



**Delivery Hero**

# **GHG Accounting**

## **Delivery Hero**

Accounting methodology 2022

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## Acronyms and Abbreviations

BEIS	United Kingdom Department for Business, Energy and Industrial Strategy
CH <sub>4</sub>	methane
CO <sub>2</sub>	carbon dioxide
CO <sub>2</sub> e	carbon dioxide equivalent
GHG	greenhouse gas
GWP	Global Warming Potential
IPCC	Intergovernmental Panel on Climate Change
HFCs	hydrofluorocarbons
kg	kilogram
N <sub>2</sub> O	nitrous oxide
PFCs	perfluorocarbons
SF <sub>6</sub>	sulphur hexafluoride
t	tonne
T&D	transmission and distribution
WRI	World Resources Institute
WTT	well-to-tank
UNFCCC	United Nations Framework Convention on Climate Change

## Common terms and definitions

### Region

A region describes a part of the world in which Delivery Hero has business activities. Currently the regions include Europe, Latin America (LATAM), Asia-Pacific (APAC) and the Middle East and Northern Africa (MENA).

### Entity

An entity describes the brand under which Delivery Hero operates in any given **market**.

### Market

A market describes all **entities** of Delivery Hero operating in a specific country.

### Delivery

A delivery includes one or more **orders** from any given **vertical**. Depending on the vertical it can be further specified into **marketplace delivery** or **own delivery**.

### Order

An order consists of all the items ordered from any given **vertical** by an individual Delivery Hero customer. An order might be delivered in several deliveries (i.e. in the case of large orders)

### Item

An item describes the smallest quantity of any good that can be ordered from any given **vertical** on Delivery Hero's platform.

### Marketplace delivery

A Marketplace delivery is a delivery not conducted by a Delivery Hero's entities rider.

### Own delivery

An own delivery is a delivery conducted by a Delivery Hero's entities rider.

### Stacking value

The stacking value represents the number of **orders** 'stacked', into a single **delivery**.

### Vertical

A vertical is a business line of Delivery Hero that serves a specific client need. This can be either a **restaurant** (main market), a **kitchen** (covering various types), a **Dmart**, or a **Vendor**. In addition, the Korean brand Woowa has three unique vertical types (**Baemin-specific**).

### Restaurant (Platform/Market)

A traditional (i.e. physical and public) restaurant offering the possibility of placing orders via Delivery Hero's platform in addition to its traditional business model. Orders may be delivered by the restaurant's employees themselves or be compiled by the restaurant's employees and handed over to a rider to deliver to the customers.

### Kitchens

#### Concept kitchen

Delivery Hero Concepts are virtual brands that are franchised out to external food operators (i.e. "Own Operated Kitchen") or existing restaurants. Delivery Hero's entities own the brands (e.g. trademark, menu creation) and provide the recipes. Orders can be delivered by Delivery Hero's entities riders or by other riders (i.e. both MD and OD).

### Virtual/Cloud kitchen

A virtual or a cloud kitchen is a leased kitchen area that is rented out to external food operators, in return for rental and other income. There are two types of cloud kitchens:

- **Spaces kitchen** – Cloud kitchens operated by Delivery Hero's entities excluding food preparation (i.e. Gen 1 kitchens). Orders can be delivered by Delivery Hero's entities riders or by other riders (i.e. both MD and OD).
- **Own Operated Kitchen** – Cloud kitchens operated by Delivery Hero's entities including food preparation; selling Delivery Hero's Concepts brands only (i.e. Gen 2 kitchens).

### Virtual restaurant

A virtual restaurant is a food brand developer with its own food preparation amenities, compiling meals (or parts of it) that are consecutively shock-frosted and sent off to traditional restaurants or virtual kitchens where they are defrosted and finalised on demand via orders from Delivery Hero's platform. Orders are compiled by the restaurant's or virtual kitchen's employees, handed over to a rider and delivered to the customers.

### Dmart

A Dmart is a retail or distribution centre intended exclusively for online purchases of a range of products from categories including, but not limited to, snacks, beverages, grocery and household and personal care products. Orders are compiled by the Dmart employees, handed over to a Delivery Hero's entities riders and delivered to the customers. Contrary to the third party vendors, Delivery Hero is acting as a principal (and not only as an agent) in this instance.

