

**REPORT** 

2012

ERG

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LETTER TO STAKEHOLDERS	4	
GROUP PROFILE	6	
History of the Group	6	
Focus on Renewable Energy	8	
ERG in a nutshell – some numbers	11	
Corporate Governance	15	
The Internal Control and Risk Management System of the ERG Group	17	
Robustness and reliability of industrial assets: ERG best practice	19	
Ethics and credibility in dealings with institutional stakeholders	20	
CSR management	22	
The importance of certifications	24	
Sustainability Report	27	
Stakeholder: analysis and listening	30	
Sustainability commitments	33	
ECONOMIC RESPONSIBILITY	34	
Economic value generated and distributed	35	
ERG: key economic indicators	36	
Transparency and timeliness for investors	38	
Rainbow project for corporate efficiency	40	
ERG Group plants: production and availability	41	
Understanding wind power	44	
Robustness of the renewable energy business:		
procurement standards handbook	46	
SUPPLIERS	48	
Suppliers, actors of the sustainability plan	48	
HSE policy and requirements also extended to our suppliers	50	
Maritime transport safety checks	52	
Innovation and technological development	54	
ENVIRONMENTAL RESPONSIBILITY	56	
Our commitment to climate change	57	
Calculation of the CO <sub>2</sub> avoided: 2012	60	
Atmospheric emissions and focus on monitoring	61	
Thermoelectric power plant indicators	62	
In search of fugitive emissions	63	
A further effort to minimise the environmental impact	65	
Objective: fewer emissions into the atmosphere	70	
The revamping of the demineralised water plant is complete	70 72	
Our actions to protect the subsoil	72 74	
our actions to protect the subsult	/4	

<u>3</u>

4

SOCIAL RESPONSIBILITY	76	
SAFETY	77	
Health & Safety is everyone's responsibility	77	
Night-time safety drill	79	
High safety standards of industrial sites confirmed	80	
Safework, the new targets	81	
Confined spaces and general maintenance: careful, detailed manag	ement 82	
A day of Training for Management	84	
PEOPLE	85	
When people make the difference	85	
Workers at the core	86	
Selection of resources	88	
Human resource numbers	89	
Skills at the core of the corporate system	92	
Training: a comprehensive, detailed plan	94	
Management remuneration policy	95	
Management by Objectives	96	
From dialogue to involvement	98	
COMMUNITY	102	
A multi-sensory journey	102	
A gas pipeline to support households affected by flooding	103	
The San Giovanni project	104	
When the public and private sectors join forces	105	
Other community initiatives	106	
The Garrone Foundation and excellence in post-graduate education	110	
COMMUNICATION	113	
High quality online communication	113	
CUSTOMERS	115	
A service area that protects the environment	115	
ERG GROUP PERFORMANCE		
DATA AND INDICATORS	116	
DATA AND INDICATORS	110	
GRI APPLICATION LEVEL	123	
OIL	132	

For the ERG Group, 2012 was a very significant year, characterised by two major events: the return to profit after four years and the achievement of a leading position in the wind energy market, both in Italy – where we are the No. 1 operator – and at a European level. These findings are the result of the strategy pursued in recent years in a difficult macroeconomic environment to which ERG was able to respond quickly and effectively, taking advantage of the best opportunities for development and repositioning its portfolio towards more profitable, less volatile assets.

Indeed, we are confident that our current business mix will allow us to maintain stable economic performance in the medium to long term and adequately remunerate our shareholders; to achieve this objective, we have also chosen to progressively exit from the refining business as well as from projects in the gas sector which, for us, are no longer of strategic importance, while we will continue to maintain a significant presence in fuel distribution through the JV, TotalErg.

In December, after a period of intense work during which we redesigned the Group's positioning, we presented our three-year business plan to the financial community, which is the continuation of the work done so far, consolidating the results achieved and tracing the path to future growth.

ERG has always managed all of its

activities by applying an integrated model of sustainable development because we know that it is only through dialogue with stakeholders and the creation of alliances and synergies with the community that we can ensure widespread and shared value creation, quality of results and continuity. Today, as a result of changes in our business areas, ERG's areas of operation have been expanded and modified, however our approach with respect to Corporate Social Responsibility issues remains the same.

With regard to environmental issues, the restructuring of ERG's asset portfolio and the new strong position in the wind energy market are not only consistent with the Group's energy policy choices at national and European levels, they also allow us to increase our contribution to fighting climate change. In 2012, we exceeded the CO<sub>2</sub> avoided emissions target of 1.2 Mt (from 2006), reaching 1.4 Mt. We also take all the necessary actions to monitor the operation of thermal power plants by adopting a set of best practices at an international level to improve the quality and accuracy of the measurements used and to ensure their full and continued validity.

For ERG, sustainability means not just focus on the environment, but also on the people and the places where they work; to this end, we implement management systems that comply with international standards and we carry out numerous activities

to promote and consolidate a genuine safety culture at all levels of the company. 2012 was also characterised by intense work to define a new human capital development model, with the aim of investing in people within the company and enhancing their potential, aptitude profiles and skills. Incentive tools were then identified which are strongly focused on the contribution of people and the results to be achieved in order to be able to reward individual performance in a manner closely related to the Group's results. We believe that, in a world of constant and rapid change, the value of

the people involved in the company and our ability to attract, motivate, retain and incentivise them can make a difference in competitive terms.

For ERG, good sustainability practices and an effective governance model are essential to ensure long-term growth and value creation and the Sustainability Report allows us to monitor and communicate all of the progress and commitments made in addition to identifying increasingly challenging margins for development and improvement



Edoardo Garrone Chairman



Luca Bettonte
CEO

In how

Maylors

# HISTORY OF THE GROUP 1938-2013



ERG is floated on





ISAB Energy begins to produce and market electricity



Following the acquisitions of the Chevron and ELF networks (1984), ERG has a 5% share of the retail market



Production begins at the San Quirico Refinery in Genoa





Report in line with GRI application level C. The application level is changed to A in 2008

2007

2006

ERG acquires 51.33%

of the share capital of

and consolidate its

Capacity is 108 MW

EnerTAD, taking a decisive

step forwards to increase

position in the renewable

energies sector. Installed

interactive and published on

2010

The Consolidated

TotalErg is established, a joint venture with Total involved in the marketing of petroleum products

TOTALERG

EnerTAD becomes ERG Renew and integrates all of the activities regarding energy production from renewable sources. Installed capacity is 195 MW

2008

ERG signs an agreement with LUKOIL, establishing a partnership in the Coastal Refining business



2011

All of ERG Group's industrial sites are certified to ISO 14001 and OHSAS 18001 standards

2012

ERG Renew is delisted from the Italian Stock Exchange. As a result of acquisitions made in 2010 and 2011 and the construction of new wind farms, installed capacity

reaches 552 MW

LUKERG Renew is established, an equal-share joint venture with LUKOIL to develop wind farms in Eastern Europe

Investments in wind power continue in Italy and Eastern Europe. ERG Renew becomes the No. 1 Italian wind farm operator. Installed capacity is 1,232 MW, of which 1,062 MW is in Italy







#### FOCUS ON RENEWABLE ENERGY

# The new positioning of the Group and the ability to interpret change

Today, ERG is an industrial operator involved in the production of electricity from thermal and wind energy, strongly oriented towards the development of renewable energy sources (especially abroad) and with a strategic presence in fuel distribution through the joint venture

The Group's new positioning is the result of achievements in recent years which, although they have brought about profound changes in the "nature" of the Group and transformed its business model, have allowed us to address new challenges and seize the best development opportunities.

RENEWABLE ENERGY

In 2012, the Group consolidated its growth in renewable energy with a transaction - completed in February 2013 which allowed ERG Renew to position itself as the No. 1 operator in the wind energy market in Italy and among the top ten in Europe. The acquisition of the assets of IP Maestrale (GDF), for a total of 636 MW, has allowed us to double the installed capacity from 596 MW of effective wind power as of the end of December 2012 to the current 1,232 MW, of which 1,062 MW is in Italy, 64 MW in France, 20 MW in Bulgaria and 86 MW in Germany.

The expansion abroad - which ERG also considers to be strategic in order to diversify the regulatory risk associated with its presence in individual countries - was carried out in 2012 through investments made by LUKERG Renew, a joint venture between ERG Renew and LUKOIL, through which ERG is developing its wind business in Eastern Europe, primarily in Romania and Bulgaria. As part of the implementation of this strategy in Bulgaria, a wind farm with a capacity of 40MW (20 MW share for ERG) was acguired. In Romania, however, LUKERG Renew acquired the project to construct a wind farm with a capacity of 84 MW and full production estimated at over 200 GWh per year. Construction work commenced in the first quarter of 2013, and the farm will be commissioned in the first half of 2014.

The Group's growth in recent years has been achieved, not just through acquisitions but also through the construction of plants. The last "family" wind farm was commissioned in November 2012: situated in Amaroni, in the province of Catanzaro, it consists of 9 wind turbines for a total installed capacity of 22.5 MW. Construction work, which began in late October 2011, was completed one month ahead of schedule, despite the complexity of the project.

In addition, during 2013 important development investments will be made in Italy with the construction of a new park, with a total rated power of 34 MW, located in Palazzo San Gervasio in the province of Potenza.

IN THE FUTURE, **ERG AIMS TO CONSOLIDATE ITS LEADERSHIP POSITION IN THE WIND ENERGY MARKET** IN ITALY AND **GROW ITS POSITION** ABROAD.

The size attained and the integration of the IP Maestrale parks with those already owned by ERG will, during the course of this year, allow the Group to achieve important synergies in the management of its assets and in the sale of generated electricity. Furthermore, ERG Renew can now rely on an industrial dimension that will allow the company to continue independently along its growth path, which is aimed primarily abroad.

#### **POWER**

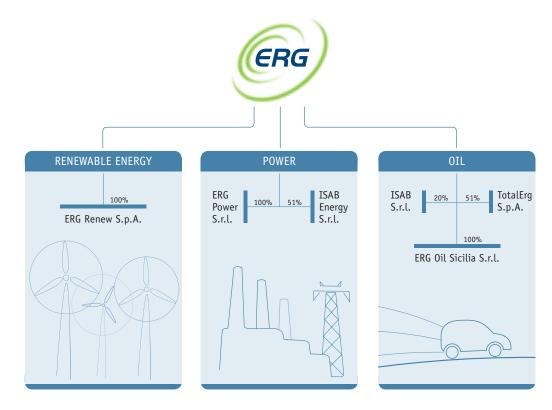
During 2012, work continued to improve the quality and efficiency of our thermal power plants: ISAB Energy (51% ERG), with an installed capacity of around 528 MW, in operation since 2000 through the twenty-year CIP6 convention, and ERG Power, in full commercial operation since April 2010 with an installed capacity of around 480 MW, which supplies utilities and electricity to the Priolo site's industrial

customers, placing the remainder of the electricity generated on the market.

In accordance with the objective of streamlining processes and improving the management and cash generation of its assets, in 2011 ERG concluded an agreement with IREN for the supply of 2 TWh per year of electricity for six years from 1 January 2012 onwards, as well as the sale of its business unit dedicated to the marketing and sale of electricity.

As a result of the agreement and contracts to supply utilities to the Priolo site, the ERG Power plant has limited exposure to changes in market conditions and is able to maintain utilisation factors that are well above average for a plant of this kind.

Furthermore, in 2011 the ERG Power plant obtained access from Terna to the Ancillary Services Market (MSD) and consequently participates in the sale of regulating services, which makes a significant contribution to margins.



TWO CUTTING **EDGE PLANTS** WITH AN **INSTALLED CAPACITY** OF 1,000 MW. GROUP PROFILE

#### 0IL

In Integrated Downstream, the Group is one of the leading players in the market by means of its joint venture with Tota-IErg, through which it owns a network of over 3,200 retail outlets in Italy. In addition, through ERG Oil Sicilia, a wholly owned subsidiary, the Group operates in the retail and wholesale sectors in Sicily. In this business, we aim to strengthen our competitive position and improve efficiency in order to increase longterm profitability and sustainability. To cope with a difficult market, we are initiating a progressive rationalisation of the network by taking into account the new market dynamics, closing retail outlets that are no longer considered profitable

and optimising others as well as giving preference to plants owned by the Group.

With regard to Refining, ERG has pursued a strategy of gradual exit from the sector – which is considered to be extremely volatile and no longer profitable – through the sale to its partner, LUKOIL, of its shares in the ISAB Refinery in Priolo, in which ERG currently holds a 20% stake with a put option exercisable from October 2013. In line with this strategy, TotalErg also decided to convert the Rome refinery and turn it into a logistics hub for the storage and handling of petroleum products. To date, TotalErg holds a 24% stake in the Trecate refinery



#### SIMPLY ENERGY

During the year, the Group's new institutional advertising page was designed. In line with the new positioning of ERG, a fresh and light tone of voice was adopted, using icons from a graphic perspective which can convey the themes behind the concept with simplicity and immediacy. More specifically, a free interpretation of the concept of energy was carried out, with the help of a team of exceptionally creative talent ... children.

ERG chose a minimal image, created by the very individuals who actually stand for and believe in the future. The new slogan, "simply energy," explicitly and effectively evokes the new perspective adopted, emphasising the pleasant and original supporting evidence: ERG is synonymous with energy, even our children know that!

11

# ECONOMIC RESPONSIBILITY | ENVIRONMENTAL RESPONSIBILITY | SOCIAL RESPONSIBILITY | DATA AND INDICATORS | GRI | OIL |

# ERG IN A NUTSHELL - SOME NUMBERS

12,457€ MLN total consolidated adjusted revenues (1)

12,132€ MLN distributed

8,219<sub>GWh</sub> electricity generation

2.6<sub>MLN</sub> equivalent households supplied

installed capacity of thermal power plants

> installed capacity of wind farms (2)

492<sub>kt</sub> CO, avoided

155 THOUSAND equivalent Rome - New York return flights

employees

6.2 DAYS training per employee

organisations operating in ISO 14001 and OHSAS 18001 certified industrial sites

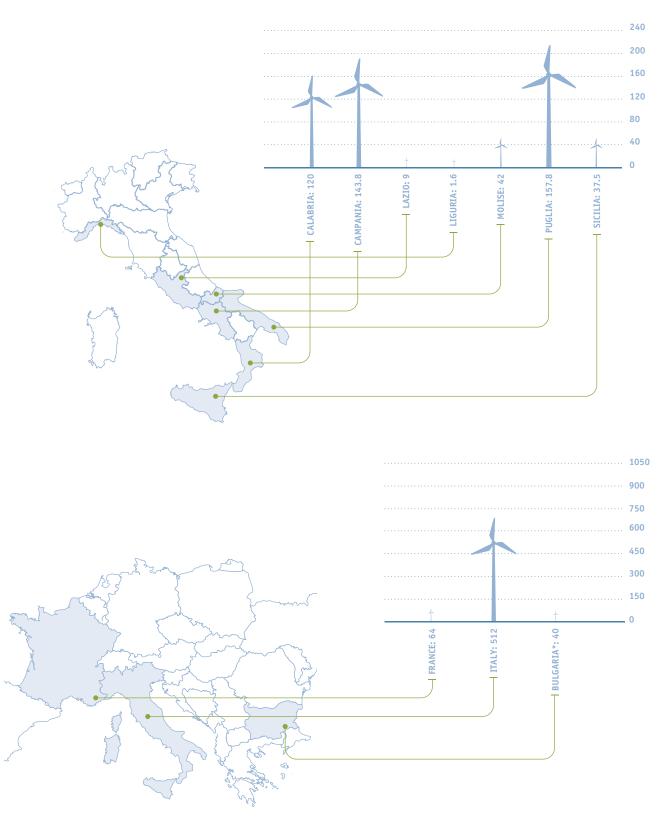
> workplace accidents on industrial sites

 $<sup>(1)\</sup> adjusted revenues take into account ERG's share of revenues generated by the joint ventures Total Erg S.p. A., ISABS.r. I. and LUKERGRenew GmbH$ 

<sup>(2)</sup> includes 50% of IP Maestrale and LUKERG Renew for Eastern Europe

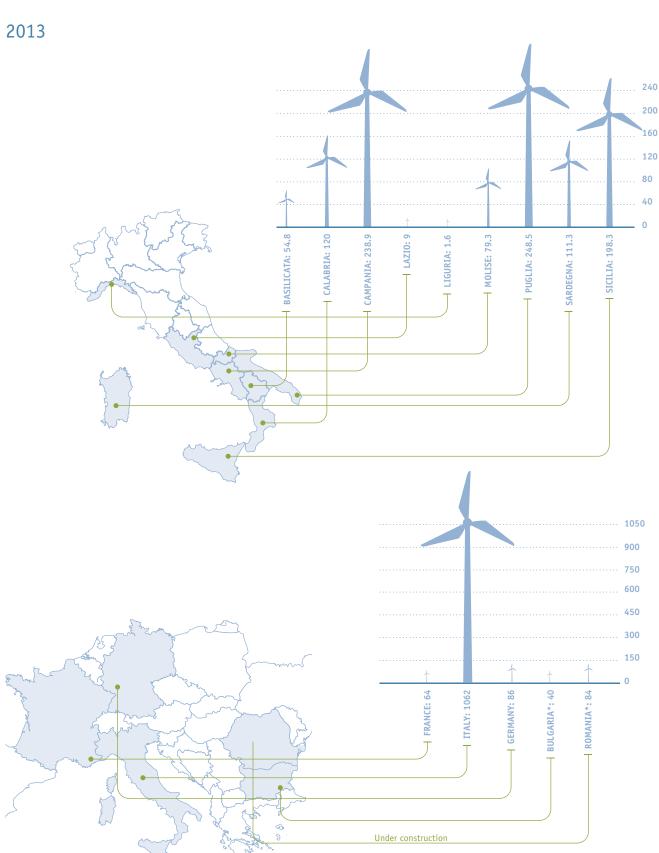
# INSTALLED CAPACITY OF WIND FARMS (MW)

2012

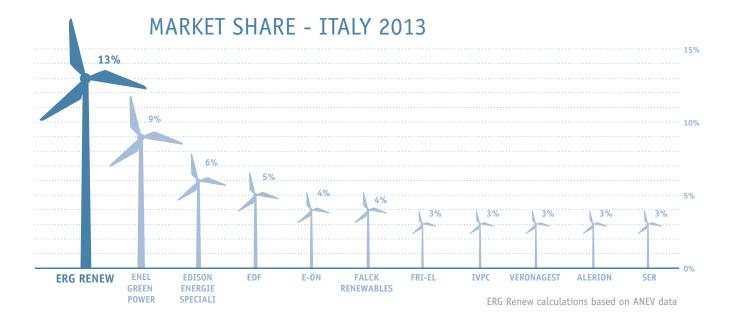


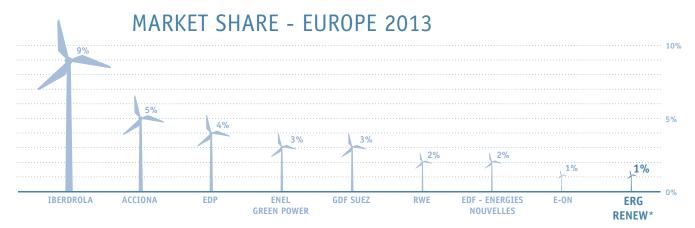
<sup>\*</sup> Wind farm owned by LUKERG Renew (50% ERG Renew)

# INSTALLED CAPACITY OF WIND FARMS (MW)



<sup>\*</sup> Wind farms owned by LUKERG Renew (50% ERG Renew))





\* ERG Renew calculations, including the wind farms owned by LUKERG Renew (50% ERG Renew)

# INSTALLED CAPACITY IN POWER PLANTS (MW)



# CORPORATE GOVERNANCE

# A solid but flexible structure which governs the Group

In order to achieve lasting sustainability, the governance system of an entity as complex as a company must adhere to two fundamental criteria: robustness and **flexibility**. The first is ensured by identifying clear rules and procedures, the balanced breakdown of powers and delegation and the implementation of process monitoring and control mechanisms.

Flexibility, on the other hand, enables an organisation to evolve, responding quickly and effectively to the need for change that is typical of modern economies.

The robustness and flexibility of our Group is ensured by Corporate Governance skills and activities, including statutory bodies and board committees that adhere to formalised procedures when performing their duties.

For further details on the role played by each corporate body, please refer to the Group's website and the Report on Corporate Governance

#### SHAREHOLDER'S MEETING

Approves the financial statements, appoints the Board of Directors, the Board of Statutory Auditors and the Independent Auditors and decides on amendments to the articles of association, including mergers, de-mergers and capital increases.

# BOARD OF DIRECTORS

Approves the financial reports, defines the strategic direction, the organisation's guidelines and the corporate governance system, decides on significant transactions and assesses management performance.

Consists of 12 members, of which 5 are independent. In 2012, the Board of Directors held 10 meetings with an average duration of about 3 hours.

#### BOARD OF STATUTORY AUDITORS

Monitors compliance with the law, the Articles of Association and the principles of proper administration, monitors the adequacy of the ICRM\* system and the independence of the Auditors.

Consists of a Chairman, 2 regular auditors and 3 substitute auditors. In 2012, the Board of Statutory Auditors held 10 meetings with an average duration of 2 hours and 30 minutes.

# INDEPENDENT AUDITORS

Carry out audits of the financial statements, perform a limited review of the interim financial report and verify the integrity of accounting operations.

