

McCabe's Coffee — Sustainability Report 2021

This is our second comprehensive sustainability report. It outlines our commitment to a sustainable business approach that minimises any negative impact on this generation and generations to come. This report clearly lays out our energy consumption and carbon footprint from 2019, 2020 and 2021. The details of our offsetting initiatives are also disclosed. This data will be updated annually to assess our progress towards our sustainability targets.

Summary

- We processed over 117,000 kg of green coffee in 2021.
- We calculated our carbon footprint¹ in 2021 to be 38,709 kg of CO₂e.
- This is a slight increase from 35,811 kg of CO₂e in 2020.
- Diesel consumption remains our largest source of emissions.
- Natural gas used in the coffee roasting process is the second largest source.
- We recently purchased our first electric delivery vehicles.
- Working with our partners we have now planted over 5,500 trees.
- These trees remove a total of 44,100 CO₂e a year from the atmosphere.
- This means our operation is carbon negative.
- We are investigating the potential to install solar panels at our roastery in Wicklow.

¹ Carbon footprint here refers to Scope 1 and 2 emissions.

Carbon Footprint

This is an organisational carbon footprint that considers the greenhouse gases (GHG) emitted directly and indirectly by an organisation. GHG emissions are categorised into three groups or 'Scopes' by the most widely-used international accounting tool, the GHG Protocol.

Scope 1 covers direct emissions from owned or controlled sources.

Scope 2 covers indirect emissions from the generation of purchased electricity, steam, heating, and cooling consumed by the reporting company.

Scope 3 includes all other indirect emissions that occur in a company's value chain.

Scope 1	Scope 2	Scope 3
Diesel combustion in delivery vehicles Gas combustion in the coffee roaster	Purchased electricity	Business travel Coffee importation Waste disposal

This study aims to quantify the Scope 1 and 2 emissions resulting from the processing and distribution of our coffee in Ireland. The Scope 3 emissions resulting from business travel, waste, and coffee importation are also investigated. The reporting period for each year was from the 1st of January to the 31st of December.

The first step required to calculate our carbon footprint was to gather all the relevant activity data. This was obtained from company records such as electricity and gas bills. All relevant activity data used in this report can be viewed in the Appendix.

This activity data was then translated into a carbon footprint using suitable emission factors. These were sourced from the Sustainable Energy Authority of Ireland (SEAI) and the UK Department for Business, Energy & Industrial Strategy (BEIS). The table on the next page shows the breakdown of our carbon footprint by source.