Note that in some countries or brands within Delivery Hero's operational control, these stores can be named differently (e.g. Bmart for Woowa), but are accounted for under the name Dmart for consistency.

### Vendors

Vendors are third-party stores that offer the possibility of placing orders via Delivery Hero's platform in addition to its traditional business model. Orders can be delivered by Delivery Hero's entities riders or by other riders (i.e. both MD and OD).

### Couriers / On-Demand-Riders (i.e. Delivery-as-a-Service)

Transport services initiated either by end customers or vendors/restaurants. Examples include PandaGo in APAC and Courier services in PedidosYa.

### Baemin Restaurant Supply

Baemin Restaurant Supply is a B2B service available in Korea (i.e. Woowa) intended exclusively for online purchases of a range of products from categories including, but not limited to, food ingredients and products, packaging and kitchen equipment. Orders are compiled and delivered to the restaurants by third party suppliers.

### Baemin Brand Store

Baemin Brand Store is a B2C service available in Korea and Vietnam (i.e. Woowa) intended exclusively for online purchases of own merchandise from categories including, but not limited to, stationary items, clothes, accessories and books. Orders are compiled and delivered to the customers by third party suppliers (fulfilment centre).

### Baemin Academy

Baemin Academy is an online and offline capacity-building service available in Korea (i.e. Woowa) intended exclusively to provide restaurant owners and entrepreneurs skills on diverse topics including, but not limited to, restaurant business, cooking, finance and legal.

# Introduction

South Pole, a leading climate protection solutions provider, supports Delivery Hero with defining its GHG methodology and with the GHG accounting of Delivery Hero's emissions.

Delivery Hero's GHG measurement program was rolled out gradually (see table 1).

**Table 1: Greenhouse gas accounting program roll out plan**

Project year	Regions
2019	Europe
2020	Europe, LATAM
2021	Global: Europe, LATAM, APAC, MENA
<b>2022<sup>1</sup></b>	<b>Global:</b> Europe, LATAM, APAC, MENA

This document includes a detailed description of the methodology used to measure the 2022 carbon footprint of LATAM, MENA, APAC and the European entities in order to identify areas for future reduction measures and disclose the emissions as part of the 2022 Non-Financial Report.

## Reporting Guidelines

### Reporting Standard

Delivery Hero's GHG accounting and reporting procedure is based on the ['The Greenhouse Gas Protocol: GHG Protocol: A Corporate Accounting and Reporting Standard – Revised Edition'](#) (GHG Protocol) and the complementary ['Corporate Value Chain \(Scope 3\) Accounting and Reporting Standard'](#) – the most widely used international accounting tools for government and business leaders to understand, quantify, and manage GHG emissions. The standards were developed in a partnership between the World Resources Institute (WRI) and the World Business Council for Sustainable Development (WBCSD).

### Unit of measure

For Delivery Hero's GHG accounting, the standardized unit type, tCO<sub>2</sub>e (tonnes of carbon dioxide equivalent), is used as defined in the GHG Protocol. tCO<sub>2</sub>e is a unit describing the global warming potential of different greenhouse gases as if they were all CO<sub>2</sub>. The overall carbon dioxide emissions (i.e. the carbon footprint) is calculated and expressed by multiplying the absolute emissions of each of the six greenhouse gases by their 100 year global warming potential (GWP) value (see Appendix).

### Emissions database used for calculations

Databases include well-renowned and publicly available sources from governmental bodies or institutions as well as licensed databases from private sector companies or agencies. In all instances, the most recent available data sets were used.

### Publicly available information

- Department for Business, Energy & Industrial Strategy, United Kingdom (BEIS)/Department for Environment Food and Rural Affairs (DEFRA) [2022](#)
- Emissions & Generation Resource Integrated Database ([eGRID](#))

<sup>1</sup> Each year the GHG methodology is reviewed and refined.

## Licensed databases

- The [Ecoinvent 3.9 database](#) (provides well-documented process data for thousands of products)
- [International Energy Agency](#) (IEA)
- [CEDA 5.0 database](#) (spend-based emission factors; Environmentally-Extended Input-Output Life Cycle Inventory)
- [Association of Issuing Bodies](#) (AIB)
- [Institute for Global Environmental Strategies](#) (IGES)

# 2022 GHG Accounting at Delivery Hero

## Operational boundaries - Introduction

Under the GHG Protocol, emissions are divided into direct and indirect emissions:

1. **Direct emissions** are those originating from sources owned or controlled by the reporting entity.
2. **Indirect emissions** are generated as a consequence of the reporting entity's activities, but occur at sources owned or controlled by another entity.

