

2023  
Greenhouse Gas Statement





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# 1. Foreword

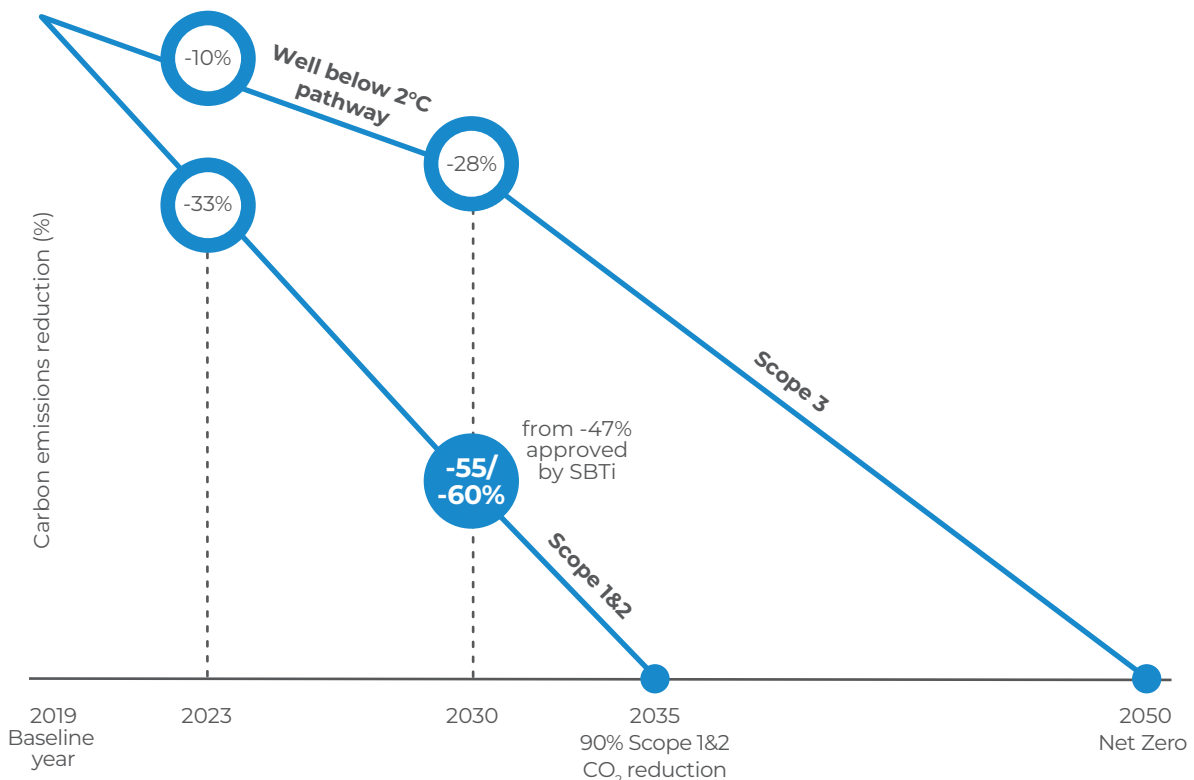
Prysmian (hereinafter the “Group”) is world leader in the supply of cables and systems for energy and telecommunications. With 150 years of experience, Prysmian’s story traces the history of the entire cable industry. With a turnover exceeding 15 billion euros and around 30,000 employees, its strong international footprint is confirmed by its presence in more than 50 countries with 108 plants. The evolution of the Group over the years has not only underscored the expansion of its know-how and technological capabilities, but also its operational ability to identify synergies and reduce costs, thereby becoming an industry leader in operational efficiency. The Group offers the widest possible range of products, services, technologies, and know-how for every type of industrial application thanks to a widespread commercial presence, 26 R&D centers in EMEA, North and South America and APAC and 1,000 qualified R&D professionals. Group R&D is responsible for the overall innovation strategy, aimed at making Prysmian a key player in the value chain supporting the Energy Transition, Digitalization and Sustainability.

Prysmian’s sustainability strategy is based on two ambitions that guide the Group’s actions over the medium and long term: the Climate Change Ambition and the Social Ambition. The former seeks to position the Group as one of the main technological players in the transition to low-carbon energy.

Prysmian has the following Near-Term and Net-Zero Targets approved by SBTi in 2023:

- **Near-Term Targets**  
Prysmian is committed to reducing absolute scope 1 and 2 GHG emissions by 47% by 2030 using 2019 as the base year. Prysmian is also committed to reducing absolute scope 3 GHG emissions by 28% within the same timeframe.
- **Long-Term Targets**  
Prysmian is committed to reducing absolute scope 1 and 2 GHG emissions by 90% by 2035 using 2019 as the base year, and to maintaining at least a 90% absolute reduction through 2050. Prysmian is also committed to reducing absolute scope 3 GHG emissions by 90% by 2050 using 2019 as the base year.
- **Overall Net-Zero Target**  
Prysmian commits to reach net-zero GHG emissions throughout the value chain by 2050. In keeping with the net-zero trajectory approved by SBTi, in January 2024 Prysmian set the objective for 2030 of reducing Scope 1 and 2 emissions between 55% and 60%, well above the 47% approved by SBTi.

