



# May 2024 Green Bond Allocation & Impact Reporting

*March 2025*

## Key Figures

**€500m**

issued in  
May 2024

**€500m**

allocated as of  
31 Dec. 2024

**10**

year  
maturity

**3.375%**

coupon  
rate

**6**

green projects  
financed

**85**

Investors  
among which  
**82% Green**

“

The success of this **second green bond** issuance illustrates **the investors' confidence in Air Liquide's ability** to implement technologies and pioneer projects that contribute to the **decarbonization** of our activities as well as help our customers lower their **carbon footprint**. This is in line with our strategic plan **ADVANCE**, which inseparably links financial and extra-financial performances. The technologies Air Liquide masters notably in the fields of **low-carbon hydrogen, carbon capture and low-carbon air gases** actively and concretely contribute to a transition to a low-carbon society.



**Jérôme Pelletan,**  
Group Chief Financial Officer

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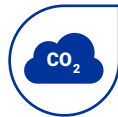
# Performing for What Matters



**Delivering financial performance** →



**Delivering extra financial performance**



**ADVANCE**



*A Comprehensive Performance:  
extra-financial and financial performance  
are positioned as equally important  
and embedded in our governance*



# 1

## Sustainability Convictions & Strategy

Our convictions that drive our strategy

For the planet



We have a role to **decarbonize** the planet



We help move **industry forward in their own decarbonization path**



We believe **technologies are key** in the fight against climate change



Protecting the environment for future generations includes **conserving resources and preserving biodiversity**



**A safe, inclusive and diverse workplace** is a source of strengths



Every person in the world should have access to **medical oxygen**



**A patient-centric approach** can contribute to build more sustainable healthcare systems



It is our responsibility **to give back to communities** we operate in



We are committed to upholding the highest standards of **ethics and human rights**

For the wellbeing of the society

# 1

# Sustainability Convictions & Strategy

## Pillars of our ESG Strategies

### For the environment



Contribute to a low-carbon society and the environment as a whole.



Reducing our CO<sub>2</sub> emissions



Water management



Biodiversity preservation

### For health



Improve the quality of life of patients and access to medical oxygen.



Improving the quality of life of patients with chronic diseases at home in mature economies



Facilitating access to medical oxygen in low- and middle-income countries.

### For all



Strive to act as a trusted partner with all our stakeholders.



Safety



Engaging with our employees: creating a safer, more collaborative and inclusive work environment



Supporting local communities



Building a best-in-class governance to create close relationships with stakeholders

1

# Sustainability Convictions & Strategy

ESG External Recognition obtained in 2024



**A-** in **Water** management and **B** in **Climate** change

## S&P Dow Jones Indices

A Division of **S&P Global**

Included in the **DJSI Europe Index** and **S&P Sustainability Yearbook**



FTSE4Good

Constituent of the **FTSE4Good index series**

**ecovadis**

Ranked in the **top 20%** of the best-rated companies



**A** rating

Corporate ESG Performance

RATED BY **ISS ESG**

**Prime**

Ranked in the **top 20%** of companies in the running and **"Prime"** status

**MOODY'S** | ESG Solutions

**Beating sector average** in all pillars and domains



"ESG Industry **Top Rated**"  
**"low risk"** rating

# 2

# 2024 Sustainable Financing Framework at a glance

## Overview

Air Liquide Sustainable Financing Framework is aligned with the **Green Loan Principles** (2023) and the **Social Loan Principles** (2021) overseen by the **Loan Market Association** (LMA) and with the **Green Bond Principles** (2021, GBP), the **Social Bond Principles** (2023, SBP) and the **Sustainability Bond Guidelines** (2021, SBG) overseen by the **International Capital Markets Association** (ICMA).



**MOODY'S**

Moody's has assigned a Sustainability Quality Score of **SQS2 "Very Good"** to Air Liquide Sustainable Financing Framework.





### Air Gases



**Air separation units** to deliver the industrial gases that Air Liquide's customers need is at the **heart of the Group's business** and is a **fundamental part of its history**. Air gases are a necessary solution to **support the decarbonisation of the Group's customers' existing processes** all around the world.

### Hydrogen



**Low carbon and renewable hydrogen** will play a **major role in the energy transition** and Air Liquide is **deeply committed to be a developer of this technology on a global scale**. Air Liquide is focused on delivering low carbon and renewable hydrogen enhancing reliable and safe processes via multiple technologies such as electrolysis, capture of CO<sub>2</sub> and hydrogen liquefaction.