#### 111

#### INTERNAL CONTROL AND RISK COMMITTEE

Supports the Board of Directors in decisions relating to the approval of periodic financial reports, the Group's Governance, the ICRM\* System, the obligations pursuant to Italian Legislative Decree 231/01 and administration, reporting and tax requirements.\*\*

Consists of a Chairman and two members chosen from among the independent directors. In 2012, the Internal Control and Risk Committee held 9 meetings with an average duration of 2 hours and 30 minutes.

- \* Internal Control and Risk Management System
- \*\* Responsible for issuing opinions with regard to the procedures for transactions with related parties



#### NOMINATIONS AND REMUNERATION **COMMITTEE**

Formulates proposals for the remuneration of Directors with delegated powers or those which perform specific functions and the definition of remuneration policies and incentive plans for the Group's management.\*\*

Consists of a Chairman and two members chosen from among the independent directors. In 2012, the Nominations and Remuneration Committee held 7 meetings with an average duration of 2 hours.

#### STRATEGIC COMMITTEE

1 1 1

Supports the CEO and the Board of Directors in the definition of strategic guidelines for the Group's business, portfolio and strategic finance and in decision making related to multi-year strategic plans, the Group's investment budgets and significant investments.

Consists of a Chairman and four members. In 2012, the Strategic Committee held 13 meetings.

#### THE STRUCTURE OF THE BOARD OF DIRECTORS AND THE COMMITTEES AS OF 31 DECEMBER 2012

POSITION	MEMBERS	LIST (M/m) <sup>(1)</sup>	EXECUTIVE/ NON EXECUTIVE	INDEPENDENT PURSUANT TO CODE AND CONSOLIDATED FINANCE ACT	% PARTICI- PATION (2)	NO. OF OTHER POSI- TIONS (3)	DATE OF FIRST APPOINTMENT (4)	RISK CONT COMM	ROL	NOMINA AND R NERA COMM	REMU- TION
				(T.U.F.)							
Chairman	Edoardo Garrone	М	Executive		100%	2	16/10/1997				
Vice Chairman	Alessandro Garrone	М	Executive		100%	2	16/10/1997				
Vice Chairman	Giovanni Mondini	М	Non Executive		100%	1	16/10/1997				
Chief Executive Officer	Luca Bettonte	М	Executive		100%	-	15/12/2009				
Director	Massimo Belcredi	М		Yes	100%	1	29/04/2003	Yes	100%	Yes	100%
Director	Pasquale Cardarelli	М		Yes	80%	-	28/04/2006			Yes	100%
Director	Alessandro Careri	М	Non Executive		100%	-	21/06/2011				
Director	Marco Costaguta	М	Non Executive		86%	1	20/04/2012				
Director	Antonio Guastoni	М		Yes	100%	4	29/04/2003	Yes	100%		
Director	P. Francesco Lanzoni	М		Yes	100%	-	29/04/2003	Yes	89%	Yes	100%
Director	Graziella Merello	М	Executive		100%	-	23/04/2009				
Director	Umberto Quadrino	М		Yes	100%	3	20/04/2012				

#### DIRECTORS WHO CEASED TO HOLD OFFICE DURING THE PERIOD UNDER REVIEW

Director	Giuseppe Gatti	М	Executive	67%	-	-		
Director	Aldo Garozzo	М	Non Executive	100%	-	-		

#### Note

- (1) This column indicates M/m according to whether the member was elected from the majority list (M) or the minority list (m).
- (2) This column indicates the percentage attendance by the Directors at the Board of Directors and Committee meetings (no. of times attended/ no. of meetings held during the period in which the member held office).
- (3) This column indicates the number of Director or Auditor positions held by the relative individual in companies other than the ERG Group companies listed on
- regulated markets including foreign markets in financial, banking and insurance companies or those of significant size.

  (4) This column indicates the date of the first appointment of the Directors as of October 16, 1997, the date the company was listed on the stock exchange.
- (5) This column indicates if the Director is a member of the Committee.

#### SIGNIFICANT INVESTMENTS AT 31 DECEMBER 2012

DECLARANT	DIRECT SHAREHOLDER	% SHARE OF ORDINARY CAPITAL	% SHARE OF VOTING CAPITAL
San Quirico S.p.A.	San Quirico S.p.A.	55,942	55,942
San Quirico S.p.A.	Polcevera S.A.	6,905	6,905
ERG S.p.A.	ERG S.p.A.	5,000	5,000
Tradewinds Global Investors LLC	Tradewinds Global Investors LLC	4,959	4,959

# THE INTERNAL CONTROL AND RISK MANAGEMENT SYSTEM OF THE ERG GROUP

#### **GENERAL PRINCIPLES**

The Internal Control and Risk Management System adopted by the ERG Group (hereinafter also the "ICRM System") adheres to the principles contained in the new edition of the Code of Conduct for listed companies promoted by Borsa Italiana S.p.A. published in December 2011 (hereinafter the "Code of Conduct") and, more generally, to existing best practices at national and international levels.

# PERSONS AND BODIES INVOLVED IN THE INTERNAL CONTROL AND RISK MANAGEMENT SYSTEM

The main persons and bodies involved in the ERG Group's internal control and risk management system, according to their respective skills and in compliance with current laws and regulations, as well as with the recommendations of the Corporate Governance Code, are:

- >the Board of Directors, which orients and assesses the adequacy of the ICRM System;
- →the Chief Executive Officer, who is responsible for identifying the main corporate risks;
- →the Director in charge of the Internal Control and Risk Management System, responsible for verifying the correct functionality and the overall adequacy of the ICRM System;
- → the Internal Control and Risk Committee, tasked with supporting, through an appropriate preliminary analysis activity, the assessments and decisions of the Board of Directors pertaining to the

ICRM System, as well as those pertaining to the approval of periodic financial reports;

>the Head of Internal Audit, Risk and Compliance, in charge of verifying the viability and suitability of the ICRM System.

# OTHER RELEVANT PLAYERS WITH SPECIFIC INTERNAL CONTROL AND RISK MANAGEMENT DUTIES

In addition to the parties listed above, below are some additional key players with regard to the Internal Control and Risk Management System:

- → Chairman;
- → Executive Vice Chairman;
- → Manager Responsible for Preparing the Company's Financial Reports;
- → Board of Statutory Auditors;
- → Supervisory Body.

# **IMPLEMENTATION OF THE** INTERNAL CONTROL AND RISK **MANAGEMENT SYSTEM**

Further details are presented in the document "Guidelines for the Internal Control and Risk Management System" approved by the Board of Directors on 26 February 2013, the contents of which are described in the section "The Internal Control and Risk Management System of the ERG Group" in the Report on Operations of the 2012 Annual Report. The document is available at www.erg.it

#### CODE OF ETHICS, MODEL 231, SUPERVISORY BODY AND 231 TRAINING

Since its foundation, the ERG Group has developed a way of doing business that is inspired by ethical values dictated by its founder, Edoardo Garrone.

With its third edition published in 2011, the Code of Ethics embodies the Group's founding principles: the document has been adopted by all Group companies by a resolution of the respective Boards of Directors and is made available to all recipients so that they can make it their own and apply it to all activities and in all countries in which they operate. The principles set out, together with the law, form the basis of the Organisational and Management Models established pursuant to Italian Legislative Decree No. 231/2001 and adopted by each company.

In particular, the Supervisory Body of each company is responsible for overseeing:

- compliance with the Code of Ethics;
- the effectiveness and adequacy of the model and its suitability to prevent the commission of crimes under the law;
- compliance by all parties concerned with the Organisation and Management Model adopted.

The Supervisory Body is responsible for proposing the adoption of new measures to make the Model more current and effective, adjusting it to legislative and organizational changes, as well as providing information and training on the Model to employees; each "new hire" must take an on-line course (regularly updated) with a

final assessment of the level of learning obtained.

In 2012, we organized classroom training with 365 participants from within the Group. specific sessions on environmental crimes were organized for staff working in sensitive areas which are exposed to these risks



# ROBUSTNESS AND RELIABILITY OF INDUSTRIAL ASSETS: ERG BEST PRACTICE

# Key players at the Conference on Risk Assessment and Management in Civil and Industrial Settlements

The latest edition of the Conference on "Risk Assessment and Management in Civil and Industrial Settlements" (VGR), hosted by the University of Pisa, was inaugurated by the Deputy Executive Chairman of ERG. Alessandro Garrone.

During his speech on business development and risk management, Alessandro Garrone drew attention to ERG Group's experience, where the identification and analysis of key risks with regard to corporate activities, Business Units and Group subsidiaries are carried out as part of an integrated risk management process.

**APPROPRIATE MANAGEMENT SUSTAINABLE** 

RISK

AND

TIME.

**ASSESSMENT** 

**TO ENSURE** 

**VALUE OVER** 

Within the ERG Group, Alessandro Garrone explained, risk management is not just about complying with safety procedures, it also involves identifying integrated assessment and management systems for all of the risks to which the Company is exposed, with the objective of generating sustainable value over time.

Defining the tools and the management methods of assessment systems (of operational, market and compliance risks as well as more sophisticated assessments, such as EBTDA risk), added the ERG Deputy Chairman, presents a real opportunity to make the various aspects of production activities as safe as possible.

The objective is actually to ensure sustainable value over time in the context of the current complex economic environment, which is marked by a lengthy global crisis.

It is precisely in this perspective that the best techniques for managing operational risks are adopted by the Group companies and plants, and together they constitute the assets and specific know-how of the various company departments



# ETHICS AND CREDIBILITY IN DEALINGS WITH INSTITUTIONAL STAKEHOLDERS

# Constant interaction in the interest of transparency and completeness

**INTEGRITY AND REPUTATION** AS FOUNDING **VALUES AND** COMMON HERITAGE.

Monitoring the guidelines issued by the various policies and institutions is an important activity in order to better orient the Group's strategic decisions with regard to our business sectors.

Carrying out this task requires constant dialogue with key entities and institutions at various levels, which is achieved through active collaboration and by providing stakeholders with our industry know-how and expertise.

At an institutional level, ERG's responsibility to protect its interests relates not only to its relationship with the various Authorities and public stakeholders, but also to the activities of the various trade associations at local, national and European levels (Confindustria, Assoelettrica, Concawe, Unione Petrolifera, etc.). As regards the associations, the ERG Group operates by making representations to the governing bodies of specific committees and technical working groups with a view to exploring areas of interest, representing its own position in a transparent manner while protecting the Group's interests.

Such advocacy is of course carried out in accordance with the "founding" principles and values of transparency, ethics, compliance and credibility laid down in the Code of Ethics and in respect of our Organization Model (pursuant to Italian Legislative Decree No. 231/01). For this reason, any behaviour adopted by

Corporate Governance bodies (or, in general, by all employees and contractors) during the execution of tasks or assignments which is contrary to these principles and values could lead to sanctions being imposed.

A consequence of these principles, in particular that of independence, is the fact that the Group does not make direct or indirect contributions, in any form, to political parties, movements, committees or organizations or trade unions, either to their representatives or candidates (with the exception of cases required by specific regulations).

#### **EUROPEAN UNION**

ERG has established a representative office in Brussels: a privileged vantage point from which it can receive information on legislative changes, in particular in relation to the European energy market.

The requirement to appropriately assess non-domestic contexts is of great importance to the Group's Executive Management and is considered essential for the international growth of the energy business, both in the traditional and renewable energy segments. Through this representation in Brussels, we have acquired the most suitable tools to provide an overall picture at European and international levels.

The scope of action includes the institutions of the European Union: the Council,

AN **APPROPRIATE** ASSESSMENT **OF EUROPEAN SCENARIOS TO IMPROVE GROWTH IN** THE ENERGY BUSINESS.

**OUR AIM IS TO PURSUE RELATIONSHIP MANAGEMENT INSPIRED BY THE TRANSPARENCY** AND TRACEABILITY OF **INTERESTS AND** BEHAVIOURS.

made up of Government representatives of the Member States; the Parliament, the only institution directly elected by the electorate; and the Commission, which is responsible for the EU legislative initiatives and acts as custodian of the Treaties. Relationships and dialogue with these stakeholders are facilitated by the transparency of relations: clearly identified contacts for each subject and the possibility of direct contact facilitate institutional relations that are inspired by clarity and traceability of interests and behaviour.

#### THE INTERNATIONAL TABLE

The presence of numerous permanent representations in the European Union, each of which has its own policymakers and subject-matter experts for each field of action, means that Brussels is an ideal starting point from which to define and manage institutional relations with the European countries in which the Group has invested or intends to invest in the future. ERG has therefore decided to engage on this front and be ready to develop and manage these institutional relationships, which are useful in order to provide the most accurate presentation of the regulatory framework and the main themes concerning the market segments of interest, including renewable energy incentive schemes, support for cogeneration and environmental protection policies <



The European Parliament building in Brussels

#### CSR MANAGEMENT

# Ensuring sustainable business activity through an integrated management system

The Group's ethical principles - which since 2003 have been summarised in the Code of Ethics - are applied to everyday business operations and are aimed at improving the environment and quality of life of people who work there every day. Over time, these principles have been transformed into the company's Corporate Social Responsibility (CSR) philosophy, which today is managed by a dedicated structure and is set in a specific governance framework.

Our CSR structure is composed of four key bodies, each with specific duties.

The Sustainability Committee is placed at the top of the structure and comprises ERG Top management and all Line Managers and CEOs of the operating companies.

The duties entrusted to it are "strategic" and are reflected in four key actions:

- → promote policies and guidelines concerning the protection of workers' health, prevention and protection from accidents and injuries and respect for the environment;
- → stimulate the definition of performance improvement objectives;
- → monitor the performance of environmental, health and safety policies (on the basis of specific reports and KPIs);
- →identify and propose the adoption of communication tools and initiatives that help to maintain a high awareness of sustainability issues, including the

preparation and publication of the Sustainability Report.

The second body is represented by the **CSR initiative Evaluation Committees:** these are two working groups that analyse all initiatives from the community and then select the most deserving, based on the values they express and the positive impact they have on the local area.

The Sustainability Department is responsible for implementing the guidelines and periodically monitoring their performance. The cross-functional monitoring activities consist of preparing the annual Sustainability Report, which is reviewed by the Sustainability Committee and subsequently approved by the **Board of Directors.** 

Finally, the Supervisory Body (pursuant to Italian Legislative Decree No. 231/2001) is entrusted with the task of supervising compliance with the principles set out

#### CSR IN THE GROUP ORGANISATION CHART

"The Chairman of ERG S.p.A is responsible for Institutional and International Relations concerning [...] Corporate Social Responsibility": the direct reporting line to the Chairman ensures that CSR principles permeate throughout the Group's organisation and activities

THE CODE **OF ETHICS SETS OUT THE FOUNDING PRINCIPLES** WHICH ARE **INGRAINED** IN OUR WAY OF DOING **BUSINESS.** 

in the Code of Ethics, in particular, the respect for human rights and equal opportunities, applicable to all ERG employees and associates.

In addition to the duties already analysed in the section on Corporate Governance, the Supervisory Body is also entrusted with this task for three main reasons:

- →it includes an independent member of the Board of Directors, as well as the Director of Internal Audit. Risk Office and Compliance and the Director of Organisation and Systems;
- →it acts as a direct interface for third parties and can be contacted directly via a specific, confidential email address;
- →it is the reference point for all equal opportunities and human rights issues (set out in the Code of Ethics), which are monitored as part of the operating protocols established under Decree 231/2001.

#### HEALTH AND SAFETY IN THE WORKPLACE IN THE ERG CODE OF ETHICS

The new edition of the Code of Ethics approved by the ERG Board of Directors in November 2011 draws explicit attention to the principles relating to the protection of the environment and workers, with particular focus on Health and Safety. By way of further information on the topics addressed, the "Permanent Consultative Commission for Health and Safety at Work" of the Italian Ministry of Labour and Social Policy has identified the document prepared by the ERG Group as one of the best practices of the sector

# POLICY AND CERTIFICATIONS FOR THE PROTECTION OF HEALTH. SAFETY AND THE ENVIRONMENT

The safety of personnel and the protection of the environment are constantly at the centre of our management style, therefore the certification of ERG's management systems according to ISO 14001 and OHSAS 18001 standards has always been the Group's target.

In 2011, a specific reminder on the appropriateness of implementing effective, certified management models was also added to the new version of the "Policy on Health, Safety and Environment."

Our commitment in this regard has always been present in our Sustainability objectives: in the period 2007-2012, the important objective of obtaining ISO 14001 and OHSAS 18001 certification for all Group industrial plants was achieved.

For the next three-year period 2013-2015, the Group will work towards extending this certification to ERG S.p.A. and integrating existing certifications into renewable energy companies.

The reasons for this choice are based in our nature and are intrinsic to our way of doing business:

- → the Group's mission and vision are expressed in the contributions it makes to building a future that relies on sustainable energy; therefore, as a natural consequence, ERG takes all the necessary management measures that contribute towards meeting this objective;
- → for a company that has a long-term approach, obtaining certification means

**CSR GOVERNANCE** IS MANAGED BY FOUR BODIES.

GROUP PROFILE

implementing a virtuous mechanism which, as well as providing added value to a production business that is "genetically" in touch with environmental problems, also implements and innovates corporate management strategies, optimises resources and reduces waste;

>the implementation of certified management systems provides a guarantee

to the community and the competent authorities that consolidated and periodically checked procedures, as well as suitable analyses and controls (which also conform to regulatory requirements), are implemented to guarantee the protection of the health of workers and the environment

# THE IMPORTANCE OF CERTIFICATIONS

# A long journey of commitment and coordination

100% OF OUR **PLANTS ARE ISO 14001 AND OHSAS 18001** CERTIFIED.

The significant focus on Health, Safety and the Environment and the continuous search for the best management methods has led us, year after year, towards a more thorough management of these issues.

By following best practices in organisational management, we were able to obtain a number of certifications, thus completing the framework punctuated by milestones, thanks to the significant effort and coordination by the parties involved. Obtaining ISO 14001 and OHSAS 18001 certification for industrial companies has always been a primary goal, so much so that one of the Group's Sustainability commitments consisted precisely of obtaining these certifications (for companies that only owned assets, their objective was to obtain the environmental certification only).

At the end of 2011, 80% of our plants were already certified. In the last year, we have also added two other certifications:

→ ERG Renew has integrated its existing

- ISO 9001 and ISO 18001 certifications with OHSAS 14001, creating an integrated management system (IMS);
- → ERG Power has obtained ISO 14001 certification.

#### **ERG RENEW**

ERG Renew is the Group company that focuses on renewable energy: a holding company in which the resources assigned



carry out the functional activities required to design, construct and operate wind farms. Controlled by the holding company, all of the company's assets consist of different wind farms.

At the end of 2011, ERG Renew obtained ISO 9001 and ISO 14001 certifications and three of our wind farms were separately certified to ISO 9001 and ISO 14001 standards.

In 2012, ERG Renew obtained OHSAS 18001 certification related to Occupational Health and Safety, integrating all of the principles of ISO 9001, ISO 14001 and OHSAS 18001 into its management system.

The integration of the Management System allowed ERG Renew to bring together the common elements and requirements of the three certifications, completing the process of optimising the organisation which had begun with the Mistral project in 2011, thus reducing the documentation required to manage the three systems. Another important aspect in this respect is the possibility of carrying out joint audit planning and a single management review to identify any differences between the objectives of each system.

Following the roll-out of the Integrated Management System, a special training programme was launched, which lasted until the end of July 2012 and involved the entire staff of ERG Renew.

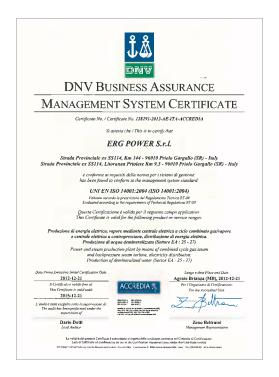
The focus of the training was health and safety in the workplace, supplemented by the procedures set out in the Integrated Management System.

#### **ERG POWER**

In 2012, ERG Power, which owns the assets of the CCGT plant (combined cycle gas turbine, commissioned in mid-2010), obtained ISO 14001 certification.

The achievement of this objective was a source of great satisfaction for the entire management team: the excellent and thorough management by ISAB Energy Services (whose staff manage the plant) significantly reduced the time to certification, resulting in its award on the first visit.

In this regard, we are also pleased to communicate the appreciation expressed by the Entity responsible for certification, which noted the "good level of awareness of the staff interviewed in relation to the environmental aspects of the activities carried out, as well as the themes of order and cleanliness" and the "design and delivery of training, especially to new employees"



**CERTIFICATION** IS NOT THE END, BUT THE STARTING POINT OF FURTHER **IMPROVEMENT** TARGETS.

26

# **GROUP CERTIFICATIONS**



#### SUSTAINABILITY REPORT

# A document that communicates our objectives and performance achieved to all stakeholders

Now in its sixth year, the purpose of the Sustainability Report remains unchanged: to describe with transparency the significant evolution of the ERG Group and communicate the objectives and performance achieved in economic, environmental and social terms.

Every year we try to improve the completeness of the information provided, giving a more detailed picture of the activities of the Group's companies.

AN IMPORTANT **PERFORMANCE** AND OBJECTIVES **COMMUNICATION TOOL INVOLVING ALL GROUP COMPANIES AND DEPARTMENTS.** 

Together, the set of documents form a collection of information: each edition builds on that of the previous year. In terms of content, we have set ourselves the goal of enhancing the specific topics of the "CSR world," reporting only material information relating to the Group's organisation and governance. All of the details are available in previous reports (available on the Group website) and in specific reports included in or attached to the financial statements.

