



Anglo American FY2023 Scope 3 Methodology

Technical report

EXTERNAL USE

FEBRUARY 2024

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1. Introduction

1.1. Context

Anglo American, in its pursuit of sustainability outlined in the Sustainable Mining Plan, places climate change at the core of its strategic pillars. Recognizing the significance of climate change as a material challenge, the company actively engages stakeholders to meet increasing sustainability expectations. Anglo American discloses its sustainability strategy, commitments, and performance through Integrated Annual and Annual Sustainability Reports, aligning with leading frameworks such as TCFD and CDSB.

As a member of ICMM, Anglo American supports initiatives addressing climate change and has had a Group Climate Change Policy since 2022. In 2020, the company published its inaugural Climate Change Report, detailing Scope 3 emissions assessments. Notably, Anglo American aims to reduce Scope 3 emissions by 50% by 2040 from a 2020 baseline. The methodology report outlines the evolving approach to Scope 3 reporting, including the FY2023 assessment, which underwent external assurance for increased robustness. This report reflects Anglo American's commitment to enhancing its methodology, achieving decarbonization targets, and advancing internal Scope 3 management practices, providing insights into climate change progress.

For the FY2023 detailed assessment, Carbon Trust coordinated with the various Anglo American stakeholders to refine the calculation methodology and enhance the quality of input data. Once again, independent external assurance was undertaken at the Group level and for Anglo American Platinum, demonstrating the increasing robustness of our Scope 3 emissions reporting processes and results, and aligning with efforts to enhance the quality of our climate disclosures..

The evolving methodology also reflects Anglo American's advancing understanding of the strategic levers to achieve our value chain decarbonisation targets, which are being pursued in parallel to strengthening internal Scope 3 management and reporting. This refreshed method report outlines our updated Scope 3 emissions methodology, the results of the detailed FY2023 assessment and complements other public disclosures on climate change management progress.

1.2. FY2023 Anglo American Scope 3 Methodology Report

Developing a Scope 3 accounting and reporting framework, which is underpinned by the GHG reporting principles, is vital in raising internal awareness regarding climate-related business risks, and the need to manage these risks both continuously and effectively. This year we have continued to embed the Scope 3 reporting processes and enhance our reporting systems.

This Methodology Report outlines the approach, organisational and accounting boundaries, methodologies, assumptions, sources, and references which have been utilised in the FY2023 detailed assessment, and the Anglo American Scope 3 assessment results for the period 1 January 2023 to 31 December 2023.

The process of modelling Anglo American's Scope 3 emissions inventory has been undertaken in conformance with the World Business Council for Sustainable Development (WBCSD) and World

Resources Institute (WRI) 2011, Greenhouse Gas Protocol Corporate Value Chain (Scope 3) Accounting and Reporting Standard Supplement to the GHG Protocol Corporate Accounting and Reporting Standard (the GHG Protocol) as amended, and the Required Greenhouse Gases in Inventories, Accounting and Reporting Standard Amendment (2013). Additional guidance from the GHG Protocol Technical Guidance for Calculating Scope 3 emissions has been considered.

The information contained in this report also meets the disclosure requirements of the Global Reporting Standards (GRI) Standard GRI 305 (Disclosure 305-3 – Other indirect (Scope 3) GHG emissions) Scope 3 Accounting and Reporting Principles.

In performing the detailed FY2023 assessment, the GHG Protocol principles of relevance, completeness, transparency, consistency, and accuracy have been adhered to. In instances where the modelling team has made distinct trade-offs, these have been highlighted with a rationale provided.

1.3. Improvements to our FY2023 Scope 3 accounting

Refinements and enhancements made in the FY2023 Scope 3 assessment for Anglo American include the following:

- Application of spend-based methodology utilising more refined emission factors based on a tailored non-US focused Environmentally-Extended Input-Output (EEIO) database for categories 1, 2 and 4;
- Updated 2023 UK Department of Business, Energy & Industrial Strategy (BEIS) and International Energy Agency (IEA) emissions factors;
- Direct performance reporting and continued refinement to benchmarking and modelling of steelmaking emissions by our direct and indirect iron ore and steelmaking coal customers;
- Detailed air freighting modes and activity rates for platinum;
- Continued improved insight to emissions at and in the value chains of our material joint ventures producing copper and manganese.

1.4. Base Year

This Methodology Report and associated Scope 3 Model covers emissions from value chain activities for Anglo American's 2023 Financial Year: 1 January 2023 to 31 January 2023.

The base year for Anglo American's Scope 3 emissions assessment is Financial Year 2020.

1.5. Boundary-setting

Table 1 summarises the Scope 3 reporting and organisation boundary applied, and key inclusions and exclusions for reference, which are consistent with FY2022 approach.

1.5.1. Organisational structure

Anglo American's business is managed as six operating units:

- > De Beers Group
- > Base Metals

- > Platinum Group Metals
- > Bulk Commodities and Other Minerals (Iron Ore, Coal Australia, Nickel and Manganese)
- > Corporate
- > Marketing

Consistent with prior Anglo American Scope 3 reporting, product value chains have been identified as a meaningful approach for management and monitoring purposes. Emissions have been attributed to operations, which have been categorised by the major commodity sold, namely:

- > Steelmaking Coal (which also produces a small quantum of Thermal Coal, reported separately)
- > Iron Ore
- > Nickel
- > Copper
- > Platinum Group Metals (including base metals)
- > Diamonds
- > Manganese

To a great extent, these product designations align with Business Units – a functional allocation within Anglo American. Trading activities were also recognised and accounted for.

For Coal Australia, which produces both steelmaking coal (primarily) and thermal coal, the FY2023 reporting approach is consistent with FY2022, wherein steelmaking coal outputs and thermal coal outputs are calculated and recorded distinctly for better accuracy and transparency. Also consistent with prior year reporting, emissions from methane capture and utilisation are reported.

Anglo American's Marketing business is engaged in 3rd Party commodity trading. For ease and consistency of communication, the traded commodities have been computed and reported separately due to the distinctions made between these product volumes and the product volumes mined by Anglo American within the company and in Scope 3 accounting approaches.

1.5.2. Scope 3 Reporting Boundary

The GHG Protocol's designation of these emissions have been applied to the FY2023 Scope 3 assessment. This Methodology report discloses Anglo American's Scope 3 emissions in line with the requirements of the GHG Protocol. All 15 categories have been considered and the approach to the Scope 3 emissions inventory assessment adheres to the minimum requirements of the GHG Protocol, with exclusions being highlighted in each section in this report. Category 12 is only included for De Beers Group and Copper Chile as these Business Units have modelled their own Scope 3 emissions and have data for category 12. Anglo American does not have emissions associated with category 8 and 13.

1.5.3. Organisational Boundary and Consolidation Approach

Anglo American's organisational boundary for carbon emissions reporting, is defined in terms of operational control. This informs its accounting and reporting for non-financial performance matters, including Scope 1 and 2 emissions and has been consistently applied to our Scope 3 accounting and reporting approach. Therefore, Anglo American's FY2023 Scope 3 reporting reflects the value chain emissions for operations, companies, subsidiaries, and joint ventures over which we have operational control reported in Scope 3 Categories 1 to 14, and the emissions from operations and value chains where we do not have operational control as Scope 3 Category 15.

All assets and operations under Anglo American's operational control have been fully accounted for, rather than accounting for Anglo American's financial or equity share in these assets or operations.

To ensure completeness, and as per the recommendations of the GHG Protocol relating to material investments held by the reporting company, the Scope 3 accounting approach includes the Scope 1, 2 and 3 emissions of non-managed investments and joint ventures where these are material and quantifiable, based on equity holdings in these. As described in *Section 0 The emissions were* calculated based on the average floor area per store which was received from client. The electricity consumption was of a retail space and operating days were assumed. This was used to estimate annual electricity consumption and then an emissions factor was applied to this. There was no data for FY2023 and thus FY2022 activity data was used until such time the updated information is available.

Category 15: Investments;

- > For the FY2023 detailed assessment, the De Beers Group joint ventures are all reported equivalently and in full; including for Namdeb and Debswana operations as though these joint ventures were owned and managed for the purpose of Scope 3 emissions calculation.

1.6. Materiality and screening assessment

Materiality refers to individual or an accumulation of errors or exclusions that can significantly affect the GHG inventory and potentially influence decision-making. To understand materiality, a materiality threshold is established as an acceptable percentage difference between Anglo American's GHG inventory and a verifier's belief of what the company's emissions would be if all excluded sources were accounted for. For the FY2023 GHG inventory, a materiality threshold of 5% was considered.

1.7. FY2023 Scope 3 Reporting Assurance

The FY2023 Scope 3 assessment received quality assurance through internal review, and FY2023 Scope 3 emissions result was independently assured by IBIS Consulting, a reputable third party sustainability reporting and assurance provider. In this process, no material findings were identified and recommendations for continued enhancement have been incorporated or identified for a subsequent period.