## Climate Change Ambition



During the long-term targets' approval process, Prysmian – at SBTi's request – recalculated some Scope 3 categories. The main changes involved updating the emission factors for metals (excluding the emission factor reduction related to material recyclability) and the method of calculating transport-related emissions (including Well-To-Tank emissions). Moreover, the contribution of emissions due to the commuting of Prysmian employees was estimated by fine tuning the calculation on the number of actual Prysmian employees. Therefore, the value of Scope 3 for 2022 has been revised from what was published in the 2022 Report as in the table below.

GHG Scope	Category	Total Emissions (t CO <sub>2</sub> e)
Scope 3 (2022-Restated)	1a: Purchased goods and services (product)	11,164,114
	1b: Purchased goods and services (non-product)	622,925
	2: Capital goods	187,011
	3: Fuel and energy related activities	226,657
	4: Upstream transportation and distribution	447,529
	5: Waste generated in operations	115,294
	6: Business travel	14,750
	7: Employee commuting	51,893
	8: Upstream leased assets	499
	9: Downstream transportation and distribution	29,528
	10: Processing of sold products	
	11a: Use of sold products (Direct)	261,933,323
	12: End-of-life treatment of sold products	48,770
	15: Investments	101,390

This statement reports the greenhouse gas (GHG) emissions relevant to the Group in the calendar year ended on December 31, 2023. It follows the operational consolidation approach as described in the GHG Protocol with respect to Scope 1, 2, and 3 emissions.

All the GHG figures have already been reported within the Non-Financial Statement included in the Group's Annual Report, published in the financials in compliance with Italian Legislative Decree no. 254/2016 and subject to limited audit. The same figures have been reported also in the Group's Sustainability report, which is also subject to limited audit.

## 2. Scope

This Statement on 2023 GHG emissions includes:

### Scope 1

direct emissions from fuel combustion and fugitive emissions<sup>1</sup>

### Scope 2

indirect emissions from the generation of purchased energy

### Scope 3

other indirect emissions generated consequently to the Group's operations, but which occur outside its specific control

All emission sources are assessed on an annual basis to confirm that the exclusion from the inventory of smaller Scope 1 and 2 sources have a material impact not exceeding a 5% quantitative threshold, as well as to confirm the non-relevance of the Scope 3 categories excluded from the perimeter.

The reporting period refers to the calendar year from January 1, 2023, to December 31, 2023.

The disclosure relates to all operations and subsidiaries either owned or under the operational control of the Group as also outlined in the 2023 Sustainability Report (namely the 2023 Non-Financial Statement included in the 2023 Integrated Annual Report and the 2023 Sustainability Report) within the "Methodological note," reviewed by EY SpA that issued a limited audit report with no findings of note.

<sup>1</sup> It should be noted that refrigerant gas refills, which are considered to quantify the relative fugitive emissions, do not occur consistently every year but are instead carried out intermittently (according to need) even at long-term intervals, resulting in a minimally linear trend, with possible fluctuations up and down.

### 3. Reported GHG gases

The greenhouse gas emissions included in this statement are CO<sub>2</sub>, HFCs, PFCs and SF<sub>6</sub>. Unless otherwise specified, CH<sub>4</sub> and N<sub>2</sub>O are included in all the emission factors (for instance for all the combustion-related activities), as the unit of measure is CO<sub>2</sub>eq. Direct emissions of CH<sub>4</sub> and N<sub>2</sub>O have been assessed and are not material to the overall emissions.

Reported GHG emissions are expressed in CO<sub>2</sub>eq, the universal unit of measurement to indicate the global warming potential (GWP), which represents the standardized way to compare the warming effects of different greenhouse gases based on the amount of heat they trap in the atmosphere and the duration they persist.

The GWPs used in the calculation of CO<sub>2</sub>eq are based on the Intergovernmental Panel on Climate Change (IPCC) Fifth Assessment Report (AR5) over a 100-year period. As for refrigerant gases, the GWP associated with those gases has been considered. The oxidation factor is always assumed to be equal to 1.



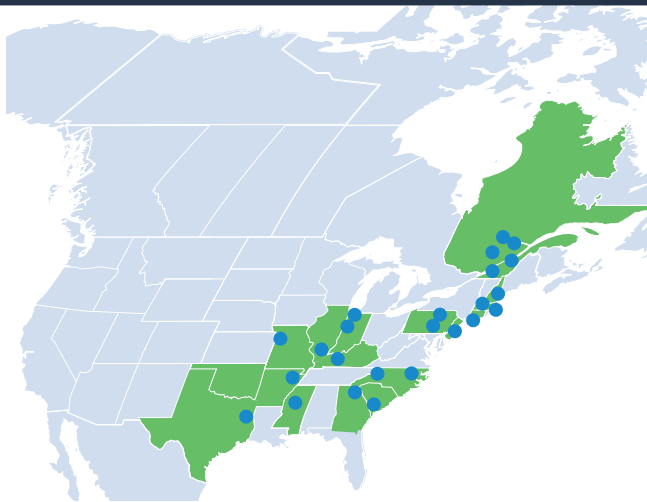
# 4. Reporting perimeter & Inventory boundary

## Relevance

A worldwide perimeter has been assumed for the calculation, thus including all the GHG emissions under the Group's operational control. A company has control over an operation if the former or one of its subsidiaries has the full authority to introduce and implement its operating policies. In general, for all data analyzed by geographical area, North America, Latin America, EMEA, and APAC regions were considered. Furthermore, due to the materiality threshold, the offices were excluded except for those located within production sites.