Direct and indirect emissions are divided into three scopes:

### Scope 1 (Direct Emissions)

Scope 1 includes all carbon emissions that can be directly managed by the organisation (direct GHG emissions). This includes the emissions from the combustion of fossil fuels in stationary and mobile sources (heating facilities on office premises, cars and others), carbon emissions generated by chemical and physical processes, as well as fugitive emissions.

### Scope 2 (Indirect Emissions)

Scope 2 includes indirect GHG emissions from the generation of electricity, steam, heat or cooling purchased from external energy providers by the reporting entity.

### Scope 3 (Indirect Emissions)

Scope 3 includes the remainder of indirect emissions that are a consequence of the reporting entity's business activities.

## Operational boundaries at Delivery Hero

The following is Delivery Hero's internal differentiation between two types of emissions:

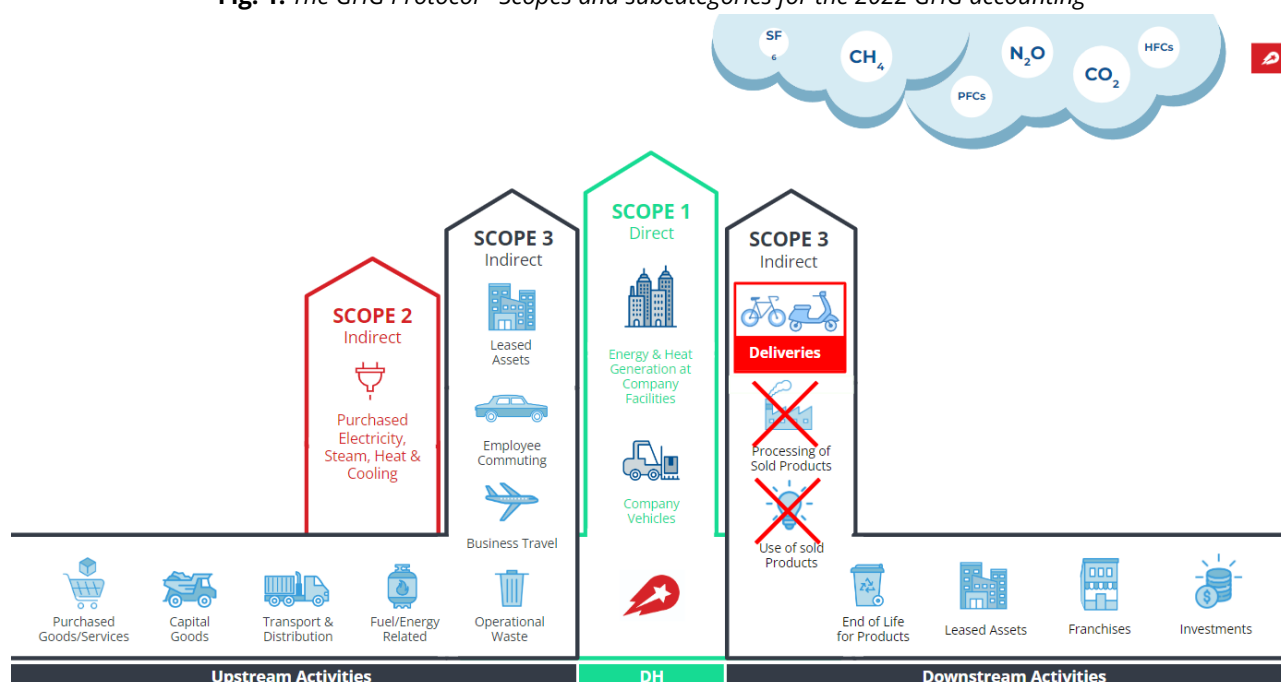
- 1) **Deliveries emissions<sup>2</sup>** (related to Category 9, under Scope 3: "Downstream transportation and distribution") - These are the emissions created from the deliveries of the food, groceries and other goods ordered via Delivery Hero's platforms and delivered to the customers (both from own delivery and marketplace delivery).
- 2) **Corporate emissions** - All other emissions sources, including Delivery Hero's operational emissions from: (1) Offices (2) Dmarts and (3) Kitchens.

