

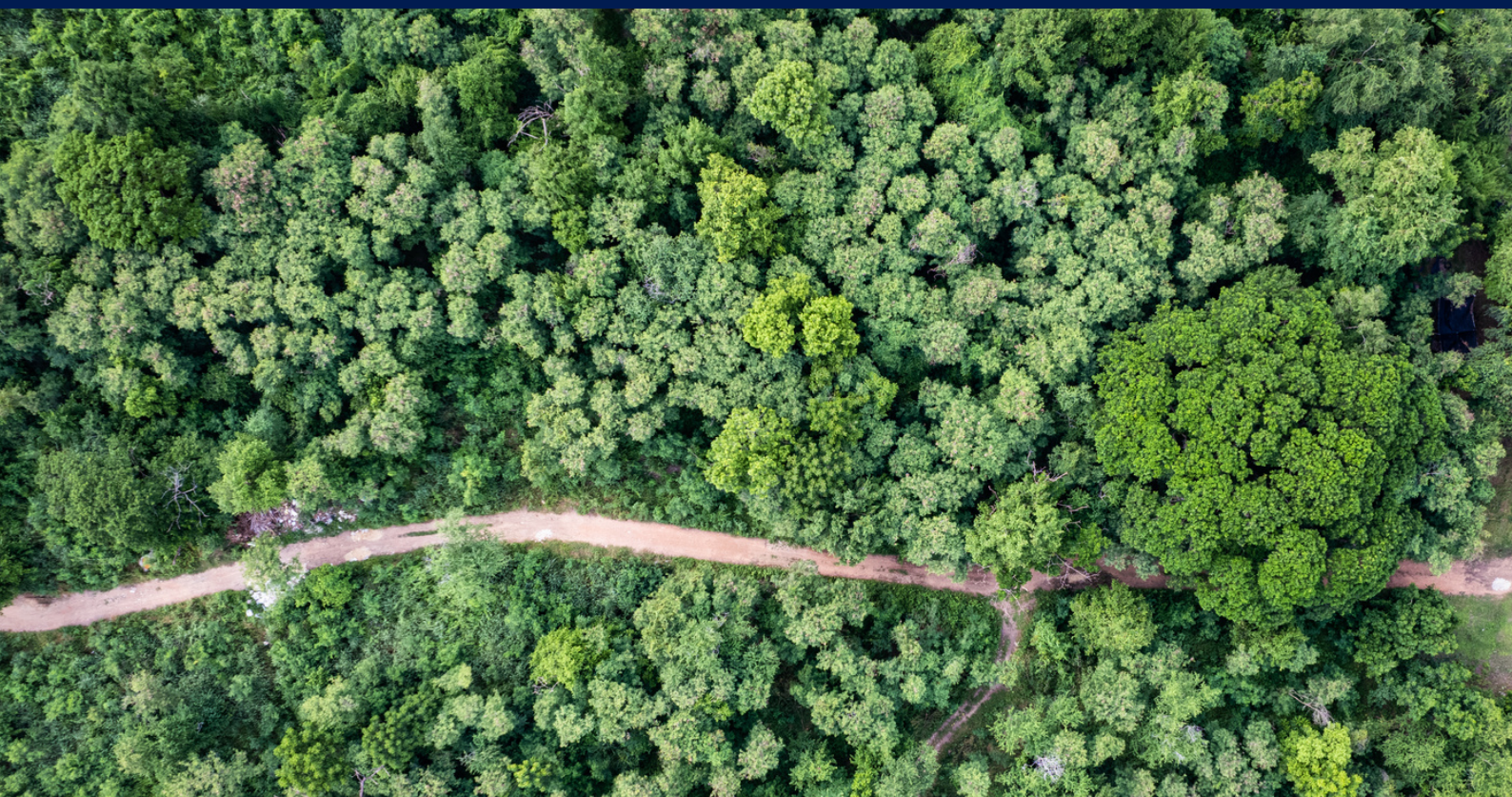


**SWPS
University**

Carbon Footprint Report

2024

The report was prepared by Sustainable Development Office at SWPS University.
The data was prepared by Plan Be Eco.



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Summary

Introduction

1

SWPS University has launched its Strategy for 2024–2029. One of its key goals is to promote environmental protection and climate responsibility. As a socially responsible university, we want to actively contribute to reducing our negative impact on the climate.