### North America

24 plants



#### Canada

- Oshawa
- Prescott
- Saguenay QC - Lapointe
- St. Jerome
- St. Maurice

#### USA

- Abbeville
- Bridgewater
- Claremont
- Du Quoin
- Indianapolis
- Jackson
- Lawrenceburg
- Lexington
- Lincoln
- Manchester
- Marion
- Marshall
- North Dighton
- Paragould
- Rocky Mountain
- Schuylkill Haven
- Sedalia
- Williamsport
- Willimantic

### Latin America

13 plants



#### Argentina

- La Rosa

#### Brazile

- Joinville
- Poços de Caldas
- Sorocaba Eden
- Sorocaba Fiber
- Vila Velha

#### Cile

- Santiago

#### Colombia

- Bogotá

#### Costa Rica

- Heredia

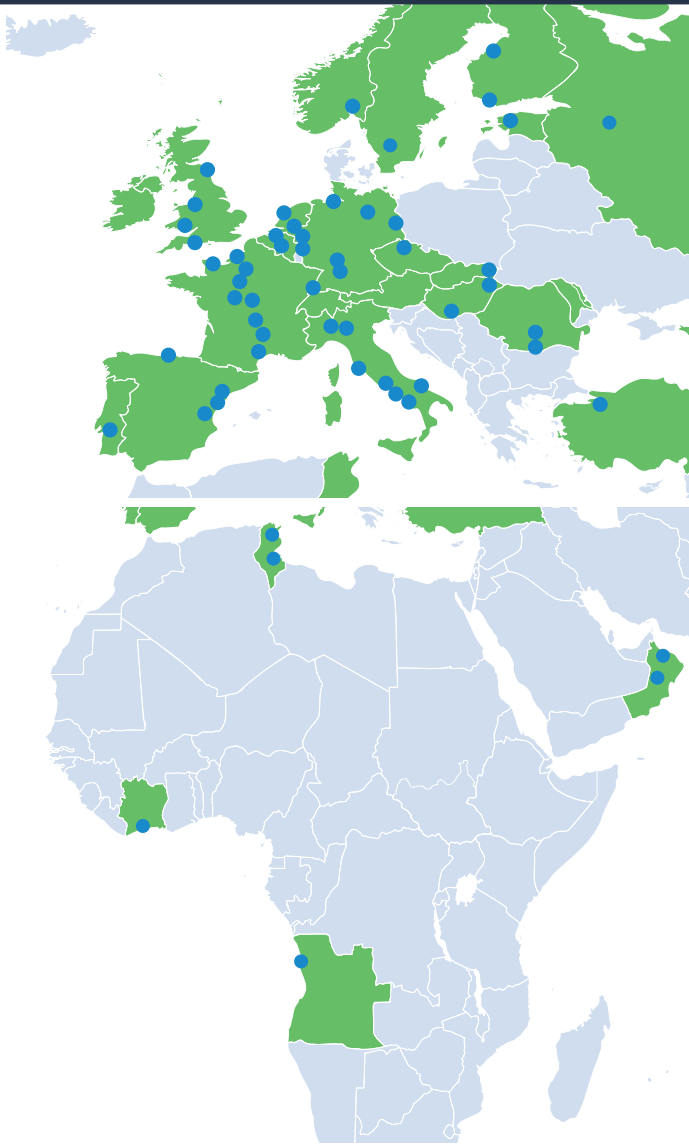
#### Messico

- Durango
- Nogales
- Piedras Negras
- Tetla

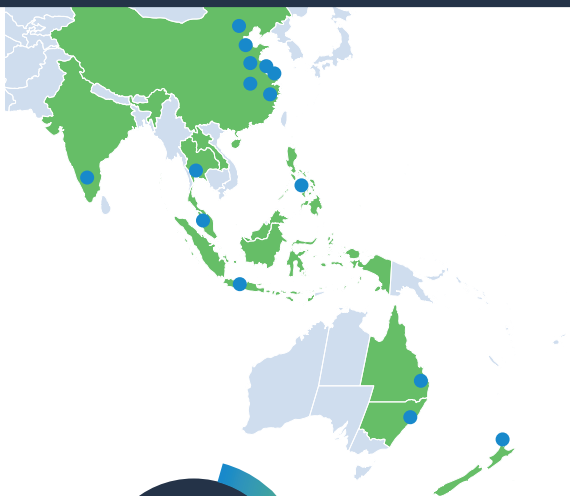
+50  
countries

108  
plants





- Angola**  
Luanda, Angola
- Czech Republic**  
Velké Meziříčí
- Estonia**  
Keila
- Finland**  
Oulu (Finland)  
Pikkala
- France**  
Amfreville  
Calais  
Charvieu  
Chavanoz  
Cornimont  
Douvrin  
Gron (Sens)  
Montereau  
Paron  
Sainte Geneviève
- Germany**  
Baesweiler (Colonia)  
Berlino  
Neustadt  
Nordenham Plant  
Norimberga  
Schwerin  
Wuppertal
- Hungary**  
Balassagyarmat  
Kistelek
- Italy**  
Arco Felice  
Battipaglia F.O.S. S.r.l.  
Giovinazzo  
Livorno  
Merlino  
Pignataro Maggiore  
Quattordio
- Ivory Coast**  
Abidjan
- Norway**  
Drammen
- Oman**  
Al Khuwayriyyah (Sohar) - OAPIL  
Factory2 Rusayl (Muscat) - OCI
- Portugal**  
Morelena
- Romania**  
Milcov  
Slatina
- Russia**  
Rybinsk
- Slovakia**  
Prešov
- Spain**  
Abrera  
Santa Perpetua  
Santander  
Vilanova
- Sweden**  
Nässjö
- The Netherlands**  
Delft  
Eindhoven  
Emmen  
Nieuw Bergen
- Tunisia**  
Grombalia  
Menzel Bouzelfa
- Turkey**  
Mudanya
- UK**  
Aberdare  
Bishopstoke  
Washington  
Wrexham



- Australia**  
Dee Why  
Liverpool
- China**  
Haixun DEP  
Shangai  
Shangai  
Suzhou  
Tianjin  
Yixing  
Zhongyao DEP
- India**  
Chiplun
- Indonesia**  
Cikampek
- Malaysia**  
Melaka Factory lot 38
- New Zealand**  
New Lynn (Auckland)
- Philippines**  
Cebu
- Thailand**  
Rayong



## Completeness

In compliance with the requirements of Italian Legislative Decree no. 254/2016, the collection of data fully covers the Group's structure to the extent needed to ensure the understanding of the business's operations.

## Consistency

The emissions calculation is consistent with the applicable frameworks and standards for the inventory boundary and calculation methodologies such as GRI Standards, the WRI GHG Protocol Initiative, the Science Based Target Initiative (SBTi), the Carbon Disclosure Project (CDP), Global Warming Potential (100 year), and IPCC 5<sup>th</sup> Assessment.