### Carbon capture as a service



To face the climate emergency, industries are mobilizing to limit and avoid CO<sub>2</sub> emissions generated by their activities. **CCS is seen as a key solution to avoid CO<sub>2</sub> emissions in the short term**, particularly in sectors whose emissions are difficult to reduce. Leveraging its **long standing experience with producing, purifying and delivering this molecule**, Air Liquide runs a **comprehensive portfolio of carbon capture solutions, based on different technologies**.

**Green Eligible Projects** will primarily include capital expenditures. They may also include maintenance costs related to Green Eligible Projects, as well as direct investments in companies and investment in dedicated funds (excluding equity participations in publicly listed companies<sup>(1)</sup>), both specialized in any of the above Green Eligible Projects categories<sup>(2)</sup>.

<sup>(1)</sup> Private equity investments will remain eligible in the event that an investee company transitions to a publicly traded company, but Air Liquide will exclude any newly originated public equity participations in listed companies.

<sup>(2)</sup> A company will be considered eligible if it derives 90% or more of its revenues from activities falling in any of the Green Eligible Project categories

# 2024 Sustainable Financing Framework at a glance

## Social eligible categories



### Home healthcare and proximity /community care services

As a **leader in home healthcare in Europe**, Air Liquide provides care at home for people with chronic diseases. Air Liquide's Home Healthcare business strives to meet public health challenges as well as the growing constraints on health spending in advanced economies, by reducing hospitalization and developing a home care offer.



Social Eligible Projects will include capital expenditures, maintenance costs related to social eligible projects, as well as direct investments in companies (excluding equity participations in publicly listed companies) specialized in the Social Eligible Project category<sup>(1)</sup>.

<sup>(1)</sup> A company will be considered eligible if it derives 90% or more of its revenues from activities falling in any of the Social Eligible Project categories

## 2

# 2024 Sustainable Financing Framework at a glance

## Eligible Projects and Output Indicators

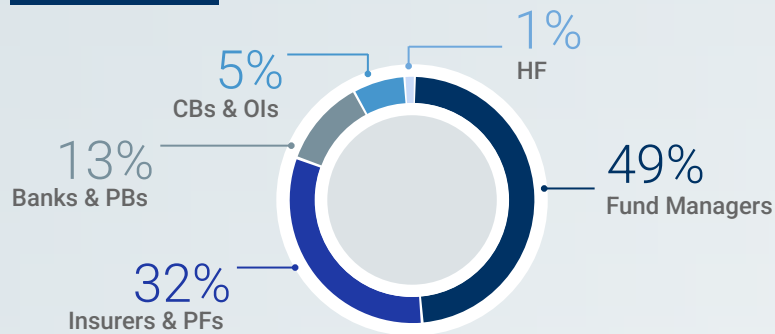
Eligible Projects	Description of eligible projects	Possible Output Indicators
Air Gases	Production of air gases for the decarbonization of industries involved in the energy transition and as necessary component in green activity value chain	<ul style="list-style-type: none"> <li>• Energy saving of the ASU</li> <li>• Information on industrial pilot units when relevant</li> </ul>
	Production of air gases for the integration of variable renewables through Demand-Side Management	
Hydrogen	Hydrogen Production	<ul style="list-style-type: none"> <li>• Annual Hydrogen production (tH<sub>2</sub> or m<sup>3</sup>)</li> <li>• Annual Hydrogen transported (tH<sub>2</sub> or m<sup>3</sup>)</li> <li>• Annual Hydrogen stored (tH<sub>2</sub> or m<sup>3</sup>)</li> <li>• Energy storage capacity (MW)</li> </ul>
	Storage of Hydrogen	
	Hydrogen Mobility	
Carbon Capture as a service	Capture of CO <sub>2</sub>	<ul style="list-style-type: none"> <li>• Annual amount of CO<sub>2</sub> captured (tCO<sub>2</sub> or m<sup>3</sup>)</li> <li>• Annual amount of CO<sub>2</sub> transported (tCO<sub>2</sub> or m<sup>3</sup>)</li> </ul>
Social	Development of home healthcare services and of proximity / community care services that fall under a public health subsidy program for long-term follow-up care related services, for chronic or complex patients	<ul style="list-style-type: none"> <li>• Estimated number of beneficiaries</li> </ul>