Table 1 Anglo American FY2021 Scope 3 Activity Boundary

Scope 3 Category	Description	Calculation Status in FY2023	Scope 3 Activity Boundary Accounted for in Anglo American's FY2023 Model
Category 1: Purchased Goods and Services	Extraction, production and transportation of goods and services purchased by the company in the reporting year	Not Material, Calculated	<ul style="list-style-type: none"> Inclusion: All upstream (cradle-to-gate) emissions of purchased goods and services in the reporting period. The emissions factors used were based on the more refined non-US focused Environmentally-Extended Input-Output (EEIO) database, with some supplier specific emissions factors being developed for Anglo American's largest suppliers by spend. Exclusion: No material exclusions.
Category 2: Capital Goods	Extraction, production, and transportation of capital goods purchased by the company in the reporting year	Not Material, Calculated	<ul style="list-style-type: none"> Inclusion: All upstream (cradle-to-gate) emissions of purchased capital goods calculated as spend on plant, property, and equipment for the reporting year. The emissions factors used are based on the EEIO spend-based methodology. Exclusion: No material exclusions.
Category 3: Fuel and Energy-Related Activities	Extraction, production and transportation of fuels and energy purchased by the company in the reporting year	Not Material, Calculated	<p>For upstream emissions of purchased fuels:</p> <ul style="list-style-type: none"> Inclusion: all upstream (cradle-to-gate) emissions of purchased fuels. Exclusion: Due to uncertainty concerning the exact origin and logistics of bringing fuels and energy to each Anglo American sites, the Model has applied a well-to-tank emissions factor, assuming the generic proxy provides complete coverage of emissions associated with this activity. <p>For upstream emissions of purchased electricity:</p> <ul style="list-style-type: none"> Inclusion: All upstream (cradle-to-gate) emissions purchased fuels (from raw material extraction up to the point but excluding combustion by a power generator). <p>For Transmission & Distribution (T&D) losses</p> <ul style="list-style-type: none"> Inclusion: All upstream (cradle-to-gate) emissions of energy consumed in a T&D system, including emissions from combustion. Exclusion: No material exclusions. Note: generation of purchased electricity that is sold to end users is not relevant to Anglo American.
Category 4: Upstream	Transportation and distribution of products	Not Material, Calculated	<ul style="list-style-type: none"> Inclusion: The Scope 1 and 2 emissions of transportation and distribution providers that occur during the use of vehicles and facilities to deliver the

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Scope 3 Category	Description	Calculation Status in FY2023	Scope 3 Activity Boundary Accounted for in Anglo American's FY2023 Model
Transportation and Distribution	purchased by the company between tier-1 suppliers and its own operations		<p>purchased goods to the various operations. The emissions factors used were based on the adapted EEIO spend-based methodology for transportation, distribution and warehousing.</p> <ul style="list-style-type: none"> • Exclusion: No material exclusions.
Category 5: Waste Generated at Operations	Disposal and treatment of waste generated by the company's operations in the reporting year	Not Material, Calculated	<ul style="list-style-type: none"> • Inclusion: The Scope 1 and 2 emissions of waste management suppliers that occur during disposal or treatment. • Exclusion: No material exclusions.
Category 6: Business Travel	Transportation of employees for business-related activities during the reporting year (in vehicles not owned by the company)	Not Material, Calculated	<ul style="list-style-type: none"> • Inclusion: The Scope 1 and 2 emissions of transportation carriers that occur during the use of vehicles (specifically airline carriers (combustions), and car rentals (combustions)). Also included are Scope 1 and 2 emissions associated with hotel accommodation (energy consumption). • Exclusion: The optional life cycle emissions associated with the manufacturing of vehicles.
Category 7: Employee Commuting	Transportation of employees between their homes and their worksites during the reporting year (in vehicles not owned by the company)	Not Material, Calculated	<ul style="list-style-type: none"> • Inclusion: The Scope 1 and 2 emissions of employees and transportation providers that occur during use of vehicles; as well as well-to-tank emissions associated with the fuel used in employee commuting. • Exclusion: The optional emissions from employees teleworking.
Category 8: Upstream Leased Assets	Operation of assets leased by the company in the reporting year and not included in Scope 1 and 2 emissions	Not relevant, Not calculated	Not applicable
Category 9: Downstream Transportation and Distribution	Transportation and distribution of products sold by the company in the reporting year between the company's operations and the consumer (in vehicles	Not Material, Calculated	<ul style="list-style-type: none"> • Inclusion: The scope 1 and 2 emissions of transportation and distribution providers that occur during use of air and sea vessels to deliver the sold goods to customers globally. Emissions factors from BEIS (2023) emissions factors for air travel related to PGMs activity rates. Bulk commodities shipping data was

Scope 3 Category	Description	Calculation Status in FY2023	Scope 3 Activity Boundary Accounted for in Anglo American's FY2023 Model
	not owned by the company)		<ul style="list-style-type: none"> Exclusion: The optional lifecycle emissions associated with the manufacturing of vehicles or infrastructure have not been included in this model.
Category 10: Processing of Sold Products	Processing of intermediate products sold in the reporting year by downstream companies	Material, Calculated (Product Specific Considerations)	<ul style="list-style-type: none"> Inclusion: The Scope 1 and 2 emissions of downstream companies that occur during the processing of the sold product into an intermediate use. Exclusion: No material exclusions. Note, secondary processing emissions in the Steelmaking value chain have been excluded, consistent with prior year reporting.
Category 11: Use of Sold Products	End of use goods and services sold by the company in the reporting year	Material, Calculated (Product Specific Considerations)	<ul style="list-style-type: none"> Inclusion: The direct use-phase emissions of sold products over their expected lifetime (i.e., the Scope 1 and Scope 2 emissions of end users that occur from the use of: products that directly consume energy (fuels or electricity) during use; fuels and feedstocks; and GHGs and products that contain or form GHGs that are emitted during use). Exclusion: The indirect use-phase of sold products has not been included in this model due to the numerous uncertainties of the indirect uses of the sold products and the complex calculations for emissions attributed to the commodity sold (as a portion of the products mass in the indirect use-phase).
Category 12: End-of-Life Treatment of Sold Products	Waste disposal and treatment of products sold by the company in the reporting year	Not Material, calculated	<ul style="list-style-type: none"> Inclusion: De Beers Group (Brands and Consumer Markets & Global Sightholders Sales business units) and the Copper Business unit computed these emissions separately by independent consultants. These calculated emissions were used directly in this assessment. Exclusion: Consistent with FY2022, emissions that may be assigned to this category for commodities other than those produced by De Beers and Copper Business Unit, have not been calculated for FY2023.
Category 13: Downstream Leased Assets	Operation of assets owned by the company and leased to other entities in the reporting year	Not relevant, Not calculated	<ul style="list-style-type: none"> Not applicable
Category 14: Franchises	Operation of franchise in the reporting year not included in Scope 1 and 2	Not material, calculated	<ul style="list-style-type: none"> Inclusion: De Beers Group has store franchises managed under Brands and Consumer Markets. Engagement to compute an estimate for this has been undertaken in FY2023.

Scope 3 Category	Description	Calculation Status in FY2023	Scope 3 Activity Boundary Accounted for in Anglo American's FY2023 Model
Category 15: Investments	Operation of investments in the reporting year not included in Scope 1 and 2	Material, Calculated	<ul style="list-style-type: none"> • Inclusion: Proportional Scope 1, 2 and 3 emissions from equity investments that occurred in the reporting year, accounted using Anglo American's equity share as the consolidation approach. • Exclusion: No material exclusions. De Beers Group accounted for 100% of their joint ventures' emissions.

2. Scope 3 Summary Results

Anglo American's Scope 3 emissions inventory for FY2023 and prior year comparison is summarised in Table 2 below, with further detail being provided for each Scope 3 category in Section 3.