The process of data and information gathering involves all Group companies and departments, under the supervision of the Sustainability Committee. Published on an annual basis, the Report is approved by the ERG Board of Directors.

#### METHODOLOGICAL REFERENCES

The 2012 version of the Sustainability Report was drafted in accordance with the "Sustainability Reporting Guidelines GRI G 3.1" published in 2011 by the Global Reporting Initiative, which is an internationally recognised model for preparing sustainability reports.

As in the previous version, the information gathered in 2012 was integrated with that required by the Electric Utilities Sector Supplement (EUSS) - the supplement to the GRI Guidelines approved in 2009 and specifically applicable to companies in the electric utilities sector. New in this edition is the reorganisation of the Report's contents compared with previous versions to align them with the GRI 4 Guidelines in advance of their adoption, which will be effective from 2014.

The information and data contained in this document refer to the Group's subsidiaries at 31 December 2012 and reflect the Group's consolidation scope in accordance with IAS-IFRS accounting standards: the business and financial values are taken from the ERG Group's audited Consolidated Financial Statements.

Unless otherwise specified in the tables, the data relating to personnel, the organisation of work and training also refer to the consolidation scope.

The main atmospheric emissions are determined through continuous measurements at the emission points and, where necessary, by means of discontinuous measurements supplemented by estimates that take into account the combustion systems and the quality of the fuels used. In particular, CO<sub>2</sub> emissions are certified by an independent third party, as required by law.

#### **ENSURING QUALITY** OF INFORMATION

To ensure the necessary quality of the information contained in the Report, we adhere to seven prerequisites:

- → materiality: the information presented should really be of interest to stakeholders;
- →comprehensiveness: all relevant issues and indicators are covered;
- →balance: the issues are presented transparently and objectively, irrespective of their quality;
- **→comparability**: all data is presented in a 3-year context to make it easy to compare and analyse the evolution of the indicators over time;
- →accuracy: the presented data is calculated very carefully and accurately. Any errors relating to previous years are corrected and duly highlighted;
- →timeliness: the Report is issued during the year, immediately following the publication of the financial statements;
- → clarity: a straightforward tone is used so it can easily be understood by all stakeholders.

#### **OBJECTIVES**

In order to assess our performance in terms of sustainability, in 2007 the Sustainability Committee approved a set of long-term objectives with a due date of 2012. New objectives for the period 2013-2015 will be approved during the year, in line with the new business plan presented to the financial community in December 2012.

#### **EXTERNAL REVIEW** AND DISTRIBUTION

In 2012, we submitted our Sustainability Report to GRI for review and received confirmation of the completeness of the information contained therein, in accordance with the requirements of Application Level A under the GRI G3.1 Guidelines + EUSS.

This year, we also wanted to verify the consistency of CSR management within ERG S.p.A. with the principles contained in the ISO 26000 standard. The GRI table at the end of the document shows the comparison between the two different sets of principles.

Given the special value attributed by the Group to the contents of this document, the Report is distributed as widely as possible to the general public by publishing it on the ERG website - where it is available in downloadable pdf and interactive versions - and also within the Group, through the intranet portal. In addition, training sessions on CSR are organised for new hires.

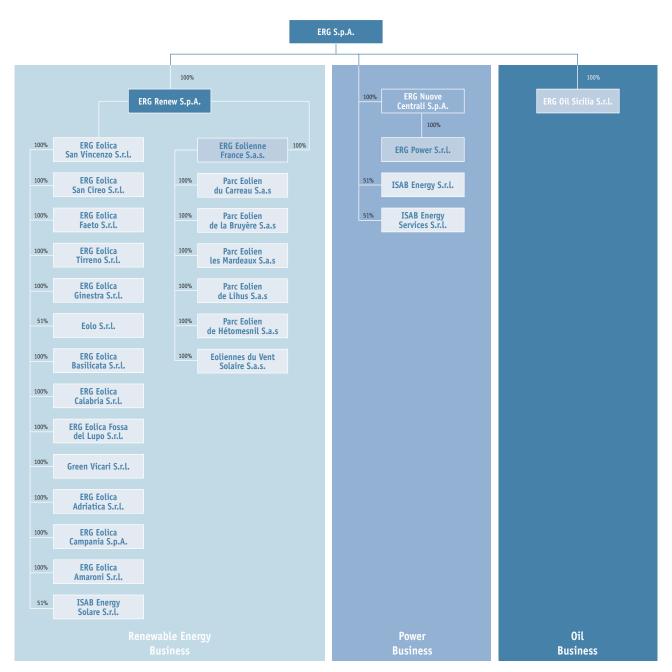
This year, for the first time, the distribution of a printed version of the entire document will be replaced by the distribution of an Executive Summary: a page that explains the Group's principles and main objectives, and which also acts as a holder for a usb key containing the document itself.

This distribution policy has allowed us

A SUSTAINABLE **DISTRIBUTION** WITHIN AND **OUTSIDE OUR** GROUP.

Finally, to maximise the capillary diffusion of the document, we can send a copy to anyone who requests it by writing to sustainability@erg.it ...

# SCOPE OF REPORTING OF THE 2012 SUSTAINABILITY REPORT



The joint ventures TotalErg S.p.A., ISAB S.r.l. and LUKERG Renew GmbH are excluded from scope from a reporting perspective

#### STAKEHOLDERS: ANALYSIS AND LISTENING

We identify our stakeholders and their expectations in order to act in the interests of everyone according to the principles of fairness, integrity and transparency

The Code of Ethics, published in November 2011, states that:

"In the spirit of corporate social responsibility and its consolidated value, ERG focuses on the social and economic development of the local communities in which it operates, listening to requests, recording expectations and needs, identifying public and private stakeholders and thus investing resources in enhancing and developing the region. ERG is committed to contributing to the growth of local organisations and supports the promotion of activities and projects in sports, artistic, cultural, medical and scientific fields based on dialogue with the relevant communities in a spirit of proactive collaboration."

Other points emphasise the need to "maintain the correctness of internal and external relationships" and the "transparency and full disclosure to Shareholders, the market and the Regulatory Authorities..."

The attention paid to our stakeholders is part of the values that inspire our way of doing business: listening is crucial to understanding the interests, expectations and needs of stakeholders and, consequently, to defining and updating our CSR objectives and commitments.

In 2006, we initiated a first analysis of the perception that local communities had of ERG. The survey, which was repeated in 2009, highlighted an increase in appreciation by stakeholders for the activities we have carried out in the areas of local community, social development, protection of the environment and health of the community and the promotion of culture and sport for young people.

The continuation of an era of significant changes in the Group's industrial activities required the stakeholder map to be updated in 2010, a task that involved resources who are normally involved in managing external relationships. The following year, the analysis focused on identifying their **expectations** (see the 2011 Sustainability Report) in order to organise the themes included in the report in a more appropriate way.

2012 also marked a major change for ERG: it made the definitive transition from a world where oil is the main commodity to one focused on wind energy. Thus, together with the presentation of the new

#### WHO ARE THE STAKEHOLDERS?

According to the classic definition, stakeholders are: "all clearly identifiable individuals and groups that may influence or be influenced by the Group in terms of products, policies and processes"

**WE FOCUS ON SOCIAL DEVELOPMENT, PROTECTION OF THE ENVIRONMENT** AND HEALTH **AND THE PROMOTION OF CULTURE** AND SPORTS.

business plan, the new positioning of the Group was also defined.

Consequently, the new strategic communication plan was prepared, new key stakeholders were identified (specifically limited to the communication objectives) and the best tools to communicate with them were identified.

A comparison of the results of this analysis with the previous CSR-focused analyses identified new stakeholders: partners, those who work alongside us to implement industrial projects, who share our principles, objectives and ways of working.

The results of the detailed analysis is shown in the following diagrams



# STAKEHOLDERS: EXPECTATIONS AND COMMUNICATION CHANNELS

STAKEHOLDER	STAKEHOLDER EXPECTATIONS	COMMUNICATION CHANNELS
Institutions European Union, Governments, Ministries, Regulatory bodies, Public Administration, Trade associations.	Collaboration, technical support and information sharing. Participation in the territorial planning of activities. Respect for the current laws in all countries in which the Group operates.	-
Partners	Creation of value. Sharing values in business management and strategy development.	Mini ad hoc relationship-building events.
Shareholders	Creation of value for shareholders. Corporate Governance and Risk Management. Representation of minorities. Transparency and timeliness with regard to business and financial information.	Webcast. Press releases. Roadshow. Events associated with the publication of the business plan.
Financial community	Creation of value for shareholders. Corporate Governance and Risk Management. Representation of minorities. Transparency and timeliness with regard to business and financial information.	Webcast. Press releases. Roadshow. Events associated with the publication of the business plan.
Future generations	Environmental protection and prevention. Corporate strategy aimed at reducing the consumption of natural resources.	-
Local communities Cultural, religious and research associations, health service, schools and universities, NGOs, Committees of citizens, residents close to production plants.	Listening to their requirements. Contribution to and support for local initiatives and local communities. Access to information. Protection of heritage and the environment. Health and safety.	Relationship-building activities with new local communities in line with new business activities.  CSR initiatives in the community with regard to "environment and health", "promotion of culture", "young people and sports."  Events with the local press.
<b>People and Trade Unions</b> Employees, contractors, trade unions.	Equal opportunities. Workplace safety. Professional development for all employee categories. Participation in company life and all related initiatives. Work-life balance. Stability.	Internal communication tools and activities Year-end events. Team building.
Suppliers	Compliance with all competition and antitrust laws in the countries in which they operate.  Safety of on-site activities.	Internet platform.
Customers	Maximising value for the consumer. Quality and continuity in the supply of electricity and steam (site customers). Product quality (retail customers).	-
Media	Completeness, transparency and timeliness of information.	Business press relationship-building event to communicate the financial results and the results of the business plan. Regular press releases and extraordinary operations.

# SUSTAINABILITY COMMITMENTS

# **ENERGY PACKAGE**

**INNOVATION** 

#### **SUPPLIERS**

# **HSF MANAGEMENT SYSTEMS**

#### PROTECTING THE **ENVIRONMENT**

AREA OF COMMITMENT	STATUS
Increase the production of electricity from renewable sources, especially wind power	Annual production has increased 18-fold since 2006
<ul> <li>Support the Group strategy through appropriate research and innovation initiatives</li> </ul>	Research and development projects in thermovoltaic and organic photovoltaic energy initiated
Consolidate a system for qualifying and evaluating suppliers on the basis of objective principles, focusing on issues relating to Health, Safety and the Environment	<ul> <li>1,650 qualified suppliers on the web platform</li> <li>Average supplier qualification time has almost halved in two years</li> <li>1,200 security checks carried out on contractor activities</li> </ul>

# Complete ISO 14001 and OHSAS 18001 certifications for all industrial sites by 2012

- 100% of organisations operating in industrial sites are ISO 14001 and OHSAS 18001certified
- 100% of thermoelectric assets are ISO 14001 certified
- Improve atmospheric emissions of thermoelectric installations by 2013 by applying the "best techniques available"
- Ongoing reduction of all macro-pollutant emissions Analysis and reduction of fugitive emissions
- Avoid 1.2 Mt of CO<sub>2</sub> emissions by the end of 2012 (baseline 2006)
- At the end of 2012, 1.4 Mt of CO₂ emissions avoided thanks to renewable energies

#### **SAFETY**

#### **PEOPLE**

#### **COMMUNITY**

#### COMMUNICATION

- Consolidate the safety culture, both within the company and for third party companies, pursuing the goal of "zero injuries"
- "Zero injuries" at industrial sites
- Pursue managerial excellence through the corporate competencies system and the guidelines of the ERG managerial development model
- Over 30,000 training hours in 2012 with an average of 6.2 days per employee
- Improve labour relations through engagement processes and communication tools
- Continued activities of the Team project People project launched
- Contribute to the development of local communities through social responsibility initiatives from an economic, social and environmental perspective
- Approximately EUR 3 million spent in 2012 on activities in local communities
- Make contact with and inform our stakeholders in an increasingly complete, transparent and timely manner
- Services provided have been consolidated, achieving 15th place in Italy in the on-line sustainability assessment and 17th place in the 2012 Webranking assessment

# 1 ECONOMIC RESPONSIBILITY

12,132

**MILLIONS OF EURO** OF ECONOMIC VALUE **DISTRIBUTED** 

**MILLIONS OF EURO OF COMPENSATION FOR THE COMMUNITY** 

596<sub>MW</sub>

**OF INSTALLED CAPACITY** FROM RENEWABLE SOURCES

8,219<sub>GWh</sub>

OF ELECTRICITY GENERATED

96.7%

**AVAILABILITY** OF ITALIAN WIND ENERGY

## ECONOMIC VALUE GENERATED AND DISTRIBUTED

## ADJUSTED REPLACEMENT COST (millions of Euro)

<b>\</b>	,		
	2012	2011	2010
Production value	12,375	11,257	9,121
Economic value distributed	(12,132)	(11,095)	(8,966)
Production costs	(11,694)	(10,727)	(8,568)
Compensation of personnel	(162)	(180)	(181)
Compensation of public administration	(145)	(45)	(70)
Compensation of debt capital (1)	(66)	(74)	(64)
Compensation of risk capital (2)	(63)	(67)	(81)
Compensation of the community	(3)	(2)	(2)
Economic value withheld by Group	243	162	155)
Amortisation and depreciation	242	247	220
Compensation of the company	1	(85)	(65)

<sup>(1)</sup> Interest paid and other financial expenses for indebtedness.

<sup>(2)</sup> Overall dividends distributed by the Group.

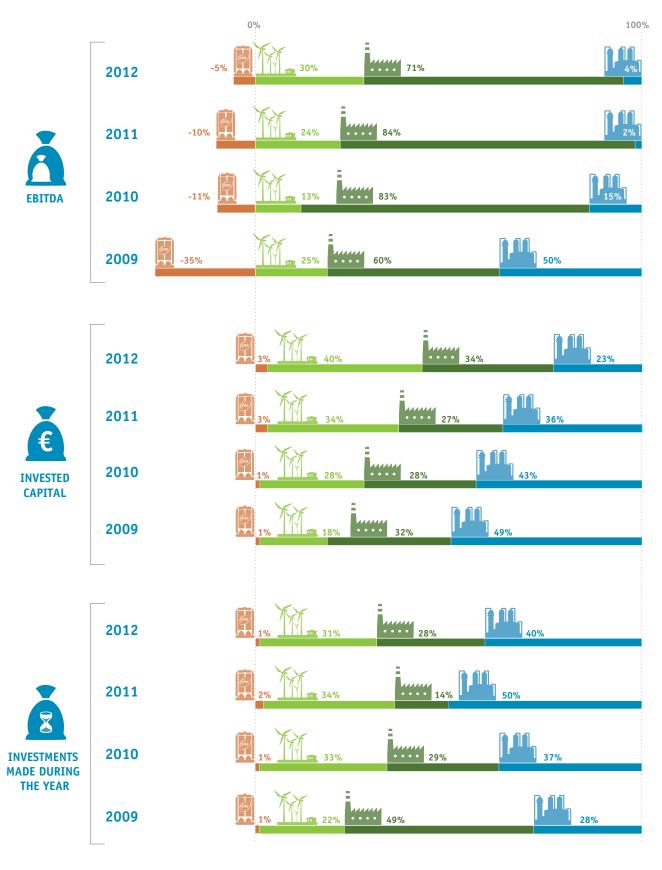
	2012	2011	2010
Net value added	12,375	11,257	9,121
Production costs	(11,694)	(10,728)	(8,568)
Compensation of personnel	(162)	(180)	(181)
Compensation of public administration	(145)	(45)	(70)
Compensation of debt capital	(66)	(74)	(64)
Compensation for the community	(3)	(2)	(2)
Amortisation and depreciation	(242)	(247)	(220)
Result before third party interests	64	(18)	16
Result of third party shareholders	(52)	(31)	(36)
Net Group result	122	(49)	(20)

#### ERG AND ECONOMIC RESPONSIBILITY

Our strategy is to create a diversified energy Group, whose main objective is to create lasting, sustainable value by increasing profitability and continuously reducing its dependence on volatile external factors, and through the balanced management of its portfolio. ERG's growth strategy is strongly focused on renewable energy sources, with particular focus on the wind energy

36

## **ERG: KEY ECONOMIC INDICATORS**









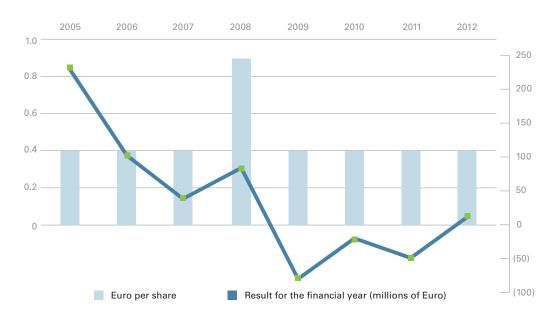


## ERG'S STOCK MARKET PERFORMANCE

ERG VS. STOXX ENERGY INDEX, FTSE ALL SHARE AND FTSE MID CAP - % VARIATION FROM 1/1/2012 TO 5/3/2013



#### SHAREHOLDER COMPENSATION TRENDS IN COMPARISON WITH ANNUAL FINANCIAL RESULTS



#### COMPENSATION OF SHAREHOLDERS

Our Group has always followed a very prudent asset management policy in order to guarantee the long-term continuity of the company. An analysis of the financial results over the years and related distributed dividends provides further evidence of the success of this prudential approach. Although the financial results have not always been positive in the recent years, ERG has been able to satisfactorily compensate the capital invested by its shareholders with a constant dividend over time (in 2008, an extraordinary dividend was paid out following the operation with LUKOIL) GROUP PROFILE

## TRANSPARENCY AND TIMELINESS FOR INVESTORS

## The Investor Relations Department acts as a liaison with the financial community

ERG has always considered it a priority to maintain and develop relationships with analysts and investors, in compliance with existing regulations on the disclosure of privileged and confidential information.

guidelines approved by management are key opportunities to communicate with the market.

THE INVESTOR **RELATIONS DEPARTMENT ENSURES CONSTANT** COMMUNICATION WITH THE **FINANCIAL** COMMUNITY.

Within the Group, this activity is carried out by the Investor Relations Department, which ensures maximum transparency and timeliness in communicating relevant information on all our business activities to the financial community in order to facilitate their evaluations and investment choices.

Providing information on the business and financial performance of the Company, its development prospects and the strategic For this reason, in December a meeting was held with analysts, investors and business journalists, during which we explained the content of the new strategic plan that will guide our activities for the next three years.

We believe - especially in situations of excessive stock market fluctuation in an economic downturn, such as the one currently being experienced - that increasing market awareness of our business strategies is an essential requirement, responding promptly to questions from

#### ERG AND SUSTAINABILITY ANALYSTS

Sustainability analysts focus their attention, not just on the economic aspects of corporate management, but also on the Corporate Social Responsibility (CSR) policies of companies. While respecting the principles of transparency and completeness set out in the Code of Ethics and the provisions of the procedure for the disclosure of confidential information, ERG is very willing to conduct open discussions with analysts as the Group believes that dialogue with our assessors may lead to a better understanding of our reality. In 2010, ERG was included in the "Benchmark" and "Leaders" indices in the new series of FTSE ECPI indices, obtaining a positive result: the rating is based on a broad information base relating to Environmental, Social and Governance (ESG) issues. This initial finding was confirmed in successive years and, in 2012, ERG's activities were presented as a case-study of the energy sector in research on the "Sustainability of Italian companies." During the year, ERG offered support to other ratings companies: preliminary assessments were shared, providing additional information so that they had an in-depth view of corporate issues

#### **INVESTOR DAY**

On 19 December, a meeting with the financial community was held in Milan to present the ERG Group Strategic Plan 2013-2015. After four years of intensive work, we revealed our new look, the outcome of our ability to anticipate scenarios and promptly seize the best opportunities to ensure sustainable growth and development for the company, even in complex macro-economic contexts, such as the current one.

Alessandro Garrone, our Executive Vice Chairman, opened the meeting by providing the general framework of the most important steps taken since 2008 and illustrating the new configuration of the Group's activities and the results achieved. Luca Bettonte, Chief Executive Officer, then continued to describe the contents of the new plan, focusing on the strategy behind the transformation of our business portfolio and explaining the reasons that led us to invest in a business with more stable returns - such as wind power - and minimise our exposure in a sector - such as refining - which is now in structural difficulty. The plan provides a synopsis of the work completed so far and describes its continuation, with the aim of consolidating the results achieved and tracing the path of future growth, which will mainly focus on the wind energy market

analysts and investors in order to maintain the Group's value.

## FINANCIAL COMMUNICATION **TOOLS**

Our financial communication is developed through contact with financial analysts and meetings with institutional investors both in one-on-one meetings and at national and international road shows.

**ALL DOCUMENTS REQUIRED BY INVESTORS CAN OUR WEBSITE.** 

> Another key tool for ensuring complete and up-to-date communication is the Group's website www.erg.it, which is structured in line with best practice and includes specific sections dedicated to the Press, Investor Relations and Corporate Governance. The website includes all press releases, financial statements and reports, company presentations, documents related to shareholders' meetings and all corporate information required by

existing regulations. In general, we publish all of the documents we consider necessary to provide a complete overview of the Company and its activities.

The website also contains presentations of the quarterly results conducted via webcast and conference call, as well as their full transcripts. Furthermore, as part of the objective for more timely and transparent communication, the webcast is available to the public and can be followed live on the website.

