff has been included as avoided emissions.

15. Amount of Electricity Generated from Owned or Controlled Sources

The solar array on the Waterbeach Depot started exporting electricity in March 2019. We have included the total renewable electricity exported from the PV array as avoided emissions. This is split 50:50 with Cambridgeshire County Council.

16. Amount of Heat Generated from Owned or Controlled Sources

South Cambs Hall benefits from a roof mounted solar thermal installation. Accurate figures for heat generated are unavailable at the present time but should be available for next year's report. As solar thermal panels only 'generate heat' it will in turn mean that the heat drawn by the gas boilers will be less than if solar thermal wasn't available.

For further information about this report, please contact:

Eleanor Haines, Project Officer, Climate, Environment and Waste
Eleanor.Haines@scambs.gov.uk, 01954 713490