## 3

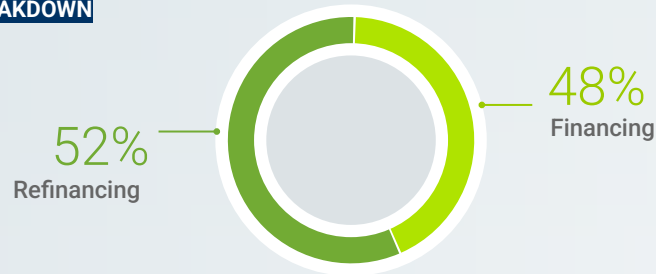
# Green Bond Issuance Summary

<b>Issuer Guarantor</b>	Air Liquide Finance (the "Issuer"), guaranteed by L'Air Liquide S.A. ("The Guarantor")
<b>Rating</b>	A2 (Moody's) / A (S&P) / A (Scope Ratings)
<b>Form of Issue</b>	Green Bond Senior, Unsecured Global Notes
<b>Documentation</b>	EMTN programme
<b>Active Bookrunners</b>	HSBC & Natixis (ESG Structurers and Global coordinators), Crédit Agricole CIB, BNP Paribas, Société Générale, Citi
<b>Use of Proceeds</b>	Financing and refinancing of Green Eligible Projects as defined in Air Liquide's Sustainable Financing Framework dated May 2024
<b>Tenor</b>	10-year
<b>Re-offer yield</b>	3.466%
<b>Spread</b>	MS + 62 bps
<b>Size</b>	500m€
<b>Second Party Opinion assessment</b>	SQS2 "Very Good" - Moody's

## INVESTOR PROFILE



## FINANCING AND REFINANCING BREAKDOWN

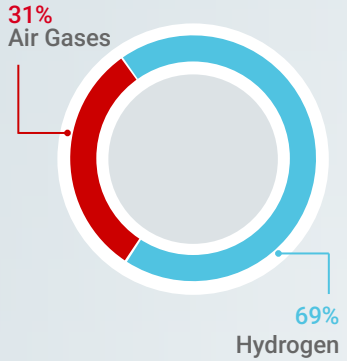


# 4

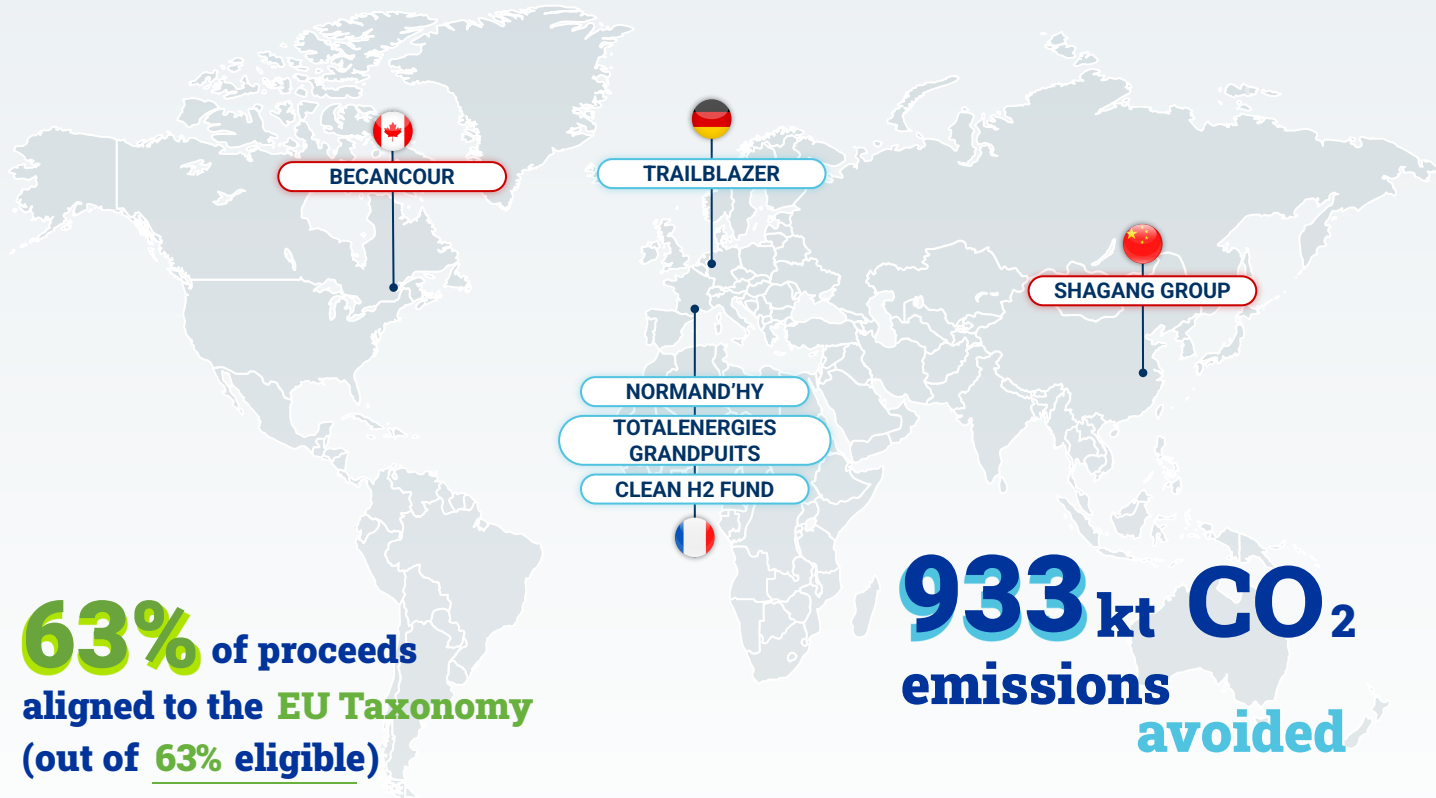
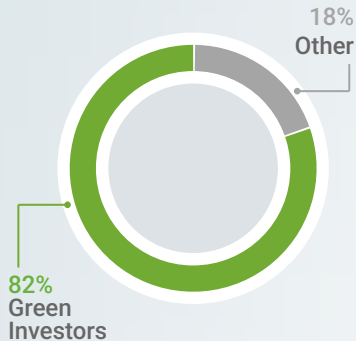
## Allocation & Impact Reporting