The Group committed to set its carbon reduction targets, which were validated by the SBTi in 2021 and publicly disclosed in the Sustainability Reporting. In 2023 the targets were updated as published in the Non-Financial Reporting.

Any kind of changes in inventory boundaries is documented and justified in the report following the GRI guidance as outlined in the specific GRI Standards GRI 305-1 (2016), GRI 305-2 (2016), GRI 305-3 (2016).

The information is tracked over time with accuracy and detail to identify Group trends and to assess the progress achieved, thanks to a reporting system.

The GHG calculation is made in compliance with the UNI EN ISO 14064 specifications to manage GHG emissions effectively and develop new solutions to reduce GHG impact.

## Transparency

This document adheres to the GRI Standards, ensuring transparency in its presentation. The report is crafted in a neutral and accessible language, with clear documentation and instructions, following the procedures and assumptions published by the Global Reporting Initiative (GRI).

## Accuracy

The quantification process is carried out to minimize uncertainty: quantitative data are collected by various functions of the Group companies and periodically reviewed by the Corporate Sustainability and HSE Function.

The Group calculated Scope 1 and Scope 2 emissions as the quantity of GHGs directly emitted or indirectly generated through the use of electric power and thermal energy, when the plants are operated according to their designed operating state.

Scope 1 emissions, which arise from fuel consumption and GHG losses, are considered direct emissions. On the other hand, Scope 2 emissions are indirect and are a result of purchased energy. The CO<sub>2</sub> emission factors associated with the purchased energy are based on the country where the energy grid is located, considering the location of the plants. All Scope 3 categories were examined and then calculated, submitted also to the CDP throughout its questionnaire, and are published yearly.

# 5. GHG inventory

A full set of data is collected in the Inventory following the guidance of the GRI Standards. The information may be aggregated by company, by business segment or by geographical area.

## 6. Data timeline

All emission sources are assessed on an annual basis. The reporting period is from 1 January 2023 to 31 December 2023. The baseline year is from 1 January 2019 to 31 December 2019. This was the most representative reporting year at the time the Group's science-based targets were set, following the SBTi methodology.