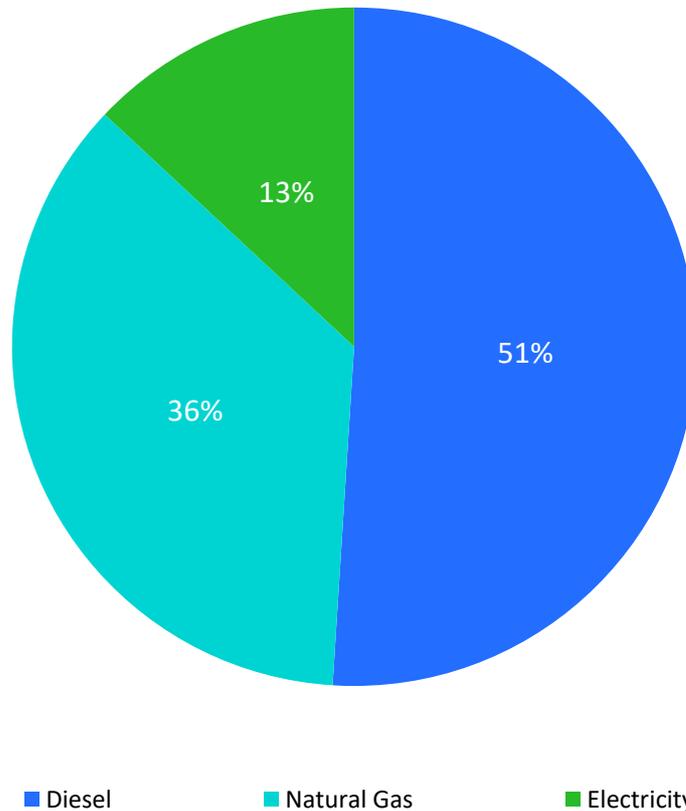
Carbon Footprint Breakdown

	2019	2020	2021
Scope 1	(kg CO ₂ e)	(kg CO ₂ e)	(kg CO ₂ e)
Natural Gas	14,454	13,660	14,501
Diesel	16,755	17,710	19,706
Scope 2			
Electricity	4,406	4,440	4,952
Scope 3			
General Waste	15	24	17
Recycling Waste	38	32	37
Organic Waste	37	26	25
Business Travel	3,516	0	0
Coffee Importation	24,005	20,504	23,090
Scope 1 + 2	35,616	35,811	38,709
Scope 1 + 2 + 3	63,227	56,397	61,879

The calculations reveal that our Scope 1 + 2 carbon footprint in 2021 was 38,709 kg of CO₂e. This is a slight increase from 35,811 kg of CO₂e in 2020.

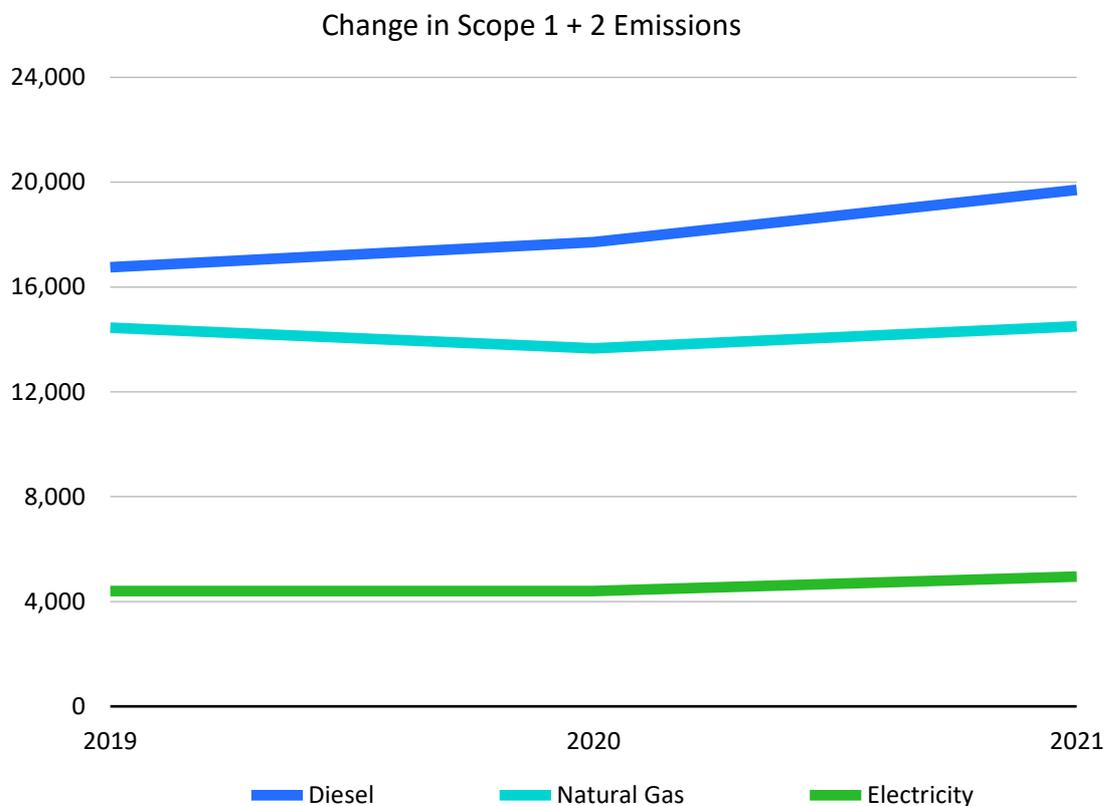
Scope 1 + 2 Breakdown

Scope 1 + 2 Emissions in 2021 by Source



Diesel consumption in our delivery vans clearly dominates our carbon footprint. This finding has led us to identify electric vehicles as a key decarbonisation strategy. Natural gas, which is used to provide heat in the coffee roasting process, is much more difficult to replace. We investigated the potential to use biogas, however, this fuel source is currently not compatible with our coffee roaster. We will continue to look out for emerging solutions in this space. Purchased electricity is responsible for a relatively small share of emissions as Ireland's

electricity system has decarbonised significantly in recent years. In 2020, 42% of Ireland’s electricity generation came from renewable sources, mainly wind energy².