The constant dialogue with the public and financial community takes place not only through the complete availability of the Investor Relations team, but also through a dedicated email address used to respond to information requests sent by shareholders and anyone interested in the Group and its business

## RAINBOW PROJECT FOR CORPORATE EFFICIENCY

## The Continuous Improvement Department identifies opportunities for improvement

The Rainbow Project was launched in early 2011 with the objective of improving the economic sustainability of ISAB Energy by increasing its profitability, identifying opportunities for optimising costs and revenues and reviewing key business processes.

The improvements already achieved in 2012 contributed to a saving of over 9 million.

This result definitely exceeded expectations. The success was made possible by:

- → obtaining white certificates through energy efficiency projects;
- → optimising maintenance costs by rationalising existing activities and contracts, increasing predictive maintenance instead of the traditional preventive maintenance, and removing "bad actors";
- →implementing advanced control systems;
- →a multi-functionality agreement with the start of the first self-maintenance activities.

In order to ensure the continuity of this project, we decided to incorporate its principles and "philosophies" into everyday business activities.

In August 2012, the Continuous Improvement Department was established, reporting to the Technology division of ISAB

Energy Services. The mission of this department is to ensure continuous improvement to support the medium to long term economic sustainability of the company and the industrial assets it manages.

The objective is to launch a new improvement campaign focused on ERG Power plants that will bring tangible results as early as 2013.

The greater added value opportunities that ISAB Energy expects to finalise in the coming years include:

- → the implementation of the interruptibility of electricity loads;
- →an energy saving project related to the reuse of some gaseous streams as fuel and for recirculation;
- →an energy saving project related to sea water pumping systems;
- → obtaining white certificates for new energy efficiency projects underway.

With regard to ERG Power, the objective is to complete the business case, analysis and design of the 2014-2016 development plan by June 2013.

This new challenge will definitely be stimulating - not just for the Continuous Improvement Department but also for all management and staff involved – and will involve technical, operational and maintenance areas as well as current costs and staff costs

**INDUSTRIAL PROCESS IMPROVEMENT** HAS **CONTRIBUTED** TO A SAVING OF **EUR 9 MILLION.** 

## ERG GROUP PLANTS: PRODUCTION AND AVAILABILITY

PLANT	INSTALLED	PRODUCTION GWh		(1) TECHNICAL AVAILABILITY		SYSTEM	CO <sub>2</sub>		
	CAPACITY IN MW	2012	2011	2010	2012	2011	2010		ALLOCATION kt/year
WIND - ITALY									
Viticuso	9.0	13.0	15.2	14.9	98.6%	98.7%	98.5%	green certificates	
Pian dei Corsi	1.6	1.6	1.3	1.2	90.9%	91.1%	91.8%	green certificates	
San Vincenzo	42.0	87.9	68.3	61.4	96.3%	98.8%	96.8%	green certificates	
San Cireo	30.0	74.2	57.8	50.2	98.0%	98.9%	96.5%	green certificates	
Vicari	37.5	68.6	58.4	74.6	96.3%	97.8%	90.6%	green certificates	
Faeto	24.0	41.5	39.8	38.9	98.4%	98.2%	98.1%	green certificates	
Rotello	42.0	103.1	86.3	46.3	98.6%	99.1%	99.5%	green certificates	
Ascoli Satriano	61.8	165.1	129.3	45.9	98.1%	98.4%	98.5%	green certificates	
Fossa del Lupo	97.5	204.5	71.7	-	94.5%	-	-	green certificates	
Ginestra	32.0	45.2	18.5	-	98.6%	-	-	green certificates	
Bisaccia	23.6	47.5	15.4	-	98.3%	-	-	green certificates	
Lacedonia	18.0	51.1	10.6	-	98.2%	-	-	green certificates	
Molinara	25.2	63.7	20.4	-	97.8%	-	-	green certificates	
Baselice	27.0	62.6	18.8	-	97.5%	-	_	green certificates	
Foiano di Val Fortore	18.0	34.5	14.9	-	98.2%	-	-	green certificates	
Amaroni	22.5	8.2	-	-	-	-	-	green certificates	
Total Wind Italy	511.7	1,072.1	626.6	333.4	96.7%	98.5%	96.8%		
WIND - OVERSEAS									
Le Carreau	9.2	22.8	19.2	21.6	98.4%	97.5%	99.0%	feed-in tariff	
Lihus	11.5	21.5	20.9	20.7	98.1%	98.0%	96.5%	feed-in tariff	
Hetomesnil	11.5	21.9	21.7	20.9	99.3%	98.2%	97.8%	feed-in tariff	
La Bruyére	11.5	25.2	20.7	23.4	97.7%	98.2%	97.3%	feed-in tariff	
Les Mardeaux	11.5	22.7	18.8	21.6	97.6%	98.5%	98.7%	feed-in tariff	
Plogastel	9.2	13.9	12.2	8.6	99.0%	98.5%	98.8%	feed-in tariff	
Tcherga (2)	20.0	21.9	18.8	21.6	_	_	_	feed-in tariff	
Total Wind Overseas	84.4	150.0	113.5	116.8	98.3%	98.17%	98.00%	taiiii	
MINI-HYDRO									
Total Mini-Hydro	_	_	_	2.7	_	_	_		
PHOTOVOLTAIC								D	
ISAB Energy Solare	0.8	1.3	0.6	-	-	-	-	Premium tariff	
Total Photovoltaic	0.8	1.3	0.6	-	-	-	-		
TOTAL RENEWABLE SOURCES	596.9	1,223.4	740.7	452.9	-	-	-		
THERMOELECTRIC									
ERG Power	480	2,920	<sup>(3)</sup> 3,015	2,903	(4) 96.4%	(4) 98.2%	_		1,748
ISAB Energy	528	4,077	3,655	3,331	89.9%	84.9%	_	CIP 6	371
TOTAL THERMOELECTRIC	1,008	6,997	6,670	6,234			-		
TOTAL ELECTRICITY PRODUCTION	ON	8,220	7,411	6,688					

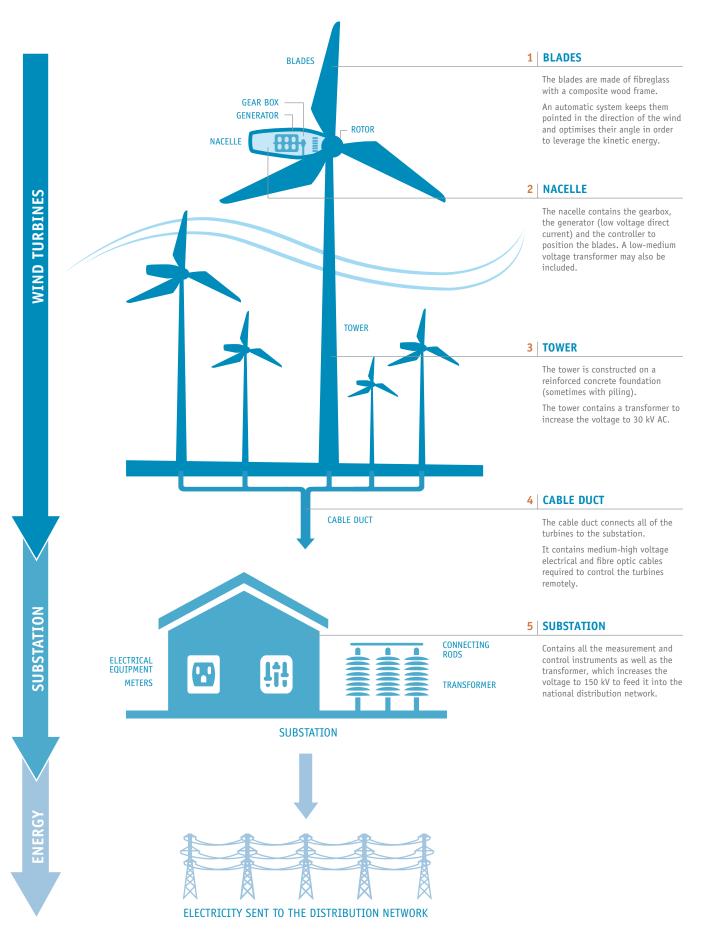
<sup>(1)</sup> The total value is calculated as the weighted mean of the individual technical availabilities as against the installed capacity of the farm.

<sup>(2)</sup> The Tcherga wind farm owned by LUKERG Renew has a capacity of 40 MW (50% ERG Renew).
(3) Data amended from the 2011 Sustainability Report.

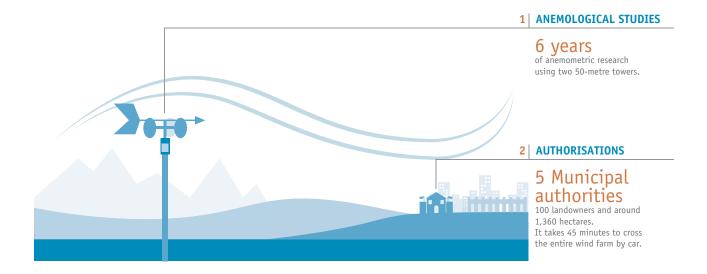
<sup>(4)</sup> Figure refers exclusively to CCGT.

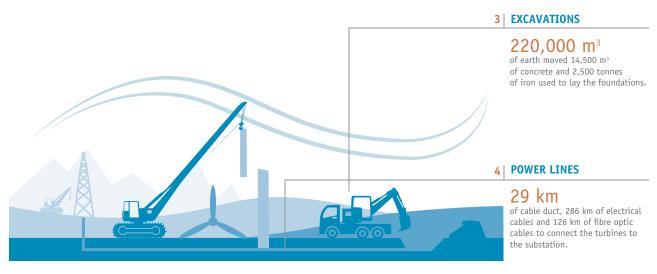
42

## WIND FARM OPERATION



## CASE STUDY: FOSSA DEL LUPO WIND FARM







SIX YEARS OF

**EXPERIENCE** 

MAKE US A

**RELIABLE** 

**SERIOUS AND** 

STAKEHOLDER.

## UNDERSTANDING WIND POWER

## Recognised subject-matter experts in the sector: our expertise in the field of anemology

The Group's significant growth in the wind energy sector in recent years had already highlighted the need for internal expertise that would allow the Group to independently assess the anemological profile of sites and, consequently, the effective production capacity of a plant (and therefore its profitability).

Today, after 6 years of operation, the professional expertise and the significant database accumulated (on the basis of which the wind estimates of a site are calculated) make ERG Renew a serious and reliable point of reference in this field.

The importance of amassing internal expertise in the field of anemology was also triggered by the need to replace the loss of generation resulting from the requirement by the independent transmission network operator (Terna) to limit the quantity of energy inserted into the grid.

The development of wind farms in regions with higher wind speeds resulted in the significant geographical concentration of installed capacity in areas where the infrastructure to transport the electricity had not - and in some cases still has not - been developed to optimal levels.

During periods of increased wind speeds, therefore, the farms may generate energy to their maximum capacity, inserting a quantity of electricity into the network that is too great for the network to transport or absorb on the basis of demand. In such cases, to avoid overloading the network, the network operator may impose limitations on production, compensating the producer for lost sales at predetermined rates.

Using the data collected by the anemometer towers in the wind farm, the ERG Renew staff calculates the loss of production and submits the resulting claim.

Last but not least, the Group's internal anemological skills have allowed us maintain an advantageous cooperation with turbine manufacturers, in some cases making a proactive contribution to resolving issues with the control software of the turbines themselves.

#### WHAT IS ANEMOLOGY?

Anemology (from the Greek *ànemos*=wind) is the part of meteorology that studies the wind. At ERG Renew, it is used to identify the most suitable places to install a wind turbine in order to ensure the best possible performance. To do this, it is necessary to evaluate the wind data collected via the wind towers

### **MAINTENANCE SCHEDULING**

Since 2012, wind forecasting has become an essential requirement for ERG Renew in order to schedule ordinary and extraordinary maintenance activities.

By correlating the wind data measured on site with the expertise of the resources and the models developed that process weather data on a mesoscale basis (the geographical dimension of weather systems), ERG Renew is able to anticipate the expected wind intensity and direction in each farm on an hourly and daily basis.

The availability of this data has led to the effective planning of plant maintenance: anticipating days of low wind speeds allows us to focus all of the ordinary maintenance activities during these periods and implement a predictive maintenance programme (with the aim of preventing unexpected failures and therefore minimising downtime due to an outage), thus maximising our productivity.

From an operational perspective, operation and maintenance contracts have also been optimised: while the previous contracts focused on plant availability, requiring that the machines be on production standby for a given period of time per year (which did not necessarily coincide with wind resource availability), in 2012, the contracts were instead defined based on energy availability, i.e. the machines are required to be ready to produce when the wind resource is fully available. This new logic has resulted in significant savings.

The efficient organisation of maintenance due to adequate wind forecasting also allows ERG Renew to develop provisional plans to insert energy into the network, meaning that it is now in a position to meet the challenge of imbalance charges set by the Energy Regulator.

Good production planning (based on accurate forecasts and maintenance optimisation) is necessary in order to minimise these charges, which are particularly difficult to manage in a sector where energy sources, by their very nature, are intermittent and difficult to schedule



Fossa del Lupo wind farm

**MAINTENANCE** IS SCHEDULED **ACCORDING** TO WIND FORECASTS.

## ROBUSTNESS OF THE RENEWABLE ENERGY BUSINESS: PROCUREMENT STANDARDS HANDBOOK

## Maintaining the long-term efficiency of wind farms through checks and interventions as part of a well-defined policy

As a new entrant to the industry over five years ago, ERG Renew has worked to develop and manage wind farms in Italy and abroad: a completely "green" operation. The company's growth has been very significant and has developed along three lines:

- →development from scratch (known as green field development), i.e., starting with the authorisation application and ending with the completion of the wind farm;
- → acquisition of projects that have already been authorised, but are still to be built;
- →acquisition of wind farms already in service.

The implementation of growth projects is always supervised by company personnel who maintain regular contact with the main contractors, fostering a growing confidence in their skills, a fundamental requirement in order to resolve the inevitable unforeseen "on site" issues.

In particular, ERG Renew has been able to increase its design awareness in terms of electrical and civil engineering in order to obtain the best solutions from a technical, operational and economic perspective.

By sharing the experiences accumulated, we have been able to compile genuine contract and technical specifications designed to operate in accordance with the applicable best practices.

Year after year, project after project, these documents have been enhanced with the synergistic knowledge of the various business functions, becoming the Contract Specifications handbook consisting of the Special Specifications for Civil and Electrical Engineering Works and a detailed set of specifications for each area where intervention or work is required.

The specifications describe the operational procedures to which professionals working on site must adhere to ensure their work complies with all the quality parameters required during the construction phase and, once in operation, the **efficiency** parameters.

A direct consequence of creating standards (which should be as consistent as possible in terms of their content) for the work carried out is the simplification of inspection and maintenance activities and, indirectly, improvement in the design and permitting activities.

Specific skills are also being developed in the area of heavy transport (transport which often exceeds 50 metres in length!), especially on mountain roads: our appropriate expertise allows us to maintain an advantageous relationship with carriers, identifying the best transport solutions and limiting, as far as possible, the invasiveness of road network upgrade works.

**ERG RENEW DEVELOPS PROJECTS THAT ENSURE** THE BEST TECHNICAL, **OPERATIONAL AND ECONOMIC** SOLUTIONS.

THE CONTRACT **SPECIFICATIONS HANDBOOK** CONTAINS SIMPLIFIED **OPERATING PROCEDURES** AND QUALITY **PARAMETERS FOR THE EXECUTION** 

OF WORKS.

Best practices applied to civil works, such as road works within the wind farm or in the surrounding area, provide greater safety to the plant as a whole: the roads are well constructed, maintained and always usable and they ensure that each wind turbine can be accessed at any time. Even the upgrading of public roads allows users to benefit from the improved public services.

An indirect consequence of this professionalism is the improvement of the design and permitting process for new wind farms: once authorisation has been obtained, the wind farm must be built according to the agreed specifications.

Any unexpected issues that require a change to the original design require the submission of a request to change the authorisation, which increases the time required to complete the necessary paperwork. The experience gained during the executive design phase allows many of the requirements for wind farm construction to be identified in advance and, therefore, for all of the requests to the Public Administration to be consolidated in a single application.

This action results in optimised permitting lead times and facilitates competent responses to requests by local authorities: for this reason, our engineering experts are involved in the technical phase of permitting as well as the actual implementation of the project.

The improvement of procurement documents and technical specifications is a continuous process: any activity that deviates from the documented procedures is analyzed in detail in order to understand the underlying reason and identify the best solution from a safety, environmental protection and technical optimisation perspective.

The solution, although specific to a single wind farm, is recorded and shared internally so that it remains an integral part of the company's procedures and can be replicated at any time in the future: in this case, the recording of historical events is a key requirement



Foundations of a turbine

## SUPPLIERS, ACTORS OF THE SUSTAINABILITY PLAN

Balancing economic interest with ethical management and selecting suppliers on the basis of transparency and sustainability

THE SUPPLIER **SELECTION MODEL IDENTIFIES** AND CORRECTS **PROBLEMS AND REWARDS EXCELLENT SERVICES.** 

GROUP PROFILE

"ERG considers its suppliers a primary source of competitive success; it thus strives to base its relations with suppliers on the same principles of sustainability, integrity and confidentiality and manage these relations with both current and potential suppliers in accordance with principles of legality, transparency, correctness and loyalty" (ERG Code of Ethics).

Suppliers are one of the main stakeholders and, in accordance with the Group's principles, they are selected by means of a thorough process of assessing, classifying and monitoring their technical capacity and their reliability according to objective criteria.

In ERG, we are committed to sourcing suppliers and external collaborators that share our corporate values: information on the rules of conduct adopted is available on the Group's web portal in the form of the Code of Ethics and the Organisational and Management Model pursuant to Italian Legislative Decree 231/01. Companies that work with us are required to issue a signed declaration (in the form of a specific contract clause) certifying that they are aware of the content of these documents and undertake to comply with their rules.

ERG requests the supplier to fill out a detailed questionnaire using the "i-Faber" portal. The questionnaire considers many aspects, not just from a purely technical perspective but also relating to economic factors and the fulfilment of its obligations with regard to safety, tax and social security and pension contributions





(including the regular payment of salaries to its employees).

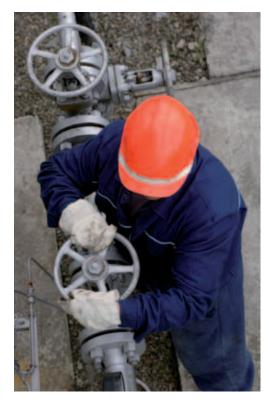
The process of sourcing and assessing suppliers is based on the rules of transparency of procedures and behaviours and separation of duties with regard to the contractual relationship and, specifically with regard to negotiations, on the rules of consistency between ethical principles and organisation, by verifying the personnel employed, and balance in relationships.

#### **HOW TO CREATE VALUE**

The process aims to fulfil two objectives. The first focuses on the development of the supplier, understood as the growth in the level of service offered, as well as increased efficiency and reliability; the second concerns the search for the best solutions available on the market in terms of technical innovation.

The first objective is achieved through the constant monitoring of supplier performance by assessing predefined objective indicators: the continuous nature of these assessments and the trend of results over time contribute to the definition of the supplier's rating.

This assessment methodology allows us to identify and correct any problems and also to reward excellent service levels in terms of supplier activities and, for example, financial robustness.



Pipeline maintenance

The constant search for the best technological solution is carried out by means of a scouting process, executed using dedicated IT systems in collaboration with the relevant technical departments: any potential supplier may submit an application, allowing future collaboration opportunities to be identified.

Both objectives involve dynamic processes that require the contribution of different business departments with a view to protecting the **proprietary information** of our suppliers, managing risk situations and identifying opportunities in line with evolution of the market and of the Group

**WE CONSTANTLY EVALUATE OUR** SUPPLIERS IN **RELATION TO** THE DYNAMIC **CONTRIBUTIONS OF TECHNOLOGY** AND **PERFORMANCE IMPROVEMENT.** 

NEW

**PROCEDURES** 

**HEALTH AND** 

PERSONNEL.

**TO ENSURE THE** 

**SAFETY OF ALL** 

## HSE POLICY AND REQUIREMENTS ALSO EXTENDED TO OUR SUPPLIERS

## The Group implements an effective system to encourage responsible behaviour

Occupational health, plant safety and environmental protection are the Group's guiding values to safeguard our cultural heritage, environmental assets, corporate assets and the community. Respect for these values can only be achieved with the synergistic effort of all players concerned. That is why we also involve our suppliers, with a view to contributing to the growth of a positive culture and improving working conditions.

Full respect for and compliance with applicable regulations in this regard, as well as compliance with additional internally defined requirements, are guiding principles of the Group Policy on Health, Safety and Environment, based on which supplier selection and assessment is carried out.

With the aim of encouraging responsible behaviour, in September 2012, specific Health, Safety and Environment Specifications were published, which are applicable to third party companies operating on Group sites.

The guiding principle that led to the definition of this document is analogous with the principle behind the "Safety Competition" that has been organised throughout the years: virtuous behaviours and the focus of workers on the topics of Health, Safety and the Environment are promoted and evaluated positively.

The Group companies follow a specific procedure for the initial qualification of suppliers; this procedure also defines the update process and the use of the list of potential suppliers (vendor list).

The preliminary assessment of a supplier is carried out by means of a dedicated qualification system and, in particular,



#### 1,200 SAFETY REVIEWS

During 2012, the various site departments performed over 1,200 reviews to analyse the on-site behaviour of contractors, both at the ISAB Energy facilities and at ERG Power.