The relevant Scopes and emission sources for Delivery Hero are presented in In Fig. 1. Following a materiality assessment of the emission sources, a range of categories has been identified as either not applicable or irrelevant in the context of Delivery Hero's reporting framework for 2022. All remaining activities and scopes are deemed relevant for the constitution of a comprehensive picture of Delivery Hero's total direct and indirect 2022 GHG emissions. The materiality assessment is conducted every year in light of the previous year's results and the changes in the business activities between the years.

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<sup>2</sup> In 2022 Cradle2Grave restaurants' packaging emissions were excluded from C3.9 and accounted for under C3.12, therefore, they are addressed as "Corporate" emissions.

**Fig. 1: The GHG Protocol - Scopes and subcategories for the 2022 GHG accounting**



## 2022 Organisational boundaries at Delivery Hero

The list of Delivery Hero's markets and brands for which emissions were included in the 2022 carbon footprint measurement is presented in Table 2.

**Table 2: 2022 Organizational boundaries - Markets and brands**

Market	Brand	Market	Brand
APAC			
<b>Australia</b>	<i>Tabsquare</i> <sup>3</sup>	<b>Philippines</b>	<i>foodpanda</i>
<b>Bangladesh</b>	<i>foodpanda</i>		<i>foodpanda</i>
<b>Cambodia</b>	<i>foodpanda</i>	<b>Singapore</b>	<i>DH APAC</i> <sup>4</sup>
<b>Hong Kong</b>	<i>foodpanda</i>		<i>Tabsquare</i>
<b>Indonesia</b>	<i>Tabsquare</i>	<b>Taiwan</b>	<i>foodpanda</i>
<b>Japan</b> <sup>5</sup>	<i>foodpanda</i>	<b>Thailand</b>	<i>foodpanda</i>
<b>Korea</b>	<i>Baemin</i> <sup>6</sup>	<b>Vietnam</b> <sup>7</sup>	<i>Baemin</i> <sup>8</sup>
<b>Laos</b>	<i>foodpanda</i>		
<b>Malaysia</b>	<i>foodpanda</i>		
<b>Myanmar</b>	<i>foodpanda</i>		
<b>Pakistan</b>	<i>foodpanda</i>		

<sup>3</sup> Tabsquare was acquired by Delivery Hero at the end of 2021. Tabsquare offers restaurant management and customer engagement platforms, both as a software (e.g. CRM) and as an Hardware (e.g. SmartKiosk for self service in restaurants). They are operating in 5 markets: Singapore, Malaysia, Indonesia and Australia. Offices exist only in Indonesia and Singapore.

<sup>4</sup> foodpanda APAC regional headquarters in Singapore.

<sup>5</sup> The market was divested in January 2022.

<sup>6</sup> Baemin Korea has unique verticals, such as: Baemin Restaurant Supply (B2B e-commerce), Baemin Brand Store (B2C e-commerce) and Baemin Academy (B2B on site and online Learning Experience).

<sup>7</sup> Baemin Vietnam has a unique vertical: Baemin Studio (B2C e-commerce), however, it was not active in 2022.

<sup>8</sup> Some of the virtual kitchens in Vietnam purchase their own ingredients (as opposed to the traditional virtual kitchen model where the ingredients are purchased by the kitchen's operators and not by Delivery Hero).



