

**2019**

**INTEGRATED REPORT**

# **Safety, Environment, Territory**





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Dear readers,

This year we would like to share the Integrated Report 2019 - Safety, Environment, Territory with our stakeholders in a new format: an evolution of the reporting process launched in 2016 on the environment, safety and social-economic relations with the territory whose outcome will be the preparation of our first Sustainability Balance Sheet in the coming years.

2019 was an important year for OLT, confirmed by the excellent operating performance of the plant. Thanks to the professionalism of the resources, OLT has achieved excellent results, not only for the company as such but also for the country's Gas System, bearing in mind OLT's contribution to the security and diversification of energy supply and the forthcoming energy transition.

Moreover, the Small Scale LNG project, whose authorisation process is ongoing, will further boost our company's business prospects in the near future, benefiting the transport - both sea and land - sector and Italian harbour operations.

Full awareness of the strategic nature and uniqueness of our Terminal in Italy, and not only, has given us the necessary insight to steer our actions towards Sustainability, respecting the Territory and the Community that host us.

**Alessandro Fino**  
*Managing Director OLT*

**Giovanni Giorgi**  
*Managing Director OLT*

Dear readers,

In February 2020 Snam S.p.a. completed the procedure to purchase 49.07% of OLT Offshore LNG Toscana.

Snam has a business model based on sustainable growth, transparency, the enhancement of talents and the development of the territories, listening and with continuous dialogue with local communities.

OLT's current management has worked in these years to reinforce a rigorous corporate policy oriented towards safety and sustainability.

This shared vision, based on responsible governance, along with the significant potential for growth, inspired Snam to make this investment.

Today, OLT is a reference infrastructure on the market due to its contribution in terms of security and diversification of energy supply and as a vector for the development of LNG through the Small Scale LNG service that will allow this "green" fuel to be used for both sea and land transport.

Alongside Giovanni Giorgi, I have been appointed by the Shareholders of OLT to manage the company in the role of Managing Director.

Our commitment will be to guarantee business continuity, encouraging and promoting new sustainable development prospects for the company and maintaining the same mission & corporate vision outlined in this Report.

**Maurizio Zangrandi**  
*Managing Director OLT*

## Notes on the methodology and materiality analysis

This Integrated Report - Safety, Environment and Territory describes the work of OLT bearing in mind environmental and social questions relating to the personnel, respect for human rights and the fight against corruption. The breadth and quality of the considerations made reflect the principle of relevance (or "material topics"), a defining element of the GRI (Global Reporting Initiative) guidelines developed by the Global Sustainability Standards Board experts, according to which the information to provide is selected by the company based on an analysis to identify relevant information on the basis of "the measure needed to ensure full comprehension of the company's activities, its trend, its results, and the impact it has, or is able to have, on the stakeholders' judgements and decisions".

Indeed, the Company implemented a consultation project in 2019 involving internal and external stakeholders (an activity already set up by OLT the moment it arrived in the territory) which will be completed during 2020.

When preparing this report, reference was made to the specific principles and methods defined in the most recent standards published in 2016 (and partly updated in 2018) by the Global Reporting Initiative (GRI Standard - GRI-referenced claim option). Refer to the "GRI Reference claim" table for details about the specific information provided.

Considering the Company's history, its size, and its capacity to gather the information needed to draw up a future sustainability balance sheet, it has been decided to start with a referenced approach and then move, in the coming years, towards a core approach defined by the GRI as follows: *"The Core option contains the essential elements of a sustainability report. The Core option provides the background against which an organization communicates the impacts of its economic, environmental and social and governance performance."*

This change process, implemented in 2019 and still ongoing, will culminate in the preparation by the Company (hereinafter "OLT") of a Sustainability Balance Sheet based on three sets of specific standards, focussed on the three fundamental dimensions of sustainability: Economic, Environmental and Social.

This Integrated Safety, Environment and Territory report (hereinafter the "Report") also takes into consideration – by means of specific references – the provisions of the United Nations 2030 Agenda for Sustainable Development with the related 17 SDGs (Sustainable Development Goals), broken down in turn into 169 specific Targets. The report presented here, which is not of a financial nature, can be consulted on the OLT website ([www.oltoffshore.it](http://www.oltoffshore.it)).

## Period and perimeter of the report

The qualitative and quantitative information contained in this Report derives from an analysis of the 2019 data, set against the data of 2017 and 2018: the reporting period is therefore annual. Another important aspect is the definition of the reporting perimeter that, in the analysis in question, regards, for the environmental part, the Terminal (indeed, the environmental impact of office activities is negligible) while, as regards the social impact, as better described in Chapter 4, the activities of OLT and ECOS (OLT outsourcer, responsible for the management of the Terminal) are taken into consideration.

## Materiality analysis

A description of the company's business, risks, policies and social-environmental impacts must be prepared, as stated above, coherently with the topics "that are relevant for reflecting the organization's economic, environmental and social impacts" and that are defined "material".

The GRI Standards underscore the importance of the principle of relevance – "materiality" – as a guiding principle in defining the content to include in the sustainability report.

Based on the stakeholder mapping performed, OLT has applied the following reporting method:

- consultation with stakeholders;
- analysis of the sustainability context: OLT's sustainability performance is analysed within the context in which the company works, both at a national and international level;
- relevance analysis: relevance analysis with reference to the mission and impact of OLT, performed bearing in mind what has already been developed within the framework of the company's IMS (Integrated Management System) as well as the Risk assessment, by means of questionnaires sent to the stakeholders. The relevance analysis enables identification of the relevant aspects for internal and external stakeholders and the perimeter of the impacts for each relevant aspect.
- materiality analysis: based on the significance attributed by the stakeholders consulted and on the relevance with the OLT mission and strategy, middle and top management selects the relevant aspects emerging from the materiality analysis.

Specifically, for 2019, the materiality analysis was performed by sending a questionnaire (based on the data of the 2018 Report and the Company's risks/opportunities analysis) to a group of stakeholders of OLT: a limited group of external stakeholders, alongside the internal ones, with the aim of developing a preliminary approach to materiality that will then be completed in coming years.

In the case of the analysis presented here, it is important to note that both internal and external stakeholders were selected for the survey carried out in 2019:

- External stakeholders: Fratelli Neri and Zerouno (outsourcers), suppliers, the press and Local Authorities;
- Internal stakeholders: OLT and the outsourcer ECOS.

The stakeholders' network is defined in detail in chapter 1.

For the purpose of a complete materiality analysis with the participation of all the external stakeholders, and the community in particular, a weight was assigned (equal to 0.3) to the relevance indexes (present in the questionnaire) of external stakeholders for solely the topics dealt with during the authorisation processes subject to consultation with the public.

It was then decided, based on the principle of "completeness", to define the specific thresholds of relevance for each area of analysis: for topics with environmental relevance, the threshold was 4.2 while topics of social relevance were attributed a threshold of 4.0.

All of the "material" topics (above the relevance threshold) are described in the Report also based on quantitative analysis of the results.

## Results of the analysis

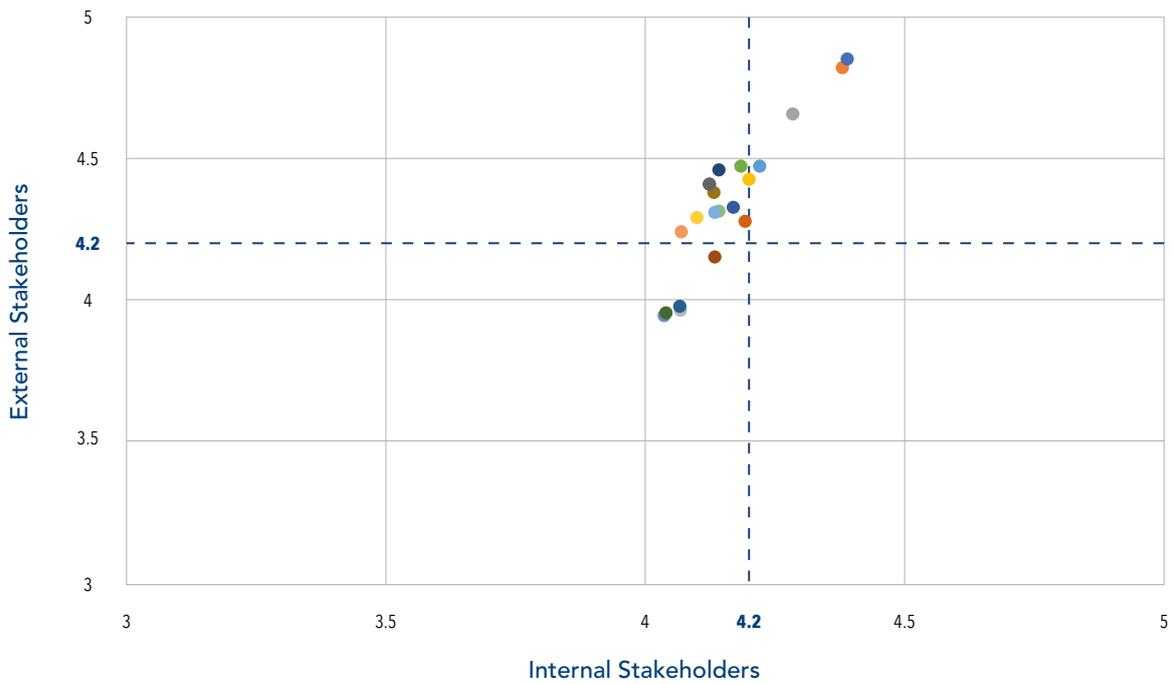
The analysis illustrated below regards only environmental and social topics; the results of the economic analysis proposed in the questionnaire are currently being studied by the company to complete the transformation of the Report into a Social Balance Sheet.

The analysis carried out led to the identification of critical areas, useful suggestions and strengths and weaknesses of the various factors of sustainability.

Comparison of the relevance attributed by the internal and external stakeholders to the topics for each area showed the following.

## Environment dimension table

## ENVIRONMENTAL PERFORMANCE



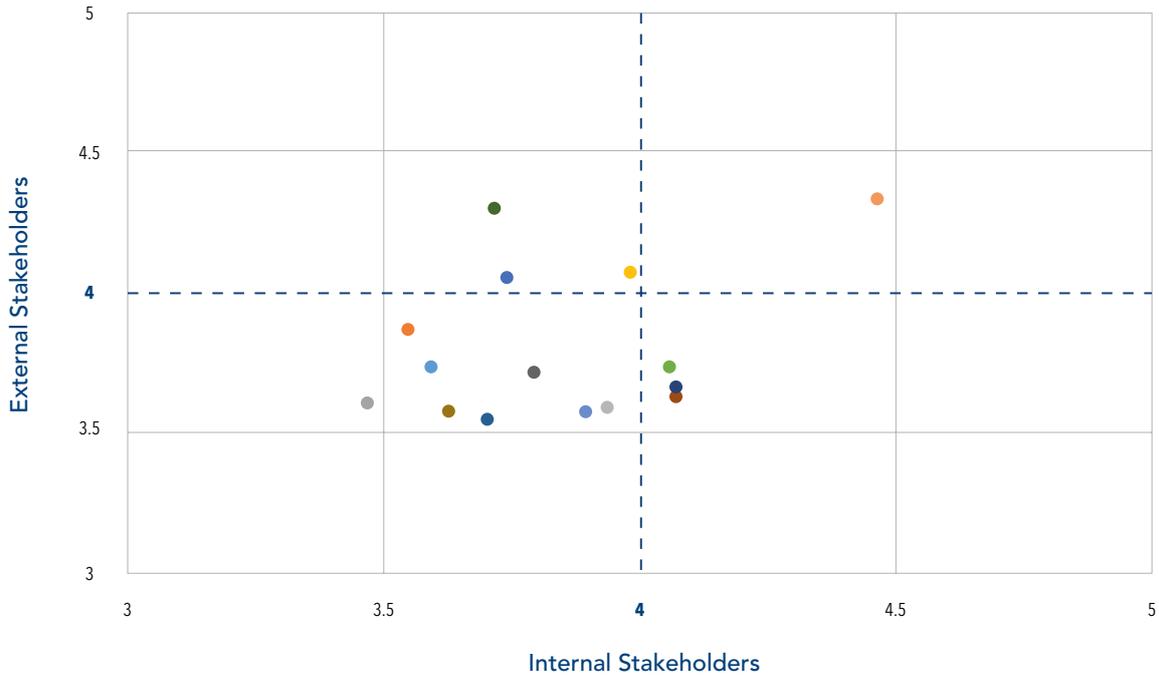
- Emissions to air
- Emissions of Greenhouse Gases
- Seawater withdrawals
- Thermal delta
- Chlorine concentrations and water discharges
- Production of waste
- Composition of waste
- % recycled/recovery
- Energy consumption by energy source
- Consumption of fossil fuels
- Consumption of steam
- Consumption of raw materials
- Recycling/recovery of raw materials
- Effects on biodiversity
- Environmental qualification of suppliers
- Environmental certification
- Compliance of environmental aspects
- Complaints - Litigation on environmental aspects
- Environmental goals achieved
- Environmental goals set

### Scale of relevance

Not important	Fairly important	Important	Very important	Essential
1	2	3	4	5

The opinions "not important" and "fairly important" are not included in the graph because they are not representative of the study carried out.

### Social dimension table



- Number of direct and indirect workers
- Emergency drills
- Equal opportunities policies
- Cultural integration
- Protection of human rights
- Ways resources are used
- Claims for unfair practices
- Equal pay
- Company welfare
- Certifications (social and safety)
- Absences
- Training
- Inclusion of disadvantaged categories
- Policies to support the local community
- Complaints

#### Scale of importance

Not important	Fairly important	Important	Very important	Essential
1	2	3	4	5

The opinions "not important" and "fairly important" are not included in the graph because they are not representative of the study carried out.

The internal and external stakeholders showed a good level of agreement in attributing the degree of relevance to the environmental topics, highlighting the importance of compliance of OLT's work in environmental terms and the need to communicate information about the main actions taken in this context.

As already indicated, it was decided to set a relevance threshold of 4.2 so the "material" environmental topics are:

- Emissions to air - greenhouse gas (GHG) emissions
- Seawater withdrawals
- Water discharges (concentration of chlorine and thermal delta)
- Waste production and concentration
- Energy consumption by energy source
- Consumption of fossil fuels
- Effects on biodiversity
- Environmental certifications
- Compliance of environmental aspects, Complaints - Litigation on environmental aspects
- Environmental targets achieved and set

Compared to the environmental aspects there is less agreement between the internal and external stakeholders on the social aspect. The study shows that all the stakeholders, with reference to OLT's activities and its mission, attribute significance to many categories including: policies to support local communities, safety certification and safety in its broadest sense.

In this case it is noted that the relevance threshold is 4.0 so the "material" social topics are:

- Number of direct and indirect workers
- Safety (including emergency drills)
- Training
- Equal opportunities and equal pay policies
- Policies for the local communities
- Certifications (for social and safety questions)

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**2008-2013**  
Conversion of the  
"Golar Frost" gas tanker



**JULY 2013**  
"FSRU Toscana" arrives in Livorno



**DECEMBER 2013**  
Technical inspection of the Terminal  
and start of commercial activities



**MARCH 2015**  
Final Commissioning Authorization for the  
operations of the Terminal given by the Ministry  
of Infrastructures and Transport



**JULY 2016**  
Final Commissioning Authorization for the  
operations of the Terminal given by the Ministry  
of Economic Development



**MARCH 2018**  
Introduction of the new auction mechanism  
to allocate regasification capacity



**GAS YEAR 2018/2019**  
booking of the regasification capacity: 97%



**GAS YEAR 2019/2020**  
booking of the regasification capacity: 100%



**137,100 m<sup>3</sup>**  
of liquefied natural gas (LNG)  
Total gross storage capacity



**22 km**

Distance from the Tuscan coast  
between Livorno and Pisa

**450 Ton/hour**  
Maximum regasification capacity



**15 million Sm<sup>3</sup>**  
Maximum authorised regasification  
capacity per day



**3.75 billion Sm<sup>3</sup>**  
Maximum authorised regasification  
capacity per year



**180,000 m<sup>3</sup>**  
Authorised vessels: up to the New Panamax class



# The company OLT Offshore LNG Toscana



OLT Offshore LNG Toscana S.p.A (hereinafter OLT) is an international company operating in the energy sector; specifically, it offers Liquefied Natural Gas - LNG - regasification services from its floating terminal "FSRU Toscana".

The Terminal, anchored permanently 22 km off the Tuscany coast between Livorno and Pisa, contributes significantly to the Italian Gas System. With a maximum authorised regasification capacity of 3.75 billion Sm<sup>3</sup> per year – allocated almost entirely in Gas Year 2018/19 – it covers around 5%<sup>1</sup> of the domestic requirement, guaranteeing the security and diversification of the country's energy supply.

Thanks to its innovative characteristics and extreme flexibility, the Ministry of Economic Development (MiSE) has awarded the terminal strategic infrastructure status.

## Location of the "FSRU Toscana" Terminal



## 1.1

### The corporate set-up

The partners that hold shareholdings in OLT at 31 December 2019 are:

- First State Investments (FSI)<sup>2</sup>, with 48.24%, is an experienced global asset manager with over 8 billion euros of unlisted infrastructure capital under management, having been actively investing in long life infrastructure businesses since 1994. First State is an experienced owner of utility businesses across Europe and its current portfolio includes utilities in Estonia, Finland, France, Germany, Portugal, Sweden and the United Kingdom. First State's European Diversified Infrastructure Fund II (EDIF II) is a European domiciled, euro-denominated fund with a long-term buy and hold investment strategy.
- IREN Group<sup>3</sup>, with 49.07%, is a multi-utility group listed on the Italian Stock Exchange and operates in the electrical power, thermal energy, gas, management and supply of integrated water services, environmental services and services for the Public Administration sectors. It also has a shareholding of 2.28% in ASA S.p.A. - Azienda Servizi Ambientali, the company that manages the integrated water and gas distribution service in Livorno and its surrounding area.
- Golar LNG, with 2.69%, is a shipping company specialised in the management and charter of LNG carriers and FSRUs, with more than 30 years' experience.