The reviews focused on over 18,000 checks in the areas of Health, Safety and Environment, recording only 1.2% noncompliance

through questionnaires that gather information on:

- → policies and involvement of company management;
- →organisation, policies, procedures and documentation;
- →information, education and training;
- → personal protective equipment and clothing;
- → maintenance of vehicles and equipment, construction and work at height;
- → statistics regarding workplace accidents and incidents.

Subsequently, the Company and the Group sites carry out the appropriate professional and technical checks to ensure that, where the companies use their own personnel, machinery or equipment to carry out activities, they are in compliance with the relevant rules and regulations.

In the case of multi-year contracts, mechanisms aimed at ensuring the permanence of requirements (for the entire duration of the contractual relationship) are also established, both in terms of those verified as part of the initial qualification and those required as part of periodic reviews.

ERG also undertakes to review the requirements and assess supplier performance with regard to HSE; the outcome of these reviews is communicated periodically to the company's procurement department.

In this respect, on-site checks are implemented to ensure the effective monitoring of supplier performance with a view to:

→ensuring that the activities are carried out in line with the information provided as part of the initial qualification;

- →ensuring that they meet the requirements of the ERG Group;
- → promoting the continuous improvement of the supplier's HSE performance.

ERG staff also works with the supplier's personnel, organising specific training and awareness sessions with regard to HSE issues.

These initiatives illustrate the Group's "constant" focus on HSE topics: the "involvement" of workers is the characteristic that best summarises our willingness to work in a responsible and collective manner.

ERG ensures that all the information provided in the internal rules and procedures and in the HSE specifications are always adhered to, by suspending any offenders in the case of proven and serious violations. Our goal is to extend, develop and maintain the HSE culture and commitment and to achieve greater involvement in related topics, not just by employees, but also by contract workers based at the Group sites ■

#### CODE OF ETHICS AND SUPPLIERS

"In managing its purchasing process, ERG requires suppliers to comply with all the regulations specifically relevant at the time, with particular reference to the topic of safety and environmental protection."

"ERG constantly works to ensure that the business operations of all Group companies are carried out with full respect for the health and safety of employees and third parties" ■

## MARITIME TRANSPORT SAFETY CHECKS

## Strict and effective control procedures to ensure reliable sea transport

The transport of petroleum products by sea is closely connected to environmental protection, both for the quantities transported and the potentially negative impact of an accident on the marine ecosystem.

The purchase of crude oil and the distribution of products sold on the cargo market are carried out by sea, on chartered ships belonging to third parties.

For this reason, we focus our attention on the ships used and subject them to strict quality tests, carried out by highly qualified internal and external specialists to ensure their safety in accordance with the Group's policy and in the interests of Corporate Social Responsibility.

In terms of Group policy, the transport of crude oil, fuel oil and other products requires the exclusive use of double-hull ships, which are recognised as being safer than other vessel types.

In addition, we regularly check that the ships meet essential requirements, such as compliance with national and international laws and regulations as well as appropriate procedures that ensure the safety of operations.

Finally, we also analyse the specific working history of each ship and verify compliance with the instructions given by the leading international maritime organisations (IMO - International Maritime



SHIPS USED FOR TRANSPORT ARE **SUBJECTED TO** STRICT OUALITY CHECKS.

GROUP PROFILE

**WE TRANSPORT OUR PRODUCTS** ON SAFE, MODERN SHIPS.

Organisation, OCIMF - the Oil Companies International Maritime Forum, etc.). The Group's procedures consist of three levels of analysis and control: Vetting, Screening and Safety.

#### **VETTING**

The Vetting controls and inspections are carried out by authorised personnel before accepting the ship and consist of carrying out a series of checks that essentially follow the guidelines of the OCIMF questionnaire for naval inspections.

The data is then entered in the SIRE (Ship Inspection Report) database, which is available to all operators registered with the OCIMF and provides significant information on the history and characteristics of each ship. This database which is continually updated - currently represents the greatest deterrent to ship owners against the use of ships that are not kept in perfect working order, or of inexperienced, unskilled crews.

The Vetting checks, therefore, verify that petroleum products are transported by carriers and on ships that minimise the risk and comply with the quality standards set out in the Group policy.

In 2012, 323 checks were made.

#### **SCREENING**

Screening consists of performing a series of preventive checks on ships that different traders (sellers and buyers) propose to ERG to transport their products. In this case, we require evidence of recent checks that confirm the suitability of the

ship according to the parameters set out by the Group.

These checks are even more essential depending on the type of business involved, which may require the ships, even occasionally, to perform ship to ship cargo transfers while anchored.

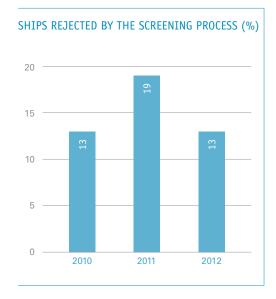
If the documentation is missing or incomplete, ERG staff or their representatives may check these parameters by means of a visual inspection.

In 2012, 13% of the ships inspected were rejected.

#### **SAFETY**

Safety checks focus on the loading and unloading operations carried out at the piers and are performed by ISAB staff on behalf of ERG, covering 100% of the ships berthed. The purpose of the inspections is to verify that operations are performed correctly in compliance with established safety standards

**323 CONTROLS** AND **INSPECTIONS** ON BOARD.



## INNOVATION AND TECHNOLOGICAL DEVELOPMENT

## Our research projects on renewable energy sources

The Group continued its commitment to research projects in partnership with different institutions and universities. In 2012, the various initiatives undertaken in recent years reached the implementation phase.

**ORGANIC PHOTOVOLTAIC PANELS** 

The project has now reached an **advanced stage of technological maturity**: production tests in a controlled atmosphere at the Fontenuova Research Centre (near Rome) are now complete and the pilot production line will be fully completed in March 2013. The first modules in A4 format have already been produced at the research centre.

In order to have commercial and industrial value and subsequently be placed on the market, the product **must be certified** 

both as single module and as a panel. For this to take place, the product must have a lifespan of twenty years, a goal that has been achieved in initial tests. Research will continue until a statistically significant number of successes are recorded for the modules and panels, after which certification by a third-party body will be sought.

Manufacturability simulations of our panels are currently being carried out that recreate their installation in different urban situations (buildings with different positions and levels of shade, various architectural integration solutions and locations in countries where climate and sunlight are very different) in order to define the best business solutions on a case by case basis.

The photovoltaic panels are intended for use in architectural facades

WE ARE
DEVELOPING
INNOVATIVE
MATERIALS FOR
THE SECOND
GENERATION
PHOTOVOLTAIC
PRODUCTS.

Research, meanwhile, is already focused on the second generation of organic photovoltaic panels, developing more efficient and more aesthetically interesting innovative materials to broaden their application, both in terms of architectural integration and other types of installations.

#### THERMOVOLTAIC POWER

The technology, based on the thermovoltaic effect, seeks to provide an important solution to the problem of energy recovery, intervening in situations where a significant portion of energy is dispersed into the environment in the form of heat. This technology is able to transform waste heat directly into electricity by exploiting the Seebeck effect which, taking temperature differences as a starting point, is able to generate electricity. The purpose of our research is to come up with devices that use low cost materials and processes, unlike those currently on the market which use rare and expensive materials. In addition, our technology will be able to use the typical production processes of the electronics industry, where costs are significantly reduced as

THE SEEBECK EFFECT

The Seebeck effect is a thermoelectric effect for which, in a circuit consisting of metallic conductors or semiconductors, where there is a temperature difference, the carriers of energy at a higher temperature move toward those at a lower temperature, generating electricity. Generation is interrupted when both parties reach the same temperature

production volumes increase.

In 2012, the initial assumption of the project, which is developed in partnership with the University of Milan - Bicocca, was demonstrated to be valid because, by subjecting a number of prototypes to differences in temperature, it was possible to measure "important" electrical currents in the laboratory.

In 2013, research activities will focus on systems engineering development (design, construction and testing) in order to obtain electrical power that is in line with the traditional systems on the market. Several Italian and foreign groups and about thirty researchers are involved in this research and development project, coordinated by ERG, and the results obtained so far are constantly increasing the number of patents held.

#### **ELECTRICITY STORAGE**

ERG Renew, which has become the main national player in the production of electricity from wind power in Italy, has initiated a study into electricity storage systems that can minimise the costs associated with the unpredictability of production.

The project, carried out through the commitment and expertise of our resources, aims to identify cost-effective systems in order to put our company in a better position to meet the technological challenges of the future - first and foremost, the full integration of renewable energy in the electricity market - with regard to which we focus on the affordability of renewable energy ■

**WE ARE TRANSFORMING** WASTE **HEAT INTO ELECTRICITY.** 

# 2 ENVIRONMENTAL RESPONSIBILITY

492 kt

OF CO<sub>2</sub> AVOIDED THROUGH
RENEWABLE ENERGIES

93.7% WATER RETURNED TO THE NATURAL CYCLE

0.09 t/GWheq
THERMOELECTRIC POWER
PLANT SO, INDEX

0.206 tep/MWheq EFFICIENCY OF THERMOELECTRIC POWER PLANTS

-30%

CO<sub>2</sub> EMISSION PER EACH THERMOELECTRIC MWh PRODUCED

## OUR COMMITMENT TO CLIMATE CHANGE

For ERG, the key themes of the 20-20-20 Climate and Energy Package are the development of sustainability and CSR programmes

As part of the Group's continuing evolution, the demand for a responsible attitude towards sustainable development has increased in recent years.

For this reason, ERG recognises the central importance of the fight against climate change as part of its main corporate responsibilities.

The production of energy by thermoelectric power plants produces atmospheric emissions consisting mainly of sulphur dioxide, nitrogen oxides, dust and greenhouse gases including, in particular, carbon dioxide. Our commitments to achieving the sustainability targets set at a European level consist of promoting and increasing the use of fossil fuels with a low environmental impact (such as natural gas), developing renewable energy sources and using technologies with a low environmental impact and energy efficiency.

The current guidelines for sustainable development are defined by the "20-20-20 Climate and Energy Package" which is part of a Europe-wide strategy. Employment, research and innovation, climate change and energy, education and the fight against poverty are the major themes on which the strategy is based. The ERG Group considers this strategy to be a key incentive to develop its own Sustainability and Corporate Social Responsibility programmes. In particular, we align our activities to fight against climate change

by implementing strategic measures with a view to obtaining sustainable development within our business portfolio.

The main objectives that the European Union needs to meet by 2020 (as set out in the "20-20-20 Climate and Energy package") are:

- →to reduce greenhouse gas emissions by 20% with respect to 1990 levels;
- →to increase the share of renewable energy to at least 20% of gross final energy consumption;
- → to reduce consumption within the EU by at least 20% through the implementation of measures that increase energy efficiency.

## **EMISSIONS TRADING SCHEME**

The achievement of these objectives is based on the implementation of a regulatory framework established by several European Union Directives.

The most important reference within this legal framework is without doubt the Emissions Trading Scheme (ETS): a mechanism to allocate quantities of emission allowances (EUA, European Union Allowances), which can be bought, auctioned, or given free of charge, depending on the sector in question. The total number of emission allowances is gradually reduced to lead Europe towards its target of a 20% reduction in carbon dioxide emissions by 2020.

**TOWARDS SUSTAINABLE DEVELOPMENT** IN LINE WITH THE TARGETS SET BY EUROPE. **WE ARE** 

**COMMITTED TO** 

**REDUCING THE** 

**RISK FACTORS** 

**ASSOCIATED** 

**GREENHOUSE** 

GAS EMISSIONS.

WITH

The rules laid down for the third phase of the ETS scheme, effective 1 January 2013 until the end of 2020, define a complex, challenging scenario for the energy sector, which will increasingly have to orientate itself towards a sustainable agenda.

Also during this third phase, it will be possible to trade certificates from the flexible schemes under the Kyoto Protocol: CDM (Clean Development Mechanism) and JI (Joint Implementation). Their use, however, will be restricted by a number of conditions and limitations laid down at EU level.

To reduce the risk factors associated with this context, the Group carries out continuous activities to monitor the development and implementation of EU and national legislation and to assess in advance the measures required in order to achieve the targets set.

THE CENTRAL IMPORTANCE OF RENEWABLE ENERGIES

Significant reductions in greenhouse gas emissions may also be obtained through the development of clean energy.

Renewable energy sources in recent years have grown considerably, both in Europe and in Italy: in 2012, Italy recorded 27% of these energy sources in gross inland consumption. It is therefore expected that, all things being equal, they will constitute an increasing share of the energy mix of the various countries.

The use of 'cleaner' fuels and the search for better energy efficiency through innovative technologies are also becoming increasingly necessary.

Our Group meets this requirement

through the activities carried out by ERG Renew, the Italian leader in the wind sector and one of the top ten European operators, with 1,232 MW of installed capacity (data updated to March 2013).

Our strategic positioning and industrial development will therefore be in line with the objectives set at a European level and will be able to combine economic and environmental sustainability. Minimising atmospheric emissions is achieved through growth in wind capacity and investment in the thermoelectric sector, which made it possible to replace the existing generation plants with high quality, modern and more efficient assets from a technological and environmental perspective.

In addition, a rigorous reporting system for greenhouse gas emissions at our plants allows us to periodically submit complete and accurate reports, certified by independent verifying bodies that have been accredited by the Competent Authority.

#### THE ITALIAN CARBON FUND

The Italian Carbon Fund is an initiative promoted by the Ministry for the Environ-

ERG THERMOELECTRIC POWER PLANTS AND EMISSION CERTIFICATES

During the 2<sup>nd</sup> phase of implementation of the EUA-ETS Directive, ERG Group's thermoelectric power plants (ISAB Energy and ERG Power) benefitted from a free allocation of CO<sub>2</sub> quotas, as shown in the plant diagram in the economic responsibility section of this document

ment, Land and Sea in collaboration with the World Bank, which in 2008 issued Certificates of Emission Reductions (CERs) - used by our Group to meet targets set by the Emissions Trading Scheme - which invest in projects that benefit the environment and use sustainable technologies in developing countries.

The Fund is open to the participation of Italian private and public companies and ERG is an active participant: we are one of the leading members from the private sector. This investment has enabled us to acquire expertise in relation to projects to reduce emissions at an international level

#### GREENHOUSE GAS EMISSIONS: REPORTING RELIABILITY AND ACCURACY

The processes for reporting greenhouse gas emissions (particularly carbon dioxide) implemented in our power plants are highly accurate and reliable and are based on specific reports produced by various business departments. The quantitative determination of emissions is mainly based on three parameters:

- the quantity of fuel used;
- the composition/emission factor of the fuel itself;
- the oxidation factor (defined by law and linked to the type of fuel).

The amount of fuel coming from the gas network or the adjacent refinery (in the case of the use of asphalt or "refinery gas") is determined based on instrument readings: the specific meters for each product flow are subject to periodic checks and calibration to ensure the accuracy of the data obtained.

The emission factor is defined as the ratio between the emission of a pollutant (in this case CO<sub>2</sub>) for each unit of fuel: this factor is variable depending on the composition of the fuel and, for this reason, periodic analysis is carried out on each fuel to determine as precisely as possible the quality of the same.

In order to improve the accuracy of the data obtained, the analyses are only carried out by accredited laboratories that are certified in accordance with ISO 17025 and are subject to periodic audits of their procedures adopted. In the case of natural gas, we refer to the quality certificates sent by the supplier.

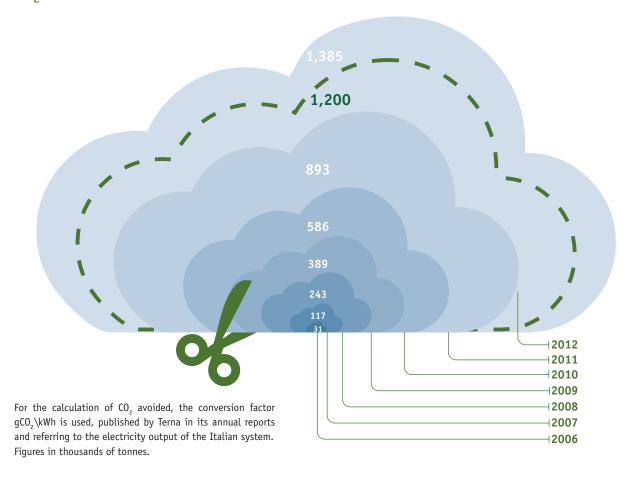
Based on the available data, the emission levels of each plant are defined using algorithms: the accuracy of the calculations carried out is subject to an annual audit by an accredited independent organisation that not only verifies the calculations but also validates the entire process to determine its constituent elements.

The data thus certified is then communicated to the competent Authority for the detection of plant emissions as a contributor to the country system

# CALCULATION OF THE CO<sub>2</sub> AVOIDED: 2012

	INSTALLED CAPACITY (MW)	PRODUCTION (GWh)	CO <sub>2</sub> AVOIDED (kt)
Domestic wind power	511.7	1,072.1	431.0
Overseas wind power	84.4	150.0	60.3
Photovoltaic power	0.8	1.3	0.5
TOTAL	596.9	1,223.4	491.8

## CO, AVOIDED: TREND 2006-2012



#### EMISSIONS AVOIDED: OBJECTIVE ACHIEVED

In line with its business plan 2007-2012, the ERG group had identified among its sustainability commitments a significant development in the production of electricity from renewable sources, giving rise, as a result, to a non-issuance of  $CO_2$  of 1.2 Mt at the end of 2012 (baseline 2006). Due to significant investments in the wind sector, the goal has been reached and even exceeded, recording  $CO_2$  emissions avoided of approximately 1.4 Mt at year end

## ATMOSPHERIC EMISSIONS AND FOCUS ON **MONITORING**

With the introduction of best practices, we have improved the reliability and accuracy of our emissions monitoring

The continuous monitoring of atmospheric emissions is becoming increasingly important with regard to the operation of industrial plants.

ISAB Energy and ERG Power fulfil this commitment by adopting a set of best practices defined at an international level: their correct application is essential for the modern and efficient management of the assets of thermoelectric power plants, and also from an environmental point of view. During 2012, an Emissions Monitoring Systems (EMS) Manual was defined, containing the best methods for managing the continuous emission detection systems directed at the chimneys.

The objective is to improve the quality and accuracy of measurements and to ensure their full and constant validity.

The key points of the procedure are:

- →a complete evaluation of the system, including the verification of the representativeness of the sampling point, periodically or following plant changes;
- → periodic operational checks;
- → performance checks.

All documents, certificates of materials and detection and sampling tools, operation and maintenance manuals and EMS system specifications are filed in the various sites and can be made available to the control authorities.

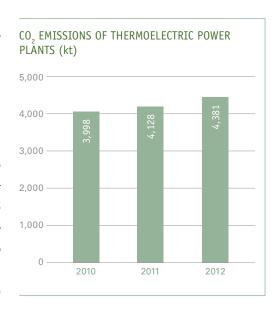
In parallel, the database containing the

recorded and system data is archived for a minimum of 5 years.

To ensure the continuous efficiency and accuracy of the EMS system, ISAB Energy and ERG Power have defined:

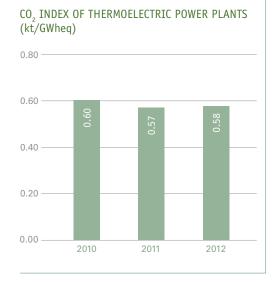
- →a process to verify the quality of the EMS measurements against a series of parallel measurements performed using a "reference method";
- >the activities required to ensure that the EMS remains in a state of "calibration", in order to ensure the quality of the measured data:
- → the necessary activities and periodic inspections to ensure that accuracy is maintained over time.

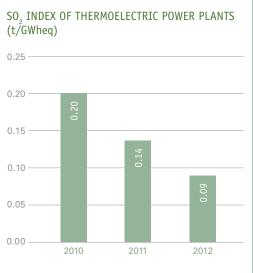
To guarantee the quality of the activities performed, all of the periodic inspections are performed under the supervision and careful control of the competent Authorities and are only entrusted to accredited laboratories -

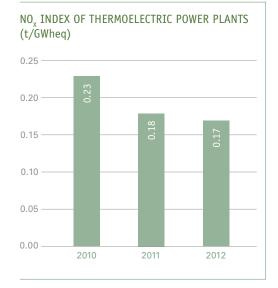


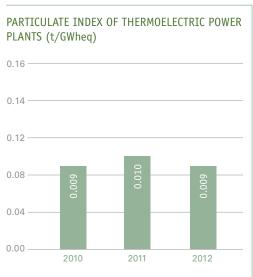
THE DATA **RECORDED** BY THE EMS AND RELATED **PLANT DATA IS** ARCHIVED FOR AT LEAST 5 YEARS.

## THERMOELECTRIC POWER PLANT INDICATORS













The sustainability objective, which expired at the end of 2011, provided for an improvement in the energy efficiency of thermal power plants by 20% compared to 2006, reaching a share of 0.216: the final balance was 23%. in 2012, we further improved our performance, increasing the previous result by another percentage point =

## IN SEARCH OF FUGITIVE EMISSIONS

Thanks to technically advanced programmes, we are also reducing diffuse emissions year on year

The concept of continuous improvement has now become part of our way of thinking, acting and organising the various issues within the Group.

This concept was actually introduced to Management Systems at the end of the 1980s with the so-called **Deming cycle**, or continuous improvement loop.

Since then, it has permeated throughout all levels of operation and in many fields of action: an example of this is the LDAR (Leak Detection and Repair) programme, relating to fugitive emissions of Volatile Organic Compounds (VOCs).