Market	Brand	Market	Brand
<b>Europe</b>			
<b>Austria</b>	<i>mjam</i>	<b>Hungary</b>	<i>foodpanda</i>
<b>Cyprus</b>	<i>foody</i>	<b>Monaco</b>	<i>Mr. Room Service<sup>9</sup></i>
<b>Czech Republic</b>	<i>Dáme Jídlo</i>	<b>Norway</b>	<i>foodora</i>
<b>Denmark</b>	<i>foodora<sup>10</sup></i>	<b>Slovakia</b>	<i>foodpanda</i>
<b>Finland</b>	<i>foodora</i>	<b>Sweden</b>	<i>foodora</i>
<b>Germany</b>	<i>DHSE<sup>11</sup></i>		
	<i>foodpanda<sup>12</sup></i>		
	<i>Honest Food<sup>13</sup></i>		
	<i>Smunch<sup>14</sup></i>		
<b>Greece</b>	<i>efood</i>		
	<i>Alpha Distribution (efood)<sup>15</sup></i>		
	<i>INKAT (efood)<sup>16</sup></i>		
	<i>Instashop<sup>17</sup></i>		
<b>LATAM</b>			
<b>Argentina</b>	<i>PedidosYa</i>	<b>Panama</b>	<i>PedidosYa</i>
<b>Bolivia</b>	<i>PedidosYa</i>	<b>Paraguay</b>	<i>PedidosYa</i>
<b>Chile</b>	<i>PedidosYa</i>	<b>Peru</b>	<i>PedidosYa</i>
<b>Costa Rica</b>	<i>PedidosYa</i>	<b>Uruguay</b>	<i>PedidosYa</i>
<b>Dominican Republic</b>	<i>PedidosYa</i>	<b>Venezuela</b>	<i>PedidosYa</i>
	<i>Hugo<sup>18</sup></i>		
<b>Ecuador</b>	<i>PedidosYa</i>		
<b>El Salvador</b>	<i>PedidosYa</i>		
	<i>Hugo<sup>19</sup></i>		
<b>Guatemala</b>	<i>PedidosYa</i>		
	<i>Hugo<sup>20</sup></i>		
<b>Honduras</b>	<i>PedidosYa</i>		
	<i>Hugo<sup>21</sup></i>		
<b>Jamaica</b>	<i>Hugo<sup>22</sup></i>		
<b>Nicaragua</b>	<i>PedidosYa</i>		

<sup>9</sup> Joined Delivery Hero in March 2022.

<sup>10</sup> Previously known as Hungry.dk, rebranded in 2022.

<sup>11</sup> Delivery Hero's headquarters in Berlin.

<sup>12</sup> Operated as an "Innovations hub" - service that is available only to Delivery Hero employees with limited deliveries areas in Berlin.

<sup>13</sup> Honest Food operates as a virtual restaurant.

<sup>14</sup> Joined Delivery Hero in February 2022. Smunch is an online Canteen that delivers lunch to offices' employees.

<sup>15</sup> Acquired by efood in July 2022. Alpha provides wholesale/warehousing and distribution services, including retail products procurement

<sup>16</sup> Acquired by efood in July 2022. Dmarts, kiosks and other physical stores are operated under INKAT, some as franchises.

<sup>17</sup> InstaShop is a MENA brand that operates in Europe (Greece).

<sup>18</sup> Joined Delivery Hero in Nov 2022. Migrated to PeYa at the end of Nov 2022.

<sup>19</sup> Joined Delivery Hero in Nov 2022. Migrated to PeYa in the beginning of 2023.

<sup>20</sup> Joined Delivery Hero in Nov 2022. Migrated to PeYa at the end of Nov 2022.

<sup>21</sup> Joined Delivery Hero in Nov 2022.

<sup>22</sup> Joined Delivery Hero in Nov 2022.

Market	Brand	Market	Brand
<b>MENA</b>			
<b>Bahrain</b>	<i>HungerStation</i>	<b>Oman</b>	<i>InstaShop</i>
	<i>InstaShop</i>		<i>talabat</i>
	<i>talabat</i>	<b>Qatar</b>	<i>InstaShop</i>
<b>Egypt</b>	<i>InstaShop</i>		<i>talabat</i>
	<i>talabat</i>		<i>Carriage<sup>23</sup></i>
<b>Iraq</b>	<i>talabat</i>	<b>Turkey</b>	<i>Yemeksepeti</i>
<b>Jordan</b>	<i>talabat</i>	<b>United Arab Emirates</b>	<i>InstaShop</i>
<b>Kingdom of Saudi Arabia</b>	<i>DH KSA<sup>24</sup></i>		<i>talabat</i>
	<i>HungerStation</i>		<i>Zomato<sup>25</sup></i>
	<i>InstaShop</i>		<i>Sweetheart Kitchens<sup>26</sup></i>
	<i>talabat</i>		
<b>Kuwait</b>	<i>talabat</i>		
	<i>Sweetheart Kitchens<sup>27</sup></i>		
<b>Lebanon</b>	<i>InstaShop</i>		

<sup>23</sup> Carriage in Qatar is a separate brand from Talabat as opposed to Carriage Egypt which is part of Talabat.