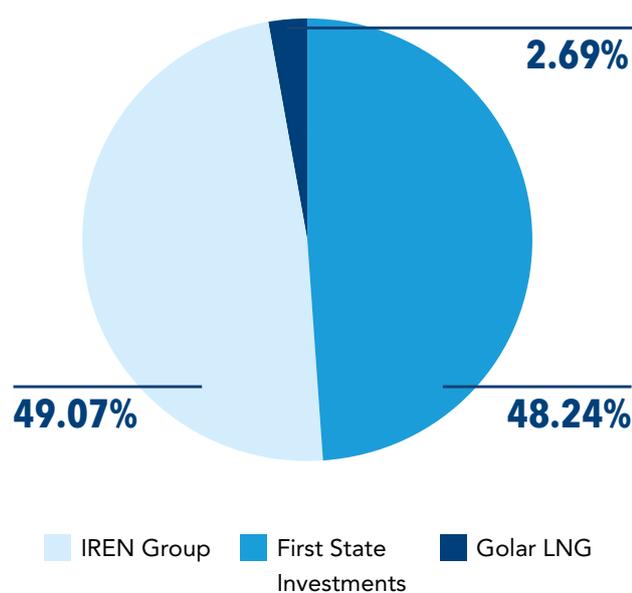
Together, the IREN Group, also through the subsidiary ASA, and FSI hold around 97.31% of the capital and have joint governance.

(1) Italian gas consumption in 2019 was equal to 73,760 million (Source MiSE).

(2) On 23<sup>rd</sup> May 2019 the shareholder UNIPER sold the entirety of the shareholding held in OLT to FSI.

(3) On 26<sup>th</sup> February 2020 the shareholder Iren Group sold the entirety of the shareholding held in OLT to Snam.

## Corporate set-up



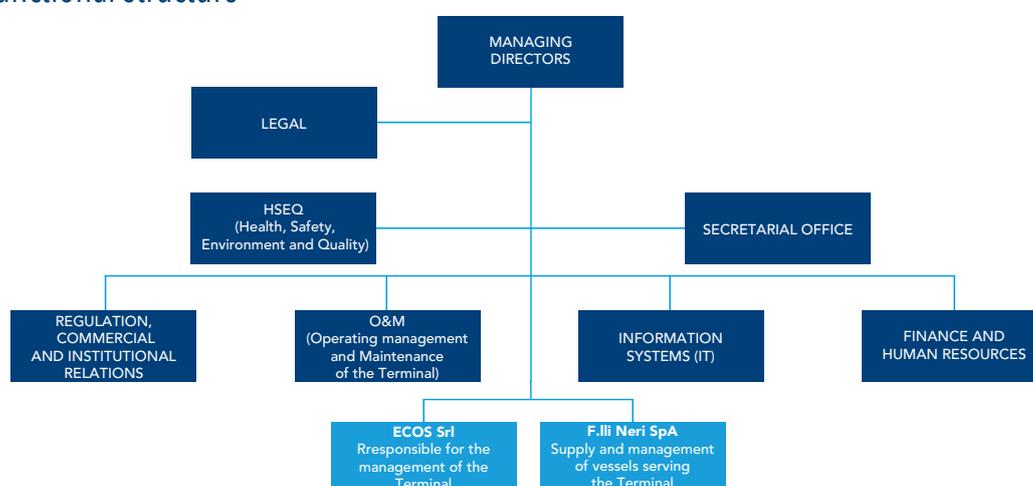
The governing body of OLT is represented by a Board of Directors, comprising 6 directors, that has appointed two Managing Directors with joint powers and to whom the direct management of the Company has been entrusted.

The Managing Directors exert the powers they have been granted by the Board of Directors directly through an operating structure comprising directors, middle-management and highly qualified staff based on the needs of the Company and its business. Besides the internal functions, for the Terminal's operations, the Company has chosen to make use of the support and collaboration of some of the most important operators in the sector.

Specifically, the company **ECOS**, responsible for the operative management and fitting-out of the Terminal, is a joint venture set up by two major national and international companies: Fratelli Cosulich, Italian company that has been operative in the shipping sector for more than 150 years, and the consortium EXMAR Ship Management, a group that operates in LNG transportation throughout the world.

The vessels serving the Terminal (surveillance and security service, tugboat and assistance to vessels approaching and departing from the Terminal and the personnel transportation service) are provided and managed by the company **Fratelli Neri**, leading company in the sector from Livorno and belonging to the Neri Group.

## The OLT functional structure



■ Internal functions    ■ Functions in outsourcing

## 1.2

### The stakeholder network

OLT is committed to consulting and engaging stakeholders, both internal and external. Based on a voluntary approach and in accordance with law provisions, the Company consults and engages its network of stakeholders in the various activities involved in growing its business and has also set up dynamic two-way communication and information channels, for example:

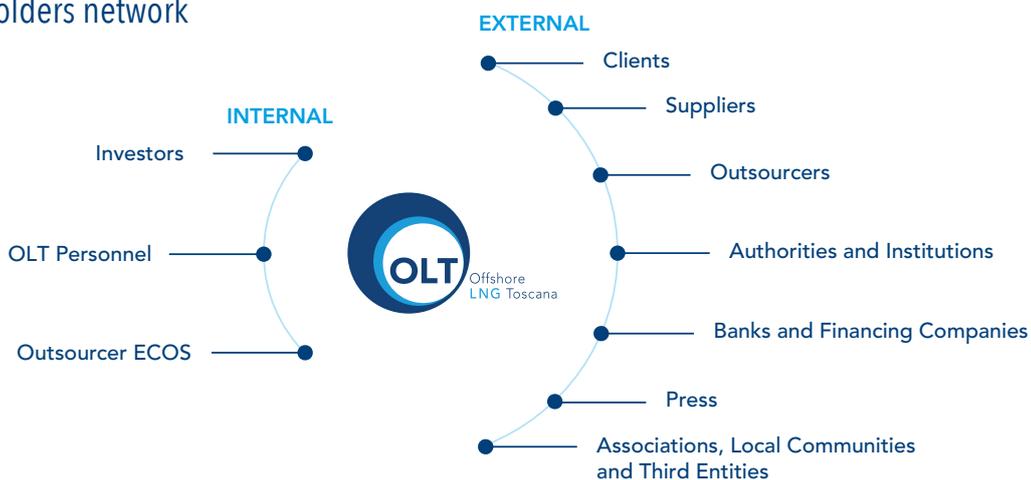
- the workshop *“Italian LNG Summit 2019 - Sustainability, Market, Stakeholders”*, organised by OLT on 14<sup>th</sup> March 2019, under the sponsorship of the Ministry of Economic Development and the Ministry of Infrastructures and Transport, during which the EMAS Declaration 2018 and the 2018 Safety Environment and Territory Report were presented;
- presentation of the Corporate Social Responsibility (CSR) project entitled *“L’Energia del Mare – Fare con e per il Territorio”* (The Energy of the Sea - Acting with and for the Territory);
- periodic reports on sustainability: the EMAS Declaration, the Safety Environment and Territory Report and the SA8000 Sustainability Report;

- the email accounts [sostenibilita@oltoffshore.it](mailto:sostenibilita@oltoffshore.it) and [SA8000@oltoffshore.it](mailto:SA8000@oltoffshore.it), available on the Company’s website for direct consultation with all stakeholders.

Appropriate environmental, social and economic communication is ensured in the various departments of the organisation not only through periodic HSEQ (Health, Safety, Environment and Quality) meetings and opportune training and information initiatives but also through distribution to employees of the OLT Management Review and the quarterly meetings of Management and top executives with subsequent distribution of the minutes of meeting. Moreover, all OLT employees and the top executives of its outsourcers (ECOS and F.lli Neri) are invited to take part in the workshops organised by the Company, like the ones mentioned above.

In the graph below the internal stakeholders; that is, the subjects that hold official roles in the company and enable it to operate are indicated on the left. On the right of the graph there are the external stakeholders that are not a constituent part of the Company but can in any case be linked by contractual agreements and have a stakeholding in the company’s activities.

### The stakeholders network



## 1.3

## Mission & Vision

The presence of two important shareholders offers the corporate structure solidity and proven managerial experience. This corporate background, along with OLT's distinctive trait of consulting its stakeholders, has allowed the company's activities to focus fully on its mission: offering a regasification service that contributes to the security of the country's energy supply, firmly upholding the intention to manage its activities in a responsible way, both from an environmental and social point of view.

Indeed, OLT is an international business project but it is also closely linked to the territory in which the Terminal is located; in this respect, the Company has decided to be physically present in Livorno with its operating base, to be part of the community that hosts

the Terminal and to supervise its functioning close at hand, paying special attention to environmental and safety aspects.

Confirming the above, OLT has voluntarily decided to report on and certify its performance in terms of safety, environment, quality and corporate social responsibility.

This decision is delineated in the Code of Ethics, the HSEQ Policy and the MAPP (Major Accident Prevention Policy), implemented in the 231 Organisational Model and in the Integrated Management System adopted by OLT in accordance with standards UNI EN ISO 9001 (Quality), UNI EN ISO 14001 (Environment), BS OHSAS 18001 (Health and Safety), SA 8000 (Corporate Social Responsibility) and in the EMAS Declaration (Eco-Management and Audit Scheme).

## OLT Certificates and Accreditation



## CODE OF ETHICS AND ORGANISATIONAL MODEL AS OF ITALIAN LEGISLATIVE DECREE 231/2001

OLT has decided to adopt an organisational and management model in accordance with Italian Legislative Decree 231/2001, with the aim of preventing the commission by employees or contractual counterparts, in the interest of the Company, of the crimes established in the Decree. This decision is in line with the company's policies, aimed at protecting legality and ethics in business relationships and with its employees and contract staff and has the aim of offering a significant additional guarantee for all stakeholders of compliance with the normal system of civil and criminal responsibility.

The "Organisational, management and control model" defines the procedures that every subject that for any reason collaborates with the Company must follow in order to prevent the commission of certain categories of crimes.

OLT has decided to adopt this organisational, management and control model on a voluntary basis in order to ensure greater efficiency of the mechanisms to prevent the risk of commission of these types of crimes by adopting specific organisational, management and control tools. The organisational and management model as per Italian Legislative Decree 231/2001 was adopted by OLT in 2011. The document is periodically updated on the basis of the evolution of events in the company; the current version was approved by the Board of Directors on 30<sup>th</sup> January 2019.

For more information see [www.oltoffshore.it](http://www.oltoffshore.it)

## THE HSEQ POLICY

The OLT HSEQ (Health, Safety, Environment and Quality) policy provides a detailed overview of Health, Safety, Environment and Corporate Social Responsibility, encouraging dialogue with all stakeholders, both external and internal. Specifically, it sets forth the commitments and continuous improvements of the Company on ESG (Environmental, Social and Governance) issues, including safety. Moreover, given the unique organisation of the Terminal, whose management is entrusted to the outsourcer ECOS, the sharing of the objectives with the Terminal Operator is given great importance in the HSEQ policy.

The commitment of OLT to environmental protection is based on the following principles:

- significant reduction of its emissions into the air where this is technically and economically possible through continuous improvement processes and prevention strategies;
- continuous observance of the emission thresholds set for water discharges and, where possible, purification of the discharges before discharging them into the receiving bodies;
- prevention of damage to the marine ecosystem;
- optimised use of energy, by means of measured saving programmes;
- reduction of the consumption of polluting fuels and optimisation of the production process in which they are used.

The commitment of OLT to health and safety is based on the following principles:

- giving utmost importance to health, hygiene and safety at work, assessing and eliminating potential risks and, if this is not possible, implementing appropriate prevention and protection measures;
- minimisation of the impacts of accidents through timely and correct application of the established protection measures;

- improvement of the reliability of systems and processes by using state-of-the-art machinery and technology and adopting targeted and preventive maintenance.

For more information see [www.oltoffshore.it](http://www.oltoffshore.it)

### MAJOR ACCIDENTS PREVENTION POLICY

Considering the high quantities of hazardous substances present on board, the Terminal is subject to Italian Legislative Decree 105/2015 (Seveso Directive). Consequently, the Company has prepared a major accident prevention policy (MAPP) which, along with the integrated Quality, Environment, Health, Safety and Corporate Social Responsibility (HSEQ) policy, defines the primary values that the Company respects in its production activities and in relations with the population in order to pursue and ensure correct management of safety and the environment.

The major accident prevention policy is also shared with Ecos and approved by same.

Specifically, in the current stage of operations of the Terminal, the Company upholds a spirit of risk prevention, assessing and mitigating any risks through

preventive maintenance of the Terminal, training and active participation of the personnel and the use of state-of-the-art technological systems.

For more information see [www.oltoffshore.it](http://www.oltoffshore.it)

### CHARTER OF VALUES

OLT demonstrates its commitment to Socially Responsible behaviour by respecting individuals and the interests of the community without distinction of class, nationality or territory, race, sex, religion and any other condition that can give rise to discrimination.

The Company is committed to implementing correct and transparent management of its "human assets" and to raising the awareness of Management, suppliers, employees and contract staff about the principles of Social Responsibility established by standard SA 8000.

For more information see [www.oltoffshore.it](http://www.oltoffshore.it)



## 1.4 Sustainability

To demonstrate its commitment to the responsible management of its operations, in environmental, social and governance terms (ESG), OLT has mapped the current and future commitments to tackle the challenges of sustainability, considering them in relation to the Sustainable Development Goals (SDGs) of the United Nations 2030 Agenda for Sustainable Development.

OLT currently takes action, with the SDGs, in at least three of the five areas - corresponding to the “5 Ps” (People, Planet, Prosperity, Peace and Partnership) of sustainable development proposed by the 2030 Agenda - with strategic choices and goals:

- **People:** end poverty and social exclusion and promote health and wellbeing to guarantee conditions for the development of the human capital;
- **Planet:** guarantee sustainable development of natural resources, combating the loss of biodiversity and protecting the environment;
- **Prosperity:** confirm sustainable production and consumption models, guaranteeing employment and the creation of quality.

Specifically, the Company is committed to directly promoting responsible projects, setting specific goals as better shown in the following table.



Goal	Description	SDGs	Year
Improvement of MAP Major Accident Prevention	Planning of organisational, awareness (through training), performance* maintenance and monitoring of improvements.		2021
LiHS Leadership in Health and Safety	Implementation of the Health and Safety culture based on information campaigns that focus on four key points: Culture, Behaviour, Leadership and Change*.	 	2021
Use of eco-friendly products and use of induction lamps	Purchase and use of eco-friendly products and use of induction lamps subject to the assessment of feasibility*.		2023
Reduction in the volume of bilge water	Reduction of discharges such as waste, bilge water, subject to the assessment of the feasibility of modifications to plants and systems*.		2020
CO <sub>2</sub> compensation	Compensation of CO <sub>2</sub> emissions through partnerships with local municipalities and other Institutions, aimed at implementing social responsibility and environmental strategies such as reforestation of woodland and the redevelopment of urban parkland*.		2022
SSLNG Small Scale LNG	Implementation of an ambitious project in which the "FSRU Toscana" Terminal will become the first Italian plant to load small scale LNG carriers that will use and distribute natural gas rather than more pollution fossil fuels, with ensuing reduction of emissions (further details in chapter 2.7).		2021
CSR Corporate Social Responsibility	Implementation of a project, based on 5 topics, aimed at reinforcing and structuring relationships between the Company and the Territory, as described in more detail in chapter 4.3.	   	2021

\*for details see the Environmental Statement - Update 2019 ([www.oltffshore.it](http://www.oltffshore.it))



## A strategic infrastructure for Italy



## 2.1 The European Energetic Strategy: Green Deal

On 11<sup>th</sup> December 2019, with Communication COM (2019) 640, the new President of the European Commission, Ursula von der Leyen, announced the new line the European Union intends to take. The goal is to become the first climate-neutral continent. For the first time ever, the European regulation on the climate will enshrine in law the goal of climate neutrality of the EU by 2050. This means introducing a truly circular economy that will touch all sectors starting from energy, passing through industry before achieving mobility that fully respects the environment. Many resources, that will activate an economy estimated at Euro 1,000 billion in 10 years, will be used to achieve this ambitious goal. The European Community will take 3 main steps in this direction:

1. Creation of the Just Transition Fund (approx. Euro 7.5 billion);
2. A specific regime for the transition within the framework of InvestEU (EU programme with funding of approx Euro 45 billion to attract private investments in the EU and to structure specific financial instruments for this purpose, in particular for the regions that have to make infrastructural changes in the energy and transport sector);
3. A new instrument to finance public investments through the European Investment Bank - EIB (approx. Euro 25/30 billion).

As defined in article 4 of the proposed regulation present in COM (2019) 640, the Fund, which aims to support activities directly linked to its goal and that contribute to the implementation of the territorial plans for the transition will support the following activities:

- a) production investments in SMEs – Small and Medium-sized Enterprises, including start-ups, whose purpose is diversification and economic reconversion;
- b) investments in the creation of new enterprises, also by means of business incubators and consultancy services;
- c) investments in research and innovation activities and promotion of the transfer of advanced technologies;
- d) investments in the installation of technology and infrastructure for affordable clean energy, in the reduction of GHGs, in energy efficiency and in renewable energy;
- e) investments in digitalisation and in digital connectivity;
- f) investments in the reclamation and decontamination of sites, restoration projects and conversion of land to other uses;
- g) investments to reinforce circular economy, also by preventing and reducing waste, efficient use of the resources, re-use, repair and re-cycling;
- h) improvement of competences and vocational re-training of workers;
- i) assistance in job-hunting;
- j) active inclusion of people looking for employment;
- k) technical assistance.