THE DEMING CYCLE: PLAN-DO-CHECK-ACT

PLAN - Survey/inventory of sources DO - Monitoring and Leak Detection CHECK - Repair ACT - Define new objectives

Atmospheric emissions are a very important issue for ERG Power and ISAB Energy plant operators; they always have endeavoured to control them by putting in place specific monitoring plans.

The objective is to prevent, reduce and, where this is not possible, monitor their environmental impact, in line with Best Available Techniques.

In the context of atmospheric emissions, diffuse emissions have gained technical focus and importance equal to that of emissions released by the chimneys: fugitive emissions are defined as emissions that may leak from normally sealed components.

However, the set of values that can result in such an emission have an extremely reduced order of magnitude of between 10<sup>-7</sup> e 10<sup>-1</sup> kg/h.

Unfortunately, fugitive emissions cannot be eliminated from a technical perspective, however they can be minimised. They are generally invisible and can only be detected by instruments, except in cases where an imperfection in the seal can be clearly seen (external condensation or dripping).

Therefore, we have focused on identifying, monitoring and quantifying these fugitive emissions, which are considered to be a subset of diffuse emissions.

In this instance, we decided to adopt the LDAR programme in order to manage this activity. In order to apply the programme, it was necessary to start by taking an inventory or survey of the components of the industrial site: approximately 11 thousand components in ISAB Energy and 3 thousand in ERG Power.

Once the potential sources were identified and surveyed, they were monitored using instruments that measure the quantity of organic gases.

A reference value was agreed and any components exceeding the threshold were subsequently identified in order to

THE CONCEPT **OF CONTINUOUS IMPROVEMENT** IS USED TO **IDENTIFY** AND REDUCE **FUGITIVE EMISSIONS.** 

trigger repair activities. The aim of the LDAR procedure is therefore to **reduce** the number of components that exceed the threshold from an unknown percentage to a set target through successive monitoring (Leak Detection) and repair cycles.

The programme, which has been in operation for a couple of years, has yielded good results, continually reducing the fugitive emission estimates of individual plants each year, at the beginning of a new analysis cycle

#### THERMOELECTRIC POWER PLANTS

	2012	2011	2010
ISAB Energy	-37%	-24%	Project start
ERG Power	-51%	Project start	_

The table shows the percentage reduction in "plant system" emission estimates compared to estimates at the beginning of the project.

#### ERG AND ENVIRONMENTAL PERFORMANCE

Environmental protection, pursued through an improvement in the environmental efficiency of processes and adequate pollution prevention, is interpreted and developed within our Group in a consistent, systemic manner with respect to the safe performance of our operations. The management of water resources focuses on the minimisation of withdrawals and the reuse of process water. Under given conditions, even the water recovered from safety and decontamination activities are reused within the production sites.

Atmospheric emissions are primarily minimised by increasing the use of low-carbon and low-sulphur fuels and carrying out specific activities aimed at lowering and controlling emissions. Investments in the thermoelectric sector have also enabled old generation plants to be replaced with new, more efficient facilities from a technological and environmental perspective. Prevention and protection operations on the topsoil and subsoil are performed on the basis of plans focusing on: analysis and assessment of new projects, restoration operations and environmental characterisation and safety activities

## A FURTHER EFFORT TO MINIMISE THE **ENVIRONMENTAL IMPACT**

Important measures implemented in ISAB Energy to improve the efficiency of the flare system

**OBJECTIVES: REDUCED WATER** DISCHARGES, **IMPROVED EMISSIONS AND MONITORING** ACCURACY.

The ISAB Energy plant is subject to the Integrated Environmental Authorisation issued under the European IPPC Directive (Integrated Pollution Prevention and Control).

In recent years, it has implemented key measures set out by the Authorisation and, in 2012, it implemented preventive measures to further improve its environmental performance by:

- → minimising waste water;
- → optimising atmospheric emissions;
- →implementing increasingly timely and effective monitoring and control activities.

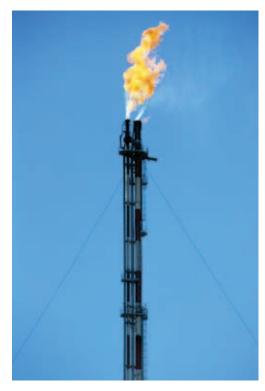
The key technical measures aimed at protecting the environment include activities aimed at improving the efficiency of the Blow down and flare system with a view to reducing the gas stream to the flare and limiting cases of over-flaring.

These objectives are definitely challenging and will be achieved by implementing activities along two technical lines:

- → scrubbing the gases from some units of the plant, so that, once the hydrogen sulphide has been removed, it can be processed through the Blow down system;
- →compressing the gases directed to the Blow down system and sending it to the sulphur recovery plan ("sulphur line").

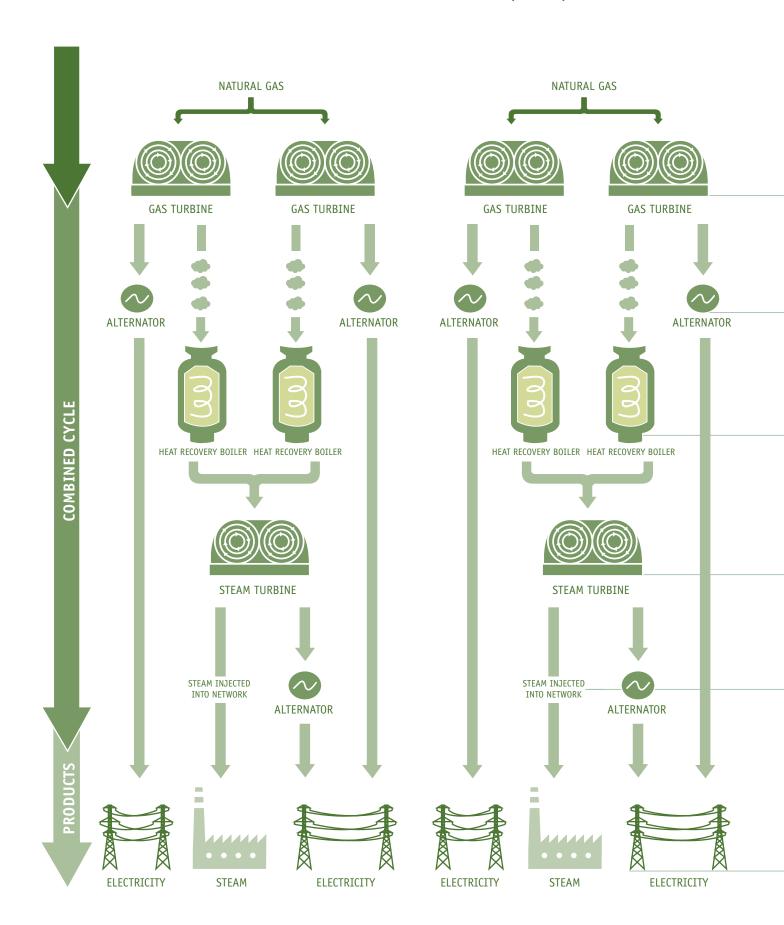
These actions will result in the increased environmental efficiency of the flare system by reducing stream volumes, returning them to the production cycle and improving their quality by reducing the hydrogen sulphide content.

In addition, ISAB Energy has installed instruments to automatically sample the gases sent to the flare system. In early 2013, once the instruments (gas chromatographs) have been put in position, the system will be calibrated and verified to ensure that it is reliable when becomes operational



The flare system

# ERG POWER - COMBINED CYCLE GAS TURBINE (CCGT)



In combined cycle technology, electricity is produced by alternators driven by "combined" gas and steam turbines: using a recovery boiler, the waste gas produced by the gas turbine (at a high temperature and therefore with a high energy content) generates the steam required to power the steam turbine. Steam is

withdrawn from the steam turbine at different pressures, which is injected into the site's network



4 General Electric gas turbines at 75 MW each. From the combustion chamber, the gas produced is sent to the turbine, causing it to rotate.

The rotation of the turbine connected to the alternator produces electricity (mechanical energy is converted to electrical energy).

Recovery boiler without post firing (internal burner): the waste gas from the gas turbine is used to produce superheated steam which is sent in the steam turbine.



2 Ansaldo Energia steam turbines at 86 MW each. The steam produced by the recovery boiler sets another turbine and alternator in motion, producing electricity.

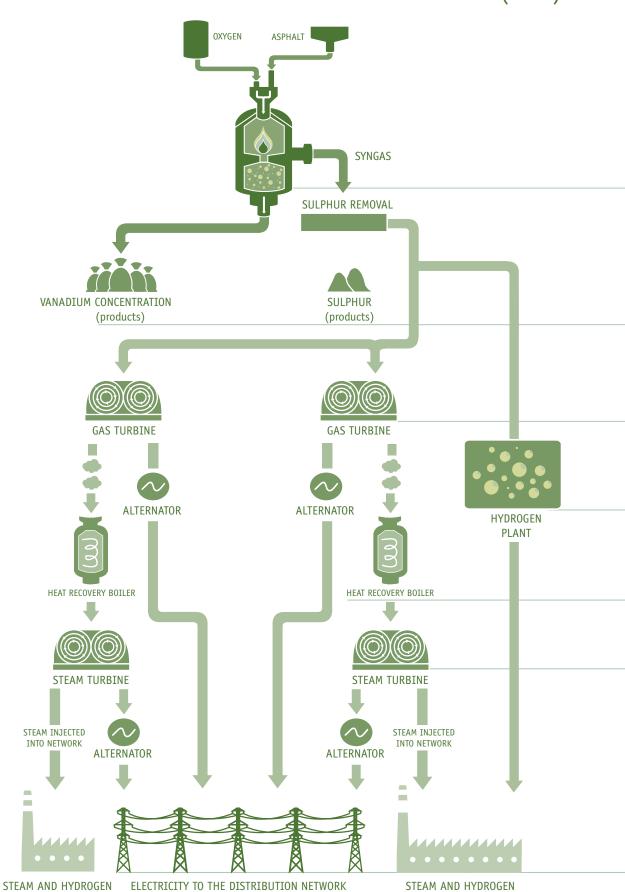


The steam taken from the different stages of the turbine at three different pressure levels (6 atm - 18 atm - 35 atm) is injected into the site's network.



The electricity produced is fed into the national electricity grid at two different voltage levels via a 380 kV substation and three 150 kV substations.

## ISAB ENERGY - INTEGRATED GASIFICATION COMBINED CYCLE (IGCC)



The IGCC technology (Integrated Gasification Combined Cycle) transforms solid fuels (in this case asphalt, the residue of the refining process) into gaseous mixtures of carbon oxides and hydrogen (Syngas) and then burns them in combined cycle plants, generating electricity. The plant also produces hydrogen and steam which is injected into the site's network.

> The gasifier converts the asphalt from the adjacent ISAB refinery into Syngas, used to produce hydrogen which is used as a fuel in the combined cycle.



From the gasification process, around 1,000 t of vanadium concentrate and 40,000 t of sulphur are produced and sold annually.



2 Ansaldo Energia gas turbines at 166 MW each.

The gas produced in the combustion chamber is sent to the turbine, generating movement that, if transmitted to the alternator, produces electricity.



The plant produces about 20,000 Nm<sup>3</sup>/h of hydrogen by physically separating it from the Syngas.

Recovery boiler with post firing powered by Syngas: transforms the heat of the flue gas of the gas turbine into steam used to power steam turbine (TV).

2 Ansaldo Energia steam turbines at 100 MW each.

The steam from the recovery boiler sets another turbine and alternator in motion, producing electricity.



The electricity is inserted into the national electricity grid via a 380 kV substation.

## **OBJECTIVE: FEWER EMISSIONS INTO** THE ATMOSPHERE

Project to improve the environmental impact of the SA1 Nord power plant

ERG Power uses its thermoelectric power plants to provide electricity and steam to the multi-company site in Priolo, which is necessary for the continuous operation of the on-site client plants.

The CCGT plant is a new generation combined cycle power plant which has extremely low emissions in line with the expected values of the best technologies currently available at an international level. ERG Power which, in accordance with the Group's HSE policy, is pursuing increasingly challenging objectives regarding environmental protection, presented a project to improve the environmental impact of the SA1N/1 group to the

competent authorities, requesting to replace the SA1N/3 group.

From an environmental perspective, the positive aspect of this project lies in the fact that the atmospheric emissions of the SA1N/1 group will be significantly reduced due to the fact that:

- → the new structure will exclusively use gaseous fuels (natural gas and fuel gas from the adjacent ISAB refinery) which have a lower environmental impact compared with the liquids currently used in the SA1N/3 group,
- → the thermal power of the SA1N/1 group will be dedicated solely to the production of steam, which is less than that of group 3, thus favouring a net reduction

FOCUS ON THE UTILITIES REQUIREMENTS OF THE PRIOLO NORD SITE

Ensuring the stability of the production of all facilities at the Site has always been a priority for ERG Power as the main energy source. This is made possible through the flexibility and reliability of steam production, which takes place in several production centres with a sufficient mutual assistance margin (understood as the capacity of a plant to make up for any deficiencies in the production of the other). The sites involved are the combined cycle plant (CCGT) and the SA1 Nord power plant, within which the SA1N/1 and SA1N/3 groups operate. The utilities requirement of the multi-company site in Priolo Gargallo currently consists of:

- electricity, of which the Raffineria ISAB Impianti Nord requires about 30%, the Consorzio Priolo Servizi about 30% and Versalis about 40%;
- steam (produced at 3 pressure levels: low, medium and high), of which the Raffineria ISAB Impianti Nord uses about 60% and Versalis uses the remainder.

The production at the SA1 Nord centrale currently covers 35% to 46% of the electricity needs of the Site and 45% to 54% of the heat demand, while the rest is provided by the CCGT =

A CONTINUOUS **SERVICE IS ENSURED BY MULTIPLE PRODUCTION** CENTRES.

in the flue gas flow rate and therefore in the total quantity of macro-pollutants emitted.

The project also includes the implementation of primary and secondary emissionreducing techniques:

- >the primary techniques consist of interventions in the combustion chamber to obtain reduced formation of pollutants;
- → the secondary techniques are aimed at reducing the existing pollutants in the combustion flue gas.

The environmental intervention works that will be undertaken to improve the quality and sustainability of utilities production can be summarised as follows:

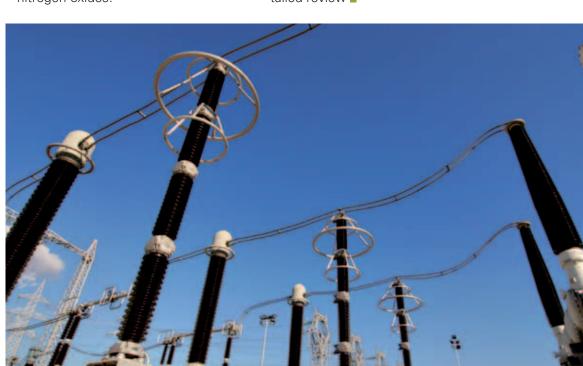
- → works on the thermal cycle, with a view to adapting the heat capacity of the boiler of the SA1N/1 group and making it more efficient under the new operating conditions;
- → works to reduce and control emissions: implementation of the BOOS technique by altering the operation of the existing plant and modifying the working conditions of the burners in the boiler; installation of a system to reduce nitrogen oxides.

Furthermore, the planned actions will not have a visual impact outside the site as they will be carried out within the existing facilities.

The environmental impact project for the SA1N/1 group obtained the positive opinion of the Ministry of the Environment and Protection of Land and Sea to be excluded from the Environmental Impact Assessment. As a result, as of September 2013, ERG Power will be in a position to pursue its aims to significantly reduce the atmospheric emissions of the main macro-pollutants at the SA1 Nord power plant:

- →nitrogen oxides (NO<sub>x</sub>): approx. -75%;
- → sulphur oxides (SO<sub>v</sub>): approx. -74%;
- → carbon monoxide (CO): approx. -87%;
- →dust: approx. -75%.

In order to effectively monitor and control atmospheric emissions, the Group will also implement a continuous emissions monitoring system (EMS) to monitor the same macro pollutants in the flue gas (SO<sub>2</sub>, NO<sub>x</sub>, CO and dust), which satisfies the requirements of industry best practices and is subject to a periodic detailed review



**OBJECTIVE: ATMOSPHERIC** EMISSIONS.

**Electricity Substation** 

ERG POWER AND BAT: BEST AVAILABLE TECHNIQUES FOR REDUCING ATMOSPHERIC EMISSIONS

The European Union issued a Directive with the aim of reducing and controlling pollution from various production sectors by carrying out interventions at source to achieve a high level of overall environmental protection.

The use of natural gas and Refinery fuel gas, provided to the SA1N/1 group (see previous section), will result in reduced emissions of dust and SO<sub>2</sub>, as indicated by the Best Available Techniques (BAT). As a result of these planned intervention works, the SA1N/1 group will comply with the extremely low concentration values: the concentration of sulphur oxides (SO<sub>2</sub>) in the flue gas will be  $\leq$  20 mg/Nm<sup>3</sup> while the dust concentration will be  $\leq$  5 mg / Nm<sup>3</sup>.

The boiler of the SA1N/1 group will also be equipped with 2 combined measures to reduce NO<sub>v</sub> emissions: The primary measure is a BOOS technique for two-stage combustion, the secondary measure is SCR - SNCR. These measures will result in immediate NO, concentrations of just under 100 mg/Nm³ (and after 18 months of less than 50 mg/Nm³) and CO emissions of under 50 mg/Nm<sup>3</sup>.

Through these measures, the SA1N/1 group will achieve adequate atmospheric emissions according to the guidelines on "best available techniques" for the sector, defined at a european level

# THE REVAMPING OF THE DEMINERALISED WATER PLANT IS COMPLETE

In 2013, the advanced technology unit became fully operational. Planned production: 1,000 m<sup>3</sup> of demineralised water per hour

**CONSTRUCTION SITE COMPLETE: NO INJURIES** AND ADVANCED **TECHNOLOGIES** INSTALLED.

ERG Power's SA9 plant (which produces demineralised water) has a strong strategic importance with regard to the safety and productivity of the entire Priolo multicompany site: it produces all of the demineralised water required to create steam which is then distributed to all site clients.

At the end of 2012, the revamping project for the plant was completed. A first phase of the project involved the installation of a new reverse osmosis and ultra filtration unit, built according to Best Available Techniques (completed at the end of 2011).

During the second phase, the existing ion-exchange lines were replaced.

As a result of this significant commitment, both from an economic and a human resources perspective (125,000 man-hours worked), the site will be fully operational in 2013, using advanced technology systems and a production capacity of 1,000 m<sup>3</sup> per hour: half of the capacity derives from the osmosis and ultra filtration section and half from the new ion-exchange lines.

Although large numbers of workers were on site for the duration of the works, the HSE performance of the construction site was excellent and no injuries were recorded: this important result is due to the verification and supervision activities implemented by the Group to manage the construction site and is in line with the Policy on Health and Safety and the team's commitment.

The conclusion of the work at the SA9 plant completes the project to modernise the ERG Power plants - which was launched in 2005 with the replacement of the old fuel oil plants with a modern combined-cycle plant fuelled by methane gas (CCGT) - in accordance with one of the Group's "key" commitments: robustness of assets and asset quality

### ENVIRONMENTAL IMPROVEMENT THROUGH REVAMPING

The revamping of the SA9 plant decreased its environmental impact by reducing waste: the introduction of the new reverse osmosis and ultra filtration unit in place of the previous ion-exchange line has reduced the use of resins and the quantity of chemicals used to purify water



Section of the demineralised water plant

## OUR ACTIONS TO PROTECT THE SUBSOIL

# Increased efficiency of the groundwater protection system

The ISAB Energy industrial complex was established with the aim of producing an indispensable asset for everyone: electricity. This is achieved by using asphalt from the adjacent refinery as a raw material. At the time of its inauguration, the ISAB Energy plant was the first in Europe to use this type of process. At the time, the idea was very technologically advanced and has been replicated in subsequent years across many other sites.

Attention to safety and environmental protection has always been at the centre of the advanced technology of the industrial process, which has helped the site to achieve important results in recent years in terms of HSE performance.

In accordance with the Group Policy on Health, Safety and Environment, ISAB Energy has always been engaged in investigating and monitoring different environmental matrices.

Over the years, IASB Energy has not only focused exclusively on atmospheric emissions and water discharge but also on the protection of other environmental matrices, such as the soil, subsoil and groundwater.

For this reason, over the years, extensive campaigns to characterise the local areas have been carried out, together and with the coordination of the Provincial Authorities and local ARPA (Agenzia Regionale per la Protezione dell'Ambiente, which also validated the results) and with the support of specialised companies and accredited laboratories. In particular, we have carried out extensive studies on the most suitable techniques for groundwater recovery, depending on the hydro geological characteristics of the site.

The first objective was to evaluate the more effective and efficient system according to the specific characteristics

**MEASURES** TO PROTECT **GROUNDWATER** HAVE BEEN **ASSESSED AND** IMPLEMENTED.

ISAB Energy Plants

**ADDITIONAL** 



With the engineering and construction of a modern system to collect and treat water ("pump & treat" technique), based on the installation and activation of pumping wells, placed down gradient of the facility.

The withdrawal of water directly from the aquifer constitutes in itself a hydraulic barrier that prevents any substances present in the water itself from continuing their route downstream and eventually ending up in the sea.

The water is pumped into ISAB Energy's production cycle and helps to reduce the fuel consumption required to operate the plant.