## 7. Scope 1, scope 2, and scope 3 emission sources

Scope 1 GHG emissions come from sources owned or controlled by the Group, including:

- Natural gas
- LPG
- Gasoline
- Diesel
- Fuel Oil
- Marine Gas Oil
- Refrigerant gas leaks
- SF6 gas leaks

Scope 2 GHG emissions come from the generation of energy purchased and produced offsite and consumed by the Group, including:

- Electric energy produced by renewable sources and covered by the purchase of Guarantee of Origin certificates (GOs)
- Electric energy produced by nuclear energy and covered by the purchase of European Energy Certificate System (EECSs)
- Electric energy produced by fossil fuels
- District heating
- Steam

Scope 3 GHG emissions presented here refer to the following sources identified in accordance with GHG Protocol guidelines:

- Purchased goods and services
- Capital goods
- Fuel and energy-related activities
- Upstream transportation and distribution
- Waste generated in operations
- Business travel
- Employee commuting
- Upstream leased assets
- Downstream transportation and distribution
- Use of sold products
- End-of-life treatment of sold products
- Investments

Please consider that Scope 3 categories not listed above have been excluded from the scope as not relevant for the Group. For more details, please refer to the section on "Methodology."

# 8. Methodology

GHG emissions are calculated through the application of documented and official emission factors. These factors are ratios relating GHG emissions to a proxy measure of activity of an emission source. Accurate emissions data are calculated from fuel use data. Hence, Scope 1 GHG emissions are calculated based on the quantities of commercial fuels purchased using published emission factors. Scope 2 GHG emissions are calculated based on purchased energy and using market, or local specific grid published emission factors. To ensure the disclosure's consistency with the baseline submitted to the Science Based Target Initiative, which enables tracking of the Group's emission progress on a constant basis, the total Scope 1 value includes emissions from the shipping fleet.

In summary:

- A. The Group Scope 1 direct emissions are mainly generated through the manufacturing and service activities of the Group due to the consumption of fuels, release of overflow refrigerant gases, and release of SF6 (these last two types of gases are part of a reduction process in line with the Prysmian transition plan). The calculation is performed by multiplying the direct GHG source quantity by its emission factor. The Group's own office-based organizations do not have process-related emissions nor material GHG emissions, therefore they have been excluded from calculations except for those offices located in production sites.
- B. Scope 2 indirect emissions instead are generated offsite, due to electricity, district heating and steam generation. The calculation is performed by multiplying the purchased energy quantity - both electric energy and thermal energy - by its emission factor according to two different metrics described by the GHG Protocol, using either the Market-Based or Location-Based approach.
  - Market Based reflects emissions from energy that companies have purposefully chosen.
  - Location Based reflects the average emission intensity of grids where energy consumption occurs.
- C. Scope 3 emissions are related to the upstream and downstream value chain of the organization. The calculation methodology is reported in the following table.

Sources of Scope 3 emissions	Methodology
Purchased goods and services	<p><b>The emissions from purchases are divided by:</b></p> <ul style="list-style-type: none"> <li>• Category 1.a – product related, including all purchased goods and services that are directly associated with the manufacturing of the product.</li> <li>• Category 1.b – non-product related, including all other purchased goods and services, which do not directly feed into the manufacturing process but are required for the operation of the organization. Installation is included in this category.</li> </ul> <p><b>Calculation:</b></p> <ul style="list-style-type: none"> <li>• Category 1.a - the calculation is based on procured metal data and component ingredient list. The calculation uses specific emission factors for each of the metals depending on form of the metal purchased, location of each metal supplier and recycled content of each metal. Referring to other raw materials, the emission factors are extracted from the Ecoinvent database, applying the European Union's Product Environmental Footprint ("EU-PEF") guidelines.</li> <li>• Category 1.b - for each spending category, a specific emission factor is extracted from the EEIO database<sup>(1)</sup>, either raw or calculated as an average of other relevant emission factors.</li> </ul>

(1) Source of emission factors: Open Input Output (2011), Sustainability Consortium, University of Arkansas. Please consider that EEIO factors are annually adjusted for global inflation, average global improvements in CO<sub>2</sub>e/GDP, and switch to service sector of global economy.