We consider measuring our carbon footprint to be the first step toward defining specific decarbonization actions. It's an important element in building a long-term emissions reduction plan and transparently communicating our progress.

In the first stage, we focus on two basic areas of emissions – scope 1 and 2. These include emissions directly from our operations and emissions related to the purchase of electricity and heat.

In the coming years, we plan to expand reporting to also include scope 3.

The report presents a detailed analysis of SWPS University's greenhouse gas emissions in scope 1 and 2 for the period from 1 January to 31 December 2024.

The data was collected by the university's internal teams and entered into the Plan Be Eco system, whose team compiled the results in line with best environmental reporting practices.

The study was based on a review of internal and external documentation. Organizational boundaries were defined in accordance with the principles of the GHG Protocol and the ISO 14064-1:2006 standard. An operational control approach was used, meaning that emissions from facilities and activities over which SWPS University has direct operational control were taken into account.

It is worth noting that buildings located in Kraków and Poznań were excluded from the inventory because the University does not own them and does not exercise operational control over them.

Glossary

2

Carbon footprint

This is the total amount of greenhouse gases (primarily carbon dioxide – CO₂) produced by human activity, an organization, or a product. It is expressed in tons of CO₂ equivalent (t CO₂e) to standardize different gases (e.g., methane, nitrous oxide).

Scope 1

Direct emissions come from fuels burned on-site, such as in boiler rooms, furnaces, and university vehicle engines (company cars). The university has full control over these emissions.

Range 3

These are indirect emissions that don't come directly from our operations or purchased energy, but rather from the entire supply and use chain. Examples include student and employee commuting, purchased goods and services (e.g., IT equipment, catering, furniture), emissions from business travel, waste management, cloud computing, and digital services.

Standard

GHG Protocol

This report was prepared based on ISO14064-1:2019 Part 1 and the GHG Protocol, which are international standards for reporting greenhouse gas emissions.

Scope 2

Indirect emissions resulting from the consumption of externally purchased energy, such as electricity and district heating. We don't produce these ourselves, but we benefit from the effects of their production.

Market based vs

Location-based

There are two methods for calculating the electricity footprint (Scope 2):
Location-based: assumes average emissions in the country (e.g. Polish energy mix).

Market-based: takes into account the specific choice of supplier – for example, if a university buys electricity from renewable energy sources with a guarantee of origin, the result may be much lower.

Methodology and scope of reporting

The report was prepared based on the GHG Protocol, data collected by the organization and emission indicators:

- Greenhouse gas reporting: conversion factors 2024. DEFRA
- The National Centre for Emissions Management (KOBiZE)

Electricity was calculated using the market-based method, which involves directly collecting data on greenhouse gas emissions per unit of energy from the producer.

The scope of GHG emissions included in the report:

- Scope 1 – direct emissions from mobile, stationary and fugitive sources
- Scope 2 – indirect emissions from purchased electricity and heat





Results

Total carbon footprint

The company's total carbon footprint for the period 01/01/2024 – 31/12/2024 is **1 705,05 tons of CO₂e**

1 705,05 t CO₂

Scope	Mg CO ₂ e
Scope 1	116,06
Scope 2	1 588,5

Table 1. Distribution of the organisation's carbon dioxide equivalent emissions into Scope 1 and 2.

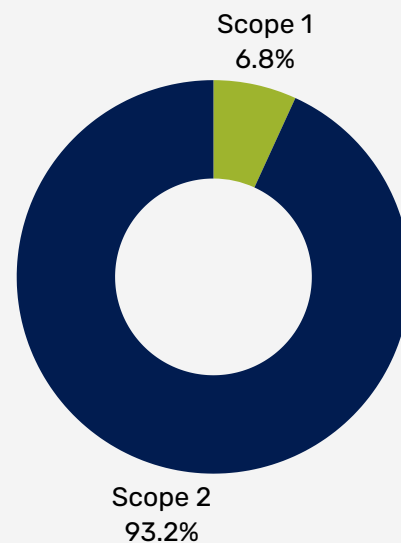


Figure 1: Distribution of Scope 1 and Scope 2 contributions to an organization's carbon footprint

93.2% of the company's emissions are in scope 2.

The largest factor influencing emissions is purchased heat, which accounts for 90% of total reported emissions.

