

Carbon Reduction Plan

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Commitment:

TG Escapes Ltd is committed to being Carbon Neutral by 2024 and Net Zero by 2030

Baseline Emissions Footprint:

The Baseline Emissions Footprint measurement is an assessment of the organisation's carbon emissions at a specific point in time. It serves as a starting point or reference for tracking and evaluating progress in reducing those emissions.

When establishing a baseline emissions footprint, an organisation comprehensively analyses its activities, operations, and processes contributing to greenhouse gas emissions. This analysis includes energy consumption, transportation, waste management, and other relevant activities that produce carbon dioxide (CO₂) and other greenhouse gases.

The purpose of determining a baseline emissions footprint is to understand the organisation's current level of carbon emissions and identify the areas where the most significant reductions can be made. It provides a benchmark against which future emission reduction efforts can be measured and monitored.

We have included all our Scope 1 & 2 emissions and included the following Scope 3

- Waste generated in operations
- Business Travel
- Employee commuting

Baseline Exclusions

Many of our scope 3 Emission are difficult to monitor; therefore, we have created the following roadmap of scope three emissions which will be included until all applicable emissions are included by 2025

2022 – Scope 3

Baseline

- Waste generated in operations
- Business Travel
- Employee commuting

Exclusions

- Purchased goods and services -
- Capital goods -
- Transportation and distribution -
- Leased assets -
- Processing of sold products -
- Use of sold products (regulated energy only) -
- End-of-life treatment of sold products -

Not applicable

- Franchises - NA
- Investments - NA
- Fuel- and energy-related activities - NA

2023 – Scope 3

Baseline

- Processing of sold products -
- Transportation and distribution -
- Use of sold products (regulated energy only) -

Exclusions

- Purchased goods and services -
- Capital goods -
- Leased assets -
- End-of-life treatment of sold products -

Not applicable

- Franchises - NA
- Investments - NA
- Fuel- and energy-related activities - NA

2024 – Scope 3

Baseline

- Capital goods - assets over £1000 only
- Leased assets - assets over £1000 only

Exclusions

- Purchased goods and services -
- End-of-life treatment of sold products -

Not applicable

- Franchises - NA
- Investments - NA
- Fuel- and energy-related activities - NA

2025 – Scope 3

Baseline

- Purchased goods - Where EPD information is available
- End-of-life treatment of sold products - Manufacturing only
- Use of sold products (un-regulated energy) - Undertake appliance surveys

Exclusions

- Purchased services - Services will be through the procurement process
- Transportation and distribution - Downstream supplier
- End-of-life treatment of sold products - Third Party Products

Not applicable

- Franchises - NA
- Investments - NA
- Fuel- and energy-related activities - NA

Emission Categories

Understanding and managing greenhouse gas emissions is essential for organisations, and categorising them into Scope 1, Scope 2, and Scope 3 can be helpful. Let's break down each scope and provide examples of emission types to provide a clear picture.

Scope 1 Emissions:

These emissions include direct greenhouse gas emissions from sources owned or controlled by the organisation. These include:

- Combustion of fossil fuels: in owned or controlled vehicles and equipment.
- Process emissions from industrial processes: e.g. chemical reactions
- Fugitive emissions from energy production, processing, storage, and transport.

Scope 2 Emissions:

The emissions are indirect greenhouse gas emissions when the organisation uses purchased electricity, heat, or steam. This category encompasses:

- Emissions associated with the generation of electricity supplied to the organisation.
- Emissions from moving electricity are transmission and distribution losses.

Scope 3 Emissions:

These emissions encompass all other indirect greenhouse gas emissions in the organisation's value chain, including upstream and downstream activities. These include:

- Purchased goods and services
- Capital goods
- Fuel- and energy-related activities
- Transportation and distribution
- Waste generated in operations
- Business Travel
- Employee commuting
- Leased assets
- Processing of sold products
- Use of sold products
- End-of-life treatment of sold products
- Franchises
- Investments

We can set realistic and achievable reduction targets by establishing a baseline. It also allows tracking progress over time and evaluating the effectiveness of mitigation strategies and initiatives implemented to reduce emissions.

It's worth remembering that a company's emissions footprint is constantly changing, that's why we've chosen to use an intensity value, considering the growth we anticipate in the coming years. We have decided to utilise head count as our intensity measure.

In 2022 we had a head count of 29, so our carbon emissions will be reported as tCO₂e/p.

Carbon Reduction Roadmap

Assess Current Carbon Footprint:

Conduct a comprehensive audit to identify and quantify TG Escapes' current carbon emissions across all operations, including energy use, transportation, waste management, and supply chain.

Goal 1:

Establish a baseline to measure progress and identify critical areas for reduction.