6 projects across the world

### CATEGORIES ALLOCATION



### SHARE OF GREEN INVESTORS





**63%** of proceeds aligned to the **EU Taxonomy** (out of **63%** eligible)

**933 kt CO<sub>2</sub> emissions avoided**

## 4

# Allocation & Impact Reporting

€500m fully allocated as of December 31st, 2024

Eligible Projects	Eligible Projects Sub Categories ✓	UN SDGs	Cash out as of end 2024 ✓	Output indicator	Impact indicator CO <sub>2</sub> emissions avoided*
Air Gases	<p>Air Gases production for the decarbonization of industries</p> <p>Air Gases production for the integration of variable renewables</p> <p>2 projects</p>	 <p>9 INDUSTRY, INNOVATION AND INFRASTRUCTURE</p>	156m€	<p>200 GWh/y</p> <p>total energy saving of the ASUs</p>	<p>513,000</p> <p>tCO<sub>2</sub>eq/y</p>
Hydrogen	<p>Hydrogen production</p> <p>4 projects</p>	 <p>7 AFFORDABLE AND CLEAN ENERGY</p>	344m€	<p>45,800 tH<sub>2</sub></p> <p>total annual hydrogen production</p>	<p>420,000</p> <p>tCO<sub>2</sub>eq/y</p>

✓ Subject to external verification

\*Avoided emissions are an estimate of the greenhouse gas emissions, expressed in tCO<sub>2</sub> equivalent, that are avoided, or whose avoidance is enabled, by the financed projects (when feasible); they are estimated by comparing with a reference case for each category of project or, when a generic reference is not available, an estimate of savings based on energy savings realized.

## 5

# Case Studies

## Air Gases - Building a Low-C Gas Production Platform in Bécancour Basin

Air Liquide will build, own and operate a production and distribution infrastructure, including a **new air separation unit (ASU)** producing oxygen, nitrogen and argon; as well as a liquid storage capacity. The new ASU will be powered by **renewable energy from hydropower sources**, in line with Air Liquide's ADVANCE plan to reduce its CO<sub>2</sub> emissions by 33% by 2035. Adding a total oxygen production capacity of **850 tonnes per day**, the new infrastructure will primarily supply **customers manufacturing battery components for electric vehicles** via long term contracts and should be operational in 2025.