Table 2 Summary of Anglo American FY2023 Scope 3 emissions

Anglo American Scope 1, 2 and 3 emissions (Scope 3 by category and major constituent)	FY 2023 GHG emissions (MtCO ₂ e) (excluding biogenic emissions)				
	<i>FY2023</i>	<i>FY2022</i>	<i>FY2021</i>	<i>FY2020</i>	<i>FY2018</i>
<i>Scope 3 Emissions</i>					
Category 1: Purchased Goods and Services	3.23	7.89	6.87	7.01	1.76
Category 2: Capital Goods	1.57	8.67	8.05	6.98	0.75
Category 3: Fuel and energy-related activities	2.44	2.81	1.63	1.34	2.19
Category 4: Upstream Transportation and distribution	1.18	0.67	0.96	0.13	0.45
Category 5: Waste Generated at Operations	0.05	0.02	0.02	0.10	0.02
Category 6: Business Travel	0.06	0.06	0.01	0.01	0.01
Category 7: Employee Commuting	0.05	0.05	0.10	0.42	0.03
Category 8: Upstream Leased Assets	<i>NA</i>	<i>NA</i>	<i>NA</i>	<i>NA</i>	<i>NA</i>
Category 9: Downstream Transportation and Distribution	2.63	2.29	2.45	2.40	4.31
Category 10: Processing of Sold Products	54.08	48.74	48.14	58.04	83.88
<i>Iron Ore</i>	<i>51.13</i>	<i>47.82</i>	<i>48.86</i>	<i>56.10</i>	<i>81.97</i>
Category 11: Use of Sold Products	22.16	22.77	20.37	28.14	128.47
<i>Steelmaking coal</i>	<i>15.51</i>	<i>14.65</i>	<i>13.54</i>	<i>21.13</i>	<i>49.71</i>
Category 12: End-of-life treatment of sold products	0.004	0.005	0.01	-	0.93
Category 13: Downstream Leased Assets	<i>NA</i>	<i>NA</i>	<i>NA</i>	<i>NA</i>	<i>NA</i>
Category 14: Franchises	0.0001	0.0001	0.0001	0.01	0.01
Category 15: Investments	8.385	10.55	9.99	10.59	2.92
Total Scope 3	95.82	104.53	98.53	114.79	225.73

3. Scope 3 Emission Methodology Details

3.1. Category 1: Purchased Goods and Services

Table 3 Anglo American Category 1 emissions overview

Category 1	
Category Description	Extraction, production, and transportation of good and services purchased by Anglo American in the reporting year
Total Scope 3 Emissions (MtCO ₂ e)	3.23
Calculation Status	Not Material, Calculated
Activity Data Source	Anglo American Group Procurement data De Beers Joint Ventures - Debswana and Namdeb
Emissions Data Source	EEIO ¹ (2023)
Exclusions	None

3.1.1. Calculation Status Rationale

The purchased goods and services emissions are no longer considered to have a material impact on Anglo American Scope 3 emissions based on the shift to the more refined EEIO spend based emission factors. However, the emissions from this category are relevant for users of the data; for raising internal awareness and providing the basis for which opportunities for mitigation may be identified, including sourcing strategies and shifting upstream performance and consequent performance tracked.

The activity data in this category was prioritised due to the influence that Anglo American Group more broadly have over them. Anglo American has both the ability and leverage to influence suppliers to improve environmental performance, while also sourcing from other suppliers who with improved environmental credentials. Suppliers are enhancing their emissions reporting, and the process of

¹ This EEIO conversion approach uses the OPEN IO database originally developed by the Sustainability Consortium at the University of Arkansas and further adapted by the Carbon Trust (<http://www.ghgprotocol.org/Third-Party-Databases/OPEN-IO>). The analysis is based on financial spend and Greenhouse Gas (GHG) emission factors, calculated per USD of economic value. The IO database has a collection of economic input-output emission factors for 431 sectors of the economy. These factors are in units of kg CO₂e per USD, allowing the conversion of spend in a given sector to carbon emissions (see example formula below). They are further broken down into emissions from Scope 1&2, purchased goods and services, and upstream transportation.

determining emissions factors based on suppliers' Scope 1 and 2 emissions has been considered for some key Anglo American suppliers for future reporting.

3.1.2. Activity exclusions and rationale

Procurement spend data from Anglo American were noted to be accurate. No notable exclusions were flagged in the reporting data.

3.1.3. Calculation methodology

Operational expenditure (OPEX) spend in US dollars for the FY2023 assessment period was collated within the Anglo American Procurement model by internal personnel. Opex spend was categorised into a labelling system within the Anglo American spend processing model, with these categorisations aligning to emission factor types and categorisations within the EEIO dataset as far as possible. Opex spend data was categorised into 16 activity categories, with spend-based emissions factors sources from the EEIO dataset being applied to spend data to attribute an emissions rate to the spend data.

Category 1 emissions are also calculated for the embedded emissions associated with the purchasing of copper concentrate and PGM tolling material by Anglo American, as well as 3rd Party traded commodities (Copper, Nickel, PGM, Thermal Coal, Steelmaking Coal, Iron Ore, Molybdenum). This is done by calculating an emissions proxy, using the total sum of the Scope 1 and 2 emissions from Anglo American operations that involve mining and beneficiating and then apportioning the amount of purchased material and tolled material to this emissions proxy. Anglo American only takes a 5% margin of these emissions. For diamond's embedded emissions, FY22 proxy data was used in the interim awaiting De Beers Scope 3 reporting.

3.1.4. Allocations and key assumptions

An assumption has been made that suppliers of goods and services produce emissions in line with industry average estimates and within the assigned spend categories. Additionally, it has been assumed that spend-based emissions factors from the improved non-US based EEIO are representative of the organisations, geographies and activities associated with Anglo American and Anglo American Group's Opex spend for FY 2023. Assumptions were made to relate the procurement system spend classifications, based on an interpretation of the typical activities covered by that classification, to an appropriate emissions factor derived from EEIO.

Where supplier specific emissions factors were applied, these were computed from public disclosure (determined by the nature and coverage of that disclosure) and applied preferentially to the spend by the associated supplier.

Procurement data included transaction reversals; these were the minority of transactions, and it was assumed that procurement data provided a reasonable representation of operational expenditure in any year. It was assumed that Anglo American category 1 emissions intensity was comparable for tolling materials and third party products and applied as a proxy to estimate these emissions.

3.1.5. Types and sources of activity data applied

Activity data utilised in the FY2023 period for was spend-based data for OPEX purposes and included a total extract of Anglo American Group procurement data, attributed to Anglo American, for the year.

This category also includes emissions estimate for upstream emissions embedded in the tolling material and third party bought product.

3.1.6. Types and sources of emissions factors applied

Secondary emissions factor data was based on industry averages for each OPEX category. The primary source of emissions factors applied to Anglo American Group's procurement spend was sourced from the GHG Protocol-endorsed EEIO dataset, which allows the selection of the emissions factor relating to a specific material or activity within each economic sector via the amount purchased in a given currency.

3.2. Category 2: Capital Goods

Table 4 Anglo American Category 2 emissions overview

Category 2	
Category Description	Extraction, production, and transportation of capital goods purchased by Anglo American in the reporting year
Total Scope 3 Emissions (MtCO ₂ e)	1.57
Calculation Status	Not Material, Calculated
Activity Data Source	Anglo American Procurement data De Beers Group Procurement data
Emissions Data Source	EEIO (2023)
Exclusions	None

3.2.1. Calculation Status Rationale

The emissions from this category are no longer considered to have a material impact on Anglo American Scope 3 emissions based on the shift to the more refined EEIO spend based emission factors. However, this category is considered relevant for the users of this data; for raising internal awareness and providing the basis from which opportunities for mitigation may be identified, including sourcing strategies and shifting upstream performance and consequent performance tracked. Anglo American has considerable influence over the design and type of capital goods purchased. The relevance of this inclusion is also due to the long term nature of capital goods, and with regard to equipment and machinery, can be made more efficient and less environmentally harmful through innovation and investment in superior capital goods. This is of particular importance in the management of transition risk, and for support for the transition of key capital inputs and decisions made by Anglo American.

3.2.2. Activity Exclusions Rationale

There were no exclusions in this category, as the data used for this calculation was based on overall spend activity with Anglo American's procurement data set, which has been provided by Anglo American Group.

3.2.3. Calculation Methodology

Anglo American spend on capital goods was drawn from Anglo American Group's procurement data set, with industry average emissions factors sourced from the EEIO dataset, applied using a spend-based methodology as prescribed by the GHG protocol.

3.2.4. Allocations and Key Assumptions

Capital expenditure records for FY2023 were provided by Anglo American's Procurement department at an individual operation level. All data entries reported as CAPEX was computed in this category. This included some goods that might typically otherwise be associated as operational goods but were identified as expenditure for capital projects.

Capex spend data was categorised into 12 activity categories, with spend-based emissions factors, sourced from the EEIO dataset, being applied to spend data to attribute emissions to spend categories.

Procurement data included transaction reversals; these were the minority of transactions, and it was assumed that procurement data provided a reasonable representation of operational expenditure in any year.

3.2.5. Types and Sources of Activity Data Supplied

Activity data utilised in the FY2023 period was spend-based data for CAPEX purposes and included the procurement of mining specific capital goods. This activity data was sourced from Anglo American's procurement data set.

3.2.6. Types and Sources of Emissions Factors Applied

Secondary emissions factor data was based on industry averages for each CAPEX category. The primary source of emissions factors applied to Anglo American Group's capex spend was sourced from the GHG Protocol-endorsed EEIO dataset, which allows the selection of the emissions factor relating to a specific material or activity within each economic sector via the amount purchased in a given currency.