Following a thorough series of start-up and performance tests, it was possible to optimise the system calibration, which today is fully up to speed and in continuous operation.

As part of the HSE Integrated Management System adopted by the Company, a specific management and monitoring procedure was implemented and the personnel involved in the operating of the system were provided with detailed advanced training

### MARINE AREA OF SANTA PANAGIA: 2012 MONITORING RESULTS

During 2012, ISAB Energy (together with the ISAB Refinery) also completed an annual monitoring of the water in the Bay of Santa Panagia (located between the Syracuse urban area and the municipality of Priolo) in which the drain known as the "Canale Alpina" is located and includes the treated water as well as water from the cooling systems of the two plants.

The objective of the monitoring activity is to establish a framework of the ecological and chemical status of the waters in the basin and then, on a more general level, to check the status of the environment.

More particularly, the applicable "best practices" of monitoring activities included the sampling and analysis of:

- marine sediments, taken from various points in the marine area.
- seawater;
- wastewater from the "Canale Alpina";
- mussels, previously placed in the area.

From the results obtained, we can confirm that the tests are consistent with the provisions of applicable regulations and standards (Consolidated Environmental Act – TUA). The toxicological assays performed on various matrices did not reveal the presence of any toxic effect and the study of biotic communities showed a fair amount of fish and plant species. The results therefore confirmed the achievement of a balance between the industrial settlement and the surrounding marine environment

# SOCIAL RESPONSIBILITY 100% ORGANISATIONS OPERATING IN ISO 14001 AND OHSAS 18001 **CERTIFIED INDUSTRIAL SITES ACCIDENTS ON INDUSTRIAL SITES** 96.4%

PERMANENT EMPLOYEES

21%

IN EMPLOYMENT

TRAINING DAYS
PER EMPLOYEE

6.2

### HEALTH & SAFETY IS EVERYONE'S RESPONSIBILITY

# The "Safety Project" continues to spread awareness about the safety culture

The Group's awareness of and commitment to safety is ever increasing. In this regard, the Safety Project - which was launched in 2009 following an incident at ISAB Energy - performed a review of all of the processes of the various industrial sites to identify activities where it is important to spread the culture of safety, not just among employees but also among the contractors who work on site.

DIALOGUE, **TRAINING AND INFORMATION:** THE **FUNDAMENTAL FACTORS ADOPTED FOR A SAFER ENVIRONMENT.**  As presented in last year's Sustainability Report, in 2011 the project achieved all of its objectives and the changes introduced have now become an integral part of everyday activities.

Therefore, in 2012, time was taken to review the process, take stock of the work carried out and lay the foundations for the follow-up and re-launch of the project.

The "programme of work" was developed around four areas of activity: safety management tools, internal training, communication and standards and procedures.

The most effective safety management tools we chose to implement, as they were deemed to be the most appropriate to our current situation, were:

→ safety dialogues: this training targets all employees, however it is aimed primarily at Operations Managers and Shift Supervisors. In parallel, differentiated objectives were set for each task in 2012. In 2013, these objectives will also be assigned to external operators;

- → safety meetings: every month, Shift Supervisors hold meetings with their respective teams at which safety-related topics are discussed. The themes for discussion are identified by the Department Managers or are chosen based on daily operations. Following these meetings, written feedback is provided to the Manager who then has the task of taking direct or indirect action to identify a solution to the issues highlighted;
- → Champions' meetings: the "Champions of Change" (including 4 Department Heads and 2 Maintenance Managers) meet on a monthly basis with the Operations Manager and the Safety Manager to analyse and discuss the results of the safety dialogues and the safety meetings, identifying the short to medium term actions to be implemented.

With regard to training (the second area of activity), it should be noted that this commitment covered the entire internal and external workforce; training was conducted with the help of trainers selected from among employees who demonstrated strong focus and motivation with regard to safety.

The third area is **communication**, which, in addition to training, focused on internal communication methods (e.g. the Company Magazine), by preparing articles and posting regular updates on the "safety boards."



The safety boards are specific areas where all information is posted regarding safety and the actions of internal and/or external staff triggered by the analysis of safety dialogues and meetings with thirdparties to share HSE performance indicators with contractors.

Finally, various standards and procedures have been defined and/or updated, including procedures to identify incidents and near misses, the sanctions plan and the new "work permit procedure", which incorporated the procedures for hot work and working in confined spaces, giving rise to the Safework application.

In summary, the project has allowed two important results to be achieved:

- →a significant increase in employee awareness on HSE issues;
- → the greater presence of expert operators in the field who are able to verify the operating methods of contractors and detect any non-compliance, intervening as required to ensure that they also adhere to best practices with regard to safety. Contractors will no longer be the focus of targeted audits, this task has been integrated into the everyday work of all employees who come into direct contact with them.

Safety, therefore, is the responsibility of each and every one of us: the connection between the various operators and their cooperation in maintaining high standards will ensure that the workplace is a safer place to be

### **ERG AND SAFETY**

periodically

ERG believes that the full compatibility of its activities with the health and safety of workers represents a primary consideration in managing its plants and activities. ERG therefore constantly undertakes to ensure that all the companies in the group operate in full respect of the health and safety of both internal and third-party employees, and the environment understood in its broadest sense, considering these factors carefully, as early as during the development of the annual and long-term operation and investment budgets, and encouraging the adoption of health and safety-oriented technologies. All personnel, third parties and visitors to our plants are trained and informed with regard to the correct behaviour to assume in emergency situations. Visitors to industrial sites are shown a video that summarises the Emergency Plan and the appropriate behaviour to adopt. Emergency management simulations and evacuation drills are carried out

### NIGHT-TIME SAFETY DRILL

# An emergency situation simulated in cooperation with local Civil Defence representatives

To maintain a high focus on safety and prepare staff to manage a real incident, ISAB Energy conducts annual simulated emergency drills that are primarily designed to prepare, test and review emergency plans and provide specific training to all staff working in the plant, including contractors.

These drills also provide an excellent opportunity to test the coordination capacity of the management system adopted by the plant with the Civil Defence Force in Priolo, enhancing mutual understanding and trust.

For this reason, on 12 May 2012 a comprehensive exercise was carried out at the plant that involved the Civil Defence Force of Priolo Gargallo, the Fire Department of the Provincial Command of Syracuse and the local Police Force.

The drill allowed us to verify the reaction time and the means of intervention in the event of an emergency situation at night: an "accidental" break of a line was simulated, resulting in leakage into the atmosphere.

This type of event is classified as a "blue alarm", resulting in the evacuation of all non-essential emergency management personnel, the support of the Fire Department and the simultaneous

convening of the Emergency Committee which is responsible for coordinating plant safety activities and communicating with the public.

In a very short time, the Civil Defence Force set up an emergency first aid tent in front of the factory while the police controlled the traffic around the ISAB Energy facility to ensure the safety of motorists in transit.

The results of the drill were very sat**isfactory** and they showed an excellent response level, both in terms of the technical means and devices used and the action of internal and external personnel responsible for emergency management: this experience can be viewed as a further guarantee of ERG's common safety policy ■

**EXCELLENT COOPERATION** WITH LOCAL **AUTHORITIES TO ENSURE THE GENERAL SAFETY** OF EVERYONE.



### **SAFETY**

# HIGH SAFETY STANDARDS OF INDUSTRIAL SITES CONFIRMED

# The reliability and robustness of our plants is validated through periodic inspections by the Authorities

**EXCELLENT INSPECTION RESULTS: ASSET SAFETY** STANDARDS ARE CONFIRMED.

Numerous checks and controls have been planned and carried out by the competent Authorities at our industrial sites with a view to ascertaining the existence and permanence of the safety requirements on site.

At ISAB Energy, a thorough inspection, carried out every three years, took place in the first half of 2012 and was performed by a Commission composed of: the Ministry of Transport and Navigation, the Ministry of Industry, Commerce and Handicrafts, the Ministry of the Interior, the Maritime Department, the Office of Civil Engineers and the Provincial Fire Department.

The activity was divided into six different stages during which all of the plants, tanks and equipment were inspected, paying particular attention to safety and fire protection.

The inspection activities were organised across the different areas of the plant and included visual inspections and the verification of documents and records.

The inspection was completed without any reservations by the Ministerial Committee, a testimony to the high safety standards of the installations and the effective management of the ISAB Energy site ■

### ERG AND SAFETY IN THE OFFICE

Our commitment to ensuring the safety of office workers is expressed in the following activities:

- new recruits receive specific training on safety and preventive and protective measures taken in the workplace;
- at each site, an appropriate number of persons are selected and given specific training on fire prevention and first-aid measures;
- company doctors are appointed to carry out the relevant health monitoring activities (periodic medical examinations) and, at the Genoa office, there is a surgery staffed by a professional nurse and, two days a week, by a doctor;
- following changes in the organisation and to respond to changes in legislation, the assessment of the risks to which the workers are potentially exposed is updated and expanded through periodic monitoring of the work environment.

The Group maintains active collaboration with the workers' safety representatives and constantly involves them in these activities; with them we organise systematic meetings in order to discuss and evaluate any improvements that could be made

# SAFEWORK, THE NEW TARGETS

# Work has continued on the development of this innovative software tool that aims to improve plant safety management

We started talking about Safework in the 2011 Sustainability Report, describing the important technological contribution to safety brought about by the implementation of the Safework project which aims to computerize the Work Permit procedure for contractors operating on ISAB Energy and ERG Power sites.

We are currently developing release number 4 of the software, an initiative that originated from the general Safety Project, which aims to harmonise safety standards across our plants, and the Rainbow Project, which aims to optimise operational processes across the various sites.

The implementation of these objectives is certainly ambitious, for two reasons. First of all, although the new procedure does not revolutionise the safety management philosophy adopted to date, it does, however, significantly improve the way the

staff involved work.

Secondly, the application has been implemented in a very short period of time, considering the broad operating scope of an IT application of this type.

Therefore, in order to ensure the on-time achievement of targets, once the milestones were identified and the minimum functionality required in order to apply the new procedure was defined, the software development was managed as an "in progress" project, reducing the delivery times of some phases and accepting the risk of potential non-functional rework. Finally, a cross-functional project team was identified to manage the roll-out of the new application and the entry into force of the related operating procedure.

The application was first released in ERG Power, which adapted quickly to the new procedure for issuing work permits. The software development followed three steps, the first of which was the "go live" of the system on 21 November 2012 containing the minimum functionality required to process a large part of the changes introduced by the procedure. The remaining functionality, along with the enhancements and improvements suggested by users when using the software, will be implemented at a later date.

These changes will include: the identification and recording of all activities required to prepare the relevant areas for "work in confined spaces", the subsequent management of the works themselves and the verification of the professional preparation of the person appointed to supervise the activity.

The design process is expected to be completed in early 2013: the final product will be an innovative and useful tool, the result of the involvement of all safety actors across all of our sites

**HARMONISED SAFETY STANDARDS IN PLANTS AND OPTIMISED OPERATIONAL** PROCESSES.

### SAFETY

# CONFINED SPACES AND GENERAL MAINTENANCE: CAREFUL, DETAILED MANAGEMENT

# Strong, meticulous commitment to applying the Safety Management System for work in hazardous environments

The operating sites may contain hidden hazardous work environments and, as a result, public opinion and the technical community have placed strong focus on the need to deal exhaustively with the procedures of risk assessment and management in particularly hazardous areas, as also provided by law.

For this reason, in particular, the theme of safety when working in confined spaces has been the subject of strong commitment by ERG, due also to its strong multidisciplinary structure.

Across the Group sites, certain tasks require staff or contractors to work in confined spaces, particularly with regard to general or extraordinary maintenance activities at the plants. The Safety Management System has been "enhanced" for such situations, addressing a number of different areas, including:

- → the identification of suitable companies to perform work in confined spaces, controlling the entry of workers to the production site according to their experience and prerequisites defined in the applicable standard;
- →the identification of confined spaces and the analysis of the emergency measures to be taken depending on the specific risks present in each space;
- →the selection of staff trained in carrying out environmental testing in

- confined spaces and/or where pollution is suspected;
- → the mobilisation of teams trained to carry out emergency operations with special techniques (rescue in confined spaces or at height);
- → conducting specific training, information and education sessions.

In particular, the procedure created by ISAB Energy Services (the company that manages the ERG Power and ISAB Energy plants) contains the minimum set of activities required to be performed during opening and prior to accessing a confined space: recovery, isolation and cleaning.

Once the preliminary activities have been performed, it is essential to ensure that the confined space is suitable for workers to access. To do this, environmental tests are carried out by qualified technicians. If it is reasonable to assume that the concentration of hazardous substances in the atmosphere will not suddenly deteriorate, the environmental tests are repeated periodically or any time that work activities are suspended. The worker is also provided with gas and explosion detectors to ensure operator safety.

Continuous monitoring is carried out in cases where, for any reason, sudden

THANKS TO THE **MANAGEMENT** SYSTEM, **EQUIPMENT LOCATED IN CONFINED SPACES WAS MAINTAINED WITHOUT ANY** INJURIES.

changes in hazardous substance levels may occur, possibly also as a result of the work being carried out (e.g. welding, washing equipment containing chemicals etc.).

Despite all the precautions described above, it is important to always consider unexpected situations that could be caused by traumas or illnesses that are not attributable to the work being carried out. In this case, given specific characteristics of the work environment, the recovery of the injured party can be a complex task, therefore the chain of survival must be put into motion as quickly as possible.

The individual responsible for monitoring the confined space therefore plays a fundamental role: he is in charge of maintaining eye and/or verbal contact with the workers inside the equipment. His training is very important: he must know at all times how many people are under his control, the location of the nearest emergency communication devices, and must send the initial alert to the rescue team.

A team of rescue workers with special techniques must be present on site at all times. The team is responsible for:

- → carrying out rescue activities in confined spaces;
- → drawing up a rescue plan for each type of equipment;
- → training all workers operating within confined spaces;
- →showing workers how to use the devices in their possession;
- → verifying that everyone complies with the requirements identified in order to carry out the work.

This method of operation has now become an integral part of the Integrated Management System for Environment and Safety implemented at the Group sites and it enables us to maintain - especially in these situations - a high level of focus and caution



**SAFETY** 

### A DAY OF TRAINING FOR MANAGEMENT

# Training for Executives, Managers and Supervisors on "Italian Legislative Decree 81/08 and the State - Regions Agreement"

A SPECIFIC HEALTH AND SAFETY **TRAINING COURSE TO EXPAND THE USEFUL TOOLS FOR EVERY DAY** MANAGEMENT.

On 25 October 2012, ISAB Energy Services organised a training event for Executives, Managers and Supervisors on the subject of Italian Legislative Decree no. 81/08. The guest speaker at the session was Professor Raffaele Guariniello, coordinator of Group Health and Safety at the Public Prosecutor of Turin and responsible for the most important proceedings with regard to Occupational Safety. He presented the key points of the Decree, breaking them down into detail according to the specific needs of the audience.

Several themes were discussed: the centrality of the Prevention and Protection System to insurance protection, the delegation system to the criteria for the qualification of companies and risk assessment to the civil and criminal

liability of everyone working within the company.

The meeting was characterised by a useful detailed discussion on legal and regulatory issues, management and organisational issues and obligations related to tender contracts.

The Professor provided clear answers to all of the questions asked, providing examples of real cases and practical situations.

It was an intensive day that went beyond its training purpose, it also aimed to provide company management with insights and tools to enhance their own cultural identity in relation to the daily management of work activities



### WHEN PEOPLE MAKE THE DIFFERENCE

# A project dedicated to the professional development of people

The Group's objectives of profitability and value creation should be supported by adequate actions that involve people, in line with process organisation.

For this reason, ERG accompanied the definition of its long-term business plan with a new "People" development model, which focuses on four areas:

- → creation of value through people.
- → participatory industrial relations;
- → recruiting & inclusion;
- →communication and involvement

The project includes all of the tools, processes and actors involved in people development. The basic idea is to influence the highest levels of individual motivation - i.e. success and self-fulfilment - and aims to involve all levels of the organisation.

It also aims to create a work environment that allows employees to initiate development projects, creating significant experiences which are rich in terms of professional and personal content.

At the same time, however, the initiative requires the person to be available, interested in stepping outside their "comfort zone" and to bring their own resources to the table in order to achieve even more significant results.

To facilitate this process, we are rolling out training to all managers to start them off in their role as facilitators of an organisational culture that is focused on people development.

2012 also saw the introduction of a new management competency system, defined by the Human Resources Committee, on the basis of which we have introduced tools and processes dedicated to people development.

Intensive growth paths for management candidates, 360° feedback and management feedback with the construction of the individuals own development plan are just some of these new processes.

In 2013, we will continue to progressively involve the entire workforce, we will establish training "construction sites" aimed at developing the employability of people and we will create new avenues of growth to transform "People" from a project to ... a new reality.

### **CREATING VALUE** WITH PEOPLE

### ERG has chosen shared leadership as its management development model,

which means that the management team is heavily involved in the development of human capital, which is seen as a factor of corporate competitiveness.

For this reason, the Human Resource Committee was established (consisting of the CEO's direct line management),

in line with changing business conditions to meet the challenges of competitive-

ness <

→ career paths;

→talent management;

which is responsible for defining and monitoring the main people development programmes and activities and supporting the Executive Vice Chairman and the CEO in the main decisions with regard to management and organisational issues.

During 2012, the Committee met every two months and monitored the main human capital development processes:

→job evaluation & succession plan;

**PEOPLE** 

### WORKERS AT THE CORE

# The Importance of Industrial Relations to engage and develop human resources, the Group's true strength

ERG's highly relevant commitment has always been to involve all staff in Group activities with a view to developing specific skills, mutual respect and fostering continuous comparison.

We remain convinced that human resources are a key element of corporate competitiveness, which is crucial in order to successfully deal with the new challenges that the market presents.

Confirming the centrality of workers, the Industrial Relations Department focuses on improving dialogue between the parties at all levels and defining clear and functional labour agreements with a view to obtaining an adequate level of consensus on corporate strategies.

In 2012, this system of relations supported and encouraged the development of the Group's efficiency and organisational change processes.

The health and safety of workers is one of the main issues that concerns Industrial Relations, therefore, dialogue was organised between the company and employee representatives based on a participatory and collaborative consolidated model.

This system, based on frequent and constructive dialogue, has contributed to the widespread dissemination of the risk prevention culture and has increased awareness of safety issues. In particular, we have implemented and applied specific operational risk procedures at the Group offices.

In addition, monitoring and controlling the risk of "work related stress" was given

SAFETY, TRAINING, **JOB ROTATION** AND WORK-LIFE BALANCE.

Another important theme supported and developed by Industrial Relations is training, which is essential in order to foster and accelerate the personal and professional growth of resources. In this regard, ERG has defined trade union agreements to implement "funded" training pro**grammes**, targeting all Group personnel. The final objectives are: to ensure the achievement of greater professional competence, to ensure more involvement, to create a better business climate and to increase consistent behaviour patterns.

With regard to people development, we prefer to look internally to fill vacant positions and we note that this opportunity for dialogue between managers and employees can also be a useful moment to assess any opportunities for professional growth.

In addition, in order to facilitate work-life balance, we have developed and defined with the trade unions a number of flexibility and support tools:

- → non-standard working hours to facilitate the return from maternity leave for working mothers;
- **→ part-time work**, on a voluntary basis and in accordance with the operational and organisational requirements of the Company;
- → crèche and nursery school contributions, periodically adjusted to bring it in line with the cost of living;
- → authorised leave of absence for medical visits;
- → flexible management of bank hours.

In addition, through the CRAL (Company Sports and Social Club), ERG continues its efforts to enrich the lives of retired employees, encouraging them to meet and exchange human and cultural values.

Many cultural, artistic, sporting, tourist, recreational and humanitarian initiatives are organised during the year thanks to the voluntary collaboration of numerous employees who add significant value by contributing both their professional and personal experience

### ERG AND THE UNIVERSAL DECLARATION OF HUMAN RIGHTS

The recognition of human rights is considered by the Group to be one of the fundamental bases for conducting business to the point that reference is made to the principles of the 1948 Universal Human Rights Declaration in the Preface of the new edition of the Code of Ethics approved in November 2011. The company has also analysed the problem from the practical point of view and in its operational and economic setting, however, as the ERG Group operates mainly in Italy or, at most, in Europe, we believe that the recognition of Human Rights is not a concern for us at the present time ■

### **PEOPLE**

### SELECTION OF RESOURCES

# An important process in order to "grow" future managers internally

ERG's selection process represents the first fundamental step towards the assessment of potential and inclusion in the management development process.

The main recruitment sources used are the internal recruitment database (consisting mainly of spontaneous applications received through the corporate website) and databases of universities and/or professional schools with which the Group cooperates to define and implement curricula, insertions and specific research conducted by specialised companies.

The criteria for selection are:

- →education (type of degree/diploma, final grade and course duration);
- →basic skills (languages, office automation);
- →aptitude/motivational profile (a certain level of relevance assumes the consistency of the candidate's profile with the ERG managerial style);
- →appropriate technical profile in order to perform the duties of the "vacant" position (this profile is defined in conjunction with the functional area for which the search has been performed);

- → willingness to work at national and international levels;
- → extensive professional experience.

In particular, we seek people who are strongly oriented towards excellence of results, who are motivated, able to work in a team, curious, open to new experiences and willing to learn throughout their career.

The final objective is to build the managers of the future internally and offer each resource the ideal environment in which to develop their talent and potential.