The low share of scope 1 is influenced by the choice of a supplier with guarantees of origin/RES, which significantly reduces the reported electricity emissions.

GHG emission sources included in carbon footprint calculations – breakdown by reporting category

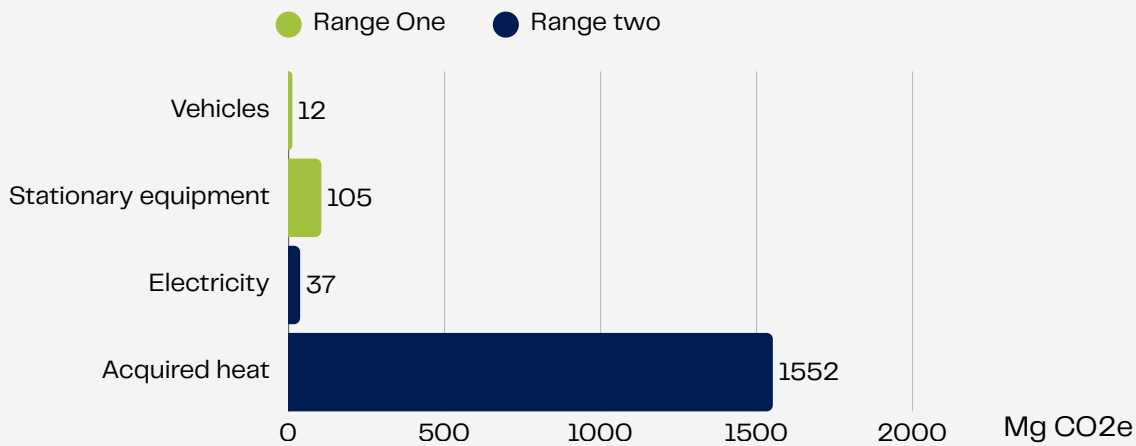


Figure 2: Distribution of the contribution of Scope 1 and 2 categories to an organisation's carbon footprint.

SCOPE 1

116.6 Mg CO₂e

In Scope 1, the largest source of emissions are stationary installations, which emitted 104.53 tonnes of CO₂e, which is equivalent to 89.6% of total emissions in this scope.

The primary source of these emissions was natural gas used in stationary equipment. Emissions from mobile vehicle use were significantly lower, at 12 tonnes of CO₂e (10.3% of Scope 1 emissions), while diesel fuel accounted for 12 tonnes of CO₂e.

Range 1 fuels were calculated using the average data* method, taking into account their volume.

Fugitive emissions in this area did not occur. This indicates that the main carbon footprint comes from fuel consumption in stationary installations.

*Average data – This is average greenhouse gas emissions data used to calculate carbon footprints when precise information from a specific supplier or process is not available. It is based on general values from databases, industry reports, or national statistics and is used to estimate environmental impact.

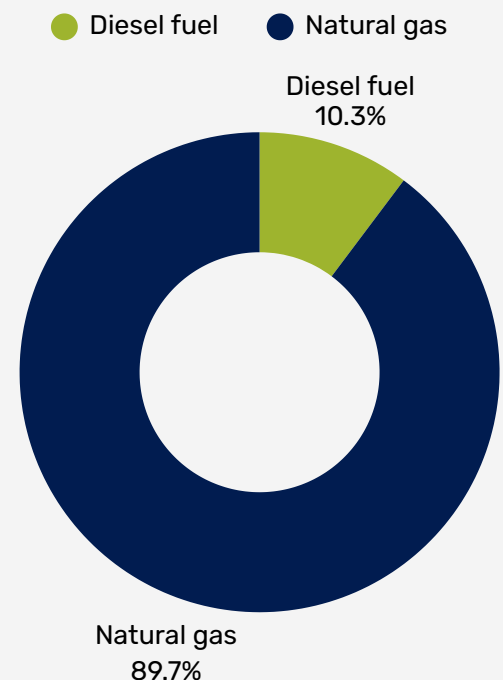


Figure 3: Distribution of Scope 1 category share in an organization's carbon footprint

SCOPE 2

Indirect emissions resulting from the purchase of electricity and heat from suppliers.