<sup>24</sup> Orders are delivered by HungerStation.

<sup>25</sup> Zomato is a company with central operations in India - Delivery Hero only owns the UAE business. Operations closed in Nov 2022.

<sup>26</sup> Orders are delivered by Talabat. The brand was closed by the end of 2022.

<sup>27</sup> Orders are delivered by Talabat. The brand was closed by the end of 2022.

## 2022 GHG Emission sources

Table 3 displays all the relevant emission sources for Delivery Hero's 2022 GHG accounting from direct and indirect sources. For more details about each emission source and the methodology used to calculate its carbon footprint, please refer to the column "Calculation Methodology (brief)".

**Table 3:** 2022 Emission sources from Delivery Hero's activities according to GHG Protocol

Scope	Activity/Category	Description	Calculation methodology (brief)
<b>Scope 1</b> GHG emissions from sources owned or controlled by the company	Stationary combustion	Fuels consumption for owned heating systems	Calculations based on primary input data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable).
	Mobile combustion	Emission from the usage of vehicles (leased and owned cars)	Calculations based on primary input data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Emission factors are based on distance, fuel type or spend information.
	Fugitive emissions	Cooling agents used by refrigeration and air conditioning installations	Calculations based on methodology for leakage estimates by ADEME (French Environment and Energy Management Agency) for typical yearly leakage per size of the site, broken down per month of operation. In cases where primary refill information was available, this was applied. Accounting for losses of cooling agents was done by means of a simplified material balance method, namely by considering records showing any removals and additions ("top-ups") of refrigerant during servicing, installation and decommissioning as equivalent to leaked amounts. Emission factors are based on the cooling agent's GWP values from the IPCC.
<b>Scope 2</b> Electricity indirect GHG emissions	Electricity consumption	Electricity consumption at sites under operational control	Calculations based on primary input data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Emission factors (market-based emissions as default) are country and/or grid-specific (e.g. EIA, AIB).
	District heating/cooling	Energy consumption purchased from external heating/cooling system for sites under operational control	Calculations based on primary input data. Emission factors are based on supplier-specific information used as proxies per region.

Scope	Activity/Category	Description	Calculation methodology (brief)
<b>Scope 3</b> Indirect GHG emissions caused by Delivery Hero's activities but owned / controlled by another	Category 1: Purchased Goods and Services:  <i>Rider equipment</i>	Any equipment for the use of Delivery Hero's riders, that was paid for in 2022	Calculations based on primary spend data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Cost-based emission factors by CEDA were applied.
	Category 1: Purchased Goods and Services:  <i>Marketing materials</i>	Marketing material items (excluding Delivery Hero's packaging) that were paid for in 2022	Calculations based on primary spend data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Cost-based emission factors by CEDA were applied.
	Category 1: Purchased Goods and Services:  <i>Own packaging</i>	Cradle2Grave emissions from packaging procured directly by Delivery Hero and distributed to the different verticals (e.g. branded bags) <sup>28</sup>	Calculations based on primary input data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Emission factors are based on South Pole internal databases and Ecoinvent.
	Category 1: Purchased Goods and Services:  <i>Groceries and shop products for Dmarts</i>	Groceries and shop products, i.e. retail's products, that were paid for in 2022, including ingredients for Virtual restaurants.	Calculations based on primary input data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Cost-based emission factors by CEDA were applied.
	Category 1: Purchased Goods and Services:  <i>Kitchens' construction</i>	Emissions from new kitchens' construction work	Calculations are based on primary data of spend for construction and fitting of new kitchens, paid for by Delivery Hero. Cost-based emission factors by CEDA were applied.

<sup>28</sup> For actionability of the footprint, the full life cycle emission of procured packaging was allocated in one category. Note, in 2022, the majority of packaging emissions resulted from non-procured packaging (i.e. restaurants packaging), which was allocated under C12.