Again, with reference to the European regulatory framework, as regards the transport sector it is noted that Directive 2014/94/EU on the deployment of alternative fuels infrastructure (DAFI Directive) has been revised: by the end of 2021 the Directive will propose much stricter rules on the emissions of combustion engine vehicles.

In this situation of profound transformation, natural gas and consequently LNG, will be of fundamental importance for the sustainable transition of the entire energy and transport sector, both as a substitute for the most polluting fossil sources (above all in the first stage, natural gas can be used as a substitute for coal

in the production of electrical power) and as a back-up energy source at moments of peak demand.

In particular, LNG can contribute to the differentiation of the energy supply sources, both from an economic point of view, taking advantage of economies of scale due to the current over-supply that is expected to continue in the coming years, and as an alternative to the procurement of gas by pipeline arriving mainly from Russia.

Finally, it should be noted that, in the mid/long-term, investments in gas infrastructure will have a return guaranteed by the flexibility of their use for the transport and storage of new "green" gases such as bio-gas and synthetic gases.

## 2.2 The Domestic Energetic Strategy: Italian Energy and Climate Plan

At the end of 2019 Italy presented its national plan for energy and climate in line with the recent European sector policies (European Regulation 2018/1999).

In the Italian strategy gas and LNG will have a fundamental role in the coming years. The plan envisages a phase-out of coal by 2025 which will be replaced by a growing quota of renewable fuels and the residual part by new generation electricity and gas for around 3 GWh/year.

For the transport sector, the aim is to promote sales of vehicles powered by alternative fuels and the diffusion of "re-fuelling" points to reach 2,400 compressed natural gas (CNG) distribution points and at least 800 liquefied natural gas (LNG) points.

LNG will play a fundamental role in the security of the country's energy supply at least until 2050 with an estimated gas requirement at 2030 of 49 Mtoe that can further boost the growth of a more flexible and transparent LNG market.

Specifically, the diffusion of LNG will be promoted to support the strategy of diversification of less polluting

fuels for shipping use aimed at setting up a "SECA area" also in the Mediterranean.

The following are also envisaged:

- measures to favour tax exemption of the sector that invests in LNG and coastal deposits;
- maintenance of the current excise duties;
- subsidised port taxes for LNG powered vessels;
- subsidised forms of financing for the construction of new vessels and the shipbuilding industry;
- measures to promote the construction of micro-liquefaction plants.

Moreover, the plan is to use gas and LNG as the energy supply of Sardinia, following the phase-out of coal.

## 2.3 The economic context

As regards the LNG market in recent years, the international scenario has undergone significant changes. On one hand, there has been a marked increase in the number of LNG importing countries; on the other, there has been a significant increase in the liquefaction capacity. This increase is expected to continue in the coming years because many North American (USA and Canada) and Australian projects are expected to be rolled out.

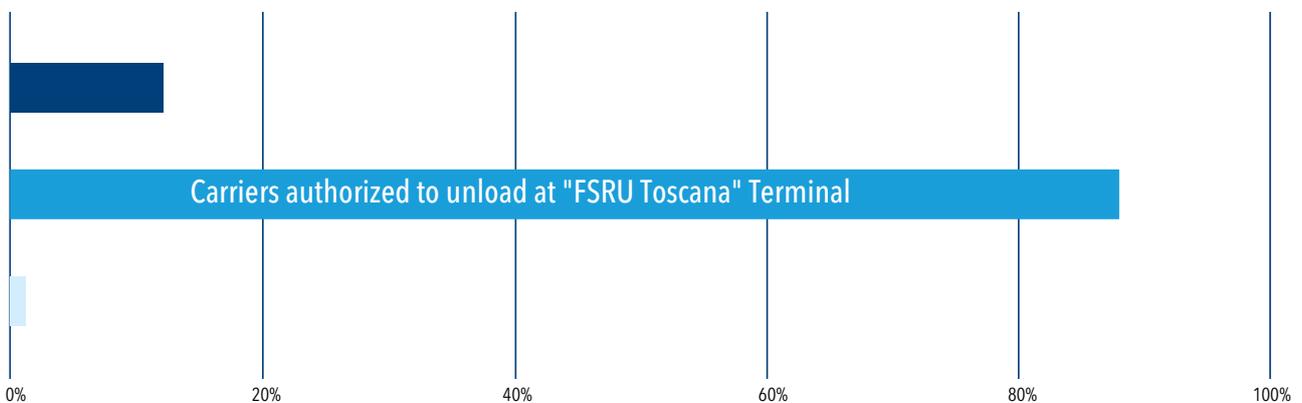
The increase in volumes should cover the growing demand of Asian countries, above all China, that in 2017 ranked second among LNG importing countries and in 2018 further reinforced its position, allowing realignment of prices between the Asian and European markets.

In this scenario, OLT has concentrated its efforts on reaching the maximum receiving capacity and flexibility of the Terminal, both in terms of loading capacity of the LNG carriers authorised and in terms of quality and origin of the LNG, while ensuring the highest levels of safety and environmental sustainability.

Thanks to its receiving capacity flexibility, OLT can exploit the possibilities offered by a constantly evolving market, allowing it to receive LNG loads from countries that today cannot be connected to

Italy by pipeline and mitigating the risks that can arise for imports (from Africa because of political events and from Russia because of the well-known problems of transit through Ukraine).

### LNG load receiving capacity flexibility of the Terminal



#### Loading capacity

- From 180,000 m³ to 270,00 m³
- From 65,000 m³ to 180,000 m³ (New Panamax)
- From 15,000 m³ to 65,000 m³

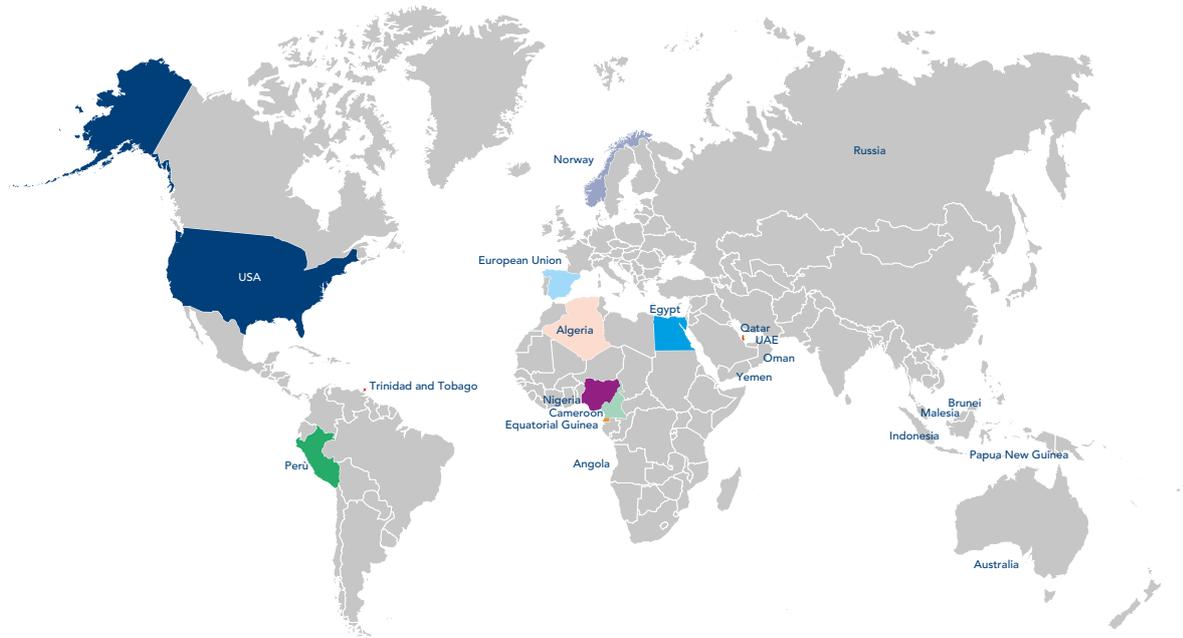
N.B. Source: IGU data 2017

*The Terminal is authorised to receive around 90% of the currently existing LNG carrier fleet and, specifically, those carriers with a loading capacity of between 65,000 m³ and the New Panamax class (around 180,000 m³).*

The contribution of “FSRU Toscana” to the diversification of supplies is confirmed by the receipt of LNG loads arriving from the main exporting countries such as: Algeria, Cameroon, Egypt,

Equatorial Guinea, Nigeria, Norway, Peru, Qatar, Trinidad and Tobago and the United States, and from other European terminals (Spain, Belgium and the Netherlands).

## Origin of LNG loads



### OLT - Origin of the LNG\*

- USA: 36%
- Norway: 11%
- Qatar: 7%
- Trinidad and Tobago: 8%
- European Union: 4%
- Algeria: 13%
- Nigeria: 4%
- Egypt: 10%
- Equatorial Guinea: 4%
- Perù: 2%
- Cameroon: 1%

### LNG exporting countries\*\*:

- Qatar: 24.5%
- Australia: 21.2%
- Malaysia: 7.9%
- Nigeria: 6.3%
- Indonesia: 5.8%
- USA: 6.6%
- Algeria: 3.2%
- Russia: 5.8%
- Trinidad and Tobago: 3.7%
- Oman: 3.2%
- Papua New Guinea: 2.2%

- Brunei: 2.0%
- UAE: 1.8%
- Perù: 1.1%
- Norway: 1.6%
- Angola: 1.3%
- Equatorial Guinea: 1.1%
- Egypt: 0.5%
- Yemen: 0.0%\*\*\*
- Cameroon: 0.2%

\*The figure refers to the period from the start of the Terminal's activities until 31/12/2019

\*\*Source: GIIGNL, KPLER 2019, report 2018

\*\*\*The LNG Terminal in Yemen was closed in 2017 due to the current war

The Terminal has a Wobbe Index System on board, that enables correction of the quality of the LNG in terms of calorific value, adapting it to the needs of the national grid; this allows the Terminal to receive most of the LNG produced around the world.

Compared to the Italian Integrated Energy and Climate Plan, as highlighted in the Italian proposal, the goal, for an importing country like Italy, is to attract new supplies and, at the same time, to guarantee the security of the National Gas System.

The road to take entails the presence of regasification terminals that can balance gas imports, in the case of reductions of imported flows by pipeline and take advantage of the economies of scale that can be created on the markets.

## 2.4 The regasification service

From the start of its commercial activities, OLT has offered its regasification capacity in the ways and times set in its Regasification Code.

In 2017, with resolution 660/2017/R/gas, ARERA (Regulatory Authority for Energy, Networks and Environment) introduced a regasification allocation mechanism by means of an auction procedure, defining at the same time the bidding procedure and the criteria for setting the reserve price for each load. In order to implement these regulatory changes, OLT adapted its Regasification Code that, after public consultation, was approved by ARERA with resolution 110/2018/R/gas dated 1<sup>st</sup> March 2018.

Since 10<sup>th</sup> April 2018, via the Regasification capacity Allocation platform (PAR) managed by Gestore dei Mercati Energetici (GME), the users of the Terminal can enter their bids for all the products – multi-year, annual and infra-annual – offered according to the terms and conditions set forth in the Regasification Code.

OLT has been fully operational since the end of 2018. Indeed, in 2018, 13 delivery slots were allocated: one under the previous allocation regime, one within the Peak Shaving 2018/2019 service and 11 slots using the new auction-based allocation mechanism. In 2019, 40 of the 41 slots were allocated and at today's date 31 of the 41 available have been allocated for 2020 and other 2 slots have already been allocated for 2021. This increase in the allocation of capacity, firstly in the short-term and then in a longer timeframe, demonstrates that the new capacity allocation system is able to meet the market's demands and the revision of the code is moving increasingly in this direction.

## Data concerning the regasification capacity in the last 3 years

Calendar year	Allocated slots	Cubic metres of liquids unloaded	Natural Gas conveyed into the network (Sm <sup>3</sup> )
2017	11	1,486,077	866,687,718
2018	13	1,740,603	1,031,883,192
2019	40*	5,622,804	3,510,403,200

\*the last slot booked of December 2019 was physically unloaded in 2020 due to adverse weather conditions that led to the lightening operations being put off by two days

## 2.5 The emergency services established by the Ministry of Economic Development: "Peak Shaving Service" and "Regasification and Storage Bundled Service"

The "Peak Shaving Service" and "Regasification and Storage Bundled Service" are two of the emergency measures established by the Ministry of Economic Development in the "Emergency Plan" to tackle particularly unfavourable situations for the National Gas System. In case of emergency during the winter, "the Peak Shaving service" operates, while during the summer is possible to contribute to the supply security using regasification if necessary to replenish the storages that supply the National System during winter ("Regasification and Storage Bundled Service"). These two services thus guarantee the security of the Italian Gas System. In fact, as regards Peak Shaving in the case of emergency, it is possible to regasify and send into the network, at short notice, the LNG previously unloaded and stored in the Terminal's tanks to tackle peak demand for a limited period of time. In the 2017-2019 three-year period, OLT made available to the system, through this service, a total

quantity of LNG of around 219,000 m<sup>3</sup>, continuing, at the same time, to offer regasification capacity on a multi-year, annual and infra-annual basis, according to the provisions of the current regulation.

As regards Regasification and Storage Bundled Service, OLT offered this service in Gas Years<sup>4</sup> 2016/2017 and 2017/2018, allocating a total of 15 offloading slots, for a total quantity of LNG offloaded at the Terminal of around 2,050,000 m<sup>3</sup>.

## 2.6 The opportunities of LNG in the Italian economic system

As already outlined in the previous paragraphs, LNG is taking on an increasingly important role in European policies on alternative fuels as it is considered to be one of the fuels with lower environmental impact able to ensure high performance in terms of energy efficiency.

The goals set by the EU for the coming years in this field are particularly strict and will probably be further reinforced by the forthcoming revision of the Green Deal. Directive 2014/94/EU on the deployment of alternative fuels infrastructure (DAFI Directive) sets forth that all the member States must draw up deployment plans for the various sources, including LNG, for the transport sector.

Indeed, from 2020, all the Member States must necessarily make use of more sustainable fuels with a view to drastically reducing polluting emissions caused by sea transport. Specifically, there are two long-term deadlines: 31<sup>st</sup> December 2025, date by which an appropriate number of

LNG re-fuelling points belonging to the central TEN-T (Trans-European Network - Transport) network inside sea ports, including the port of Livorno must be installed, and 31<sup>st</sup> December 2030, final deadline for the installation of LNG re-fuelling points in the main inland navigation ports. Directive 2014/94/EU was implemented in Italian law with Decree no. 257 of the MiSE dated 16<sup>th</sup> December 2016, which stressed the strategic nature of the LNG storage, regasification and transport infrastructure. Our country is therefore a promoter of projects for the construction of LNG storage and distribution centres throughout Italy, in order to reduce not only our environmental footprint but also the energy costs of areas that natural gas pipelines have not reached.

## 2.7 The Small Scale LNG service

In June 2015, the MiSE launched public consultation on the National LNG Strategy in order to identify and analyse goals, topics and measures to take. Then, based on the information emerging from the consultation, the Ministry issued the "Strategic Plan for the use of LNG in Italy" which is part of Decree no. 257 implementing the DAFI Directive, that took effect on 14<sup>th</sup> January 2017. In this context, the "FSRU Toscana" Terminal can have a decisive role on the Small Scale LNG (hereinafter SSLNG) market due to the versatility and strategic position of the Terminal. The SSLNG service means that small LNG carriers can load LNG directly from the regasification and storage terminal and then deliver it to coastal storage plants inside Mediterranean ports. Indeed, the construction of LNG storage and distribution centres is planned in the ports; it will be possible for seacraft and LNG powered vehicles to refuel at these centres.

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(4) Gas Year, in this case, means the Gas Storage Year defined as the period that runs from 1<sup>st</sup> April in one calendar year to 31<sup>st</sup> March in the following calendar year.

In 2015, OLT performed a specific preliminary study, co-financed by the European Union, within the framework of the "Sea Terminals" project in collaboration with the Valenciaport Foundation and the Port Authority of Livorno, under the supervision of MIT and in line with the "Strategic National Plan on the use of LNG in Italy" proposed by MiSE.

The feasibility study provided positive answers, confirming the possibility for the Terminal to offload LNG to small gas tankers, called "barges". As regards safety, reference was made to the international standards for large gas tankers and so also barges must comply with the OCIMF (Oil Companies International Marine Forum) guidelines and must have emergency shut-down systems (ESD), in accordance with the international guidelines issued by SIGTTO (Society of International Gas Tanker and Terminal Operators), to guarantee the maximum level of safety during offloading operations. The study also highlighted that the modifications necessary at the terminal to provide this new service are minimal and could be carried out in a short period of time. They regard the left side of the terminal where there are already the main components for the lightning and offloading operations.

The Terminal has therefore proved that it has all the characteristics necessary to operate as an LNG distribution centre in the upper Tyrrhenian Sea, providing the quantities of LNG necessary to supply the main ports in the area.

Based on the results of this feasibility study, OLT continued with its controls, carrying out various detailed engineering studies to obtain the necessary permits; some of these studies were partially financed through participation in the tender "Connecting Europe Facilities (CEF)" promoted by the European Commission with the aim of developing the Trans-European networks and infrastructure in the transport, telecommunications and energy sectors.

Finally, in 2019, the Company began the formal authorisation process to offer the new service. The necessary modifications to the plant should be completed by 2021 with the subsequent start of SSLNG activities.

When fully operational, this new service will allow 41 loading slots to be offered every year for small LNG carriers that will be able to transport the LNG to the storages being constructed and to ports, confirming the role of the OLT Terminal as a fundamental part of the LNG procurement and distribution chain.