**1 588.45 Mg
CO₂e**

Comparing market-based to location-based energy

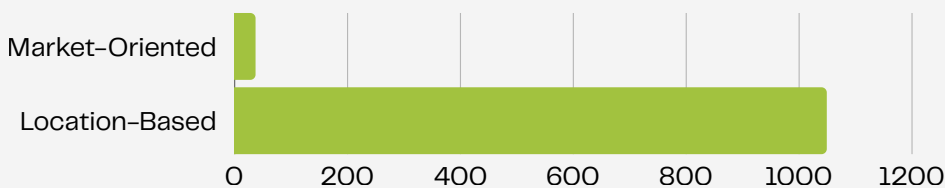


Chart 4: Comparison of Market Based to Location Based methods.

Emissions attributed to energy supplier Engie amounted to 36.8 tonnes of CO₂e, while emissions calculated using the location-based method reached 1048.5 tonnes of CO₂e. This means that choosing Engie as a supplier reduced emissions by approximately 95% compared to the average emissions of the national grid. Choosing a supplier with guarantees of origin/RES significantly reduces the reported emission intensity of electricity

Renewable energy

Renewable energy accounted for 5% of the total electricity purchased by SWPS University. Only 1,796,538 kWh of electricity was not covered by renewable energy certificates.



Chart 5: Share of renewable energy sources in reducing electricity emissions.

Distribution of emissions between locations

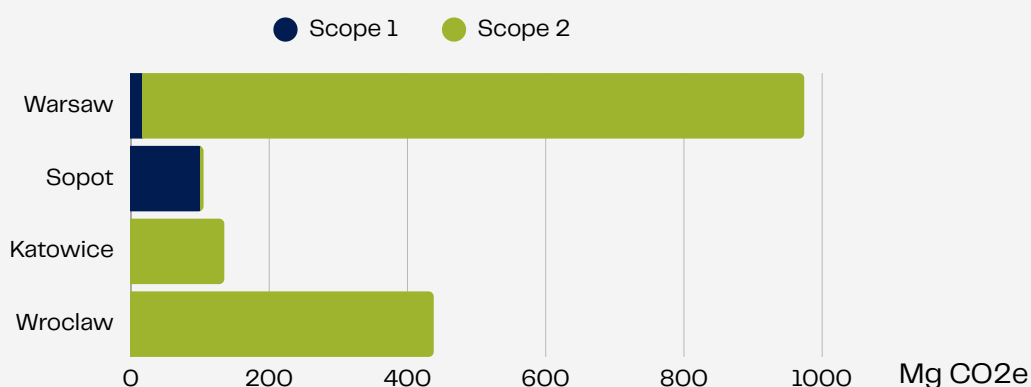


Figure 6: Distribution of Scope 1 and 2 emissions between locations.

The largest footprint is generated by Warsaw (mainly heat), followed by Wrocław; Sopot and Katowice significantly lower.

Location	Scope 1		Scope 2		Scope 1+2
	Vehicles	Stationary equipment	Energy	Warm	Addition
Warsaw	12	4	31	927	1027.4
Sopot	----	101	4	----	105
Katowice	----	----	3	132	135
Wrocław	----	----	1	437	438

Table 2: Distribution of Scope 1 and 2 emissions between locations.

Carbon footprint per employee in Scope 1 and 2 expressed in tons per person

The analysis included full-time employees.