Set Ambitious Carbon Reduction Goals:

Define clear, measurable, and time-bound targets to reduce TG Escapes' carbon emissions. Consider aligning the goals with internationally recognised frameworks like the Science-Based Targets Initiative.

Goal 2:

Create smart goals to achieve a year-on-year reduction.

Monitoring and Reporting:

Continuously monitor and track TG Escapes' progress towards carbon reduction goals.

Implement a robust reporting system to communicate achievements, challenges, and areas for improvement.

Regularly update stakeholders on the organisation's carbon reduction initiatives annually, including employees, customers, and investors.

6-month internal review of carbon reduction target

Partnerships and Offsetting:

TG is looking to procure Carbon credits for peat bog land with additional habitat preservation as an additional environmental gain to the Carbon credits. We are currently looking for high-quality partners in this area.

Continuous Improvement:

Review and refine the carbon reduction plan based on new technologies, industry standards, and emerging best practices.

Engage in research and development initiatives to explore innovative solutions for further reducing carbon emissions.

Annually republish this report with the progress made for the previous year.

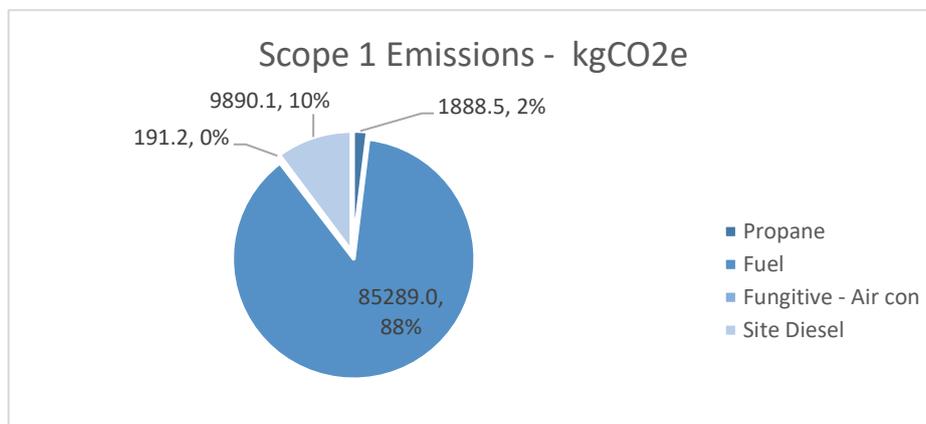
TG Escapes Carbon Footprint 2022

Number of Employees = 29

Scope 1

The following scope one emissions have been identified and measured

Scope 1 Emissions	
Propane	1.89 tCO ₂ e
Transport Fuel	85.3 tCO ₂ e
Fugitive Emissions	0.12 tCO ₂ e
Site Diesel	9.9 tCO ₂ e
Total	97.2 tCO ₂ e
Intensity factor Adjusted Total	3.35 tCO ₂ e



Scope 2

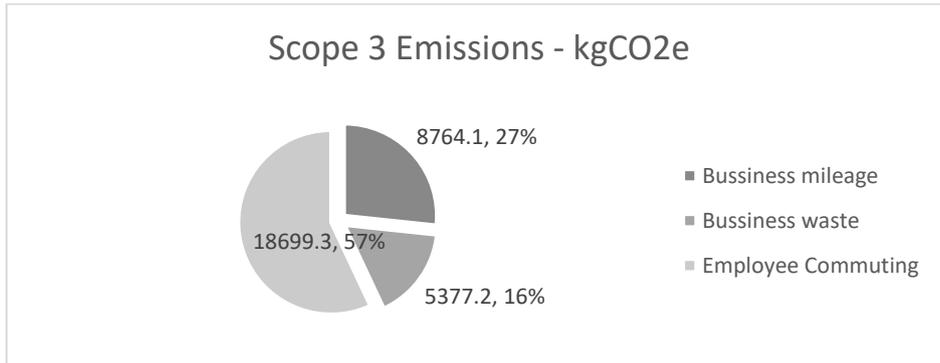
The following scope two emissions have been identified and measured.

Scope 2 Emissions	
Unit A	12.5 tCO ₂ e
Unit B	2.1 tCO ₂ e
Total	14.6 tCO ₂ e
Intensity factor Adjusted Total	0.502 tCO ₂ e

Scope 3

The following scope two emissions have been identified and measured.

Scope 3 Emissions	
Business Mileage	11.3 tCO ₂ e
Business Waste	5.4 tCO ₂ e
Employee Commuting	18.5 tCO ₂ e
Total	35.15 tCO ₂ e
Intensity factor Adjusted Total	1.21 tCO ₂ e



Total Emissions

Therefore TG Escapes has:

Total emissions of 146.9 tCO₂e and 5.1 tCO₂e per employee

TG Escapes Carbon Reduction Goals

TG Escapes is committed to reducing its carbon emissions by 10% yearly; therefore, we have set the following targets.