**20MW PEM (water electrolysis)**  
Electrolyzer in operations since 2021



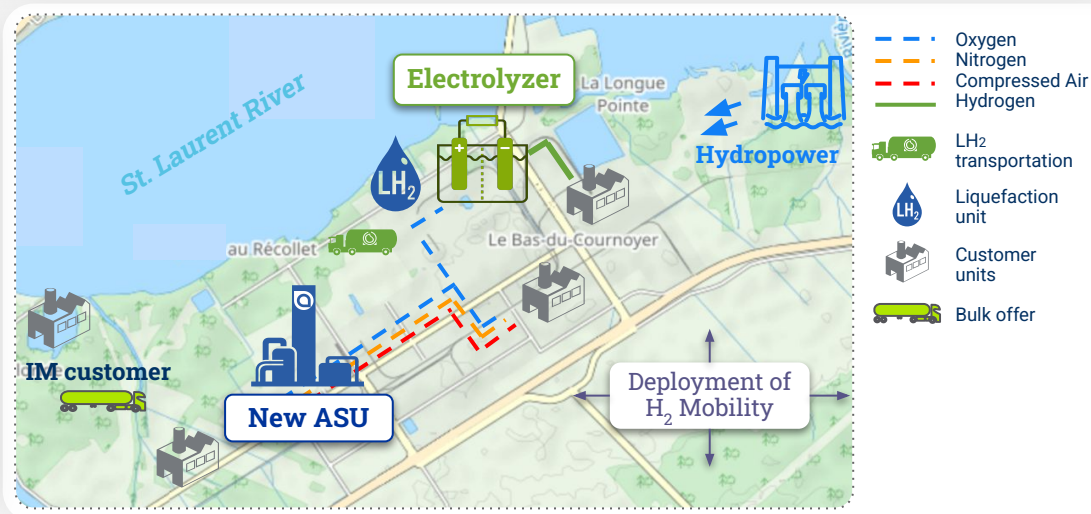
**Renewable energy** sourcing



H<sub>2</sub> liquefier to **develop H<sub>2</sub> mobility**



For **industrial** use and **mobility**



## 5

## Case Studies

## Hydrogen - TE Grandpuits to produce renewable and low-carbon hydrogen

Air Liquide and TotalEnergies are innovating to produce and valorize renewable and **low-carbon hydrogen**. Under a long-term contract committing TotalEnergies to purchase the hydrogen produced for the needs of its platform, Air Liquide will invest in the construction and operation of a **new unit producing hydrogen**. This unit will partly use biogas from the biorefinery built by TotalEnergies and will be delivered with **Air Liquide's carbon capture technology, Cryocap™**. These innovations will prevent emissions amounting to **150,000 tonnes of CO<sub>2</sub> a year compared to current processes**. TotalEnergies' biorefinery will use the unit's hydrogen to produce **SAF**.



Production capacity of more than **20,000 tons** of hydrogen per year



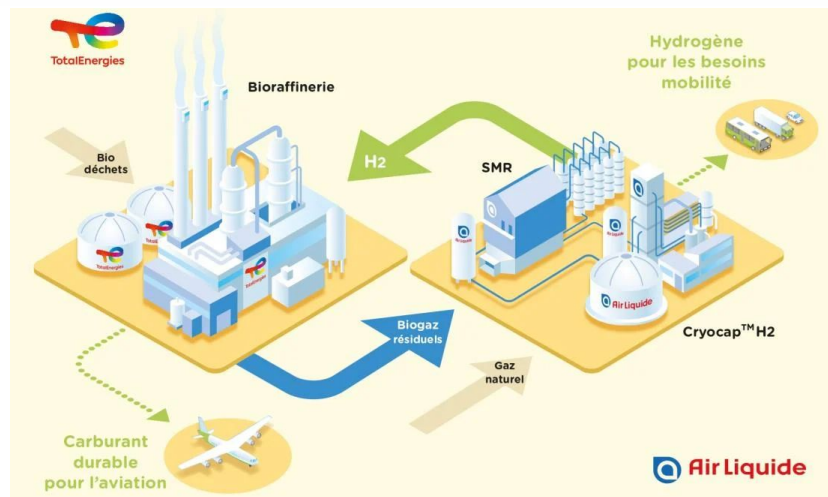
Prevent emissions amounting to **150,000 tons of CO<sub>2</sub>** a year