3.3. Category 3: Fuel and Energy-Related Activities

Table 5 Anglo American Category 3 emissions overview

Category 3	
Category Description	Extraction, production and transportation of fuels and energy purchased by Anglo American in the reporting year
Total Scope 3 Emissions (MtCO ₂ e)	2.44
Calculation Status	Not Material, Calculated
Activity Data Source	Anglo American data management systems as volumes for liquid and gaseous fuels; mass for solid fuels; and MWh for electricity purchased
Emissions Data Source	Secondary, Industry average data (BEIS and IEA, 2023)
Exclusions	None

3.3.1. Calculation Status Rationale

The upstream emissions emanating from purchased fuels are not material considering their overall contribution to Anglo American's Scope 3 emissions. That said, they have been calculated, as the consumption of fuels at operations is a key activity and accounts for significant expenditure for the company. Accounting for the upstream emissions from fuel usage allows consideration for the broad footprint of these activities beyond the organisational emissions from these fuels. It is also possible for Anglo American to make alternative purchasing decisions in terms of increasing inclusion of biogenic emissions in some fuels and to make alternative purchasing decisions based on the carbon profiles of upstream fuel producers and transporters.

3.3.2. Activity Exclusions Rationale

No exclusions for types of fuels or operations in terms of upstream emissions arising from fuel-related activities have been made for this assessment. All fuel- and energy-related purchases have been included for the product and operation. The emissions factors applied are well-to-tank factors, which do not specifically include an estimate of emissions associated with the "final leg" -i.e., a journey for fuels and energy from a reasonably assumed location central to each operation. The emissions associated with this final leg is not expected to be material. Additionally, due to uncertainties regarding the exact origins and logistics of supplying fuels and energy to each Anglo American site, an additional computation has not been included. Some sites within Anglo American portfolio may be further from a regional fuel hub, which would require greater transportation distance and resultant increased upstream emissions. It has been assumed that generic well-to-tank proxies provide substantially

complete coverage of emissions associated with this activity. It is recommended for future inclusion as the Scope 3 reporting processes are refined.

3.3.3. Calculation Methodology

Volumes or masses of each fuel purchased by Anglo American operations in the FY2023 reporting period have been multiplied by the corresponding well-to-tank emissions factors to derive the total attributable upstream emissions for each fuel or energy type.

Regarding operational electricity usage, the transmission and distribution (T&D) losses and well-to-tank emissions were sourced from BEIS (2023) and the (IEA 2023) factors and applied to the corresponding activity data.

Renewable energy generated on site has no emissions associated with it, however, purchased renewable energy generated off site, will have emissions associated with the transfer and distribution of the energy to the Anglo American site.

3.3.4. Allocations and Key Assumptions

An assumption has been made that suppliers of fuels and energy produce emissions aligned with industry average estimates for embedded carbon, as well as aligned to the BEIS and IEA-defined national average for electrical energy losses.

3.3.5. Types and Sources of Activity Data Supplied

Activity data was sourced from Anglo American Group internal data management systems (Isometrix). Activity data was recorded as volumes for liquid and gaseous fuels, and as mass for solid fuels and heavy fuel oils. Electricity consumption was measured in Megawatt hours (MWh)

3.3.6. Types and Sources of Emissions Factors Applied

Secondary data has been applied for each fuel type procured. The well-to-tank emissions factor for each fuel type approximates the fugitive, processing, and transportation emissions for each of the fuels based on global industry averages. Applied emissions factors were sourced from BEIS (2023) and the IEA (2023).

3.4. Category 4: Upstream and Transportation and Distribution

Table 6 Anglo American Category 4 emissions overview

Category 4	
Category Description	Transportation and distribution of products purchased by Anglo American between Tier-1 suppliers and its own operations
Total Scope 3 Emissions (MtCO ₂ e)	1.18
Calculation Status	Not Material, Calculated
Activity Data Source	Anglo American Procurement data De Beers Group Procurement data
Emissions Data Source	EEIO (2023)
Exclusions	None

3.4.1. Calculation Status Rationale

The upstream transportation and distribution of purchased goods is not considered to have a material impact on Anglo American Scope 3 emissions. However, Anglo American's influence over suppliers, delivery frequencies and modes, as well as the company's exposure to climate risks makes these activities a priority.

3.4.2. Activity Exclusions Rationale

No notable exclusions were flagged in the reporting data.

3.4.3. Calculation Methodology

Anglo American's logistical expenditure is classified as Category 4. Road freight, rail freight and warehousing expenditure has been allocated to category 4. The data was sourced from Anglo American Group Procurement. Freight and warehousing expenditures have been assigned to corresponding spend-based emissions factors sourced from the EEIO 2023 dataset.

3.4.4. Allocations and Key Assumptions

An assumption has been made that suppliers of logistics and distribution services produce emissions in line with industry average estimates. Additionally, it has been assumed that spend-based emissions sourced from the EEIO emission factor dataset are indicative of the emissions rates of organisations, geographies, and activities associated with Anglo American's FY2023 OPEX procurement.

Where supplier specific emissions factors were applied, these were computed from public disclosure (determined by the nature and coverage of that disclosure) and applied preferentially to the spend by the associated supplier.

3.4.5. Types and Sources of Activity Data Supplied

FY2023 air freight, road freight and warehousing spend in USD was collated in the Anglo American procurement model by internal personnel and provided for Scope 3 quantification.

3.4.6. Types and Sources of Emissions Factors Applied

Secondary emissions factor data was based on industry averages for each transport & distribution category. The primary source of emissions factors applied to Anglo American Group's capex spend was sourced from the GHG Protocol-endorsed EEIO dataset, which allows the selection of the emissions factor relating to a specific transport-related activity via the amount purchased in a given currency.

3.5. Category 5: Waste Generated in Operations

Table 7 Anglo American Category 5 emissions overview

Category 5	
Category Description	Disposal and treatment of waste generated by Anglo American operations in the reporting year
Total Scope 3 Emissions (MtCO ₂ e)	0.05
Calculation Status	Not Material, Calculated
Activity Data Source	Internal waste activity rate performance project
Emissions Data Source	Secondary, industry average data (BEIS 2023)]
Exclusions	None

3.5.1. Calculation Status Rationale

Scope 3 emissions from waste generated in Anglo American operations are not material but have been calculated owing to the influence that Anglo American has over waste management activities, and the importance given to the mitigation and treatment of waste by relevant stakeholders.

3.5.2. Activity Exclusions Rationale

No exclusions from this category were made, as all significant waste generation has been recorded and accounted for.

3.5.3. Calculation Methodology

Activity data in the form of mass (tonnes) per waste type and waste fate/ treatment of waste recorded for Business Unit was received from Anglo American Group's data collection process. Industry average emissions factors were applied to waste categories obtained from BEIS (2023).

3.5.4. Allocations and Key Assumptions

It was confirmed that all materials and respective quantities have been hauled off-site and treated in facilities that are neither owned nor controlled by Anglo American. Bulk mining wastes have not been included, and this is on the understanding that such wastes are not handled off-site and are included in Anglo American's Scope 1 and 2 footprints.

Due to the availability of emission factors by BEIS, some waste types provided by Anglo American were reassigned to match industry average waste types supplied by BEIS.

3.5.5. Types and Sources of Activity Data Supplied

Activity data has been sourced from Anglo American's data collection process. Activity data has included the mass of waste types produced as well as treatment methods for the waste type.

3.5.6. Types and Sources of Emissions Factors Applied

Secondary emissions data was used for emissions factor estimation yielding industry average waste disposal factors. Emissions factors were derived from BEIS (2023) for waste disposal of various waste types.

3.6. Category 6: Business Travel

Table 8 Anglo American Category 6 emissions overview

Category 6	
Category Description	Transportation of employees for business-related activities during the reporting year (in vehicles not owned by Anglo American)
Total Scope 3 Emissions (MtCO ₂ e)	0.06
Calculation Status	Not Material, Calculated
Activity Data Source	Third Party Providers (Egencia Travel) in the form of GHG activity data from air travel, car rental and accommodation nights by Anglo American staff
Emissions Data Source	BEIS (2023) [40%], EEIO (2023) [40%] and Egencia travel agent emissions calculations [20%]
Exclusions	None

3.6.1. Calculation Status Rationale

The emissions within this category are not considered to be material to Anglo American's Scope 3 emissions inventory but have been calculated in accordance with the GHG Protocol principles of completeness and accuracy. Anglo American has significant influence over the extent, modes and class of travel undertaken for business, and there is opportunity to create internal awareness and adapt behaviour to reduce emissions within this category.

3.6.2. Activity Exclusions Rationale

Activity data from flights, hotel stay, car rental and train travel were provided by Egencia travel agents to calculate emissions. Emissions from provided activity data for air travel, car hire and hotel stay were calculated, while emissions for train travel were provided by the travel agent and used due to completeness.

3.6.3. Calculation Methodology

Two calculation methodologies were applied, given the form in which the data was provided, excluding train travel data which was provided by the travel agent in already calculated emissions (kgCO₂e):

- Distance-based method was applied to air travel activity data as the emissions data calculated by the travel agent contained gaps and inconsistencies.