Methodology	Sources of Scope 3 emissions
<p><b>Exclusions:</b></p> <ul style="list-style-type: none"> <li>With regard to category 1.a – metals, data related to the following countries are excluded: Ivory Coast, Tunisia, India, and the data related to the OAPIL factory in Oman and EHC legacy perimeter.</li> <li>With regard to category 1.a – compounds and other materials and category 1.b, non-product related only the data related to Chiplun (India), OAPIL (Oman), EHC (Canada and China) are excluded.</li> </ul>	Purchased goods and services
<p>Calculation: the calculation is based on Prysmian's investment expenditures, associated with an estimate of the share that goes to each of eight categories: building, utilities, purchased machinery, custom machinery, refurbished machinery, control system, engineering, and boat. Emission factors are calculated for each of the eight spending categories by averaging relevant EEIO emission factors. Assumptions are then made for which portions of each spending line are related to procuring a material or a service. Finally, emissions are calculated by multiplying the spending for each category by a blended average of the emission factor of the material and the emission factor of the service.</p>	Capital goods
<p>Calculation: emissions are calculated by multiplying fuel, electricity, and thermal energy quantities by relevant upstream emission factors. IEA and DEFRA conversion factors are used to calculate upstream emissions of purchased fuels, electricity, and thermal energy, including transport and distribution (T&amp;D) losses.</p> <p>Regarding the European Energy Certificates (EECSs) for the electric energy produced by nuclear energy, upstream emissions are calculated using the aforementioned methodology. In contrast, upstream emissions from GOO derived from renewable energy are evaluated only considering the transportation and distribution contribution.</p>	Fuel-and-energy-related activities (not included in Scope 1 or 2)
<p>Calculation: for this category two different calculations were used for inbound and outbound logistics. For inbound transportation the calculation of the emissions is based on quantity-based information for product-related purchased goods and services (category 1a) and EEIO emission factors. For outbound logistics, the calculation is based on the distance travelled, the weight transported, and transport mode. As Prysmian's data include thousands of unique trips, making it difficult to extract distances for any given trip, distance is estimated by grouping the trips by country and assuming that all trips are from capital city to capital city.</p> <p>When trips are to and from the same country, they are assumed to be from the capital city to the second- largest city. Additionally, as mode of transport data were not provided, it is estimated that all trips under 3,000 km were made by road, and all trips over 3,000 km were done 10% by road and 90% by ocean (air travel constitutes a minimal part of logistics). Emissions are then calculated for each trip by first calculating "tonnes.km" travelled (by multiplying total distance travelled by weight transported) and multiplying this by the relevant DEFRA emission factor. With regard to the Group's non-operated or paid outbound logistics, the corresponding emissions are included in category 9. Emission factors used for the calculation of category 4 include Well-To-Tank (WTT) emissions.</p> <p>Exclusions: with regard to category 4, data related to the following business or locations are excluded: Chiplun (India), OAPIL (Oman), Automotive B.U. (limited to Tunisia, North America and Mexico), Côte d'Ivoire, Russia, EHC (North America Elevator), Projects (Powerlink, NSW and Arco Felice) and other minor streams among China logistic centers and European semifinished products.</p>	Upstream transportation and distribution
<p>Calculation: waste data are provided for manufacturing sites, while waste data from offices are estimated based on industry averages. Waste data include a breakdown of location for final treatment. These data are in kg form and subsequently matched to DEFRA emission factors corresponding to waste treatment.</p> <p>As waste data from offices were not available, an industry average is used for calculations. An average value of waste (in kg of waste per employee), and an average value of density (in m<sup>2</sup> per employee) have been applied to determine the total quantity of waste per Prysmian's office floor area (kg of waste per m<sup>2</sup>). This is further supported with averages of waste disposed vs recycled from an office environment.</p>	Waste generated in operations
<p>Calculation: business travel spending was collected for the reporting year and categorized by air and rail trips, car rental. Emissions were instead calculated by multiplying the spending by the respective relevant EEIO emission factors for each category of travel.</p>	Business travel
<p>Calculation: emissions were calculated multiplying the total amount of Group employees for an emission factor equal to 1700 kg CO<sub>2</sub>eq/year for each employee commuting. This average emission factor is derived from the Greenhouse Gas Protocol tool "Quantis- Scope 3 Evaluator."</p>	Employee commuting
<p>Calculation: the calculation is based on available electricity consumption and floor area data provided by Prysmian. IEA emission factors for each country are then applied to the corresponding kWh. Where kWh data are missing or not provided, an average kWh per m<sup>2</sup> is used.</p>	Upstream leased assets