Inclusion of a Air Liquide **Cryocap™ H<sub>2</sub>** carbon capture unit



Produce **Sustainable Aviation Fuel (SAF)**





## 5

## Case Studies

### Hydrogen - Air Liquide Normand'Hy, decarbonising industry in Normandy

Located in the industrial zone of Port-Jérôme in Normandy, France, the **large-scale electrolyzer project** of Air Liquide Normand'Hy aims to supply **renewable hydrogen for industrial applications**, as well as future heavy mobility applications. Air Liquide will connect the electrolyzer to its hydrogen pipeline network in Normandy, which would contribute to the development of **the world's first low-carbon hydrogen network**. The Air Liquide Normand'Hy project is a **cornerstone of the decarbonization ecosystem** which is being set up by Air Liquide with other major industrial players on the **Seine Valley axis in Normandy**.



Large-scale electrolyzer with an **initial capacity of 200 megawatts**



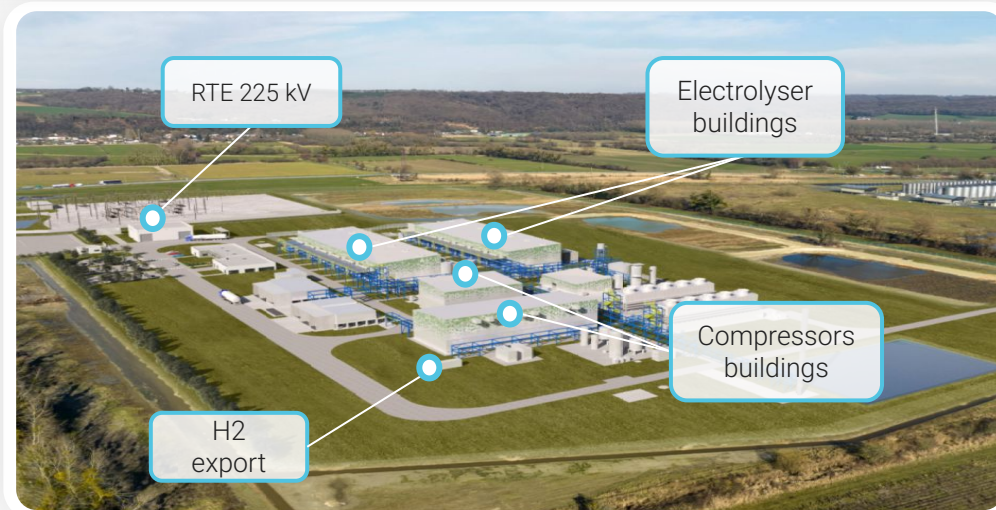
**Avoided CO<sub>2</sub>** up to 250,000t CO<sub>2</sub>/y



Technology: **PEM** (water electrolysis)



For **industrial** use and **mobility deployment**





### Independent practitioner's limited assurance report on the sustainability information in Air Liquide's Green Bond Allocation & Impact Reporting

To the board of directors of Air Liquide Finance,

#### Limited assurance conclusion

In accordance with section "4.5 External Review" of the *Sustainable Financing Framework* published in May 2024 (the "2024 Sustainable Financing Framework"), we have conducted a limited assurance engagement on the sustainability information of the Air Liquide Group (the "Company") presented below and identified with a (\*) columns: "Eligible Projects Sub-Categories" and "Cash out as of end 2024") on page 14 in section "4 Allocation & Impact Reporting" in the *May 2024 Green Bond Allocation & Impact Reporting* (the "2024 Green Bond Allocation & Impact Report") (the "Identified Sustainability Information"):

- the information related to the allocation as at December 31, 2024 in respect of the green bond with a 10 year maturity date issued by Air Liquide Finance on May 23, 2024 (ISIN: FR001400QB37) for a total aggregate amount of EUR 500 000 000 (the "2024 Green Bond") to the Company's green projects presented in section "4 Allocation & Impact Reporting" of the 2024 Green Bond Allocation & Impact Report (the "Eligible Green Projects");
- the Eligible Green Projects as described in the section "4.1. – Use of Proceeds" of the 2024 Sustainable Financing Framework published in May 2024.

Based on the procedures we have performed and the evidence we have obtained, nothing has come to our attention that causes us to believe that the Identified Sustainability Information is not prepared, in all material respects, in accordance with the criteria set out in section "4.1. – Use of Proceeds" of the 2024 Sustainable Financing Framework available on the Company's website.