- Spend-based method was applied to calculate emissions for hotel stay and car hire as activity data for both was provided by the travel agent in spend (USD) and the emissions data calculated by the travel agent for same contained gaps hence the need to calculate the emissions.

3.6.4. Allocations and Key Assumptions

In order to maintain consistency of emissions, the transaction date was used to maintain the boundary of FY2023 emissions calculation, as this was the only traceable date type available across all business travel types (air travel, car hire, hotel stay and train travel).

To calculate the emissions from Anglo American's air travel activity data, haulage type was required. Despite this being provided in the data received from the travel agent, inconsistencies were noted. Thus, using the distance travelled (km), haulage types were assigned as follows:

- Domestic flights: less than 415km
- Short haul flights: between 415km and 3700km
- Long haul flights: greater than 3700km

Given the availability of emission factors by BEIS, some cabin classes provided by the travel agent were reassigned as follows:

- All Domestic Haul cabin class assigned to BEIS Domestic Haul 'Average Passenger'
- Short Haul 'First Class' and 'Premium Economy' cabin class assigned to BEIS Short Haul 'Average Passenger'
- Unknown and Blank cabin classes redefined as 'Economy Class'

3.6.5. Types and Sources of Activity Data Supplied

Air travel activity data was provided in distance travelled (km) and cabin class (where necessary to align with BEIS emission factors some were reassigned, see above Allocations and Key Assumptions) per Business Unit. Haulage type was assigned using distance travelled.

Hotel stay and car hire activity data was provided in spend per Business Unit. This meant that emissions were calculated using EEIO emission factors.

Train travel data was provided in already calculated emissions (kgCO₂e) without data gaps, hence these emissions were used as is.

3.6.6. Types and Sources of Emissions Factors Applied

BEIS emission factors were used to calculate air travel emissions, EEIO emission factors were used to calculate hotel stay and car hire emissions and train travel emissions were taken as is from the data provided by the travel agent.

3.7. Category 7: Employee Travel

Table 9 Anglo American Category 7 emissions overview

Category 7	
Category Description	Transportation of employees between their homes and their worksites during the reporting year (in vehicles not owned by Anglo American)
Total Scope 3 Emissions (MtCO ₂ e)	0.05
Calculation Status	Not Material, Calculated
Activity Data Source	Proxy of FY2022 data
Emissions Data Source	Secondary, industry average data (BEIS, 2023 & IEA, 2023)
Exclusions	None

3.7.1. Calculation Status Rationale

Emissions from employee travel are not considered to be material at Anglo American Group level but are relevant to Anglo American overall Scope 3 emissions inventory and efforts towards improved inventory quality and consistency of decarbonisation. These emissions have been included in this Scope 3 inventory to raise internal awareness and to ensure completeness within the Scope 3 inventory.

3.7.2. Activity Exclusions Rationale

None.

3.7.3. Calculation Methodology

Identical to the methodology used in FY2022, estimates of daily distances travelled for bus and minibuses have been used as an activity data input. Distances have been estimated by using the distance between the operation and the residential location for most employees. Bus and minibus daily distances are multiplied by industry average emissions factors for each vehicle corresponding to the number of trips undertaken in FY2022. Regarding private vehicle trips, the number of person trips taken per annum were estimated and have been multiplied by the emissions factor applicable to each operation based on the estimated average distance between the operation and the residential location for the majority of employees using an average internal combustion engine car.

3.7.4. Allocations and Key Assumptions

As per FY2022, an assumption has been made that both bus and minibus trips were fully laden, with 50 people per bus and 20 people per minibus. For bus and minibus trips, it has been assumed that employees travel 365 days per year, given that mines are continually operational. An additional

assumption is that a bus would use 22 litres of diesel per 100 km travelled, while a minibus would use 15 litres of petrol per 100 km travelled.

Regarding individual vehicle trips, it has been assumed that employees make return trips for 230 days per year which accommodates leave taken, weekends, and public holidays. An estimation was applied using the ratios of employees travelling by bus, mini-bus and passenger vehicles which was 60% by bus, 30% by minibus and 10% by private passenger vehicle.

Where no operational-level data was provided, the employee committing emissions were evenly allocated across the operations.

3.7.5. Types and Sources of Activity Data Supplied

Using FY2022 as a proxy, for Anglo American Operations, the 2021 Anglo American Group Integrated Annual Report was used to obtain full-time employee (FTE) data for each business unit, which was used to calculate the number of trips for each transport mode (bus, minibus, and private vehicle).

3.7.6. Types and Sources of Emissions Factors Applied

Secondary data was used to provide industry average travel emissions factors. These were sourced from BEIS (2023) and IEA (2023). The industry average emissions factor for bus, minibus, and passenger vehicles were applied to the corresponding FY2022 proxy activity data.

3.8. Category 8: Upstream Leased Assets

Table 10 Anglo American Category 8 emissions overview

Category 8	
Category Description	Emissions from the operation of assets that are leased by the Anglo American and not already included in the reporting company's scope 1 or scope 2 inventories
Total Scope 3 Emissions (MtCO ₂ e)	NA
Calculation Status	Not Material, Not Calculated
Activity Data Source	NA
Emissions Data Source	NA
Exclusions	NA

3.8.1. Calculation Status Rationale

The emissions inventory boundary is defined to include all leased assets over which Anglo American has operational control, and for the emissions which are not captured in the reporting company's Scope 1 and 2 emissions inventories. It is understood that Anglo American's emissions relating to its leased assets are quantified in the Scope 1 and 2 inventories. This is based on the engagements held with company representatives for the FY2019 assessment, noting that there have been no material changes to these assets or the company reporting structures managing these assets.

3.9. Category 9: Downstream Transportation and Distribution

Table 11 Anglo American Category 9 emissions overview

Category 9	
Category Description	Transportation and distribution of products sold by the company in the reporting year between the company's operations and the consumer (in vehicles not owned by the company)
Total Scope 3 Emissions (MtCO ₂ e)	2.63
Calculation Status	Not Material, Calculated
Activity Data Source	Anglo American Group Procurement data [80%] Anglo American freighting information - Rightship Bulk Transportation data [10%] De Beers Group FY2022 Proxy [10%]
Emissions Data Source	BEIS (2023) and third-party logistics provider (Rightship)
Exclusions	None

3.9.1. Calculation Status Rationale

The carbon footprint from downstream transportation and distribution of Bulk commodities Iron Ore is considered to be material to the overall Scope 3 emissions. This bulk commodity accounts for most emissions arising from downstream transportation and distribution activities, due to customer distances being notably greater than for the other commodity types and the significance of the quantity of bulk product moved. The emissions from this category have been calculated due to the materiality, climate-risk exposure and the company's influence over logistics and freighting supplier practices. Moreover, bulk shipping in this category is the subject of focused organisational cooperation and emissions reduction efforts, with measures to monitor progress, relevant to other bulk commodities produced and traded.

3.9.2. Activity Exclusions Rationale

It is anticipated that the emissions associated with any exclusions may have a negligible impact on the overall upstream transportation and distribution emissions accounted and does not detract from the relevance of this information reported for users.

3.9.3. Calculation Methodology

The emissions associated with the bulk shipping of include traded iron ore, steelmaking coal and chrome. The emissions associated with bulk shipping is derived from information sourced from a third-party provider, Rightship; Rightship records the shipping charters for the reporting company and the cargo types and volumes, to determine the attributable carbon emissions. Rightship calculates emissions according to EN 16258 standard and uses the AR4 GWP metrics for methane and nitric oxide emissions. In this model, a mass-based emissions intensity factor was derived from the Rightship data to ascertain the emissions associated only with Anglo American traded product on board.

Air freight expenditure has been included in Category 9 for Diamonds and PGM operations as these commodities are considered as precious minerals that are often transported via air freight to their destinations.

PGMs: This category includes an estimate for the emissions from helicopter transportation of PGM product leaving the refinery, as well as the associated flight information of the product leaving South Africa from O.R Tambo International Airport.

- Air freight spend was assigned an emissions factor from the BEIS (2023). The air freight emissions were calculated based on the weight of the metal transported over the distance travelled and multiplied by an emissions factor derived from BEIS (2023).
- Helicopter transport emissions were calculated assuming two trips per month from Precious Metals Refinery to O.R Tambo International Airport. This considered distance, and estimated fuel consumption.

Diamonds: *De Beers Group* FY2022 activity data for the Brands and Consumer Markets was used as a Proxy for the Category 9 emissions as this data was not yet available from the Business Unit. The proxy data was multiplied by FY2023 emission factors.

Nickel: Shipping freight was calculated using data supplied by the client. The total tonnage and the total distance travelled was multiplied by a bulk freight shipping emissions factor from BEIS (2023).

3.9.4. Allocations and Key Assumptions

It has been assumed that the suppliers of the logistics and distribution services produce emissions in line with industry average estimates.