Sources of Scope 3 emissions	Methodology
<b>Downstream transportation and distribution</b>	<p>Calculation: this category includes emissions that occur from the transportation and distribution of sold products but not controlled or paid for by the reporting company. Specifically, the category 9 perimeter includes EXW deliveries and other incoterms. The calculation is based on distance travelled, weight transported, and transport method. As means of transport data were not provided, it is estimated that all trips under 3,000 km were made by road, and all trips over 3,000 km were 10% by road and 90% by ocean (air travel constitutes a minimal part of logistics). Emissions were then calculated for each trip by first calculating “tonnes.km” travelled (by multiplying total distance travelled by weight transported) and multiplying it by the relevant DEFRA emission factor. Emission factors used for the calculation of category 9 include Well-To-Tank (WTT) emissions.</p> <p>Exclusions: with regard to category 9, data related to the following business or locations are excluded: Chiplun (India), OAPIL (Oman), Automotive B.U. (limited to Tunisia, North America and Mexico), Côte d'Ivoire, Russia, EHC (North America Elevator), Projects (Powerlink, NSW and Arco Felice) and other minor streams among China logistic centers and European semifinished products.</p>
<b>Use of sold products</b>	<p>Calculation: the model extracts yearly cable losses per cable type and per country from 2023 to the year of cable life-end (between 2046 and 2063, depending on the cable). Losses for each year are then multiplied by the relevant country's electricity emission factor, which is the emission factor for the national grids' generation and WTT-generation provided by the IEA. Every country's emission factor is different for every year from now to 2063 to account for projected changes in the grids' carbon intensities. Grid decarbonization projections are calculated for the countries in which Prysmian's cable losses amount to over 5% of total losses, and for those where projection data are easy to obtain. For countries where losses amount to 5% or below, and projections are difficult to obtain, regional proxies are used: for example, EU data are used for Belgium, and Asia Pacific data are used for New Zealand.</p>
<b>End of life treatment of sold products</b>	<p><b>Calculation: the following assumptions were considered:</b></p> <ul style="list-style-type: none"> <li>• The quantity of cables produced is equivalent to the quantity of cables sold to customers.</li> <li>• “Energy cables” and “rod” are produced in the “Energy” and “Projects” divisions, thus accounting for 90% of sales, while “telecom” and “optical fiber” are part of the “Telecom” division and thus account for the remaining 10%.</li> <li>• 90% of cables are recycled at end of life, and the remaining 10% goes to landfill.</li> <li>• The composition of “energy cables” is 90% metals and 10% plastic, and the composition of “rod” is 100% metals.</li> </ul> <p>Emissions are calculated for “energy cables” and “rod” because they are the only categories for which metric data expressed in tons of product are available rather than km, as the DEFRA emission factors are expressed in kg CO<sub>2</sub>eq/ton. The calculation is done by multiplying the weight of metals and plastics by the respective DEFRA emission factors for both recycling and landfill. The figure is then scaled up by 10% to account for “telecom” and “optical fiber.”</p>
<b>Investments</b>	<p>Calculation: emissions are calculated using the following equation:  <math>CO_2eq = \text{SUM}(\text{USD invested per industry} \times \text{Industry Emission Factor (kgCO}_2\text{eq/million USD)})</math>.  Different emission factors are used according to the industry in which investee companies operate, and therefore, each investment was matched to its industry. Most investments were assigned to “industrials,” others to “materials” and others, where investee company information was not available, to a “global” average emission factor.</p>

Note that some categories are excluded because they are not relevant to Prysmian, and therefore no emissions are generated from them. These are listed below.

- **Category 10:** this is excluded as Prysmian sells final products to end users, and no intermediate products that could be further processed or transformed into other products.
- **Category 13:** Prysmian does not lease assets to third parties, therefore this category is excluded.
- **Category 14:** Prysmian does not have franchises, therefore this category is excluded.

# 9. Emission factors

The Scope 1 emission factors are provided by DEFRA 2023 “UK Government – GHG Conversion Factors for Company Reporting” related to fuels and fugitive emissions.

The Scope 2 emission factors related to electricity consumption follow different metrics:

**A.** Location-Based method: values are provided by IEA “Emission factors” 2023.

**B.** Market-Based: values are provided by:

- AIB, European “Residual Mixes 2022” for European based sites.
- AIB-2019-EECSFS-05 EECS Rules Fact Sheet 05 - Types of Energy Inputs and Technologies - Release 7.7 v5 12 February 2020
- Center for Resource Solutions, “2023 Green-e Energy Residual Mix Emissions Rates”, for sites based in the US and Canada.
- IEA “Emission factors” 2023.

The Scope 2 emission factor related to thermal energy purchased as steam and offsite district heating is provided by DEFRA 2023 “UK Government – GHG Conversion Factors for Company Reporting” both for Location-Based and Market-Based purposes.

The Scope 2 emissions for electric energy produced by nuclear energy (fuels codes: : F03010100, F03010101, F03010102, F03010103) and covered by the purchase of European Energy Certificates (EECSs) have zero emission factors according to EECS Rules.

Emissions of Scope 2 are expressed in tons of CO<sub>2</sub>. However, the percentage of methane and nitrous oxide has a negligible effect on total greenhouse gas emissions (CO<sub>2</sub> equivalent) as can be inferred from the technical literature of reference.

The emission factors are reported in the following paragraphs.

## Scope 1 emission factors

Fuel consumption	Emission factors in kg CO <sub>2</sub> eq
Natural gas (m <sup>3</sup> )	2,0384
LPG (kg)	2,9394
Diesel oil (kg)	3,2039
Marine gas oil (kg)	3,1548
Fuel oil (kg)	3,2289
Gasoline (kg)	3,1541

Gas leak	Emission factors in kg CO <sub>2</sub> eq
SF6 (kg)	23,500
Refrigerant gas (kg)	specific factors based on refrigerant gas type

## Scope 2 location based and market based emission factors:

- for purchased thermal energy

Category	Emission factor Location Based kgCO <sub>2</sub> /kWh	Emission factor Market Based kgCO <sub>2</sub> /kWh
Purchased District Heating	0.1797	0.1797
Steam	0.1797	0.1797

# 10. GHG Statement

The following table report the 2023 Group's emissions according to all the assumption previously described.