Scope	Activity/Category	Description	Calculation methodology (brief)
<b>Scope 3</b> Indirect GHG emissions caused by Delivery Hero's activities but owned / controlled by another	Category 1: Purchased Goods and Services:  <i>Cloud services</i>	Emissions from the use of cloud services due to energy consumption	Emissions based on primary sources by the provider.
	Category 1: Purchased Goods and Services:  <i>Other</i>	All other purchased goods and services, e.g. office supplies, catering, cleaning services, maintenance services, etc.	N/A
	Category 2: Capital goods  <i>Dedicated hardware</i>	Dedicated hardware items that were paid for in 2022 and are used to process the orders from the platforms (i.e. POS devices)	Calculations based on primary spend data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Cost-based emission factors by CEDA were applied.
	Category 2: Capital goods  <i>Site equipment</i>	Dmarts', Virtual kitchens' and other sites' equipment that was paid for in 2022	Calculations based on primary spend data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Cost-based emission factors by CEDA were applied.
	Category 2: Capital goods  <i>IT hardware</i>	IT hardware items owned by the company and paid for in 2022	Calculations based on primary input data (if available) or extrapolated based on regional averages per vertical (if primary data was unavailable). Emission factors are based on South Pole internal databases and Ecoinvent.
	Category 2: Capital goods  Vehicles	Vehicles that were procured in 2022	Calculations based on primary input data or extrapolated based on regional averages per vertical (if primary data was unavailable). Emission factors are based on South Pole internal databases and Ecoinvent.
	Category 3: Energy-related Activities	Well-to-tank (WTT) emissions of fuels used in combustion engines or other energy-generating machinery	Calculations corresponding to data and extrapolations for Scopes 1 and 2. Emission factors are based on the BEIS database and/or country and/or grid-specific factors (e.g. EIA, AIB).

Scope	Activity/Category	Description	Calculation methodology (brief)
<b>Scope 3</b> Indirect GHG emissions caused by Delivery Hero's activities but owned / controlled by another		Well-to-tank (WTT) emissions of fuels used in combustion engines or other energy-generating machinery (upstream) Transmission and Distribution losses (T&D) from power lines (downstream)	
	Category 4: Upstream Transportation and Distribution	Sea, air, rails and road transportation from Tier-1 suppliers, including inbound and outbound shipments	Calculations were based on approximations using the emissions from 2021 calculations, for simplification, using the emissions ratio of procurement categories in Category 1 and 2 (excluding groceries and shop products) to total shipment emissions in 2021. This reflects both inbound transportation (i.e. from the direct supplier to an intermediate station, such as the office or a logistics centre) and outbound transportation (i.e. from an intermediate station to the destination). Modes of transportation include air freight, rail and road transport as well as waterway shipping. Emission factors are based on BEIS.
	Category 5: Waste	Daily waste from offices, virtual restaurants and Dmarts (including disposal of spoiled/unsold products)	Calculations of operational waste on sites was based on primary data (volumes) for Dmarts/Virtual restaurant, and estimates by waste type for offices based on volumes data collected in 2021 per country (or based on regional averages if primary data was unavailable). The emissions from the disposal of spoiled/unsold products were approximated via the spend data and the typical share of end-of-life emissions per product type (largely food waste) Emission factors per waste type are based on BEIS and regional waste management scenarios by waste category ( <a href="#">World Bank Report</a> ). Waste from kitchens was not under operational control.
	Category 6: Business travel:  <i>Air travel</i>	Business flights	Calculations based on primary input data (if available), extrapolated data or conservative assumptions (if primary data was unavailable). Emissions based on DEFRA 2021 (RFI = 1.9).
	Category 6: Business travel:	Rental cars, taxis, buses, trains, etc. and use of employees' cars (i.e. reimbursed costs)	Calculations based on primary input data (if available), extrapolated data or conservative assumptions (if primary data was unavailable). Emission factors are based on BEIS.

Scope	Activity/Category	Description	Calculation methodology (brief)
<b>Scope 3</b>  Indirect GHG emissions caused by Delivery Hero's activities but owned / controlled by another	<i>Ground transportation</i>		
	Category 6: Business travel:  <i>Hotel overnight stays</i>	Hotel overnight stays	Calculations based on primary input data (if available), extrapolated data or conservative assumptions (if primary data was unavailable). Emission factors are based on South Pole internal databases.
	Category 7: Employees commuting	Employee ground transportation to and from work. The data was obtained via an employees online-survey	Calculations based on primary input data collected via qualtrics for commuting and work from home patterns, and extrapolated for the total headcount by country. Emission factors are based on BEIS 2021 databases and <a href="https://www.mobitool.ch">mobitool.ch</a> . Incremental emissions from working from home were calculated following the <a href="#">Anthesis 2021</a> methodology.
	Category 8: Upstream leased assets	Scope 1 and 2 emissions from the use of shared office spaces, Woowa's BRS and Woowa's brand stores fulfilment centres (sites that are leased/managed externally - no operational control)	Calculations based on primary input data (if available), extrapolated data or conservative assumptions (if primary data was unavailable). Emissions factors are extrapolated.
	Category 9: Downstream transportation and distribution	Deliveries emissions from Delivery Hero's Own Deliveries and from Marketplace Deliveries	Calculations based on primary input data from Delivery Hero's databases (distances) and a survey (stacking value). Emission factors are based on BEIS 2021 (distances). Stacking value and marketplace mobility types has been estimated based on a survey from 2021.
	Category 10: Processing of sold products	I.e. emissions from food production and from cooking the food	N/A - excluded
	Category 11: Use of sold products	I.e. emissions from food waste	N/A - excluded