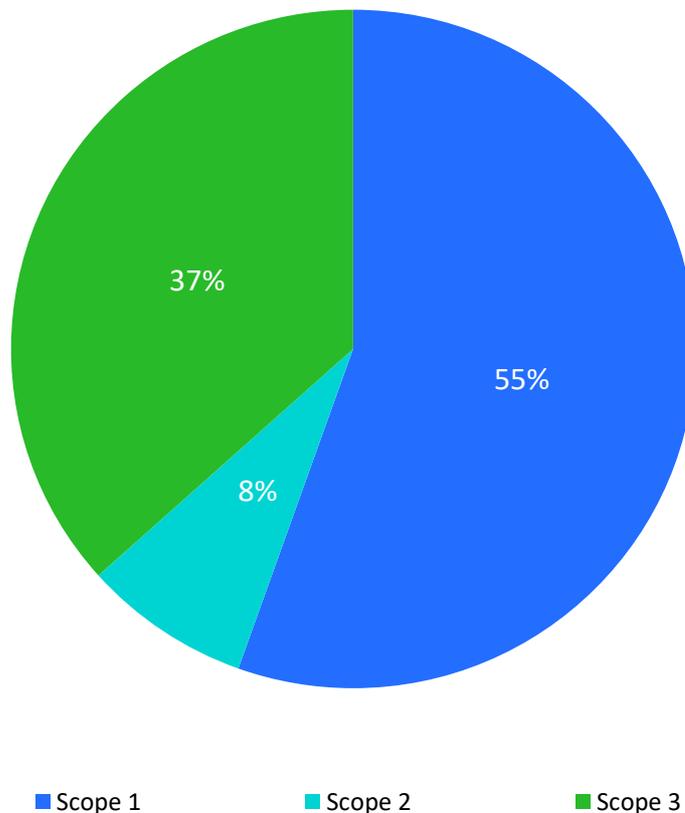


Emissions from natural gas increased in 2021 due to the higher volume of coffee beans being roasted across the year compared to in 2020. Diesel emissions increased, while electricity emissions remained largely constant.

² SEAI Provisional Energy Balance 2020. View [here](#).

Scope 1 + 2 + 3 Breakdown

2021 Emissions by Category



The pie chart above clearly shows Scope 1 and 3 emissions dominate our carbon footprint. As we reduce our Scope 1 emissions it is likely Scope 3 emissions will come to represent a greater percentage of our yearly total. Due to the lack of operational control over activities that cause Scope 3 emissions they can be difficult to reduce. Despite this, we are committed to finding suppliers who share our vision and also take decarbonisation seriously.

Carbon Offsetting

We've teamed up with Hometree, an Irish charity whose work is to establish and conserve permanent native woodland in Ireland, encouraging land regeneration and biodiversity through afforestation, restoration and education. We have planted 940 trees with Hometree in Milltown Malbay, Co. Clare.

We have also partnered with Tree Nation to plant 4,600 trees across five different countries. The projects we are involved in are outlined in the table below.

Project	Country	Number of Trees
Usambara Biodiversity Conservation	Tanzania	2,550
Cocoa Farmer Agroforestry	Cameroon	1,000
Eden Projects	Madagascar	850
Reforest the Mata Atlântica	Brazil	100
Trees for Water	India	100

Together these projects will offset 41,100 kg of CO₂e each year, which is more than our current carbon footprint (Scope 1 + 2). Therefore, our operations in Ireland are carbon negative.

	Number of Trees Planted	Total CO ₂ Sequestration (kg of CO ₂ e / year)
HomeTree (Co. Clare)	940	2,700
Tree Nation	4,600	41,400
Total	5,540	44,100

You can view our profile on TreeNation [here](#), and our interview on the HomeTree website [here](#). All of the tree planting projects we are involved with have firm partnership contracts in place to ensure the trees are managed, protected and allowed to live out their natural lives.