Scope Category	CO <sub>2</sub> eq value [tCO <sub>2</sub> ]
Scope 1 <sup>(1)</sup>	226,131
Scope 2 Location Based	474,715
Scope 2 Market Based	389,928
<b>Scope 1 &amp; 2 Location Based</b>	<b>700,846</b>
<b>Scope 1 &amp; 2 Market Based</b>	<b>616,059</b>
<b>Scope 3</b>	<b>267,433,725</b>

(1) Scope 1 figure includes shipping fleet – related emissions.

The bulk of GHG emissions generated are Scope 3 related, representing more than 99% of the total carbon footprint of the Group. The detailed quantification of the Scope 3 emissions, carried out in 2023 with reference to the relative GHG Protocol Standard, highlighted that these emissions are mainly attributable to the “use of products sold”, representing more than 95% of the total carbon footprint of the Group and the total emissions generated throughout the value chain.

An endeavor to reduce 55-60% emissions in total Scope 1 and Scope 2 compared to 2019 baseline by 2030 is planned, in addition to a 28% reduction in total Scope 3 emissions, deriving from the good and services purchased, and the use of products sold.



# 11. Annex

The following table reports 2022 Scope 1 and Scope 2 emissions disaggregated by business line:

Scope 1 & 2 emissions in tCO <sub>2</sub>		Power Cables	Telecom Cables	Accessories	Optical Fiber	Wire Rod	Shipping fleet
Scope 1	Direct emissions from combustion	119,900	4,850	2,787	9,108	11,175	57,942
	Emissions from refrigerant gas	4,147	649	239	137	4	-
	Emissions from SF6 gas leaks	10,845	-	4,348	-	-	-
	<b>Total Scope 1</b>	<b>134,892</b>	<b>5,499</b>	<b>7,374</b>	<b>9,245</b>	<b>11,179</b>	<b>57,942</b>
Scope 2	<b>Location-based</b>	345,142	46,357	11,121	70,483	1,612	-
	<b>Market-based</b>	259,797	36,721	9,598	81,923	1,889	-
Scope 1 & 2	Location-based	480,034	51,856	18,495	79,728	12,791	57,942
	Market-based	394,689	42,221	16,971	91,167	13,069	57,942

The following table reports 2022 Scope 1 and Scope 2 emissions disaggregated by country:

Country	Total Scope 1 Emissions [tCO <sub>2</sub> e]	Scope 2 Location-Based [tCO <sub>2</sub> ]	Scope 2 Market-Based [tCO <sub>2</sub> ]
Angola	186	297	297
Argentina	821	3,803	3,803
Australia	1,242	20,239	20,239
Brazil	13,136	12,826	-
Canada	11,332	6,567	10,635
Chile	178	4,662	-
China	3,590	33,601	33,601
Colombia	291	1,307	-
Costa Rica	316	6	6
Czech Republic	572	8,450	13,927

Country	Total Scope 1 Emissions [tCO <sub>2</sub> e]	Scope 2 Location-Based [tCO <sub>2</sub> ]	Scope 2 Market-Based [tCO <sub>2</sub> ]
Estonia	167	5,881	211
Finland	589	6,060	2,295
France	26,887	11,933	28,741
Germany	9,208	30,224	57,991
Hungary	1,796	8,249	13,850
India(1)	125	854	854
Indonesia	66	6,120	6,120
Italy	20,628	42,220	41,222
Ivory Coast	34	691	691
Malaysia	188	3,050	3,050
Mexico	6,652	18,724	-
Netherlands	4,389	16,674	7,448
New Zealand	49	58	58
Norway	287	59	-
Oman	5,614	21,725	21,725
Philippines	1,356	7,446	7,446
Portugal	245	1,738	-
Romania	845	9,213	-
Russia	126	4,827	4,827
Slovakia	38	1,634	2,249
Spain	2,812	10,872	-
Sweden	71	631	492
Thailand	44	1,782	1,782
Tunisia	53	738	738
Turkey	2,920	13,639	13,639
UK	3,828	9,176	16,409
USA	47,512	148,740	75,583
Shipping fleet(2)	57,942	-	-

(1) Data include Chiplun estimate, calculated by proportioning the consumption of the "Energy Cable" business line according to the percentage of Chiplun production  
(2) Emissions of the shipping fleet are not attributable to a specific country because the vessels operate for the entire group.

The following table reports 2023 Scope 3 emissions:

Category	Total emissions (tCO <sub>2</sub> e)	% of Scope 3
1: Purchased goods and services	10,822,444	4.1%
2: Capital goods	245,617	0.1%
3: Fuel and energy related activities	189,358	0.1%
4: Upstream transportation and distribution	405,264	0.2%
5: Waste generated in operations	123,822	0.0%
6: Business travel	19,216	0.0%
7: Employee commuting	51,146	0.0%
8: Upstream leased assets	390	0.0%
9: Downstream transportation and distribution	32,838	0.0%
10: Processing of sold products		
11: Use of sold products (Direct)	255,435,436	95.5%
12: End-of-life treatment of sold products	46,395	0.0%
13: Downstream leased assets	-	
14: Franchises	-	
15: Investments	61,799	0.0%
<b>Total</b>	<b>267,433,725</b>	

# 12. Independent accountant's audit report