PGMs: Flight distances between Johannesburg International Airport (O.R Tambo) and destination airports (Leg 2) were estimated from a flight distance calculator. Assumptions were applied as to the typical helicopter used for the first leg of transportation of precious metals from the mine to Airport, its speed and fuel efficiency, and the frequency of the transportation activity. The third leg of travel was bucketed with third party emissions and a 5% equity margin applied to these emissions.

3.9.5. Types and Sources of Activity Data Supplied

The USD spend on air freight for the FY2023 period was collected in the Anglo American Group Procurement model. Additional data was provided for air freight and helicopter movements of product from the refinery.

3.9.6. Types and Sources of Emissions Factors Applied

The source of emissions factors applied for air freight and helicopters transportation was BEIS (2023).

3.10. Category 10: Processing of sold product

Table 12 Anglo American Category 10 emissions overview

Category 10	
Category Description	Processing of intermediate products sold in the reporting year by downstream companies
Total Scope 3 Emissions (MtCO ₂ e)	54.08
Calculation Status	Material, Calculated
Activity Data Source	Market sales volumes per commodity
Emissions Data Source	Customer-specific steelmaking emissions Ecolnvent V3.10
Exclusions	None

3.10.1. Calculation Status Rationale

The emissions attributed to the processing of sold products are considered material and of significant importance. These emissions have been calculated due to the magnitude of GHG emissions arising from the processing of the products sold, particularly Iron Ore, Steelmaking Coal and Copper. Processing emissions for each operation were calculated for completeness and to provide a wholistic account of the downstream emissions profile.

Category 10 represents the areas in Anglo American's value chain where considerable abatement effort is required to reduce the Scope 3 inventory.

3.10.2. Activity Exclusions and Rationale

Secondary processing emissions in the manufacturing of steel and processes downstream of this are not included in the reporting boundary.

3.10.3. Calculation methodology

Iron Ore and Steelmaking Coal: Iron Ore sintering and pelletisation, Steelmaking Coal coking; blast furnace to basic oxygen furnace (BF-BOF); and direct reduction to electric arc furnace (DRI-EAF) emissions factors were collected by Anglo American internal experts (using customer provided information) and the CRU Group's Emissions Analysis Tool, wherever possible. Similarly, Iron Ore and Steelmaking Coal inputs per unit crude steel outputs were collected for each customer facility to enable mass-in, mass-out conversions. This was possible where both the customer was known, and customer performance data was available, for both own mined product and 3rd Party traded product.

- Where data on the specific customers and facilities were not available (whether own mined product or 3rd party traded product), a regional average proxy was used based on the customer sample data received.
- The volume of own-mined Steelmaking Coal and Iron Ore sold in the reporting period was converted into crude steel equivalent, using customer-specific conversion factors wherever available. These conversion factors utilise a mass apportionment approach to determine the amount of Iron Ore, Steelmaking Coal (as relevant to BF-BOF) or Natural Gas (as relevant to DRI-EAF) required to produce a unit of crude steel.
- For the BF-BOF processing route, the shared volume of crude steel equivalent between the two commodities, which is the lower crude steel equivalent volume of the two, was then multiplied by the total crude steel emissions factor for the BF-BOF processing route.
- The excess BF-BOF crude steel equivalent volume, which was attributable to Iron Ore in FY2023, is then accounted for using the same mass apportionment factor (65%) and emissions factors as for the shared volume. This would apply inversely in future period should Steelmaking Coal equivalent steel volume create the 'excess'.
- Finally, the emissions attributable to the excess crude steel equivalent volume of Iron Ore in 2023 to BF-BOF customers has been accounted for in the Scope 3 inventory using the Iron Ore to Steelmaking Coal ratio to avoid reporting the Scope 3 emissions of 3rd Party commodity suppliers.
- The crude steel equivalent volume of Iron Ore sold to DRI-EAF customers was similarly multiplied by the total crude steel emissions factor for the DRI-EAF route, and the emissions that would be attributable to the natural gas provider (which is not an Anglo American commodity) is not allocated to Anglo American.

Copper: Emissions for copper were sourced from Copper Chile utilising their independently quantified results. The activity data, emissions factors, and third-party calculations were seamlessly integrated into the Anglo group model. Minor adjustments were made to ensure harmonisation with other commodities within this category.

Molybdenum: Molybdenum, a by-product from the Copper operations, were also incorporated from Copper Chile's inventory in 2023

Nickel: Ferronickel volumes from Barro Alto and Codemin sold in 2023 were multiplied against a stainless steel manufacturing emissions factor attributed to the percentage of Nickel in stainless steel, as it was assumed that all this product is used for that end use.

3rd Party Iron Ore, Steelmaking Coal, and Copper: the 3rd Party product volumes traded in 2023 were computed using the same methodologies as the own-mined product volumes, but distinctly. An Economic Benefit Margin on these 3rd Party traded product volumes was used across all relevant Scope 3 categories to determine the Scope 3 emissions figure in the FY2023 inventory.

PGM: Trolled material was calculated to have an associated embedded processing emission. An emissions proxy was developed using the processing intensity for Anglo American downstream emissions for own-mined PGMs. A 5% margin was applied.

Diamonds: For the FY2023 footprint, FY2022 data was utilised for Sightholder emissions. Additionally, data for the Brands and Consumer BU is currently unavailable. Updates will be provided once this data is received.

3.10.4. Allocations and Key Assumptions

Iron Ore: the collection of reliable customer-specific emissions and conversion data reduced the assumptions needed in prior computation, required to compute the Category 10 and 11 emissions for these commodities.

The input intensity factors used to calculate the amount of crude steel equivalent for each commodity, at a portfolio level, was derived on a customer specific weighted average performance basis, differentiating between the two processing routes: BF-BOF and DRI-EAF.

Iron ore preparation processes, pelletising and sintering, were applied to the pellet feed and fines volumes, respectively. Lump volumes sold did not require preparation prior to feed into the furnaces and had no emissions in the preparation phase.

Similarly, it was assumed that 80% of the Steelmaking Coal sold would be coked before being fed into the BF with 20% being pulverised coal injection (PCI) and not requiring coking in a coke oven.

Nickel: assumed that all Ferronickel produced is used for stainless-steel production and that stainless steel produced 0.88 tCO₂e per tonne stainless steel and that the average Ni % in stainless steel is 0.074 (determined from an average from article from the Nickel Institute). The emissions associated with processing Nickel into stainless-steel have been included under the processing of this sold product.

PGM: It was assumed that downstream processing emissions intensity of own-mined and tolled material was equivalent.

3.10.5. Types and Sources of Activity Data Supplied

Activity data was derived from Anglo American marketing for the product book sales numbers. Iron Ore customer trading information was sourced directly from the steelmaking coal team. Diamonds FY22 data was used as proxy awaiting sales data that will be sourced directly from the Innovation and Strategy team. PGM end use profiles were provided by Anglo American Marketing.

3.10.6. Types and sources of emissions factors applied

Iron Ore and Steelmaking coal: These emissions factors were generated through engagement with the client who sourced customer specific emissions factors. Where there were none, industry averages were used.

Nickel: Emissions factor for Nickel were developed by multiplying the steelmaking emissions per tonne of steel produced (World Steel) by the percentage of nickel content in steel. The latter was developed by compiling a weighted average of nickel content in steel from published by the Nickel Institute.

PGM: Intensity proxy developed from own-mined average performance.

3.11. Category 11: Use of Sold Products

Table 13 Anglo American Category 11 emissions overview

Category 11	
Category Description	End use of goods and services sold by the company in the reporting year
Total Scope 3 Emissions (MtCO ₂ e)	22.16
Calculation Status	Material, Calculated
Activity Data Source	Anglo American Market sales volumes for steelmaking coal and PGMs
Emissions Data Source	Primary, Secondary, industry average data (BEIS, 2023) EcolInvent V3.10
Exclusions	None

3.11.1. Calculation Status Rationale

Emissions associated with the use of sold product is considered material. Category 11 emissions have accounted for emissions arising from the downstream processing and use of own-mined material. For own-mined material processing emissions were not separately reported in category 10.

The direct use phase of the sold products is considered to be material for Iron Ore and Steelmaking Coal. For completeness, direct use phase emissions for PGMs have been computed, although these are not considered material.

3.11.2. Activity Exclusions and Rationale

Nickel: the use phase emissions for Nickel have been excluded on the presumption that there is great uncertainty on the applications of the stainless steel produced.

All indirect use-phase emissions have been excluded from consideration in these results. Indirect use phase estimations would need to be based on the mass of the commodities embedded in final products and assumptions concerning the use profiles of those products, which would be based upon unsupported assumptions and estimations with the number of variables to consider for each commodity too great to quantify with reasonable certainty. As these final product constituent elements become more integrated with other materials and systems, attribution of emissions to base products is anticipated to diminish commensurately with this diffusion.