Year	tCO₂e PP
2022	5.07
2023	4.56
2024	4.11
2025	3.7
2026	3.33
2027	3
2028	2.7
2029	2.43
2030	2.19

As our scope three emissions are mapped more effectively, we will add these to our baseline emissions and create adequate reduction plans. This means that our tco₂e per employee will increase until 2025, when we have included all our scope three emissions. After this, the figures will fall.

As a comparison case, An SME office-based business with around ten employees could expect a carbon footprint in the region of 3.7 tCO₂e per employee per year, according to the Carbon Trust.

TG Escapes, on the other hand, is a national turnkey contractor that manufactures its buildings in-house and has only 37% higher emissions.

2023 – Carbon Reduction Plan

We are hoping to reduce our emissions by approximately 14.7 tCO₂e in 2023. We will do this through a reduction in all three scopes:

- Scope One: 9.7 Tonnes
- Scope Two: 1.5 Tonnes
- Scope Three: 3.5 Tonnes

Scope One

We will look to find our education in the following areas:

Fuel – All new non-commercial vehicles will be procured as Electric or petrol-Hybrid, we hope this will reduce our fuel usage drastically and encourage public transport on longer journeys.

Site diesel – Our site emissions emit almost 9 tonnes of carbon. We believe we can reduce this through the following measures:

- Temporary electrical mains power to the site
- Solar-powered welfare units

Scope Two

We have identified the following potential savings in our scope two emissions.

- 20% of our energy usage is outside office hours; therefore, we believe that through the use of smart technology, we can make a significant reduction in our energy usage

Scope Three

We have identified the following potential savings in our scope three emissions:

- Business mileage – High mileage individuals to be identified and company cars to be explored; this allows us to reduce emissions.
- Employee communication – Cycle-to-work scheme to be rolled out
- Business Waste - while we recycle 97% of our waste, we will still attempt to reduce our emissions in this area.

2023- 2025 Carbon Reduction Proposals

Scope One

We will encourage employees to use low-carbon transportation options such as public transit, carpooling, or cycling. Instead of driving, however, we also take the following active measure to reduce Carbon.

- Transition the company's fleet to electric or hybrid vehicles by 2025, with commercial vehicles to be electric or hybrid by 2030. This will reduce emissions by 15 tonnes of CO₂e by 2025 and a further 15 tonnes by 2030.
- Optimise routes and consolidate shipments to minimise transportation-related emissions.
- Look to utilise an electric plant onsite during the build phase; this would reduce carbon by 2.5 tonnes of CO₂e per year
- Look to replace the warehouse forklift with an electric version. This would reduce carbon by 1.89 tonnes of CO₂e per year
- Diesel generators for power generation utilise about 2000 litres per Annum; the swap to solar-powered welfare will hopefully reduce this by 2.3 tonnes of CO₂e, and utilising mains power for power requirements could reduce carbon by an additional 4.5 tonnes.

Scope Two

Reducing onsite energy usage could save up to 14 tonnes of Carbon per year; this accounts for both regulated and unregulated energy. To reduce regulated energy use, we could:

- Implement energy efficiency measures such as upgrading insulation, Walls, Roof and Doors
- Automatic lighting systems, and ensure the site is full LED
- Optimising heating, ventilation, and air conditioning (HVAC) systems to reduce energy consumption.
- Evaluate the feasibility of adopting renewable energy sources like solar, as we have a south-facing roof. This would automatically save 1/3 of our energy due to the primary energy factor
- 20% of our consumption is out of hours; therefore, we would like to investigate this further and make a substantial saving.

Scope Three

Scope three emissions are quite a broad spectrum. However, we must establish a baseline for many of these before establishing a reliable reduction plan.

- Procurement of products and services.
 - 90 % of products we use should have an EPD by 2025
 - All our services suppliers should be Carbon Neutral by 2030
 - Review the products we specify and attempt to utilise low-carbon alternatives
- Waste Management and Recycling:
 - TG Escapes already has an exception recycling benchmark of 97%. We would aim to maintain this.
 - We will look into reducing waste on-site and in production.
- Employee Engagement and Education
 - Encourage employee involvement through suggestion schemes & green teams.
 - Foster a culture of sustainability and incentivise employees to become carbon literate.

- Capital goods & Leased Assets
 - To have both their embodied and operational carbon reviewed as part of the procurement process
- Transportation and distribution.
 - To be reviewed as to the most sustainable options
- Manufacturing of sold products
 - Raw materials are to be recorded and minimised
- Use of sold products
 - Regulated energy to be monitored through SBEM designs company to target Net Zero in operational energy
- End-of-life treatment of sold products
 - We will employ a specialist to produce a report on the EOL of our products by 2025 to ensure that we can reduce these and offset where we can't reduce.