Metrics and Targets

Despite our operations here being carbon negative through our offsetting projects, we intend to reduce our emissions even further. In order to track our decarbonisation progress as the business grows, we have created a carbon intensity metric. This value is calculated by dividing the Scope 1 + 2 emissions by the quantity of green coffee processed in a given year. The carbon intensity values for the past three years are outlined below.

	2019	2020	2021
Scope 1 + 2 Emissions (kg CO ₂ e)	35,616	35,811	38,709
Green Coffee Processed (kg)	122,580	104,700	117,904
Carbon Intensity (kg CO ₂ e / kg green coffee processed)	0.29	0.34	0.37

The carbon intensity of our operations increased slightly in 2021. This is likely due to the impacts of COVID-19 on our operations. For example, delivery vans operating at lower capacities, increasing the amount of CO₂e released per bag of coffee delivered.

We have set a target to reduce our carbon intensity to 0.25 kg of CO₂e per kg of green coffee by the end of 2022. This will be achieved by increasing operational efficiency and electrifying our delivery vehicles. Three vehicles have been changed to electric in 2022.

Supporting Coffee Farmers

Sustainability goes beyond just environmental concerns. The farmers who grow our coffee must receive a fair price. We have built close relationships with these farmers over the years, visiting when we can and contacting them each year to agree on a price that is fair.

1. The price paid to the farmer or farmers in a cooperative must be a minimum of 20% more than the Fairtrade price.
2. Typical daily payment for pickers must at least match the legal minimum daily wage.
3. Water, sanitation, and accommodation must be provided on the farms
4. Confirmation that no underage workers work on the farms.

Achievements to Date

In 2019, we were the first Irish Coffee Roasters to offer a unique collection service of every bag of coffee we supply to our wholesale customers for recycling into plant boxes, watering cans, and park benches by Terracycle. Our roasting waste is also used as compost by Dun Laoghaire Rathdown Co. Council.

This circular economy approach is a sustainable alternative to the traditional linear model of create – consume – dispose. It keeps plastic in use for as long as possible, recovering and recycling it to extract value and regenerate it into new products. This model eliminates waste plastic into the environment and reduces the requirement for fossil feedstock in plastic production.

In 2022, we replaced three diesel delivery vans with electric cars. This will significantly reduce our carbon footprint as diesel consumption is our largest source of emissions.

Future Plans

We are investigating the potential to install solar panels at our roastery in Wicklow. A solar system will reduce the amount of electricity we have to purchase from the grid each year, reducing our Scope 2 emissions. As we electrify our delivery fleet having access to onsite low-carbon electricity will become even more valuable.

We are increasing our organic coffee offer year on year. Organic coffees use no carbon rich fertilizers or insecticides and our typically from shade grown estates where flora and fauna can thrive.

Our retail tea packaging is now made from 100% recyclable material confirmed by RePak. In 2022, we will be trialing this material in our catering bags and we also plan to introduce 2 lines of coffees in reusable containers.

Our next challenge will be to investigate the climate risk faced by the farmers who grow our coffee. The tropical regions where coffee grows will be disproportionately affected by the impacts of climate change such as extreme weather events and drought. We can support coffee farmers by helping them implement climate change adaptation strategies such as incorporating shade trees into their coffee plantations to protect against extreme weather and high temperatures.

Appendix

The table below includes all the activity data used to calculate our carbon footprint.

Activity Data

	Unit	2019	2020	2021
Scope 1				
Diesel	Litres	6,581	6,956	7,740
Natural Gas	kWh	78,612	74,294	76,418
Scope 2				
Electricity	kWh	13,578	15,000	15,260
Scope 3				
General Waste	Kilograms	693	1,149	800
Recycling Waste	Kilograms	1,767	1,484	1,760
Organic Waste	Kilograms	4,148	2,869	2,840
Business Travel	Destination	Sumatra	N/A	N/A
Other				
Water	Litres	29,512	25,560	36,197
Green Coffee Processed	Kilograms	122,580	104,700	117,904