3.11.3. Calculation methodology

Steelmaking Coal: The steelmaking Scope 3 emissions for Steelmaking Coal are captured in Category 11. The methodology for the calculation follows the same steps as described in Category 10 for Iron Ore. The 35% mass apportioned share of the steelmaking emissions are allocated to Steelmaking Coal in Category 11.

Steelmaking Coal Methane Gas Sales: the volume of methane gas generated and sold at the Steelmaking Coal operations and transferred to power generation companies who combust the methane have been included. The volume of methane sold was multiplied by the combustion factor for methane gas to yield the total emissions rate for these volumes.

Steelmaking Coal - Thermal Coal: Included for the Dawson produced thermal coal, only the use phase. The application of Thermal Coal to other uses is considered marginal. Following the demerger and divestment of assets only Thermal Coal from the Steelmaking Coal assets and 3rd Party traded Thermal Coal volumes are applicable.

PGM: For own-mined materials reported production was apportioned to the end-use categories supplied by Anglo American as representative of its market. Emissions factors were developed for jewellery and auto-catalyst manufacturing from academic publications concerning manufacturing processes and concentration.

3rd Party Steelmaking Coal, Thermal Coal and PGMs: the 3rd Party product volumes traded in 2023 were computed using the same methodologies as the own-mined product volumes. was used across all relevant Scope 3 categories to determine the Scope 3 emissions figure in the FY2023 inventory.

Diamonds: For the FY2023 footprint, FY2022 data was utilised for Sightholder emissions. Additionally, data for the Brands and Consumer BU is currently unavailable. Updates will be provided once this data is received.

3.11.4. Allocations and Key Assumptions

If Steelmaking Coal sales volumes produced a greater amount of crude steel equivalent, the excess crude steel equivalent attributable to Steelmaking Coal would be captured in Category 11. Again, the mass apportionment approach (65%:35% Iron Ore to Steelmaking Coal) would be used to account for Category 11 emissions attributable to Anglo American for this excess crude steel. The emissions and conversion factors used for this excess crude steel are based on industry averages and combustion emissions factors rather than customer-portfolio approach, as potential carbon abatement from improved customer efficiency is not deemed to be attributable to the Steelmaking Coal unless the abatement comes from carbon capture, utilisation and storage (CCUS).

PGM sales were disaggregated into the volumes of Platinum, Palladium, Rhodium, and Ruthenium and Other Metals. Each of these PGM categories is used for different purposes but are broadly used in jewellery, electronics, investment, or industrial applications such as automotive catalysts. Only industrial end-use applications were considered to generate material emissions for PGMs and therefore only industrial applications were calculated in Category 11.

3.11.5. Types and Sources of Activity Data Supplied

Activity data was derived from Anglo American Group FY2023 Annual Report. Steelmaking Coal information was sourced directly from the steelmaking coal team. Diamonds data was sourced directly

from the Innovation and Strategy team. PGM end use profiles were provided by Anglo American Marketing.

3.11.6. Types and sources of emissions factors applied

Iron Ore and Steelmaking coal: These emissions factors were generated through engagement with the client who sourced customer specific emissions factors. Where there were none, industry averages were used.

PGM: Eco-invent V3.10 was used to ascertain the emissions produced from auto-catalyst manufacture. A determination of the mass of a typical auto-catalyst and the average mass of PGMs metals contained within an auto-catalyst was derived from academic literature.

Diamonds: The Strategy and Innovation group data provided energy emissions use for their machines and thus the relevant country electricity emission factors that were used. The FY2022 data will be used until such time the updated data becomes available.

3.12. Category 12: End-of-Life Treatment of Sold Products

Table 14 Anglo American Category 12 emissions overview

Category 12	
Category Description	End of life treatment of sold product
Total Scope 3 Emissions (MtCO ₂ e)	0.004
Calculation Status	Not Material, Calculated
Activity Data Source	De Beers Group Brands and Consumer Markets external consultant reports Copper Business Unit external consultant reporting
Emissions Data Source	De Beers Group Brands and Consumer Markets external consultant reports [50%] Copper Business Unit report calculations [50%]
Exclusions	All commodities except Diamonds and Copper

3.12.1. Calculation Status Rationale

The emissions emanating from the end-of-life treatment of the Anglo American's sold products is considered to have immaterial impacts on Anglo American's overall Scope 3 emissions. For FY2023, the integration of De Beers Group's Scope 3 emissions and Copper Business Unit's Scope 3 emissions inventory assessment, though these emissions are not considered material to Anglo American's broader Scope 3 emissions inventory. The De Beers emissions were taken directly, as reported in the De Beers Brands and Consumer Markets and Global Sightholders Sales business units carbon emissions reports that were prepared by the Carbon Footprinting Consultancy (CFC) in April 2023. The FY2022 activity data was used as a proxy for FY2023 until such time the updated data is available. The Copper Chile data is sourced from the Scope 3 inventory work done by external consultant Engie Impact.

Apart from the emissions registered by De Beers and Copper Business Unit, and as a continuation on the FY2022 assessment's boundary, the level of value chain transparency and traceability is low, and calculations are based upon unsupported assumptions and estimations. Additionally, the number of variables to consider for each commodity is too great to quantify with reasonable certainty. There is hitherto little fair consensus on approaches and methodology for recognition and apportionment of emissions. Thus, a calculation for commodities other than diamonds has not been undertaken.

3.13. Category 13: Downstream Leased Assets

Table 15 Anglo American Category 13 emissions overview

Category 13	
Category Description	Emissions associated with downstream leased assets owned by the company
Total Scope 3 Emissions (MtCO ₂ e)	NA
Calculation Status	Not Material, Not Calculated
Activity Data Source	NA
Emissions Data Source (Portion of data provided by third parties)	NA
Exclusions	NA

3.13.1. Calculation Status Rationale

The emissions inventory boundary is defined to include all assets by Anglo American and leased onwards for use by an external entity. The understanding is that Anglo American has not leased any material assets to other entities, and this is based on engagements held with company representatives, noting that there have not been material changes to these assets or the company reporting structures managing these assets. As such, the optional Scope 3 (upstream emissions, representing the life cycle emissions to manufacture and then transport assets from Anglo American facilities to the lessee are not relevant in this Scope 3 inventory.

3.14. Category 14: Franchises

Table 16 Anglo American Category 14 emissions overview

Category 14	
Category Description	Emissions associated with company franchises
Total Scope 3 Emissions (MtCO ₂ e)	0.0001
Calculation Status	Not Material, Calculated
Activity Data Source	De Beers Group external consultant reports FY2012 Proxy data
Emissions Data Source	De Beers Group external consultant reports [100%]
Exclusions	All commodities except Diamonds

3.14.1. Calculation Status Rationale

Aside from Diamonds, Anglo American does not operate on a franchise model and thus has no franchisees for which emissions can be attributed. Regarding Diamonds, De Beers Jewellers was launched in 2017. Customer facing stores are operated on a franchise model, with stores in China, Taiwan, Japan, India, Australia and the US (to name a few).

Engagement in started in 2021 to start the process of capturing the emissions arising from the associated franchises. While there are differences in the licencing and operating models for De Beers Jewellers and Forevermark (licencing and core), for the purpose of coherent reporting at Group level, these have been collated under Category 14.

3.14.2. Calculation methodology

The emissions were calculated based on the average floor area per store which was received from client. The electricity consumption was of a retail space and operating days were assumed. This was used to estimate annual electricity consumption and then an emissions factor was applied to this. There was so data for FY2023 and thus FY2022 activity data was used until such time the updated information is available.

3.15. Category 15: Investments

Table 17 Anglo American Category 15 emissions overview

Category 15	
Category Description	Operation of investments in the reporting year not included in Scope 1, Scope 2 and Scope 3 including upstream and downstream emissions for these entities
Total Scope 3 Emissions (MtCO ₂ e)	8.385
Calculation Status	Material, calculated
Activity Data Source	Sustainability reports, FY22 Proxy data
Emissions Data Source	Scope 1, 2 and 3 of Investment reported emissions
Exclusions	None

3.15.1. Calculation Status Rationale

The emissions attributed to the company's economic interests in other entities has been calculated. In FY2023 the non-managed operation was core to the company's business model and the rationale for the calculation is the material nature of emissions relating to the operation and its value chain, the material nature of the investment, the materiality of the revenue generated, and, although not holding operational control, the potential influence that Anglo American may exert on the performance of the entity (as well as the relevance of their performance in terms of climate-related risk exposure).

3.15.2. Activity Exclusions Rationale

The De Beers Group joint ventures are all reported equivalently and in full; including for Namdeb, Debmarine and Debswana operations as though these joint ventures were owned and managed for the purpose of Scope 3 emissions calculation. While these operations are managed by our joint venture partners, for the purpose of Scope 3 strategy, management and disclosure, we have deemed it appropriate to report in full given that consumers closely associate De Beers with its products (without consideration for carbon accounting protocols) and joint ventures partners are working closely with De Beers concerning value chain emissions. In effect, the De Beers joint ventures are excluded from this category, having been reported across Categories 1 – 14 in full in FY2023.