# Environmental protection<sup>5</sup>



This chapter of the Report analyses OLT's performance in relation to the impact of its activities on the environment. In this light, the technical concepts have been simplified, while maintaining the scientific rigour of the information contained, in an exhaustive way, in the documents that the Company submits to the Competent Authorities<sup>6</sup>. OLT places great importance on the monitoring of performance in this area, first of all to define opportune improvement actions and, secondly, because reporting its environmental performance is of primary interest for its stakeholders.

It is noted that, to accurately assess environmental performance, and allow clear comparison with the regulatory obligations, it is necessary to express such performance in the form of indicators that are pertinent to the activities carried out by the Terminal, enabling detailed comparison of the years taken into consideration. This consists in setting the selected environmental data against the annual production of the plant (Sm<sup>3</sup> of natural gas regasified each year) and the production of electricity (expressed in MWh).

### 3.1 Energy consumption<sup>7</sup>

#### ELECTRICAL ENERGY

The "FSRU Toscana" Terminal is characterised by an energy self-reliance system that optimises consumption by fully off-setting the electrical energy used with that produced. The quantity of energy consumed on an annual basis is obtained by summing the electrical energy produced by the 4 steam turbo-generators and the diesel generator present on board the Terminal.

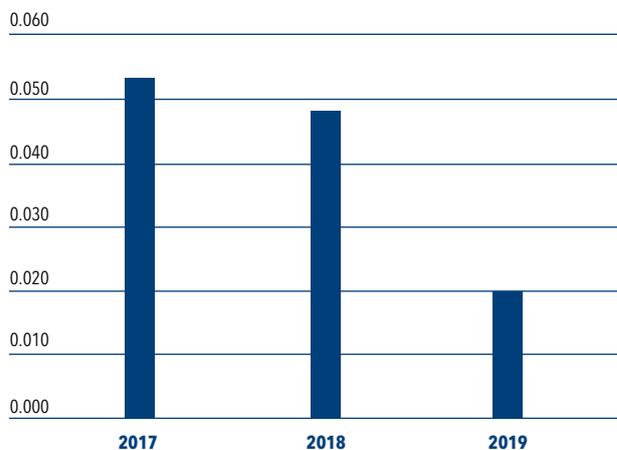
#### Energy produced and consumed (MWh)

2017	2018	2019
46,007	49,440	70,079

The table shows the values of the total energy produced, expressed in MWh, whose amount is due to the intensification of the regasification activities in the 2017-2019 three-year period (see chapter 2 for details about the regasified LNG).

Therefore, reference must be made to the specific index to assess the energy efficiency of the Terminal.

#### Energy performance index of the Terminal



■ MWh/1,000 Sm<sup>3</sup>

	2017	2018	2019
MWh/1,000 Sm <sup>3</sup>	0.053	0.048	0.020

(5) This material refers to GRI 103-1, GRI 103-2 and GRI 103-3 of GRI 103: Management Approach 2016.

(6) For more details see the Environmental Statement prepared for EMAS purposes on the company's website [www.oltoffshore.it](http://www.oltoffshore.it).

(7) This material refers to GRI 302-1 and GRI 302-3 of GRI 302: Energy 2016.

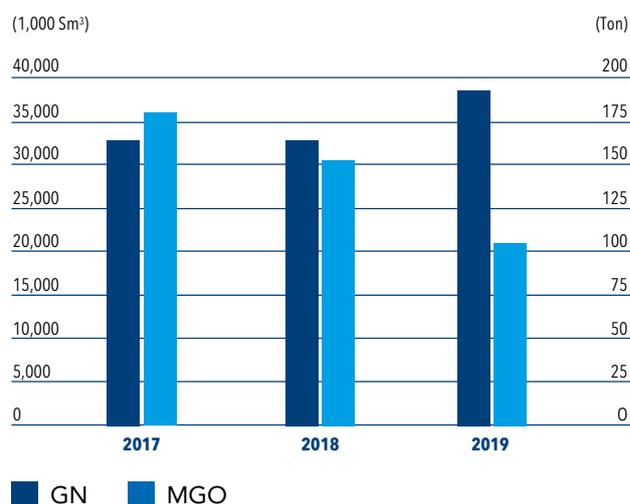
The Terminal's energy performance index represents its efficiency in a dynamic way, comparing the MWh produced and consumed in the three-year period with the annual quantity of regasified natural gas (Sm<sup>3</sup>). From 2017 the graph shows a marked improvement, in 2018 and 2019 there was a reduction in the specific index, in the three-year period, of around -62,4%. This certifies in an unequivocal way an increase in energy efficiency with the rise in operating activities: the reduction in the energy consumed compared to the NG is the result of the optimisation of the consumption and production of energy guaranteed by the high activity of the Terminal.

## FUELS

The most highly consumed raw materials on the Terminal used for the production of electrical energy are: natural gas, that is the raw material with the highest consumption and Marine Gas Oil (MGO)<sup>8</sup> used at the Terminal as a substitute for Natural Gas (lack of NG on board, maintenance, anomalies and/or emergencies).

The consumption of natural gas rose in the three-year period due to the increase in the Terminal's activities and the ensuing increase in the energy demand, while that of MGO decreased. The reduction in the consumption of MGO is the result of the significant improvement in the management of the energy plant, due also to plant maintenance and reduction in anomalies.

## Fuel consumption



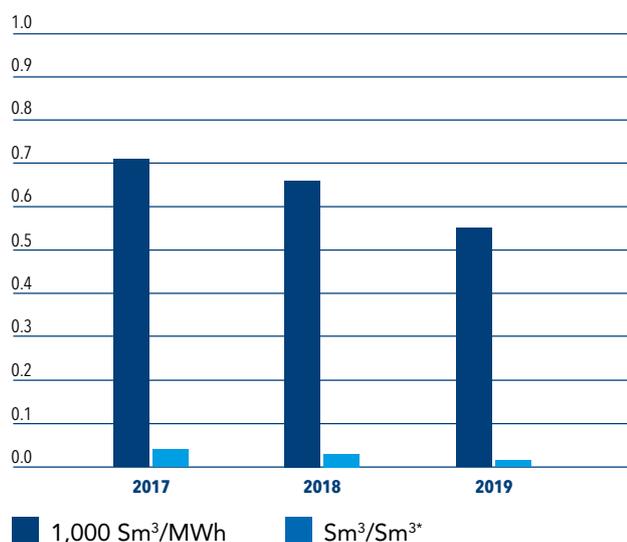
Consumption	2017	2018	2019
GN (1,000 Sm <sup>3</sup> )	32,774	32,719	38,665
MGO (Ton)	180	154	103

<sup>(8)</sup> The MGO consumption values have been measured in m<sup>3</sup> and converted into Tons using the density of the product procured (declared by the producer).

The specific consumptions of both fuels are indicated below, set against the energy produced and the regasified natural gas.

### Specific consumption of NG in the boiler

Gas consumed in the boiler against energy generated and regasified NG



	2017	2018	2019
1,000 Sm³/MWh	0.71	0.66	0.55
Sm³/Sm³*	0.038	0.032	0.011

Sm³ of gas consumed in the boiler and Sm³ of regasified gas

The figure shows the NG consumption in the boiler indexes; that is, the natural gas consumed in the boiler (expressed in Sm³) compared to the energy generated (expressed in MWh) and the regasified NG (expressed in Sm³), that shows a marked downward trend in the three-year period: the former index dropped by -22.5%, the latter by -70.9%.

Instead, the following graph shows the consumption of Marine Gas Oil (expressed in Tons) compared to the energy produced (expressed in MWh) and the regasified NG (expressed in 1000 Sm³); this also shows a downward trend: the former dropped by -61.6%, the latter by -85.3%.

### 3.2 Water withdrawals<sup>9</sup>

Seawater is used for the regasification process and the naval plants and systems (ballast, hygienic-sanitary system, etc.) and to manage emergencies, for maintenance or for faults; this resource is not consumed but after use it is discharged back into the sea (as regards effluent, after being treated in the purification system).

The total withdrawal of seawater is indicated below.

#### Water withdrawal m³/year

2017	2018	2019
106,053,037	106,736,577	110,529,590

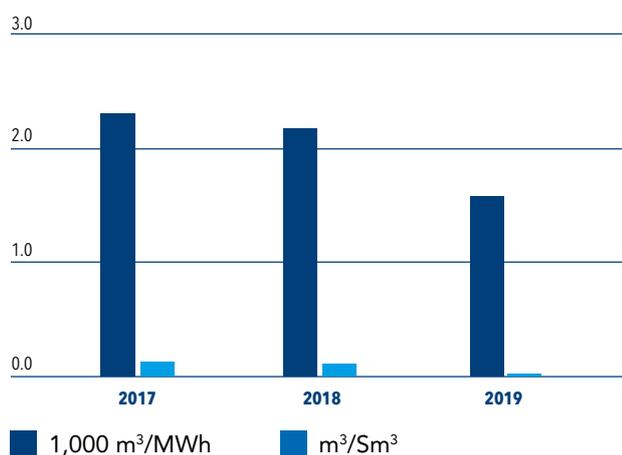
The figure shows the specific seawater withdrawal indexes (expressed in m³) set against the MWh produced and consumed by the Terminal and the Sm³ of regasified NG.

Both of the above specific indexes show a clear reduction in the three-year period: the former specific consumption dropped by 31.6%, the latter by -74.3%.

(9) This material refers to GRI 303-3, GRI 303-4 and GRI 303-5 of GRI 303: Water and effluents 2018.

## Specific seawater withdrawal indexes

Withdrawals by energy generated and regasified NG



	2017	2018	2019
1,000 m³/MWh	2.31	2.16	1.58
m³/Sm³	0.12	0.10	0.03

Note: the rate withdrawn considered in the graph is the total amount (contribution of the main output - sea water necessary for regasification purposes equal to 10,800 m³/h - and the secondary outlets)

### 3.3 Biodiversity<sup>10</sup>

The assessment of the possible effects of the Terminal on the marine ecosystem is a topic of great interest for the stakeholders, taken into consideration right from the start of the project. Indeed, with the EIA Decree, the Ministry of the Environment, Land and Sea Protection (MATTM) established an Environment Monitoring Plan for the Marine Environment around the "FSRU Toscana" Terminal defined by ISPRA (Italian Institute for Environmental Protection and Research) and implemented by the CIBM (Interuniversity Centre of Marine Biology) of the City of Livorno. Under this plan, the water and sediments environmental matrices in the area affected by the Terminal are studied from a chemical, biological and eco-toxicological point of view. The data obtained during the monitoring campaigns are sent to MATTM, ISPRA and ARPAT (Regional Agency for Environmental Protection of Tuscany) for

the relative controls. The CIBM introduced a "zero time" campaign before the Terminal arrived in 2013 (hereinafter called 'white phase'). Study campaigns were conducted in the following years and the results sent to ISPRA, MATTM and ARPAT for the relative controls. At present, the seventh study is being carried out. The results of the campaigns carried out to date have actively demonstrated that there are no differences due to the presence of the Terminal (comparison with the white phase) and that there are no risks for the marine ecosystem due to the Terminal's activities.

The first component studied in the monitoring plan is the water column; that is, study of the hydrological profile of the area around the Terminal that takes into consideration, inter alia, temperature, salinity, pH and turbidity. As described in the annual reports, all the values measured during the various monitoring campaigns fall fully within the minimum and maximum values of the reference ranges.

The sediments withdrawn undergo physical, chemical, eco-toxicological and microbiological analyses. Physical analysis (grain size) shows that the shale component is the dominant one, in accordance with the seabed in the area. Analysis of the inorganic (heavy metals) and organic (hydrocarbons) pollutants confirms the presence of elements identified in concentrations that are greater than the reference standard levels, already identified in the white phase. The eco-toxicological analyses have always highlighted a generally low level of toxicity and in any case in line with the white phase. As far as regards marine biodiversity, the results of all of the study campaigns have shown a constant trend throughout all the monitoring campaigns, confirming the general trends of the density and distribution of the organisms that characterise the correct maintenance of the marine biodiversity (such as plankton). This confirms that the natural habitat of the area close to the Terminal has been conserved.

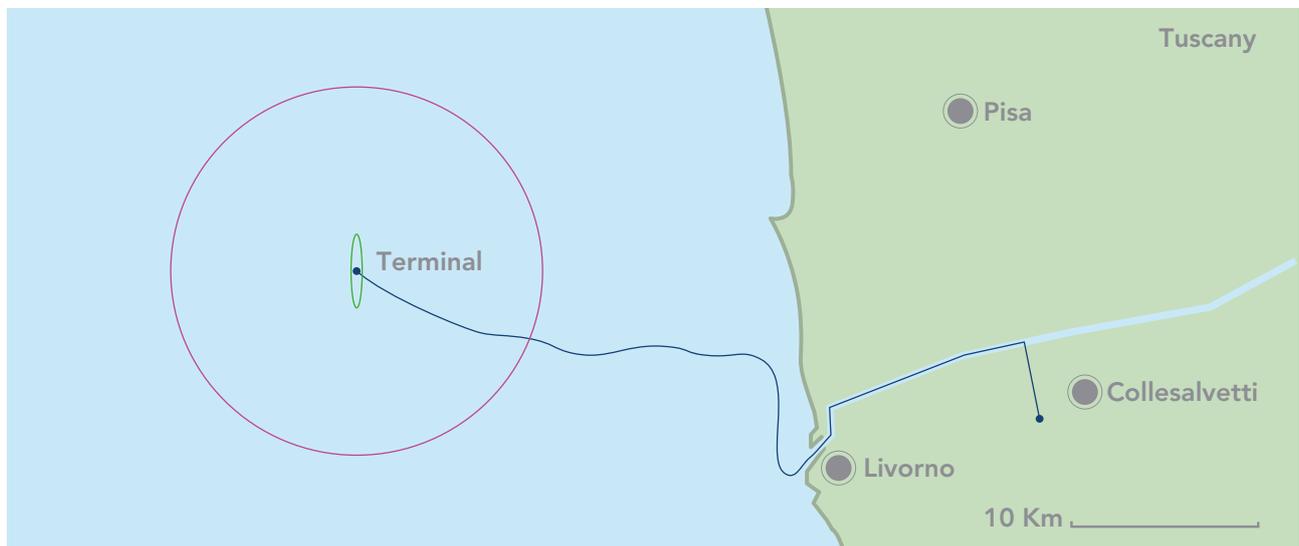
(10) This material refers to GRI 304-2 of GRI 304: Biodiversity 2016.

The noise levels of the plant in operation are monitored both by means of subsea bioacoustic analyses, aimed at ensuring compliance with the safety thresholds for marine mammals and in order to monitor and guarantee the health of the offshore

workers. Also in this case no negative impacts on the biodiversity have been identified.

Consequently, it can be said that there are no significant effects on the marine biodiversity.

### Study area for the Monitoring Plan of the marine environment around the Terminal



- Monitoring Area A**  
 Analysis of several points of axes for:
- sediments for analysis of the fauna; chemical-physical and eco-toxicological analyses
  - water for chemical-physical and eco-toxicological analyses
  - plankton
  - CTD (Conductivity, Temperature and Depth) profiles

- Monitoring Area B**  
 Area for:
- noise measurements
  - sightings of cetaceans and turtles

**Sub-sea pipeline**

### 3.4 Greenhouse Gas and other emissions<sup>11</sup>

#### GREENHOUSE GAS (GHG)

The question of climate change and man’s contribution to greenhouse gas emissions is central to international policies on the protection of the planet and the vitality of the ecosystems; this relevance is reflected also in the significance attributed to this topic.

As regards greenhouse gases (GHGs), the quantity of CO<sub>2</sub> equivalent emitted into the environment is indicated below, considering all of the Terminal’s operating conditions; the data recorded: 63,756 Tons (2017), 61,940 Tons (2018) and 73,106 Tons (2019)<sup>12</sup>. The numbers indicated are the result of the sum of the CO<sub>2</sub> quotas deriving from the contribution of stack emissions (included in the Emission Trading system), fugitive emissions and vent emissions<sup>13</sup>. These data highlight an increase in emissions over the years, directly attributable

to the increase in the amount of energy produced and consumed, as a consequence of the constant growth in the Terminal's operations (increase in regasified NG), which is now fully operational in 2019. The following figures highlight the reduction of specific indexes of the emissions of CO<sub>2</sub> equivalent expressed both for the energy produced and regasified NG.

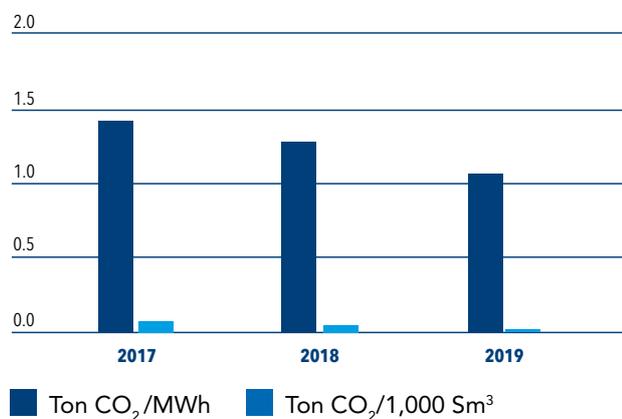
In the three-year period the reduction in the CO<sub>2</sub> equivalent index was:

- -24.7% if expressed in energy produced;
- -71.7% if expressed in regasified NG.