#### Basis for conclusion

We conducted our limited assurance engagement in accordance with International Standard on Assurance Engagements (ISAE) 3000 (Revised), Assurance engagements other than audits or reviews of historical financial information ("ISAE 3000 (Revised)"), issued by the International Auditing and Assurance Standards Board.

We believe that the evidence we have obtained is sufficient and appropriate to provide a basis for our conclusion. Our responsibilities under this standard are further described in the Practitioner's responsibilities section of our report.

#### Our independence and quality management

We have complied with the independence and other ethical requirements of the French Code of Ethics for Statutory Auditors (Code de Déontologie) as well as the provisions set forth in article L.821-28 of the French Commercial Code (Code de Commerce) and the International Code of Ethics for Professional Accountants (including International Independence Standards) issued by the International Ethics Standard Board for Accountants (IESBA Code), which is founded on fundamental principles of integrity, objectivity, professional competence and due care, confidentiality and professional behaviour.

The firm applies International Standard on Quality Management 1, which requires the firm to design, implement and operate a system of quality management including policies or procedures regarding compliance with ethical requirements, professional standards and applicable legal and regulatory requirements.

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### Independent practitioner's limited assurance report on the sustainability information in Air Liquide's Green Bond Allocation & Impact Reporting – Page 2

#### Responsibilities for the Identified Sustainability Information

Management of the Company is responsible for:

- The preparation of the Identified Sustainability Information in accordance with the criteria set out in section "4.1. – Use of Proceeds" of the 2024 Sustainable Financing Framework (the "Criteria");
- Designing, implementing and maintaining such internal control as management determines is necessary to enable the preparation of the Identified Sustainability Information, in accordance with the Criteria, that is free from material misstatement, whether due to fraud or error; and
- The selection and application of appropriate sustainability reporting methods and making assumptions and estimates that are reasonable in the circumstances, if any.

Those charged with governance are responsible for overseeing the Company's sustainability reporting process.

#### Practitioner's responsibilities

Our responsibility is to plan and perform the assurance engagement to obtain limited assurance about whether the Identified Sustainability Information is free from material misstatement, whether due to fraud or error, and to issue a limited assurance report that includes our conclusion. Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence decisions of users taken based on the Identified Sustainability Information.

As part of a limited assurance engagement in accordance with ISAE 3000 (Revised) we exercise professional judgement and maintain professional scepticism throughout the engagement. We also:

- Determine the suitability in the circumstances of the Company's use of the Criteria as the basis for the preparation of the Identified Sustainability Information.
- Perform risk assessment procedures, including obtaining an understanding of internal control relevant to the engagement, to identify where material misstatements are likely to arise, whether due to fraud or error, but not for the purpose of providing a conclusion on the effectiveness of the Company's internal control.
- Design and perform procedures responsive to where material misstatements are likely to arise in the Identified Sustainability Information. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control.

#### Summary of the work performed

A limited assurance engagement involves performing procedures to obtain evidence about the Identified Sustainability Information. The procedures in a limited assurance engagement vary in nature and timing from, and are less in extent than for, a reasonable assurance engagement. Consequently, the level of assurance obtained in a limited assurance engagement is substantially lower than the assurance that would have been obtained had a reasonable assurance engagement been performed.

The nature, timing and extent of procedures selected depend on professional judgement, including the identification of where material misstatements are likely to arise in the Identified Sustainability Information, whether due to fraud or error.

In conducting our limited assurance engagement, we:

- Considered the Identified Sustainability Information and, through inquiries, the procedures implemented by the Company to produce the Identified Sustainability Information;
- Obtained an understanding, through inquiries, of the control environment of the Company and the information systems relevant to the production of the Identified Sustainability Information;
- Inspected relevant documentation (presentations, "minutes", etc.);
- Assessed the eligibility of a sample of Eligible Green Projects regarding the 2024 Sustainability Financing Framework;

### Independent practitioner's limited assurance report on the sustainability information in Air Liquide's Green Bond Allocation & Impact Reporting – Page 3

- Performed the necessary reconciliations between the Identified Sustainability Information and the accounting records, verifying that the information agrees with the data used to prepare the consolidated financial statements of the Company for the year ended December 31, 2024 and, where applicable, December 31, 2023 and December 31, 2022;
- Assessed the overall consistency of the Identified Sustainability Information with other sustainable information published by the Company.

Neuilly-sur-Seine, March 12, 2025

The statutory auditor  
PricewaterhouseCoopers Audit

Oliver Lotz  
Partner



## Group Financing and Rating

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