Warsaw
1.65 t



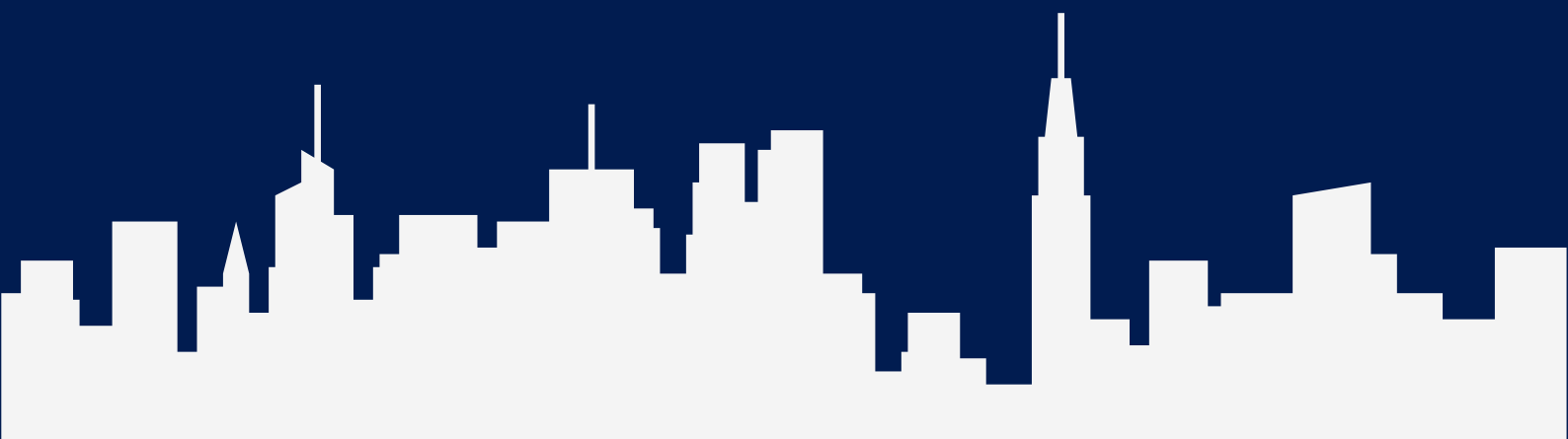
Sopot
1.42 t



Katowice
2.37 t



Wroclaw
3.0 t



Summary

Scope	Category	Subcategory	Mg CO ₂ e
Scope 1			116.61
	Vehicles		12.08
		Diesel fuel	12.08
	Stationary equipment		104.53
		Natural gas	104.53
Scope 2			1 588.45
	Electricity		36.8
		Market-Oriented	36.8
		Location-Based	1048.5
	Warm		1551.65

Table 4: Data summary.

The total greenhouse gas emissions for SWPS University in scope 1 and 2 amounts to 1 705.05 tonnes of CO₂ equivalent.



Purchased heat has the greatest impact - approximately 90% of total emissions.

1653 tons of CO₂e, how much is that?



Carbon footprint

SWPS University 2024

Key takeaways

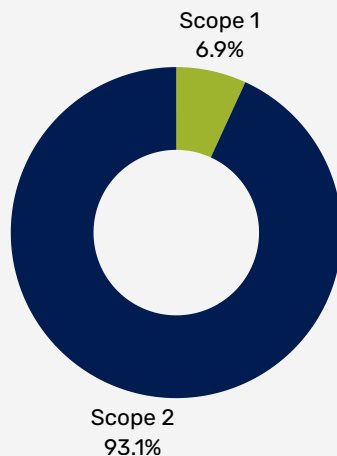
- District heating (Scope 2) accounts for ~90% of total emissions – this is the main area for reduction.
- Electricity has very low emissions thanks to the purchase of green energy.
- Warsaw and Wrocław generate the largest footprint due to the size of their campuses.
- Scope 1 (mainly gas in installations) is only 7% of the total, fleet emissions are minimal.

Total emissions
1705 Mg CO₂e

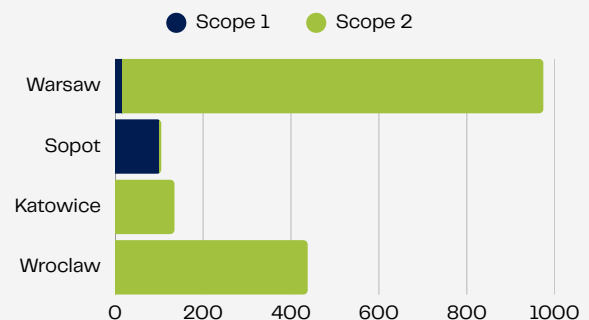
Scope 1
116 Mg CO₂e

Scope 2
1 588 Mg CO₂e

Distribution of scopes



By location



What we counted

Scope 1: fuels in stationary installations, university fleet.

Scope 2: electricity and purchased heat

Included locations: Warsaw, Wrocław, Katowice, Sopot.

Excluded locations: Kraków, Poznań (no building ownership).

Period covered: 1 January – 31 December 2024

How we did it

The data was entered by the operational teams into the Plan Be Eco tool.

The report was prepared based on the **GHG Protocol**, data collected by the organization and emission indicators:

- Greenhouse gas reporting: conversion factors 2024. DEFRA
- The National Centre for Emissions Management (KOBIZE)