## Specific CO<sub>2</sub> equivalent emissions index

CO<sub>2</sub> by energy generated

CO<sub>2</sub> by regasified NG



	2017	2018	2019
Ton CO <sub>2</sub> /MWh	1.39	1.25	1.04
Ton CO <sub>2</sub> /1,000 Sm <sup>3</sup>	0.074	0.060	0.021

## EMISSIONS TO AIR FROM THE STACK

Emissions to the air from the Terminal are subject to detailed monitoring to protect the territory and the surrounding environment. Indeed, the Terminal is equipped with an Continuous Emissions Monitoring System (CEMS) able to monitor – continuously – numerous emission parameters on each line of the

two boilers (E1, E2) present on board. The parameters monitored continuously, besides the physical characteristics of the emissions, are: carbon monoxide (CO), nitrogen dioxide (NO<sub>2</sub>), nitrogen oxides (NO<sub>x</sub>), particles (PM), volatile organic compounds (VOCs) and carbon dioxide (CO<sub>2</sub>), even if the data given regard the parameters considered most significant (CO, NO<sub>x</sub>, Particles).

The limits set in the IEA Decree in normal operating conditions (that is, burning natural gas) are: NO<sub>x</sub> (150 mg/Nm<sup>3</sup>; 100 mg/Nm<sup>3</sup> since 1st July 2018), particles (5 mg/Nm<sup>3</sup>), CO (70 mg/Nm<sup>3</sup>). In accordance with Italian Legislative Decree 152/06 as amended, the other limits set and controlled annually by a certified laboratory regard the parameter SO<sub>2</sub> (5 mg/Nm<sup>3</sup> with NG as the fuel).

In non-normal operating conditions (that is, burning MGO in the boiler) OLT, albeit not a requirement for the Authority, with a view to reducing pollutants in all operating conditions, monitors all the pollutants and checks that the values of the Terminal are below the limits set by law for plants solely for normal operating conditions: NO<sub>x</sub> (400 mg/Nm<sup>3</sup>), particles (50 mg/Nm<sup>3</sup>) SO<sub>2</sub> (850 mg/Nm<sup>3</sup>) and Metals. To date, the Terminal has always respected the limits set, in all operating conditions<sup>14</sup>.

(11) This material refers to GRI 305-1, GRI 305-4 and GRI 305-7 of GRI 305: Emissions 2016.

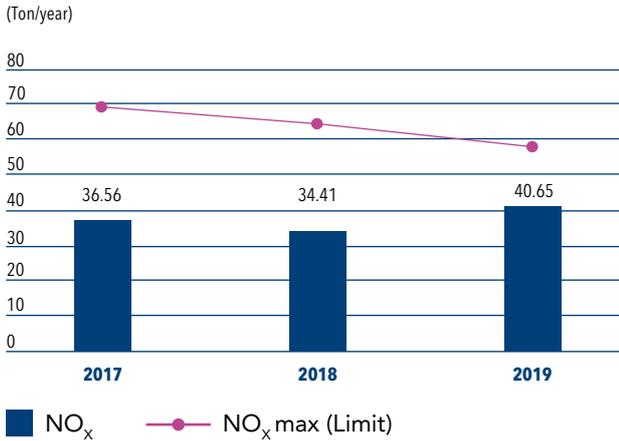
(12) It is noted that the values indicated (2017-2018) are different from those reported in the previous reports as the quantity of CO<sub>2</sub> emitted by the boilers has been calculated according to the method set forth by the Emission Trading System and not directly by means of measurement, as in the previous reports.

(13) The quotas of the fugitive and vent emissions have been calculated respectively by monitoring the fugitive emissions as established by the Competent Authority in the IEA Decree, and by estimating the quantity of NG emitted by the vent in the case of maintenance, both converted into CO<sub>2</sub> equivalent (conversion made based on factors called GWP – Global Warming Potential).

(14) In 2018, a value of NO<sub>x</sub> that was slightly higher than the limit was recorded in the month of July in boiler E2 while in February 2019, again for an hour, in both boilers. The two events were reported to the Authority.

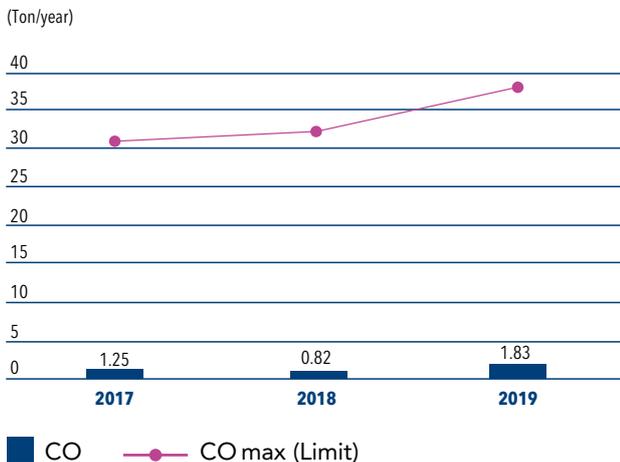
The graphs below show the trends of the total quantities (Ton/year) of the emissions of NO<sub>x</sub>, carbon monoxide (CO) and particles, summing the total values of the two boilers in all operating conditions<sup>15</sup>. The trend of the emissions shows that, while growing, due to the marked increase in the amount of energy produced and of the regasified NG, their values are well below the maximum total limits<sup>16</sup>.

### Trend of NO<sub>x</sub> emissions

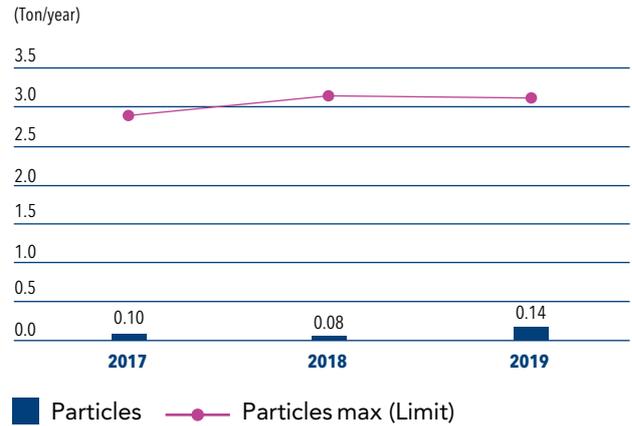


Note: the maximum value for 2018 was calculated considering the variation in the limit starting from 1<sup>st</sup> July 2018; this new limit has been maintained in the calculation of the max. NO<sub>x</sub> for 2019

### Trend of CO emissions



### Trend of particles emissions



All the specific indexes of the NO<sub>x</sub>, CO and particles emissions compared to the energy produced, have shown a marked decrease, in the three-year period, equal respectively to:

- NO<sub>x</sub>: -27%
- CO: - 3.6%
- Particles: -7.7%

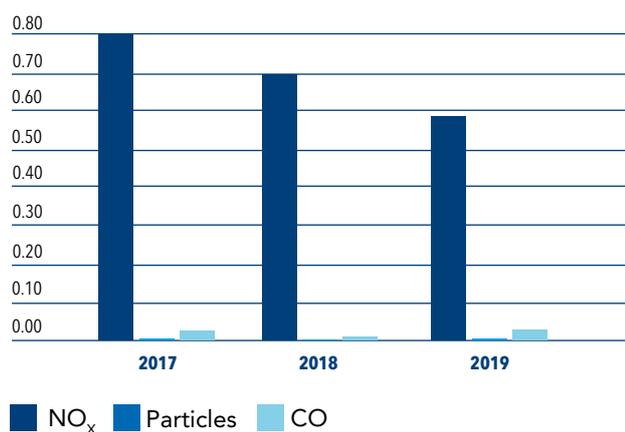
15) The Tons of pollutants have been calculated considering not only normal operations (that is, burning NG in the boiler), but also non-normal operating conditions (that is, burning MGO in the boiler) and the transistors (boilers with load below the technical minimum or dual fuel).

16) The maximum Tons of pollutants (maximum allowable values) have been calculated using the legal limit concentrations allowable at the Terminal and the real operativeness of the boilers in the reference years.

## Specific emissions of NO<sub>x</sub>, Particles and CO

Pollutants per energy generated

(kg/MWh)



kg/MWh	2017	2018	2019
NO <sub>x</sub>	0.79	0.70	0.58
Particles	2.22x10 <sup>-3</sup>	1.59x10 <sup>-3</sup>	2.04x10 <sup>-3</sup>
CO	2.71x10 <sup>-2</sup>	1.67x10 <sup>-2</sup>	2.61x10 <sup>-2</sup>

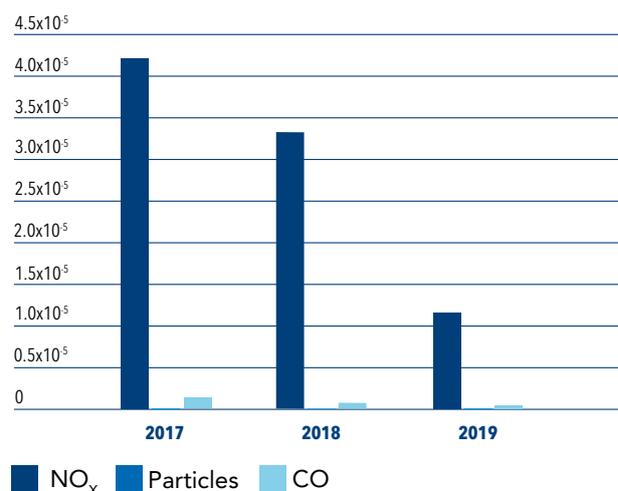
All the specific indexes of the NO<sub>x</sub>, CO and Particles emissions compared to the regasified natural gas, have also shown a marked decrease, in the three-year period, equal respectively to:

- NO<sub>x</sub>: -72.5%
- Particles: - 65.3%
- CO: - 63.8%

## Specific emissions of NO<sub>x</sub>, Particles and CO

Pollutants per regasified NG

(kg/Sm<sup>3</sup>)



kg/Sm <sup>3</sup>	2017	2018	2019
NO <sub>x</sub>	4.22x10 <sup>-5</sup>	3.33x10 <sup>-5</sup>	1.16x10 <sup>-5</sup>
Particles	1.18x10 <sup>-7</sup>	7.62x10 <sup>-8</sup>	4.08x10 <sup>-8</sup>
CO	1.44x10 <sup>-6</sup>	7.98x10 <sup>-7</sup>	5.22x10 <sup>-7</sup>

### 3.5 Water discharges<sup>17</sup>

The Terminal has 30 water drains, including:

- drains for the regasification process;
- drains other than those for the regasification process;
- drains for domestic waste water;
- drains for rainwater.

The regasification process withdraws water that is used for the heat transfer in the vaporisers (that vaporise the LNG). This water is discharged back into the sea at the end of the process through the main drain (seawater drain necessary for the regasification).

#### MAIN SEAWATER DRAIN NECESSARY FOR THE REGASIFICATION

The values of the [discharge flow rate of the vaporisers](#) used in regasification in 2017, 2018 and 2019 are always lower than the limit set by the Authority, equal to **10,800 m<sup>3</sup>/h**. The parameters monitored continuously on the drain are the Thermal Delta and the free active chlorine

The Thermal Delta, that is, the difference in temperature between the water entering the Terminal and that leaving the Terminal, after use in the vaporisers in the regasification phase, generally has a negative value, due to the fact that the seawater is cooled during the regasification of the LNG.

[Thermal Delta](#) values lower than -4 °C are associated with a high regasification rate; no Thermal Delta measured in the 2017-2019 three-year exceeds the authorised hourly limit of **-6 °C**. In periods where there was no regasification, there is a slight increase in the outgoing temperature compared to the incoming one due to the pre-heating of the water

through the main re-condenser (approx. +2.8 °C as an annual average with very high Thermal Delta peaks immediately before regasification).

Instead, if we consider the [frigories](#) used to cool the seawater, in the regasification process, it can be said that the frigories discharged into the receiving body (1.26×10<sup>9</sup> kcal/year in 2017; 2.95×10<sup>9</sup> kcal/year in 2018; 10.73×10<sup>9</sup> kcal/year in 2019) are significantly lower than the limit set by law of **312×10<sup>9</sup> kcal/year**.

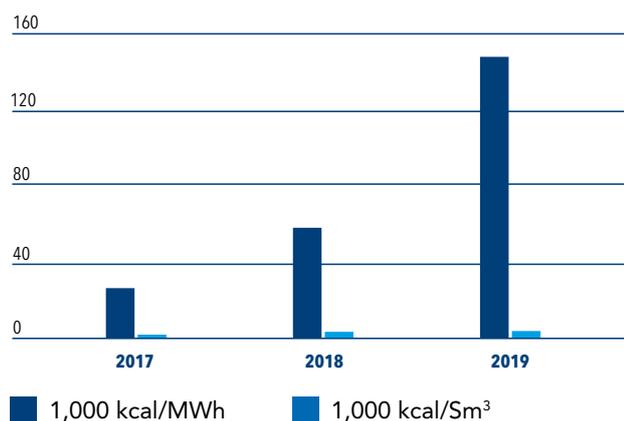
It is also noted that the higher value measured in 2019 was due to the increased operations of the Terminal and therefore to the total Sm<sup>3</sup> regasified in that year, significantly higher than in previous years.

Analysis of the specific indexes of the frigories shows, against a clear increase in the frigories discharged in the three reference years, an increase in the indexes; this is because the increase in the quantity of regasified NG in a year led to higher hourly regasification flow rates, consequently increasing the amount of frigories discharged into the receiving body. In any case, the values are significantly lower than the limits set by law.

(17) This material refers to GRI 303-4 of GRI 303: Water and effluents 2018.

## Specific frigories indexes

Frigories per energy generated and regasified NG



	2017	2018	2019
1,000 kcal/MWh	27.29	59.71	153.07
1,000 kcal/Sm <sup>3</sup>	1.45	2.86	3.06

The data regarding **free active chlorine**, measured at the regasification process cooling water drain, have always been lower than the three limits set by the Authority (0.05 mg/l as an hourly limit on the concentration; 10 kg/day and 3.6 Ton/year as limits on the quantity discharged)<sup>18</sup>. Instead, the annual quantity of free active chlorine was 1.92 Ton/year in 2017, 2.36 Ton/year in 2018 and 2.56 Ton/year in 2019.

## CHLORINATED WATER DISCHARGES

The table below shows the quantities of total chlorine discharged into the receiving body deriving from all the chlorinated discharges including the main drain used for regasification.

## Free active chlorine (Ton/year)

	2017	2018	2019
	3.6	3.4	3.8

Instead, the respective indexes represent the relationship between the total free active chlorine and the quantity of energy produced and regasified NG (expressed in Sm<sup>3</sup>).

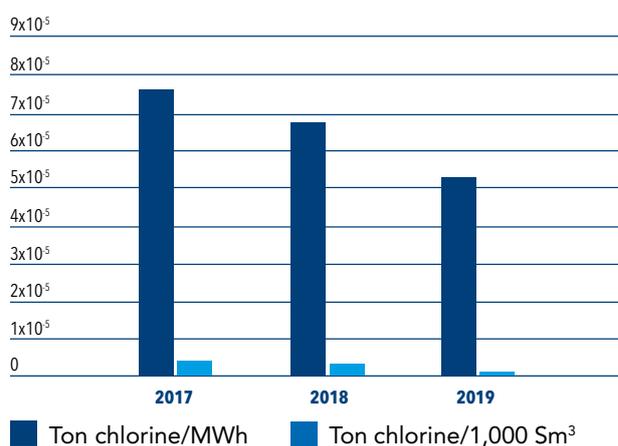
The figure below shows the decrease in the three-year period of the specific total free active chlorine indexes:

- -35% if compared to the total energy;
- -75.3% if expressed in regasified NG.

## Specific free active chlorine index

Free active chlorine per energy generated

Free active chlorine per regasified LNG



	2017	2018	2019
Ton chlorine/MWh	7.81x10 <sup>-5</sup>	6.91x10 <sup>-5</sup>	5.41x10 <sup>-5</sup>
Ton chlorine/1,000 Sm <sup>3</sup>	4.15x10 <sup>-6</sup>	3.31x10 <sup>-6</sup>	1.08x10 <sup>-6</sup>

All of the other chlorinated discharges from the Terminal, other than those that refer to the regasification process, are monitored every quarter by the Terminal operators and annually by an accredited laboratory, to check that the limit value of 0.2 mg/l set by the reference law for free active chlorine present in water is not exceeded: the limits set by law have never been exceeded.

(18) For a few hours in the month of December 2019 the average hourly value was slightly higher than the limit due to a momentary malfunctioning of the chlorine dosing system.

**OTHER DISCHARGES**

Discharges from the galley, laundry and living-quarters on board the Terminal are gathered in the onboard sewer, then collected in the waste water network to then reach the biological purification system (activated sludges with primary Archimedes’ screw filtration treatment and final disinfection using a membrane system without the use of chlorine), present on board. The effluent is then discharged into the sea, subject to analysis of compliance with law every six months. The parameters monitored are those set by Legislative Decree 152/06 as amended and by the IEA Decree for the discharge of wastewater into surface water (pH, BOD, COD, total coliforms and total suspended solids). It is noted that in the years studied, the values of pollutants present in the civil wastewater have always been below the limits set by law.

Rainwater is discharged directly into the sea subject to verification of the absence of oil/material that is potentially harmful for the environment, in accordance with the regulatory framework of the naval sector and the IEA Decree.

**3.6 Waste<sup>19</sup>**

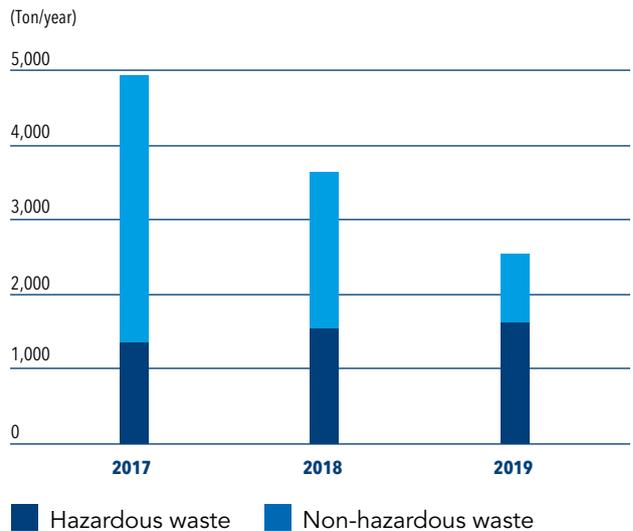
Another topic considered significant by the stakeholders is that of the Terminal’s waste, mainly produced by maintenance, cleaning and galley activities and classified in accordance with Legislative Decree 152/06 as amended, such as:

- waste comparable to urban waste: waste with a composition similar to uncontaminated urban waste;
- non-hazardous special waste: non-hazardous waste produced by industrial activities and services that cannot be considered comparable to urban waste;

- hazardous special waste: waste produced by industrial activities, comprising products that fall within the hazard classes identified in the above-stated Legislative Decree.