3.15.3. Calculation Methodology

For the emissions calculations concerning non-managed operations, financial exposure was considered in terms of equity share, which is the equity holding that Anglo American has in the joint venture operation, as the consolidation approach used to account for the Scope 1, 2, and 3 emissions.

Due to the absence of data on the liabilities and the financial arrangements between Anglo American and these non-managed operations, the approach for consolidation based on equity share without considering further financial arrangements is considered simplistic but aligns with the recommendations of the GHG Protocol Standard.

Where primary Scope 1 and Scope 2 emissions data for non-managed operations was available (i.e., the direct and indirect emissions associated with the purchase of electricity, steam, heat, or cooling for that entity/operation, relative to these operations), the FY2023 reported emissions for these operations was multiplied by the percentage equity held by the company to yield emissions attributable to Investments.

Where no reported Scope 1 and Scope 2 emissions were found through outreach or in research, an emissions proxy was applied, computed as available emissions intensity data from a company producing the same material as the operation in question to yield a useable emissions per unit produced. This emissions factor was multiplied by the mass of material produced by the company's operation in question.

For Scope 3 for non-managed operations (i.e., indirect emissions not otherwise accounted and arising from activities up- and downstream of these non-managed operations), the emissions intensities for the owned and managed operations were used as proxies to determine these extended boundary emissions of the non-managed investments, wherever possible. These Scope 3 emissions proxies were then multiplied by the volume of product sold in the 2023 period by the non-managed asset.

Copper (Collahausi): Collahausi publishes their Scope 1, 2 and 3 emissions in their Sustainability Report 2022 but have not, to date, released the 2023 figures. This assessment applied the Collahuasi reported 2022 Scope 1, 2 and 3 values to Anglo American equity share holding.

PGM (Kroondal Pooling and Sharing Agreement): To account for the Scope 1 and 2 emissions from these entities and apportion to Anglo American based on equity holding (%). PGMs from the joint operations (Modikwa and Kroondal) are fed into the Amplats refining volumes. Therefore, the downstream Scope 3 emissions for these PGMs volumes are not included as they will already be accounted in the Amplats total sales volumes. The upstream scope 3 emissions (Category 1-7) are included, again apportioning these emissions to Anglo American using the equity holdings (%).

Steelmaking Coal (Jellinbah): For the Scope 1 and 2 values we used the figures reported to the Clean Energy Regulator via the National Greenhouse and Energy Reporting scheme. In alignment with our operational control approach, we used the "Greenhouse and energy information by controlling corporation 2021-22" figures. According to the National Greenhouse and Energy Reporting scheme by the Clean Energy Regulator, "A registered corporation's report must contain greenhouse and energy information in relation to the activities of the facilities under the operational control of it or its group members as at 30 June of the relevant reporting year." Meaning that the emissions run from 1st July 2021 - 30th June 2022. In the absence of data for the latter half of 2022, we assume the Scope 1 and 2 data for H2 2021 are reflective of Scope 1 and 2 emissions for H2 2022.

The Scope 3 emissions are calculated using the latest World Steel Sustainability performance indicators (2023) for a BF-BOF emissions factor and the Raw Materials fact sheet for the inputs-outputs values for steelmaking coal and iron ore per unit crude steel produced.

Iron Ore (Ferroport): Direct disclosure by Ferroport on their Scope 1, 2 and 3 emissions. This was summed and multiplied by Anglo American's Equity Share (50%). FY2022 emissions data was used as a proxy until such time Ferroport reports their emissions.

Manganese (Samancor): Direct disclosure by South32 to Anglo American of Samancor Manganese Scope 1 and 2. Samancor Manganese Scope 3 was estimated from the South32 Sustainability Report for FY2023, applying the reported Scope 3 Categories 1 – 14 to the proportion of Scope 3 arising from the manganese value chain (reported as 16.4%). The aggregate estimate for Samancor Manganese Scope 1, 2 and 3 was multiplied by equity exposure.

3.15.4. Allocations and Key Assumptions

Anglo American assumes only the equity share portion of the total emissions associated with the joint venture. It was assumed that the non-managed operations would achieve comparable emissions performance to the managed operations, where proxies were used, and to industry averages, where industry average emissions factors were used.

Appendices

Appendix 1: Glossary of terms and abbreviations

Table A-1 Terms and abbreviations used in report

Activity Data	Figures representative of the company's level of activity for a particular operation in the year under review. This could include mass of product produced, volume of fuels purchased, number of employees commuting etc. as relevant. The suitable emissions figures are applied to these activity data to yield a representative amount of greenhouse gas emissions for that activity for the given reporting period.
AUS	Australia
BF-BOF	Blast furnace to basic oxygen furnace
Capital Goods	Final goods that are purchased by the company that have a lifespan of longer than a year and are used for the production, processing and sale of goods and services by the company. This includes plant, property, and equipment.
Carat	A unit of mass equal to 200mg or 0.2 grams used to measure gemstones and pearls, pertinent to diamonds in the context of this report.
Cradle-to-Gate	Emissions that are attributable to a product or activity that include lifecycle emissions associated with production and logistics up to the point of receipt by the company.
C&M	Closure and maintenance
Coal AUS	Bulk commodity business producing and selling (in international markets) predominantly metallurgical quality coal principally for the iron & steel industry, as well as thermal coal for heat and steam in industries, and power generation applications. Operations are Australia based.
Coal SA	Bulk commodity business producing and selling (in domestic and international markets) thermal coal of varying grades, principally for heat and steam in industries, and power generation applications. Operations are South Africa based.
CDP	A global disclosure and transparency programme and reporting platform, previously known as the Climate Disclosure Project.
DRI-EAF	Direct reduction iron to electric arc furnace
Emissions Factor	A figure representing the greenhouse gas emissions for a specified quantity of applicable activity data that is used to convert the activity data into a representative amount of greenhouse gas emissions for that activity data.
Gate-to-Grave	Emissions that occur downstream from the company from the point of sale of the good up to and including the end-of-life treatment of that good.
GHG	Greenhouse gases accounted for in this report are the seven main gases covered by the UNFCCC/Kyoto Protocol as defined in GHG Protocol, as amended: carbon dioxide (CO ₂); methane (CH ₄); nitrous oxide (N ₂ O); hydrofluorocarbons (HFCs); perfluorocarbons (PFCs); sulphur hexafluoride (SF ₆); and nitrogen trifluoride (NF ₃).
GHG Protocol	Greenhouse Gas Protocol Corporate Value Chain (Scope 3) Accounting and Reporting Standard Supplement to the GHG Protocol Corporate Accounting and Reporting Standard, Copyright of World Resources Institute and World Business Council for

Sustainable Development, September 2011 [accessed at https://ghgprotocol.org/sites/default/files/standards/Corporate-Value-Chain-Accounting-Reporting-Standard_041613_2.pdf].

GWP	Global Warming Potential: a factor applied to the greenhouse gases such as nitrous oxide (N ₂ O), methane (CH ₄), hydrofluorocarbons, perfluorocarbons, and sulphur hexafluoride.
IPCC	Intergovernmental Panel on Climate Change.
JV	Joint venture.
KIO	Kumba Iron Ore.
IOB	Iron Ore Brazil
Materiality	Activities and resulting emissions that are deemed to have a significant impact on the overall results of the Scope 3 model. Immaterial activities or emissions are those that are anticipated to have negligible impacts on the company's emissions profile.
Ounce	A unit of mass equal to 31.103 grams, pertinent to PGMs in the context of this report.
PGMs	Platinum Group Metals being predominantly platinum, palladium, and rhodium.
Primary Data	Data either directly from the company or from company suppliers or customers. Primary emissions data refers to Scope 1 and Scope 2 emissions obtained directly from the company's suppliers or customers for use as an emissions factor. Primary activity data is data that has been obtained directly from the company for use in this model.
Proxy	A proxy is where no available data, activity and/or emissions factors, is available and a representative substitute is used to give an estimation for the emissions for that activity instead of excluding the activity entirely.
Scope 1	Direct emissions from owned or controlled sources, as defined by the GHG Protocol.
Scope 2	Indirect emissions from the generation of purchased energy consumed by the reporting company), as defined by the GHG Protocol.
Scope 3	All other indirect emissions other than Scope 3, that occur in a company's value chain, as defined by the GHG Protocol.
Secondary Data	Emissions and/or activity data that has been obtained from a third party or from a source that represents industry averages for that activity. Secondary data is less preferred but often more attainable than primary data, and as such has been used only in the absence of primary data.
tCO₂e	Metric tonnes of carbon dioxide equivalent. The equivalent here means that the GWP of the various greenhouse gases have been converted to represent the radiative forcing in carbon dioxide equivalent.
UNFCCC	United Nations Framework Convention on Climate Change.
WBCSD	World Business Council for Sustainable Development.
WRI	World Resources Institute.

Appendix 2: References

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