Scope	Activity/Category	Description	Calculation methodology (brief)
<b>Scope 3</b> Indirect GHG emissions caused by Delivery Hero's activities but owned / controlled by another	Category 12: End-of-life treatment of sold products	Cradle2Grave emissions from the waste disposal and treatment of sold products, i.e. restaurants food packaging	Calculations based on extrapolated input data. Emission factors based on secondary sources ( <a href="#">World Bank Report</a> ).
	Category 13: Downstream leased assets	Scope 1 and 2 emissions from these sites are covered, calculated based on secondary data (regional averages per vertical of owned facilities).	Scope 1 and 2 emissions from these sites are covered, calculated based on secondary data (regional averages per vertical of owned facilities).
	Category 14: Franchises	Scope 1 and 2 emissions of businesses that operate by 3rd parties under Delivery Hero's branding, i.e. concept kitchens and franchised Dmarts	Scope 1 and 2 emissions from these sites are covered, calculated based on secondary data (regional averages per vertical of owned facilities).
	Category 15: Investments	Emissions associated with Delivery Hero's investments in 2022	Financed emissions of Delivery Hero's investments are covered based on secondary emissions data for the invested amounts by sector, in accordance with the Category 15 guidance of the GHGP and PCAF guidance for financed emissions from equity investment.



# Appendix

## Supplementary Information

### Global Warming Potential (GWP)

Global Warming Potential (GWP) is a measure of the climate impact of a GHG compared to carbon dioxide over a specified time horizon. GHG emissions have different GWP values depending on their efficiency in absorbing longwave radiation, and the atmospheric lifetime of the gas. The GWP values used in GHG accounting include the six GHGs covered by the United Nations Framework Convention on Climate Change (UNFCCC) and Kyoto Protocol and combinations of these, as presented in Table 4. These are the GWPs used by the UK Department for Business, Energy and Industrial Strategy (BEIS) and are based on the 'Intergovernmental Panel on Climate Change (IPCC) Fourth Assessment Report (AR4)'. Although the 'AR5' is more recent, it has not been accepted internationally by all stakeholders.

**Table 4:** Applied global warming potentials (GWP)

GHG	GWP (100 years)	Unit
Carbon dioxide (CO <sub>2</sub> )	1	kgCO <sub>2</sub> e/kg
Methane (CH <sub>4</sub> )	28	kgCO <sub>2</sub> e/kg
Nitrous oxide (N <sub>2</sub> O)	265	kgCO <sub>2</sub> e/kg
Hydrofluorocarbons (HFCs)	<a href="#">See IPCC AR5, Table 8.A.1</a>	kgCO <sub>2</sub> e/kg
Perfluorocarbons (PFCs)	<a href="#">See IPCC AR5, Table 8.A.1</a>	kgCO <sub>2</sub> e/kg
Sulphur hexafluoride (SF <sub>6</sub> )	22,800	kgCO <sub>2</sub> e/kg

(Source: IPCC AR5, 2014)

## References

IPCC, 2014: Climate Change 2014: Synthesis Report. Contribution of Working Groups I, II and III to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change [Core Writing Team, R.K. Pachauri and L.A. Meyer (eds.)]. IPCC, Geneva, Switzerland, 151 pp.

WRI & WBCSD (2004), *Greenhouse Gas Protocol: A Corporate Accounting and Reporting Standard*, Revised edition, World Resources Institute and World Business Council for Sustainable Development, Washington, DC.

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