All of the waste management stages, from selection to delivery to the Livorno Port sub-contractor are carried out in accordance with reference maritime and land regulations. The sub-contractor decides on the final use of the waste, whether it be recovery or disposal.

**Division between hazardous and non-hazardous waste, produced by the Terminal**

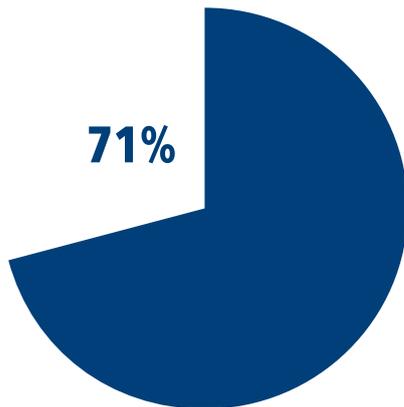


Ton/year	2017	2018	2019
Hazardous waste	1,342	1,527	1,608
Non-hazardous waste	3,548	2,087	921

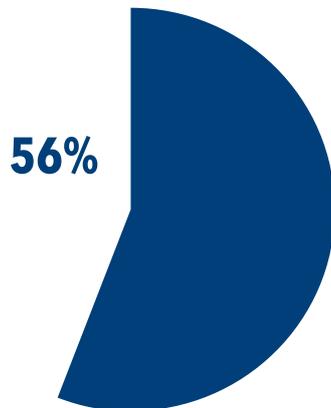
The figure shows a clear reduction in total waste in the 2017/2019 three-year period of approx - 48.3%. This reduction is due to the reduction in civil wastewater sent onshore as waste thanks to the good performance of the purification plant. The figure below shows this reduction.

(19) This material refers to GRI 306-2 of GRI 306: Effluents and waste 2016.

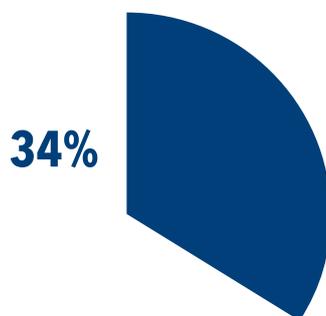
## Ratio between civil waste managed as normal waste and total waste produced by the Terminal



2017



2018



2019

■ (%) waste managed as normal waste over the total waste produced

## Specific waste indexes



	2017	2018	2019
Ton/MWh	0.106	0.073	0.036
Ton/1,000 Sm <sup>3</sup>	0.006	0.004	0.001

The figure highlights, even more clearly if expressed in specific indexes, the clear reduction in waste; in the 2017/2019 three-year period, the specific indexes decreased by 66% if expressed in relation to the energy produced and by 87.2% if expressed in relation to the regasified NG.

### 3.7 Compliance with environmental laws and regulations<sup>20</sup>

The Terminal is subject to a complex set of regulations that refer both to the land regulations that govern similar plants located onshore and to maritime regulations due to the clearly "offshore" nature of the Terminal.

The most important environmental authorisations obtained by OLT (Operator of the plant pursuant to Italian Legislative Decree 152/06 as amended) are:

- "Strategic Environmental Assessment" (SEA) no. 28, issued by the Tuscany Region in July 2004;
- "Environmental Impact Assessment Decree" (EIA) no. 1256, issued by the MATTM (Ministry of the Environment and Protection of the Territory and the Sea) in December 2004 as amended;
- "Integrated Environmental Authorisation Decree" (IEA), prot. 93 issued by the MATTM in March 2013 as amended.

All of the authorisation processes, as of law, followed the opportune public consultation process; moreover, the environmental documentation, with specific reference to the documentation to apply for authorisation and these authorisations are published on the MATTM website.

The environmental aspects linked to possible impacts on the environment, both on and off the Terminal, are carefully identified and analysed. Moreover, the necessary and opportune mitigation measures have been established to minimise the impact, as acknowledged by all the Competent Authorities, both during the authorisation procedure and during operations. The Company has also implemented a system for the extraction and collection of all the environmental data using an ad hoc software, aimed at their continuous monitoring, with the final goal of fully respecting all the regulations and, specifically, all the environmental provisions applicable to them.

It is noted that in the 2017/2019 three-year period there were no accidents with impacts on the surrounding environment nor were any violations of environmental laws and regulations recorded.

The results shown above are the fruit of control and prevention actions that include the numerous audits conducted each year, both on OLT and on its outsourcers.

#### n° of Audits

Years	OLT (internal-external)	outsourcer
2017	11*	13
2018	13	8
2019	14	10

\*the 2 audits conducted by the competent Authorities in accordance with Italian Legislative Decree 05/15 (Seveso) and Legislative Decree 152/06 as amended (IEA Decree) were also counted

All recommendations or non-conformities are considered and, when possible, rapidly solved, implementing suitable corrective actions.

### 3.8 Suppliers and social impact

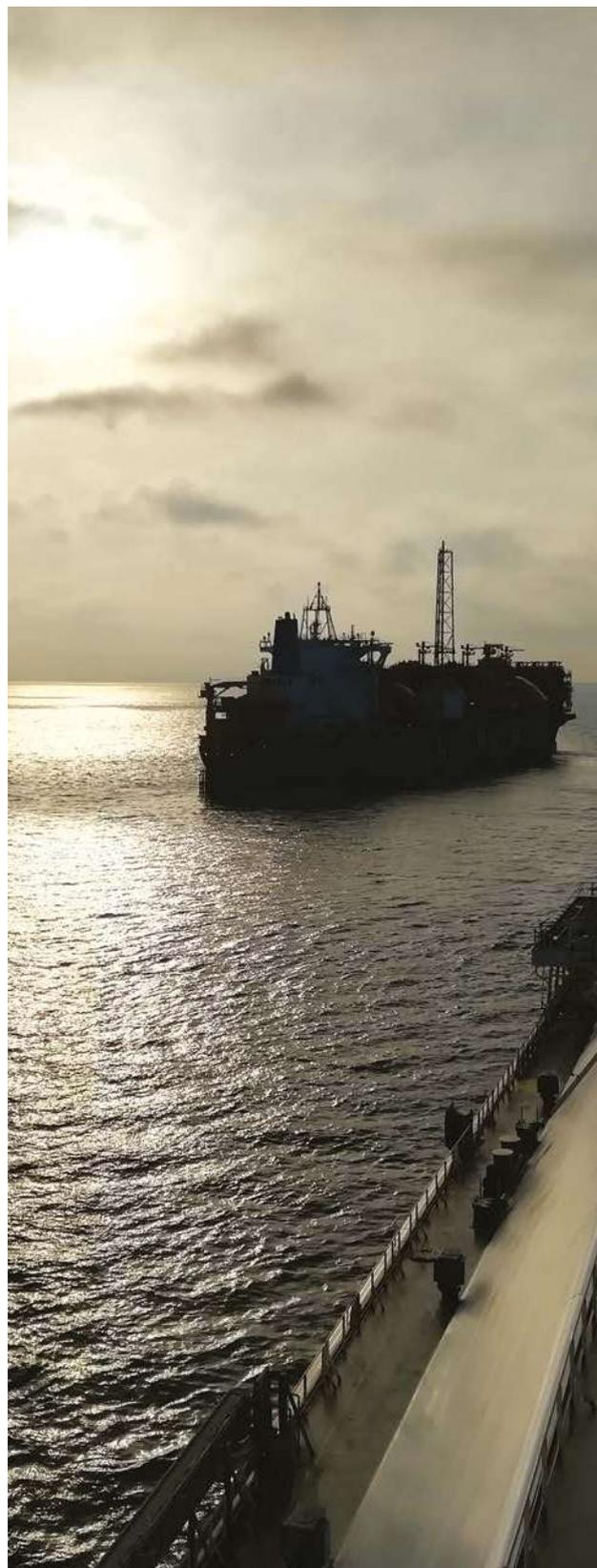
Of the main outsourcers (if we exclude the Terminal operator, whose environmental impacts and aspects are under the direct control of the OLT organisation and have been discussed above) we can mention the company Fratelli Neri that provides the support vessel services (tug boats, surveillance boats and crew boats).

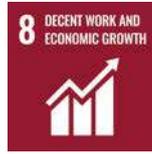
(20) This material refers to GRI 307-1 of GRI 307: Environmental compliance 2016 and to GRI 413-1 of GRI 413: Local communities 2016.

As regards the impact that OLT can have on environmental aspects linked to the activities of the company Fratelli Neri, it is noted that the latter has obtained ISO 14001 certification and constantly conducts audits to monitor its performance indicators. Whenever “non-conformities” emerge in the service provided, also in relation to environmental questions, OLT makes the required communications and manages these non-conformities with a view to continuous improvement. Through control of the correct use of the F.lli Neri vessels, OLT monitors their main impacts; that is, emissions to air monitored indirectly through the consumption of fuels.

It is also noted that OLT, directly or through ECOS, that we note once again has obtained ISO 14001 certification, for all suppliers and sub-suppliers of the Terminal, exercises its influence in environmental issues through:

- evaluation and qualification of suppliers;
- conduction of audits;
- observance of compliance of contractual clauses in which the supplier declares to be fully aware of and informed on the provisions of the 231 Model, the Code of Ethics and the Environmental Policy.





## The social-economic component<sup>21</sup>



As concretely emerges from the environmental data, the central question for OLT is not the mere functioning of the plant but the ongoing pursuit – voluntary – of improvement to fully protect the territory and the local population, its employees and everyone who actively takes part in the management of the Terminal. It is with the same sense of responsibility that the Company, in its social-economic role, intends to communicate with the Community, to build together positive effects that go well beyond the concept of “off-setting”.

The above is the result of a management approach based on the assessment of risks and opportunities of the various aspects of sustainability, with special attention to the environment and the company, including safety in its broadest sense.

#### 4.1 Personnel management

##### PERSONNEL<sup>22</sup>

From the point of view of employment, OLT guarantees employment to 132 people (data at 31 December 2019). Specifically, 24 people are employed directly by OLT, 14% more than the previous year.

The remaining workers are employed by the two main outsourcers of the Company and, respectively:

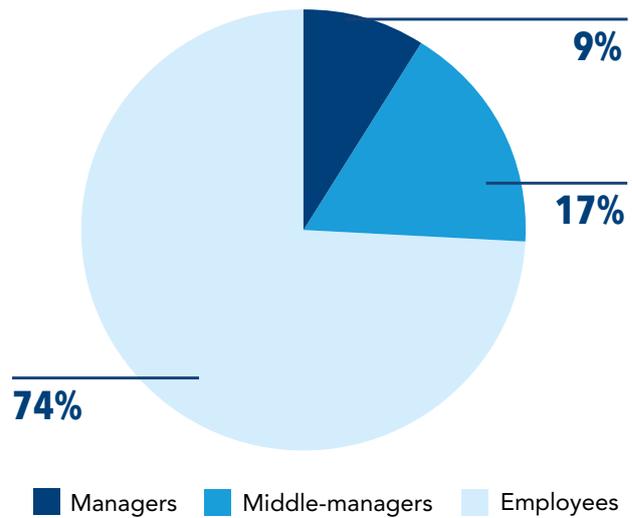
- 69 by ECOS involved in the management of the Terminal;
- 39 by the company Fratelli Neri involved in the management of the support vessels.

(21) This material refers to GRI 413-1 of GRI 413: Local communities 2016 and to GRI 103-1, GRI 103-2 and GRI 103-3 of GRI 103: Management Approach 2016.

(22) This material refers to GRI 401-1 of GRI 401: Employment 2016.

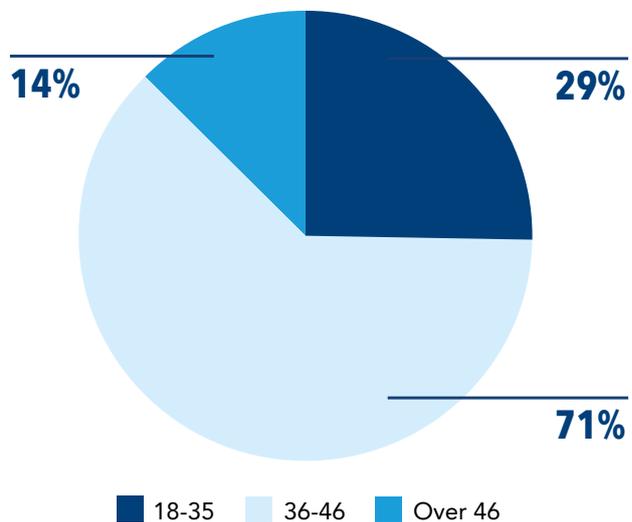
The data of the direct employees are given below.

#### Employment by contractual category (average data 2017-2019)



The data show a stable and balanced overview of the employment, which has grown over the last two years. There have been no major variations in terms of contract levels and categories. An example of a significant data is that of the appointment during 2019 of one of the managers of OLT as Managing Director.

#### Composition by age (2019)



As regards age, in 2019, of the 4 newly recruited employees, 2 are under 30 years of age while 2 are between 30 and 50 years old (recruitment rate of 16.7%).

The average age of the employees is 39-40. The data show that more than one fifth of the employees are between 18 and 35 years of age: a figure that demonstrates the intention of the Company to offer new generations opportunities for growth.

In 2019 no voluntary resignations or dismissals, retirements or deaths were recorded; one resource left the company at the end of a fixed term contract. Therefore, the turnover rate<sup>23</sup> coincides with the rate of new recruitments.

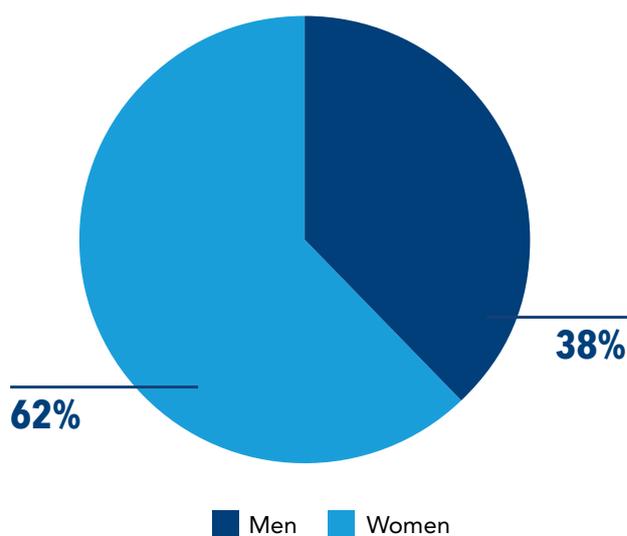
In this respect, OLT is committed to adopting objective evaluation criteria. It is in the Company's interest to develop the potential of every resource and their professional growth through respect for the dignity of each person, prevention of abuse, appropriate training, transparency and loyalty in the management of relations with employees, besides clear and precise internal communication on the Company's policies and strategies. Every employee is informed at the moment of recruitment and/or change of duties about the characteristics of the function and of the duties that they will be called on to perform, the salary, the standards and the procedures to protect health and safety.

## GENDER EQUALITY<sup>24</sup>

OLT's commitment to gender equality is proven by the Company's employment data.

As shown in the graph, the Company employs more women than men: specifically, at December 2019 there were 14 female employees and 10 male employees. The average age by professional category is almost identical for both sexes. Moreover, as shown in the table below, the difference between the average age divided by gender has flattened out over the three-year period.

## Distribution of the personnel by gender (average data 2017 - 2019)



## Comparison of the average age by gender in the three-year period (years)

	2017	2018	2019
Men	44.4	40.9	39.3
Women	38.2	38.3	39.4
<b>Total</b>	<b>44.1</b>	<b>39.2</b>	<b>39.4</b>

(23) The turnover rate is calculated by subtracting the number of incoming from outgoing employees divided by the average number of annual employees.

(24) This material refers to GRI 405-1 of GRI 405: Diversity and equal opportunity 2016.

The protection of female works is actively demonstrated also by a meticulous maternity protection policy. Each year, in the last three-year period, more than 60% of the women have exercised their right to maternity leave. Moreover, as regards female workers returning to work after maternity leave, in different times based on the needs of each individual, all return to OLT within 12 months following the deadline of the maternity leave (retention rate: 100%).

As regards the governing bodies, and the Board of Directors above all, it is noted that in 2017-2018 it comprised only men while in 2019, 33% of the Board is female. The Board of Directors can be divided into two age groups: 30-50 years old and over 50.

### Board of Directors

	2017	2018	2019
n° of members between 30 and 50 years old	3	2	1
n° of members over 50	4	4	5

### TRAINING

Training is essential in guaranteeing even greater stimulus, commitment to one's work and a high level of attention in terms of safety, environment and efficiency in all the operations at the Terminal. This system also envisages the activation of training and information initiatives for personnel, aimed at guaranteeing continuous improvement of the systems adopted, management in line with the values and rules defined also in its policies and a mutual and profitable relationship with its outsourcers.

This training is one way of improving the professional value of every person but also the competitive edge and quality of the work as a whole.

Specifically, in 2019, 449 hours of training were provided in OLT (18.71 hours per employee) and 4247 hours for the Terminal operators (61.5 hours per employee).

The table below shows the statistics of training offered both by the OLT personnel and the Terminal personnel.

### n° of hours of training/total hours worked

Years	OLT	Terminal
2017	1.70%	2.85%
2018	1.20%	3.29%
2019	1.29%	3.52%

N.B.: the data in the table for the Terminal are provided by the outsourcer ECOS.

## 4.2 Safety<sup>25</sup>

The Company has always paid great attention to safety, both in terms of workers' health and safety<sup>26</sup> and "large risks" industrial safety.

In the current operational stage, the management systems of OLT and of the Terminal operator are not only compliant with standard OHSAS 18001 but also with regulations applicable to the latter.

(25) This material refers to GRI 403-1, GRI 403-2, GRI 403-4, GRI 403-8, GRI 403-9, GRI 403-10 of GRI 403: Occupational health and safety 2018.

(26) Workers means both the workers of the company OLT and the operators on the Terminal.

Specifically, the management systems of both companies integrated with the principles of the safety management system for the prevention of major accidents (MAPP and SMS compliant with UNI 10617 and Italian Legislative Decree 105/15; that is, the Seveso Decree) and with the ISM Code (International Safety Management ), are perfectly appropriate for the risks of major accidents on the "FSRU Toscana" Terminal. This operating and management method is confirmed by the positive outcome of the audits carried out by the Competent Authorities in 2017 for the purposes of the Seveso Decree and IEA.

### SAFETY OF THE TERMINAL

The Company continues to pursue a spirit of risk prevention, assessing and mitigating same through preventive maintenance of the Terminal, training and active participation of the personnel and the use of state-of-the-art technological systems.

This process entails the following stages:

- identification of all the risks entailed in the Terminal's processes and activities by means of HAZOP (HAZard and OPerability analysis), HAZID (Hazard IDentification), analysis of the critical components, fault tree and event tree;
- evaluation of the risk bearing in mind the entity (severity) of the event and the probability of occurrence;
- development of action plans aimed at reducing the risk through implementation of technological systems, management, maintenance and training systems;
- implementation of coherent goals and clearly defined responsibilities;
- monitoring activities with direct and objective measures linked to the operating and management performance of the Terminal.

The above is guaranteed by the implementation and maintenance of the Safety Management System and by the attention paid to the monitoring of process systems, control of navigation in the area surrounding the Terminal, implementation of an appropriate inspection and preventive maintenance policy, continuous improvement pursued with the opportune audits (chapter 3.7), as well as measures to adopt to mitigate any events (internal emergency plan). The result of this *modus operandi* is the continuous consolidation of the culture and awareness of safety.

Objective demonstration of the safety culture can be seen from:

- the monthly HSEQ meetings during which general safety and environment issues and the specific topics of the moment are discussed along with direct consultation with the operators in the field;
- coordination meetings between OLT and ECOS on safety and the environment, aimed at guaranteeing close cooperation to achieve shared goals.

### WORKERS' HEALTH AND SAFETY

The health of the workers is a non-negotiable aspect for OLT: the Company is committed to creating a work environment that guarantees conditions that fully respect the health and safety of its employees and the employees of its outsourcers.

The highest guarantees in terms of health and safety underpin the accountability policy pursued by OLT and demanded also of its outsourcers. The Company invests constantly in improving safety: in this respect, it is noted in particular that OLT, whose employees work mainly in the offices, and the Terminal operator both achieved the "Zero Accident" goal in 2019.

## Frequency of accidents in the offices and on the Terminal in the 2017- 2019 three-year period

(n° of accidents x 1,000) / (n° of hours worked)

Years	OLT	Terminal
2017	0	0.0168
2018	0	0.0082
2019	0	0*

N.B.: the data in the table for the Terminal are provided by the outsourcer ECOS.  
\* zero accidents in 120,613 hours worked

Considering the increase in operations and maintenance activities in the three-year period taken into consideration, it can be said that there was an improvement between 2017 and 2019, confirmed by the severity index of the accidents that occurred, expressed as hours lost compared to hours worked: 0.0024 in 2017 - 0.0026 in 2018 and 0 in 2019.

The continued commitment to reporting near misses and their analysis demonstrates OLT's pursuit of the above goal; this positive approach to the study of near misses can be seen in the table below.

## Frequency of "near misses"

(n° of near misses x 1,000) / (n° of hours worked)

Years	OLT	Terminal
2017	0	0.26
2018	0	0.23
2019	0.03	0.12

N.B.: The data in the table for the Terminal are provided by the outsourcer ECOS.  
The near misses calculated take into consideration all of the near misses and not only the near-miss accidents

It is also noted that no occupational diseases have been recorded for any worker (neither ECOS nor OLT).

The results shown and, in particular, the achievement of the "Zero Accident" goal were possible thanks to a rigorous control and prevention policy guaranteed by the management systems.

Specifically, depending on the severity (anomaly, non-conformity, accident or injury) of the event, such event is analysed by means of a "Root Cause Analysis": method to solve problems that investigates their causes in great detail.

The involvement of the workers in health and safety issues lies at the heart of the activities, not only by holding the periodic meetings as required by law, but also specific meetings (monthly for the Terminal and periodic for the office).

The key role of prevention is strategically combined with effective management of emergencies. An emergency plan compliant with applicable offshore and onshore laws has been put in place. Emergency drills are carried out every week and involve all the personnel on-board the Terminal.

## Emergency drills

Years	OLT*	Terminal
2017	2	146
2018	2	150
2019	2	153

N.B.: the data in the table for the Terminal are provided by the outsourcer ECOS.  
\* the workplace of OLT is the office

In order to optimally manage any crises deriving from an undesirable event, OLT has adopted a manual for the management of crises and formed a committee comprising experts from inside the Company and outsourcers (ECOS and F.Ili Neri) that has the task of coordinating operations in the event of a crisis, able to affect not only the Terminal but the Company itself or the main related outsourcers.

### 4.3 Local communities<sup>27</sup>

OLT is fully aware of the impact its activities have on the economic-social development and standard of living in the Territory. The development and growth of the Company do not depend solely on operating performance but go hand-in-hand with the Company's capacity to maintain and implement social-economic synergies with the local community. Coherently with this concept, OLT constantly consults the Community and Territory that host the infrastructure.

On one hand, the Company is maintaining the commitments undertaken in terms of social-economic effects related to the commissioning of the plant. In general terms, we are talking about a total investment of approximately Euro 400 million in the 20 years of life of the Terminal starting in 2013, that includes numerous activities: from management to maintenance of the Terminal to the surveillance system of same, from direct employment to accessory services related to environmental protection.

Specifically, collaboration with local companies - specialised in the repair, maintenance, procurement, storage and transport sectors - besides creating employment for the personnel needed for the Terminal's management, will generate new business of around Euro 200 million for 20 years.

The naval support activities for the tug-boats, for the mooring of LNG carriers at the Terminal, the transport of personnel on board, the surveillance service of the Terminal by means of a guardian boat and the Marine Base, instead, generate new business of approx. Euro 160 million.

Moreover, the CIBM - Consortium for the Interuniversity Centre of Marine Biology and Applied Ecology of Livorno - has drawn up a twenty-year Marine Environment Monitoring Plan for the area around the Terminal that sets forth the performance of marine, physical, biological, chemical-physical, bathymetric and eco-toxicological analyses and generates new business for approx. Euro 19 million. Finally, the rental for the occupation of the state-owned area amounts to approx. Euro 10 million for 20 years.

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(27) This material refers to GRI 413-1 of GRI 413: Local communities 2016.

Alongside the activities related to the functioning of the Terminal, further demonstration of the active social-economic collaboration between OLT and the Territory is the series of initiatives in favour of the local community. Most of these initiatives, planned during the authorisation process stage of the plant and already implemented for the most part, have an environmental aim: a detailed list is provided below.

As per the agreements reached with the Tuscany Region in the authorisation stage and with the towns of Livorno, Collesalveti and Pisa, OLT has committed to works for a total of Euro 1 million.

- Livorno:
  - contribution to the construction of the “Secche della Meloria” Protected Marine Area Visitor Centre for a value of Euro 400,000 (5% already granted pending definition of the executive project by the Municipal Authorities);
  - contribution to the performance of the environmental characterisation of sites along the coast of Livorno, carried out in 2015 and used during the revision of the Structural Plan and Town-Planning Regulation of the town of Livorno, for a value of Euro 80,000.
  
- Collesalveti:
  - contribution to the environmental requalification of the Stagno town centre for a value of Euro 420,000; 85% has already been paid out.
  
- Pisa:
  - contribution to the construction of an equipped park in the “La Camilla” public park in Marina di Pisa, for a value of Euro 100,000, inaugurated in 2017.

Further offsetting resulted in the granting, between 2014 and 2018, of Euro 2.5 million, used by the Tuscany Region for the implementation of kerbside waste collection in the town of Livorno.

Of the initiatives in the Territory, agreed with the Tuscany regional Authorities, an important place is held by the re-opening of the Incile Canal, the connection between the Arno River and the Navicelli Canal, whose aim is to restore navigation from the centre of Pisa to the port of Livorno. This project was the subject of an agreement signed by OLT (which in this case holds the role of commissioning body), the municipality and district of Pisa for a value of approx. Euro 5 million. The project was completed in February 2018 and tested in October of the same year. It is a complex project and a virtuous example of engineering, that will give back to Pisa a part of its urban history.

Besides the activities agreed with the Institutions, OLT has voluntarily supported initiatives that enhance the social fabric, by supporting sectors such as infancy, health or disabilities through donations, sponsorship of events and supporting organisations and structures devoted to people in need of help.

## OLT AND THE TERRITORY

For some years, thanks to the donations made by OLT, the hospital of Livorno has been developing a high fidelity simulation programme for paediatric and neonatal emergencies in which the child is replaced by a sophisticated mannequin able to reproduce with a high degree of fidelity the physiological and vital reactions that the team of doctors and nurses face in real life. To this end, the simulation programme includes the purchase in 2018 of a video laryngoscope, donated by OLT which, together with the high-fidelity mannequin that the company will purchase and donate in 2020, combining the contribution of 2019 with that of 2020, will make the Paediatrics unit in Livorno one of the most advanced departments as regards instruments in this field.

From 2018 OLT has decided to support the VIP Italia Onlus Association that promotes volunteer clown therapy in private and public structures as well as in all those places where there is a situation of physical or mental distress. The Association is active also at the hospital of Livorno.

In 2019, a donation was made to the "Cuore Matto" Onlus that, promoting a fund-raising campaign for the purchase of an electrosurgical scalpel for the Neurosurgery department at the hospital of Livorno, managed to make the donation thanks to OLT's support. Since 2013, OLT has supported the "Il Porto dei Piccoli" Association, a NPO that creates awareness in hospitalised children and their families about the culture of the sea. Always sensitive to the sea as a resource and the world that revolves around it, over the years since 2013 the Company has made donations to Assonautica Livorno, specifically to support the Sailing School of the association devoted to young, disabled people who love sailing.

Since 2014, OLT has sponsored 'Effetto Venezia', the summer event organised by the municipality of Livorno that animates the old city, the La Venezia quarter, characterised by bridges and canals, with concerts, theatre shows, art installations, street entertainment and light shows.

In 2019, for the second consecutive year, on the occasion of the flood that struck the town of Livorno in 2017, a donation was made to support a symphonic concert whose takings were devolved in full to the Caritas of Livorno, coordinator of the aid given to flood victims.

In 2019 OLT also contributed to the sponsorship of the "Modigliani e l'avventura di Montparnasse" exhibition organised by the Municipal Authorities of Livorno on the occasion of the centenary of the death of Amedeo Modigliani.

Thanks to the contribution of OLT, the Town of Collesalveti was able to fit out the town's theatre with technical plants and systems, giving life to numerous initiatives for the community, among which the "Open Opera", the first talent show for operatic music.

Moreover, the town organises music courses in the primary schools, both during and outside school hours. Since 2017 OLT has supported this project with the purchase of musical instruments to loan to the primary school pupils.

Sponsorship of sporting events: the Half Marathon, the rowing races of the town of Livorno, including the Palio Marinaro and the Settimana Velica Internazionale Città di Livorno.



## **l'energia del mare**

**FARE CON E PER IL TERRITORIO**  
un progetto di OLT Offshore LNG Toscana

And with a view to reinforcing and structuring consultation with the local community, to create common social projects; that is, of interest to the territory of Livorno and Pisa and, at the same time, in line with its corporate mission, in 2019 OLT presented an ad hoc project: "L'Energia del Mare – fare con e per il Territorio" (The Energy of the Sea - Acting with and for the Territory), which will be implemented during 2020 and in the following years.

The project is divided into 5 areas of action, that refer to 5 areas of interest for the Territory and for OLT:



**green & blue**

To promote responsible and targeted policies to protect the ecosystems, reducing the impact of man's activities and disseminating the culture of sustainability;



**open lab talent**

To invest in young people, research and innovation that lie at the heart of a solid future. The project will include concrete actions to stimulate, support and train the new generations;



**gioco di squadra**

To create union in the community by promoting sporting, cultural and social activities. The projects aim to amplify the sense of inclusion and stimulate the participation of the public (sport, culture and social);



**curiamo il futuro**

To support children and their families in difficult moments of their young lives (infancy and health);



**codice bianco**

To defend workers' health and safety, spreading the culture of safety at work, because it is the workers that make a Company a great enterprise (safety/health of workers).

#### 4.4 Suppliers and social impact<sup>28</sup>

In relationships with suppliers, OLT complies in full with the indications of the IMS system documents, such as the Code of Ethics and Conduct of OLT as well as the procedures that are also compliant with the Social Accountability Standard (SA 8000). The supplier selection criteria for the assignment of individual jobs are subordinate to objective criteria, including the quality of the service offered, the cost and the method for performing and delivering the service. This operating method is demanded also of the main outsourcers and, above all, the Terminal operator. OLT and ECOS periodically review their supplier list with the aim of streamlining it and improving efficiency also in terms of cost-effectiveness. Therefore, no potential supplier that possesses the necessary requirements should be denied the possibility of offering its products/ services. In the case of award of a tender to carry out works, OLT and the Terminal operator guarantee the rights of the contractors and check that same observe applicable laws when carrying out the works. It goes without saying that OLT requires the Terminal operators to comply with principles of cost-effectiveness and free access of qualified suppliers to any and all procurement requested on a case by case basis, while respecting the management and operational autonomy of the Terminal operator.

OLT is an SA 8000 certified company and this therefore means that it does not use suppliers that have significant negative social impacts. In this respect, OLT periodically assesses the risks and opportunities of its own outsources so as to verify, inter alia, that no situations of child labour exist. The measures and treatment identified in the analysis are tackled in order of priority, programming targeted actions to eliminate the cause of the problem.

At the time of the signing of the contract, OLT verifies, also by including a compliance clause, that the chosen supplier is fully aware of the provisions of Italian Legislative Decree 231/2001 (231 Model and Code of Ethics and Conduct of OLT), as well as the Charter of Values, the HSEQ Policy and, if pertinent, the MAPP (Major Accidents Prevention Policy). The services of suppliers are constantly monitored by filling in assessment grids that enable maintenance or modification of the classification of the selected supplier.

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(28) This material refers to GRI 413-1 of GRI 413: Local communities 2016.



# Glossary



- **Archimedes' screw:** hydraulic machine for raising water, consisting of a circular pipe enclosing a helix that draws water from the basin.
- **ARERA:** Autorità di Regolazione per Energia, Reti e Ambiente, that is the Regulatory Authority for Energy, Networks and Environment.
- **ARPAT:** Agenzia Regionale per la Protezione Ambientale della Toscana, that is the Regional Agency for Environmental Protection of Tuscany.
- **Audit:** an independent assessment aimed at obtaining evidence, for a given object, and assessing it objectively, in order to establish to what degree the criteria set have been achieved.
- **Azimuth tugs:** vessels used to tow large ships. The main characteristic is that the propellers can rotate around a vertical axis, increasing manoeuvrability.
- **Ballast:** embarkation and disembarkation system to change the trim of the vessel/Terminal.
- **Barge:** small vessels that transport goods or liquids to and from larger vessels, generally inside ports.
- **BAT (Best Available Technology):** the best technologies available for the design and production of equipment, plants or processes.
- **Biogas:** methane-rich combustible gas, obtained from the anaerobic fermentation of agricultural or urban waste.
- **BOD (Biochemical Oxygen Demand):** quantity of oxygen required, in mg/l, for bacterial flora to break down organic material (oxidation) present in wastewater.
- **BOG (Boil Off Gas):** natural gas vapours produced by the LNG contained in the tanks due to natural evaporation, necessary to maintain the balance at -160°C and atmospheric pressure.
- **Bottlenose dolphins:** a toothed cetacean belonging to the Delphinids family.
- **BREF (BAT Reference Document):** reference document for BATs.
- **Bunkering:** supplying of fuel (Marine Gas Oil, for the Terminal) on board a vessel, generally carried out by a small vessel (bunkering tanker).
- **CEF Tender (Connecting Europe Facilities):** a tender called by the European Commission with the aim of developing trans-European infrastructure and infrastructure in the transport, telecommunications and energy sectors.
- **CEMS (Continuous Emissions Monitoring System):** System for continuous monitoring of air pollutants.
- **CIBM:** Centro Interuniversitario di Biologia Marina ed Ecologia Applicata, that is the Consortium for the Interuniversity Centre of Marine Biology and Applied Ecology of Livorno.
- **CO (carbon monoxide):** polluting gas generated by incomplete combustion due to lack of air. The effects on the environment are considered negligible while it is toxic for man because it can cause asphyxiation (generally in closed environment); it is particularly insidious because it is odourless and tasteless.
- **CO<sub>2</sub> (carbon dioxide):** colourless and tasteless gas, (also called carbon dioxide as it is formed by carbon and two atoms of oxygen), heavier than air, easily liquefiable, soluble in water and alcohol. CO<sub>2</sub> is fundamental in vital processes and is naturally present in the atmosphere but the increase in its concentration is becoming significant for the greenhouse effect and therefore for the average global temperature.
- **COD (Chemical Oxygen Demand):** quantity of oxygen used to oxidise the organic and inorganic substances contained in a water sample after being treated with compounds with high oxidising power.
- **Cold vent:** cold (without flame) vent system used in plants in the case of anomalies and emergencies to vent overpressures.
- **CTD:** Conductivity, Temperature and Depth.
- **DAFI Directive:** Directive on the deployment of alternative fuels infrastructure.

- **dB (decibel):** unit of measurement of the level of energetic intensity of sound.

- **EIA (Environmental Impact Assessment):** pursuant to Legislative Decree 152/06 this is a technical-administrative procedure whose aim is to identify, describe and assess, prior to the start of any works, the effects on the bio-geophysical environment, on health and on human wellbeing of certain public or private projects, as well as the identification of measures aimed at preventing, eliminating or minimising negative impacts on the environment, before these actually occur. The authorisation is issued by means of a Decree (EIA Decree).

- **EIB:** European Investment Bank.

- **EMAS (Eco-Management and Audit Scheme):** a voluntary tool created by the European Union that can be used by organisations (companies, public institutions, etc.) to assess and improve their environment performance and to provide the public and other stakeholders with information about how they manage the environment. The currently applicable European regulation is number 1221 issued in 2009.

- **Emission Trading:** this term generically refers to a system adopted internationally to control emissions and trade quotas of greenhouse gas and pollutants; the "Emission Trading" directive is the European directive that regulates the exchange of quotas and their monitoring.

- **ESG (Environmental, Social, Governance):** the acronym ESG refers to three dimensions - environmental, social and governance - essential when measuring the sustainability and social impact of an enterprise.

- **EWC Codes:** waste identification codes as indicated in the European Waste Catalogue.

- **Fine particles:** airborne particles (fibres, carbonaceous particles, metals, silica, liquid and solid pollutants) with a diameter of less than 10 micron (PM10) or 2.5 micron (PM2.5). The high

concentration of fine particles is one of the causes of atmospheric pollution.

- **Free active chlorine:** defined as the active chemical product available as oxidant and therefore for disinfection (indeed, it has sanitising properties). This is the parameter used by sector regulations to define the potability of water.

- **Frigories:** Unit of measurement used in the design and production of cooling plants equal to the quantity of heat to be removed from 1kg of water to lower its temperature from 15.5 to 14.5 °C. In this document it refers to the quantity of energy removed from the seawater to be able to regasify the LNG.

- **FSRU (Floating Storage and Regasification Unit):** floating unit fitted out for the regasification and storage of LNG.

- **Fugitive emissions:** emissions deriving from an industrial process that are not channelled because they derive from physiological losses (and therefore not accidental) of plants and systems. In particular, physiological losses from gaskets, valves, etc.

- **Gas Year:** reference time period used in the gas market that runs from 06.00 on 1<sup>st</sup> October until 06.00 on 1<sup>st</sup> October of the year immediately following.

- **Gas storage year:** time period that runs from 1<sup>st</sup> April in one calendar until 31<sup>st</sup> March in the year immediately following.

- **GME (Gestore Mercati Energetici):** company owned by the Ministry of the Economy and Finance that organises and manages the electrical energy, natural gas and environmental gases market.

- **Green Deal:** growth strategy of the European Union that sets forth on new bases the commitment of the Commission to tackle problems linked to the climate and the environment.

- **GRI Standards:** the global reference standards for sustainability reporting; that is, for reporting the sustainability performance of companies and organisations in general.

- **GWP:** Global Warming Potential.

- **HSEQ (Health, Safety, Environment and Quality):** any process related to Health, Safety, Environment and Quality.
- **HSEQ Policy:** top management document in which the management of a company describes its actions to achieve and continuously improve certain standards concerning the health and safety of workers and respect for the environment and quality.
- **IEA (Integrated Environmental Authorisation):** the IEA is the measure that authorises functioning of an installation under certain conditions that must guarantee compliance with the requirements as of the second part of Italian Legislative Decree 152/06. The authorisation is issued by means of a Decree (IEA Decree).
- **IGU (International Gas Unit):** global association founded in 1931 with the aim of promoting technical and economic progress in the gas industry.
- **Inertisation of tanks:** technical term that indicates the process required to make tanks inert (e.g. substitute NG with an inert gas).
- **InvestEU:** programme that gathers all the financial instruments of the EU balance sheet. It replaces the current EFSI (European Fund for Strategic Investments), set up in the wake of the financial crisis.
- **ISM Code:** international standard for the safe operation of ships and for pollution prevention.
- **ISO 14001:** standard that sets the requirements of an organisation's environmental management system.
- **ISO 9001:** standard that sets the requirements of an organisation's quality management system.
- **ISPRA:** Istituto Superiore per la Protezione e la Ricerca Ambientale, that is the Italian Institute for Environmental Protection and Research.
- **LNG (Liquefied Natural Gas):** natural gas at liquid state at boiling temperature or less. At the LNG Terminal it is stored at atmospheric pressure and therefore at a temperature of around -160 °C.
- **LNG Shipping:** Sea transport of liquefied natural gas using vessels designed and built for this purpose.
- **MAPP:** Major Accidents Prevention Policy, prepared by a company/plant subject to the Seveso Directive (implemented in Italy by Legislative Decree 105/15).
- **MARPOL (MARitime POLLution):** international convention for the prevention of pollution from vessels. Convention approved by the numerous member countries of the IMO (International Maritime Organisation).
- **Materiality analysis:** Stool used to identify relevant topics for internal and external stakeholders in the environmental, social and economic areas and subsequent analysis of their relevance based on their affinity with the organisation's mission and strategy. Topics identified as "material" will lie at the basis of the reporting.
- **MATTM:** Ministry of the Environment and Protection of the Territory and the Sea.
- **MGO (Marine Gas Oil):** fuel like diesel but with a slightly higher density, suitable for use in marine engines.
- **Mission:** the purpose of the company, the reason for its existence, the sense of its presence on the market. At the same time, it is a distinctive element able to differentiate the company, as far as possible, from all the other players and, therefore, from its competitors.
- **MIT:** Ministry of Infrastructure and Transport.
- **MiSE:** Ministry of Economic Development.
- **MOSS tanks:** type of spherical tanks for the transport of LNG. The tanks are thermally insulated using insulating material: a cavity between the tank and the insulating material, filled with inert gas, further increases the system's insulating capacity. Each tank is supported around its circumference by a ring that rests on the hull of the ship; this ring is protected against LNG leakages by a secondary barrier positioned at the base of the tank.

- **Mtoe:** Millions of tonnes of oil equivalent.
- **MWh:** Mega Watt hour, unit of measurement of energy.
- **Near miss:** an accident and/or injury that almost occurred.
- **New Panamax:** vessels of a size such as to be able to cross the Panama Canal after its expansion, completed in 2016.
- **NG (Natural Gas):** mixture of hydrocarbons at gaseous state (mainly methane, ethane and propane with traces of compounds with more than 4 carbon atoms) produced by the decomposition of organic material. In nature it is commonly found at fossil state along with petroleum and carbon, or on its own in reservoirs.
- **Nm<sup>3</sup> (Normal cubic metres):** unit of measurement used for gas in "normal" conditions, that is, with reference to atmospheric pressure and temperature of 0°C. The relationship between normal cubic meter and standard cubic metre is the following: 1 Nm<sup>3</sup>= 1,056 Sm<sup>3</sup>.
- **NO<sub>2</sub> (nitrogen dioxide):** brown-reddish gas, poorly soluble in water, toxic, strong, pungent odour and with major polluting potential.
- **NO<sub>x</sub> (nitrogen oxides):** all nitrogen oxides and their mixtures. They are generally produced as by-products during combustion that takes place in the presence of air (from wood-burning fireplaces, vehicle engines, thermoelectric plants). The quantity and quality of the NO<sub>x</sub> mixture depend on the burnt substance and the conditions in which the combustion takes place.
- **OCIMF (Oil Companies International Marine Forum):** involuntary association of oil companies involved in the maritime sector in oil and gas sector terminals.
- **OHSAS 18001 (Occupational Health and Safety Assessment Series):** international standard for an occupational health and safety management system.
- **Outsourcer:** company to which a part of the service of the client company is contracted out.
- **Over supply:** market condition in which supply exceeds demand.
- **PAR (Platform for the Allocation of Regasification capacity):** IT platform developed and managed by GME, within the framework of which the procedures for the allocation of regasification capacity at the terminals managed by regasification companies that have requested to use this service are managed.
- **Peak Shaving Service:** measure that can be activated in weather emergencies pursuant to Ministerial Decrees of 19/04/2013 and of 18/10/2013 and ARERA resolutions no. 471/2013/R/gas and no. 739/2017/R/gas, as well as the subsequent ARERA resolutions that identify the subjects able to supply one or more loads for the receipt and long-term storage of LNG in the Terminal's tanks and subsequent re-delivery.
- **pH:** value that indicates the acidity or basicity of a solution.
- **Phase out:** leaving a market, in this context abandoning the use of coal as a source of energy.
- **Plankton:** ecological category that includes floating aquatic organisms that are passively transported by the current and wave movement.
- **PNIEC:** Italian Integrated Energy and Climate Plan. The plan intends to contribute to a profound transformation of the economy in which decarbonisation, the circular economy, efficiency and rational and fair use of natural resources represent goals and tools for an economy that better respects people and the environment, in a situation of integration of the national energy markets on a single market and with adequate attention to the affordability of prices and the security of supply.
- **Ppm:** unit of measurement that indicates parts per million.
- **Ppt:** unit of measurement of salinity in parts per thousand.

- **Passive protection:** measurement that, in the case of fire, ensures that the fire has difficulty propagating thanks to the use of incombustible or poorly combustible products (e.g. paints).
- **Rainwater:** Legislative Decree 152/06 regulates rainwater that can be defined as the fraction of water of an atmospheric precipitation that, not infiltrated into the subsoil or evaporated, washes out the drainage surfaces.
- **RCN:** Navigation Code.
- **Regasification Code:** document containing all the rules for access to and use of the regasification service offered by the Terminal as well as the service quality standards.
- **Regasification terminal:** plant fitted out for the regasification of LNG; that is, transformation of the product from liquid state, used in sea transport, to gaseous state for final consumption and road transport.
- **RINA (Italian Naval Register):** certifies that a ship has been designed and built in compliance with the regulations/criteria established by the same classification company (in turn, compliant with the principles established internationally by the international maritime organisation), and it is therefore authorised to carry out the activities for which it has been designed.
- **SA 8000 (Social Accountability):** International certification standard prepared by CEPAA (Council of Economical Priorities Accreditation Agency) and aimed at certifying some aspects of the company's management with reference to social accountability.
- **SDGs (Sustainable Development Goals):** the 17 sustainable development goals of the United Nations 2030 Agenda for Sustainable Development. By pursuing the SDGs it will be possible to guarantee fully sustainable development that respects people, the community and the environment.
- **SEA:** Strategic Environmental Assessment, that

is a set of analytical and participatory processes for incorporating environmental considerations, at early stages of decision making, into policies, plans, and programs that affect natural resource.

- **SECA Area (Sulphur Emission Control Area):** Sulphur Emission Control Areas in cooperation with the International Maritime Organisation (IMO) set up by North America and the European Union with the aim of limiting atmospheric pollution and the related impact on man and the environment.
- **Seveso Decree (Seveso):** European Directive 2012/18/EU implemented in Italy by Legislative Decree 105 of 26/6/2015 (Legislative Decree 105/2015): "Implementation of directive 2012/18/EU on the control of the risk of major accidents involving hazardous substances". Generally called Seveso III as it is the third version of the decree concerning major accidents; the previous version (Seveso II), now superseded, is Directive 96/82 EEC implemented in Italy with Legislative Decree 334 of 17/08/1999 (Legislative Decree 334/99).
- **Ship to Ship operation:** transfer of part of the load of a vessel to a smaller sized vessel. By extension, the term is used in this document for all operations starting from the manoeuvring phase through to the departure of the vessel after the load has been fully transferred.
- **SIGTTO (Society of International Gas Tanker and Terminal Operators):** the main activity is that of analysing gas transport by sea and its handling at terminals with the aim of making these activities safer and more eco-friendly.
- **Sm<sup>3</sup> (Standard cubic metre):** quantity of gas contained in a cubic meter under standard temperature (15 °C) and pressure (1,013.25 millibar, i.e. atmospheric pressure) conditions.
- **Small Scale LNG:** all the activities involved in managing small and medium-sized quantities of Liquefied Natural Gas, including transport, storage, transfer to tank trucks, bunkering, etc.
- **SME:** Small and medium-sized enterprises.

- **Spent gas:** exhaust gas deriving from combustion. In this document it refers to exhaust gas from the boilers channelled to the stack.
- **Stakeholders:** interested parties.
- **Start-up:** Newly established company.
- **Storage:** conservation of a product in a deposit or dedicated tank.
- **TEN-T (Trans-European Network-Transport):** this network consists of an infrastructure and logistic corridor that allows intermodal transport of goods and people along the continent's main connections.
- **Thermal delta:** variation in temperature between entry and exit ( $T_{\text{exit}} - T_{\text{entry}}$ ).
- **Ton:** Tonnes.
- **Total coliforms:** coliforms are a group of bacteria used to characterise wastewater.
- **Total suspended solids:** part of material present in a liquid that is found at solid state; these are also used for the characterisation of wastewater.
- **Turbo-generator:** machine that uses the thermal energy of pressurised steam, converting it into mechanical energy.
- **Vent:** system to vent gas safely into the atmosphere.
- **Vision:** projection of a future scenario. A forecast of what the company will become, or the context in which it operates which is consistent with its ideals and the message. It sets goals in a concrete way and in some way promotes the action.
- **VOCs (Volatile Organic Compounds):** class of organic substances that includes various chemical compounds formed by molecules having different functional groups but characterised by a certain volatility. VOCs are released by many human activities and can have a range of harmful effects, including a contribution to the formation of troposphere ozone.
- **Wastewater:** all water whose quality has been impaired by man's activities after being used in domestic, industrial and agricultural use and thus becoming unsuitable for direct use.
- **Water column:** conceptual column of water that starts from the surface of the sea, lake or river and descends to the bed sediments. The term is used in many fields of hydrology and in environmental science to assess stratification or mixing of the layers of water of rivers, lakes or oceans due to thermal or chemical causes.
- **Water curtain:** wall or curtain of water to protect the hull.
- **White phase:** overall situation of the surrounding environment at the start of the activities of an industrial plant. The set of data gathered during the White Phase represents a parameter for comparison to assess the impacts of the plant.

GRI	GRI Edition	Chapter N.
GRI 103: MANAGEMENT APPROACH 2016 103-1: Explanation of the material topic and its Boundary	2016	3 – 4
GRI 103: MANAGEMENT APPROACH 2016 103-2: Explanation of the material topic and its Boundary	2016	3 – 4
GRI 103: MANAGEMENT APPROACH 2016: Evaluation of the management approach	2016	3 – 4
GRI 302: ENERGY 2016 302-1: Energy consumption within the organization	2016	3.1
GRI 302: ENERGY 2016 302-3: Energy intensity	2016	3.1
GRI 303: WATER AND EFFLUENTS 2018 303-3: Water withdrawal	2018	3.2
GRI 303: WATER AND EFFLUENTS 2018 303-4: Water discharge	2018	3.2 – 3.5
GRI 303: WATER AND EFFLUENTS 2018 303-5: Water consumption	2018	3.2
GRI 304: BIODIVERSITY 2016 304-2: Significant impacts of activities, products, and services on biodiversity	2016	3.3
GRI 305: EMISSIONS 2016 305-1: Direct (Scope 1) GHG emissions	2016	3.4
GRI 305: EMISSIONS 2016 305-4: GHG emissions intensity	2016	3.4
GRI 305: EMISSIONS 2016 305-7: Nitrogen oxides (NO <sub>x</sub> ), sulfur oxides (SO <sub>x</sub> ), and other significant air emissions	2016	3.4
GRI 306: EFFLUENTS AND WASTE 2016 306-2: Waste by type and disposal method	2016	3.6
GRI 307: ENVIRONMENTAL COMPLIANCE 2016 307-1: Non-compliance with environmental laws and regulations	2016	3.7
GRI 401: EMPLOYMENT 2016 401-1: New employee hires and employee turnover	2016	4.1
GRI 403: OCCUPATIONAL HEALTH AND SAFETY 2018 403-1: Occupational health and safety management system	2018	4.2

GRI	GRI Edition	Chapter N.
GRI 403: OCCUPATIONAL HEALTH AND SAFETY 2018 403-2: Hazard identification, risk assessment, and incident investigation	2018	4.2
GRI 403: OCCUPATIONAL HEALTH AND SAFETY 2018 403-4: Worker participation, consultation, and communication on occupational health and safety	2018	4.2
GRI 403: OCCUPATIONAL HEALTH AND SAFETY 2018 403-8: Workers covered by an occupational health and safety management system	2018	4.2
GRI 403: OCCUPATIONAL HEALTH AND SAFETY 2018 403-9: Work-related injuries	2018	4.2
GRI 403: OCCUPATIONAL HEALTH AND SAFETY 2018 403-10: Work-related ill health	2018	4.2
GRI 405: DIVERSITY AND EQUAL OPPORTUNITY 2016 405-1: Diversity of governance bodies and employees	2016	4.1
GRI 413: LOCAL COMMUNITIES 2018 413-1: Operations with local community engagement, impact assessments, and development programs	2018	3.7 – 4 4.3 – 4.4

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