In order to align the world of education more closely with the reality of work, ERG develops insertion plans to welcome young students on work placement.

Through the Edoardo Garrone Foundation, ERG supports the Scuola di Alta Formazione al Management in Turin in collaboration with the Giovanni Agnelli Foundation and the Pirelli Foundations and together with the Association du Collège des Ingenieurs in Paris, using it as an opportunity to attract and train young talent

**OUR AIM IS** OFFER EVERY **RESOURCE THE OPPORTUNITY** TO DEVELOP **HIS/HER TALENT** AND POTENTIAL.

### HUMAN RESOURCE NUMBERS

At 31 December 2012, ERG Group had a total internal staff of 613: during the year, 48 people left the company and 9 were taken on, resulting in a balance of 39 fewer staff than in 2011.

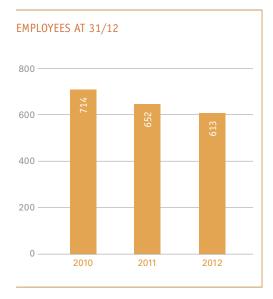
The turnover dynamics are presented in the graphs on the following pages.

The division of labour between the various Group companies is as follows:

- → ERG S.p.A. 280 people;
- →ISAB Energy Services S.r.l. 285 people;
- → ERG Renew 36 people;
- → ERG Oil Sicilia S.r.l. 12 people.

By analyzing the macro phenomena for the year, we discover that the decrease in ERG S.p.A headcount was mainly due to the sale to IREN of the business unit concerned with the marketing and sale of electricity in the wholesale segment: this operation did not result in any layoffs and all of the resources were absorbed by the acquiring company.

The average age of staff is slightly lower at 43 years and the level of education shows that second and third level graduates account for approximately 93% of the population



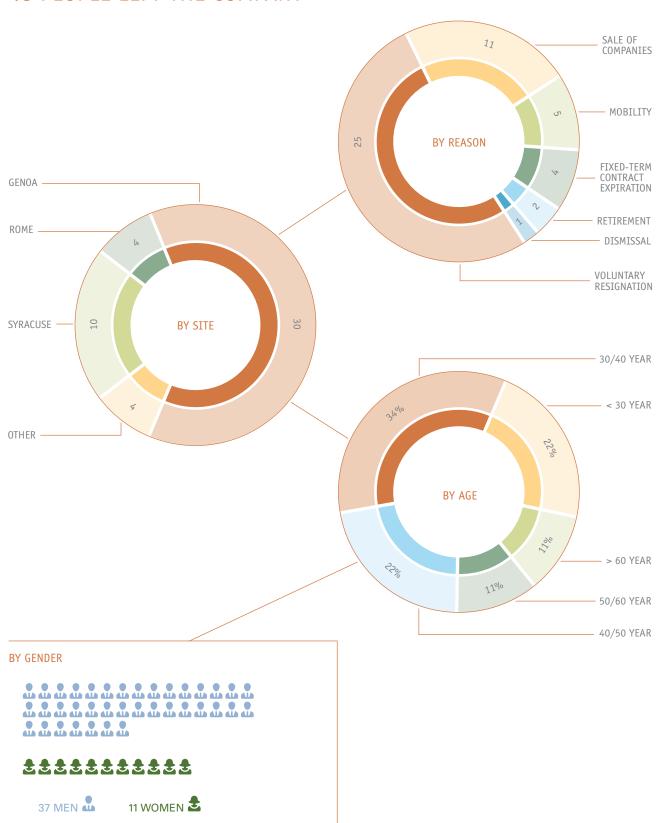
### **ERG AND PEOPLE**

"People are the indispensable factor for the existence, development and success of any business; ERG therefore pays particular attention to valuing, protecting and developing the abilities and skills of all its employees so that they can realise their full potential and professionalism and, as a result, contribute to reaching the Group's objectives with regard to compliance with its social and environmental responsibility commitments defined by management.

ERG offers to all persons equal employment opportunities, according to their professional features and performance capabilities, without any discrimination, condemning every criminal act against the individual and committing to adopt the most appropriate supervisory measures to this end". (ERG Group Code of Ethics)

93% OF **STAFF HAS A UNIVERSITY DEGREE OR SECONDARY SCHOOL** DIPLOMA.

# 2012 STAFF TURNOVER: 48 PEOPLE LEFT THE COMPANY



22

7 MEN

2 WOMEN

### **PEOPLE**

### SKILLS AT THE CORE OF THE CORPORATE SYSTEM

# Leadership, Coaching, Teamwork, Intrapreneurship and Vision are our core competencies

The famous American psychologist, McClelland, through his applied studies on the psychology of personality, which was then continued by his pupils, R. Boyatziz, LM Spencer and SM Spencer, was the first person to introduce the modern concept of competency.

According to the definition by this historic school, "competency is an underlying characteristic of an individual that is causally related to criterion-referenced effective and/or superior performance (...) measured on a specific criterion or standard."

**SKILLS AND MOTIVATION:** THE KEY **ASPECTS ON** WHICH TO FOCUS **MANAGEMENT POLICIES AND HUMAN RESOURCE** 

**DEVELOPMENT.** 

Therefore, it is a component of personality that allows individuals to pursue objectives and obtain the desired results.

This component is in turn determined by elements of work experience, knowledge and skills (know how).

Today, a number of factors have transformed the way we work:

- →the increasing complexity of companies:
- →increasingly flexible and evolving tasks;
- →the strong connection between work and technology;
- → the importance of lifelong learning;
- →new organisations often centred on working in project teams.

Work has therefore become difficult to programme and the activities of people cannot easily be predefined, resulting in a context where competencies (i.e. the set of skills, knowledge and experience of an individual) combined with motivation become an essential resource and a key aspect on which to focus Human Resource management and development policies.

But how do you recognise skills in people and measure them?

A competency is expressed through behaviour: everyday activities that are observable by everyone and which, if they are well described, can be easily traced back to the same competency.

The definition of competencies and the observable behaviours related to them therefore constitute the first two elements that make up the corporate competency system.

The assessment scale can then be added to these two elements, through which the intensity of the individual behaviour can be measured. The "frequency" of the action then allows you to measure the level to which that competency has been acquired.

Today, many companies have implemented their own skills management systems, however, although they may be similar to one other, the behavioural elements are often very different because

they represent the specific culture of the company and become a sort of qualifying identity card for the Group and its employees.

ERG implemented its first competency system in 2007, identifying Authority, Coaching, Team working, Entrepreneur skills and Vision as its reference competencies.

Since then we have witnessed significant changes, both from a business and an organisational perspective therefore, during 2012, the Human Resources Committee reviewed the competency system and, working on four different fronts, it:

- → revised certain skills;
- → highlighted the behaviours which are considered more functional;
- →introduced new concepts that are best suited to the new nature of the business;
- → revised the assessment scale.

The main changes concern primarily the definition of the competency and a description of the relevant behaviours, which have been made more understandable and immediately observable. In addition, individual behaviours are no longer listed in order of importance, as in the old system, they are all equally representative of the associated competency.

Entrepreneur skills has been replaced with Intrapreneurship to emphasise the aspects of accountability and timeliness related to this concept (where timeliness means speed of action associated with an adequate level of accuracy).

The other skills have remained the same. Other concepts that emerge from the overall system are valuing others, the use of emotions (their own and others), orientation to discontinuity, respect for deadlines and alliance with co-workers, with the understanding of "Head" as being the sum of leader, manager and coach.

With regard to the assessment system, it is interesting to highlight the significance attributed to value 4 (on a scale from 1 to 5), defined as "infectious behaviour": particular importance is assigned to the ability of a person to spread a positive behaviour, getting other people to "mimic" them and retain that behaviour as best practice. In practice, positive assessments are not only associated with behaviours that are included in the model. employees should also become "drivers" or active promoters of the ERG culture and methods.

The competency system is one of the tools that will spread throughout the company (also as part of the People project) a culture that reinforces the passion for work, identification with the company, the high quality of results, respect for others and the timeliness of thought and action.

Finally, the new competency system it is also a "source of inspiration" for some of the development tools used by Human Resources, such as Management Feedback, Extended Management Assessment, 360° feedback, Training Plans and Matching resources to available positions

**INFECTIOUS BEHAVIOUR:** TO BE A DRIVER AND PROMOTE **ERG'S CULTURE** AND METHODS.

# TRAINING: A COMPREHENSIVE, DETAILED PLAN

# Three training areas consisting of updating technical skills, mandatory training and managerial training

**A TRAINING PLAN TO** COMMUNICATE THE VALUES THAT **REPRESENT OUR EVOLUTION.** 

Once the principles of corporate competencies (see previous paragraph) were defined, we developed our training plan with the aim of communicating to all staff the values that we look for in people.

Training in ERG can be divided into 3 main categories:

- → technical and specialist training;
- → mandatory training (by law);
- →institutional, managerial and behavioural training.

The technical and specialist training is aimed at professional development with a view to maintaining high standards of technical expertise of staff based on the specific job profile.

This training takes place mainly by participating in seminars, conferences and inter-company workshops and is organised by the best training schools in Italy and abroad with regard to the specific sector in question.

THE SEMINARS ARE DESIGNED AND TAILORED **TO OUR NEEDS** AND OUR **OBJECTIVES.** 

Mandatory training ensures that all the HSE regulatory requirements are met. In this regard, all Group companies, in accordance with the provisions of the State-Regions Agreement with regard to safety training, organised special training sessions, reaching the vast majority of employees by mid-December 2012. The importance of this commitment is

shown in the graph below, where we see a significant increase in training hours compared to the previous year (almost 31 thousand hours compared to approximately 24 thousand in 2011).

With regard to institutional, managerial and behavioural training the main objective is to encourage people to acquire the knowledge, techniques and behaviours to enhance their performance and that of the team in which they work. Training is in the form of seminars, often using experiential methodologies, with a strong "practical" focus in order to apply the skills learned to real life situations of each trainee.

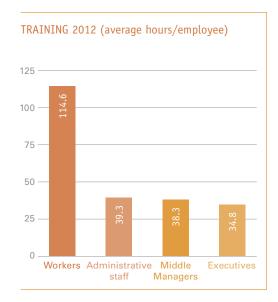
The seminars are based on the behaviours explained by the corporate competency system and are therefore specifically designed and tailored to ERG, reflecting

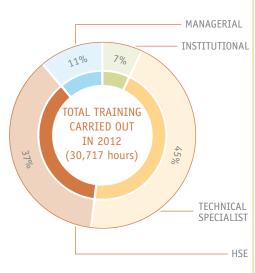
### ENGLISH LANGUAGE TRAINING COURSE FOR SHIFT WORKERS

In 2012, following the logic of corporate welfare and with the aim of promoting the understanding of technical texts which are more and more frequently written in English, an English language training course was rolled out to all shift workers

people.

complete redesign: the activity began in 2012 and will be fully implemented in 2013 as part of the People project





### **PEOPLE**

# MANAGEMENT REMUNERATION POLICY

The remuneration of Directors and Executives is defined based on the achievement of strategic objectives and the creation of value

THE SYSTEM IS DESIGNED **TO PROMOTE** THE MAXIMUM **ALIGNMENT OF OBJECTIVES BETWEEN MANAGEMENT** AND SHAREHOLDERS.

Pursuant to the Code of Conduct, in 2011 ERG established its management remuneration policy which is applicable to members of the Board of Directors of ERG S.p.A. and Executives with strategic responsibilities in the conduct of their business activities. The policy is applicable for the period 2012-2014, consistent with the term of the Board of Directors. The remuneration system chosen by ERG S.p.A. and its subsidiaries is one that is

likely to attract, retain and motivate highly qualified management personnel and is designed to promote maximum alignment in terms of objectives between management and shareholders.

The compensation is divided into two components, one fixed and one variable, determined through benchmarking with other listed companies operating in the Italian market. The two components

# are properly balanced according to the strategic objectives and policy of risk management:

- → the **fixed part** is sufficient to compensate the manager with strategic responsibilities for his/her performance in the event that the variable part is not paid for failure to achieve the performance objectives;
- →the variable part is linked to the achievement of specific objectives to create value over a period of three years.

For the CEO, the variable part is determined in accordance with the performance of the Group's EVA indicator (Economic Value Added).

For managers with strategic responsibilities, the variable part is divided into mid to long-term incentives (LTI) that adhere to the process described above, and short-term incentives (MBO), which are described in the next section

### WHAT IS EVA

The EVA is the "residual" monetary value after all of the production factors have been paid, including the cost of capital invested. It expresses, therefore, an income net of the cost of capital; EVA considers the asset and financial components alongside the income

**PEOPLE** 

# MANAGEMENT BY OBJECTIVES, A PROCESS TO PUT FOCUS ON OUR OBJECTIVES

# A new system to identify targets and evaluate the performance based on the results achieved

In ERG, more and more attention is being paid to the processes of assigning objectives and performance assessment.

For this reason, Group managers have been involved in various training courses to learn to:

- → build individual objectives capable of determining business performance in line with expectations;
- → support the process throughout the year through coaching and feedback;
- → manage the year-end performance reviews as a space for the development of the person.

In 2012, as part of the Performance Management process, Management By Objectives (MBO) was launched at the highest levels of the organisation: a useful system to place increasing focus on the business priorities defined at the time the annual budget is developed.

Therefore, we have moved from a system that combined managerial performance and objectives to two separate processes with their corresponding tools, which will be rolled out during the year.

ERG's MBO requires the formalisation of:

268 **OBJECTIVES**, **ALL CERTIFIED FOR SYSTEM** CONSISTENCY AND LEVEL OF CHALLENGE.

- → 4 objectives (one corporate and 3 individual);
- →indicators to measure actual achievement:
- →targets, they can be numerical and should allow the result achieved to be identified, taking advantage of its nuances (80%, 100%, 120%).

Each objective is linked to a percentage of the individual's variable remuneration: 30% for shared corporate objectives and a total of 70% for the 3 individual objectives.

From a process perspective, by cascading top-down objectives including all levels of the organisation, 268 objectives were assigned: Human Resources Management Control has certified the consistency of the system and the level of the challenge given.

The process is simple but rigorous and it has allowed us to achieve an important result: At 31 December 2011, all participants had received their objectives and by 31 January 2012, all the targets and indicators had been defined.

Since this system is critical to ensuring the Group's results, during the year a specific time was identified where the CEO's first line staff monitored the performance of each individual objective,

replacing any objectives that are no longer a priority, as applicable.

While, for ERG, MBO is a tool to focus people on objectives and then reward their performance in a manner closely linked to results achieved, managerial performance follows a different process, known as management feedback, which focuses on the development of the person and the construction of a growth path that each employee proposes to his/ her supervisor.

The logic behind the growth path is that each individual should take responsibility for his/her personal and professional development.

In summary, we are moving more and more towards tools capable of valuing our people, highlighting our achievements and continuing to stimulate growth management, at all levels

### **EMPLOYEE OBJECTIVES**

In 2012, the process of assessing performance by assigning individual objectives that are directly related to the Group objectives was also extended to Category 2 employees: to date over 305 people are involved in the performance management process, amounting to approximately 50% of the workforce

### FROM DIALOGUE TO INVOLVEMENT

Numerous internal communication projects and activities to improve information sharing, simplify work processes, and promote company culture and values

**FOCUS ON ERG'S CURRENT** AND FUTURE **IDENTITY AFTER** A JOURNEY OF **GREAT CHANGE.** 

In 2012, the Internal Communication activities were guided by the objective, on the one hand, to facilitate the sharing of information and the simplification of work processes and, on the other, to continue to promote company culture and values, increasing the sense of belonging and openness to collaboration between people. To achieve this, some of the events and activities already under way in 2011 were consolidated and new tools and methodologies were introduced which were more focused on listening to people.

### **PROJECTS**

### **ERG** strategic identity

At the end of a cycle of profound changes which have affected our business and involved our people, Top Management and the Human Resources department felt that it was time to start a process to focus on ERG's Strategic Identity, understood as being everything that makes our past and future company recognisable in a full and distinctive way, differentiating it from the ERG of the past and also other similar companies or competitors.

The "road map" of the journey was created in the second half of 2012 with the support of an agency specialising in communication strategy and was presented to management in December of the same year. The road map will be enhanced in 2013 by identifying the lines of action.

### THE INFORMATION TOOLS

### **Intranet portal**

Following a requirements gathering phase (involving 270 people) carried out in late 2011 in preparation for the implementation of the information architecture of the new intranet portal, ERGate2 was released to all users in September 2012, including the operating personnel based in the plants. Additional dialogue, information and cooperation tools were gradually implemented in November and December 2012, thus providing staff with more modern methods and functionality that is closer to their "mental model", simplifying the work methods and increasing visibility for employees.

**NEW INTRANET PORTAL RELEASED TO STIMULATE** DIALOGUE, **INFORMATION SHARING AND COLLABORATION.** 



## **Internal publications: TeamERG** and Megawatt

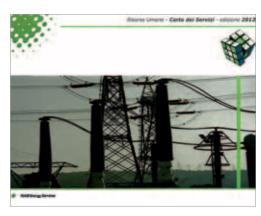
In 2012, the quarterly magazine, Team-**ERG**, continued to be published. The magazine remains a valuable tool for obtaining additional information on the activities of the Group and its partner companies -ISAB and TotalErg. Each issue of the magazine is distributed in 2,160 copies and is made available in a browsable format on the intranet.

The companies in the thermoelectric sector produce a monthly "newsletter", Megawatt, to periodically review the results achieved, analyse the short to medium term objectives and share useful information regarding leisure activities. The newsletter is distributed in hard copy to employees of ISAB Energy Services and is available to all employees on the Group intranet.



### **IES Service Charter 2012**

In 2012, the new edition of the IES Service Charter was distributed to all



employees of ISAB Energy Services. Inside, the booklet contains information about social welfare and insurance funds, business cards, leisure activities and internal communications.

Other items include handbooks and memos on training, site Information systems, policy meetings, e-mail, cars and basic elements regarding the management of First Aid boxes.

The Charter also contains useful telephone numbers of the main contacts in General Services.

The document will be replicated in 2013 for the other Group companies.

### **EVENTS**

### **Group Meetings**

In 2012, the six-monthly meetings between Top management and management continued to be held, the contents of which have been further expanded thanks to the contribution of participants who provided useful information by responding to specific satisfaction questionnaires.

The speakers at each Group Meeting were recorded and posted on the portal, as were the individual reports, in order to share with all Group resources more

energy sources and the production processes of the plants.

The last activity of the day was a guided tour to see where their parents work; this involved either a bus journey to visit the plants or a quick walk to visit the offices.

The tour of the facilities in Syracuse was attended by the children and 120 family members of employees.

detailed and up-to-date information on the company's performance and the development of the individual business areas.

## **Communications from Top Management**

Top Management's commitment to issue timely communications on important issues (where possible in real time) to all personnel was continued in 2012.

One example was the communication of the "handover" between Alessandro Garrone and Luca Bettonte and the recording of the meeting between the ERG Executive Vice Chairman and the CEO with financial analysts to present the business plan 2013-2015.

### **Focus**

The schedule of meetings - "Focus" also continued in 2012. The purpose of Focus is three-fold: to provide people with more information on the business, to give visibility to "who does what" in the company and to promote discussion in an open and informal environment. Each meeting was organised via videoconference with the office in Rome and almost all have been replicated at the Priolo site.

### Family Day

Designed to promote greater integration between the family and the workplace, the first ERG Family Day involved parents with children aged between 4 and 11 years: 38 children participated in Genoa and 55 in Syracuse.

During the event, the children were involved in recreational and educational activities on the subject of the different



### Christmas events

In order to foster greater involvement and disseminate the corporate culture, in 2012 we organised a Christmas party totally dedicated to staff with a view to encouraging conviviality and exchange.

The festive event brought together all of the people located in Genoa and Syracuse (650 people in total). It was an ideal opportunity for staff to spend time and chat with Top Management.

**2012 NEWS** FLASH, THE **FAMILY DAY INVOLVED 38 CHILDREN IN GENOA AND 55** IN SYRACUSE.

### **OTHER INITIATIVES**

### Marathon and half marathon of Amsterdam

Following the large numbers that signed up for the New York Marathon, ERG decided to organise a group to take part in the Amsterdam marathon. 27 marathon runners ran in the ERG and TotalErg colours on 21 October 2012. Why Amsterdam? Because, in addition to being a quick race along a magical route, it is also possible to run a half marathon, which made it possible to involve many colleagues who did not have enough athletic preparation to run a full marathon. To organise an ERG team for a second time was an important commitment that gave us the opportunity to spend time together and share the excitement of a genuine team experience.

## **National Oil** Championship

In 2012 a large group of ERG athletes - 30 including runners and cyclists - represented the company at the National Oil Championship, the multidisciplinary sports event established in 2000 by the Italian oil companies



The Amsterdam marathon

### **COMMUNITY**

## A MULTI-SENSORY JOURNEY

# "Dialogue in the Dark" teaches us to "see" the world from another perspective

In 2012, ERG was a partner of the "Dialogue in the Dark" project, a multi-sensory journey in total darkness, on which expert blind guides take participants through areas that are part of everyday life and which, when revisited without any visual stimuli, reveal new perspectives and all of the potential of the "other" senses. This experience also provides an opportunity for participants to exchange skills, developing and promoting trust in others.

"Dialogue in the Dark" develops a concept that is well established in many countries and which has been organised in Italy for several years at the Institute for the Blind in Milan.

With our support, the project was offered in Genoa for the first time by the David Chiossone Institute and ran from 13 October 2011 to 30 June 2012. It is expected to reopen on a permanent basis in the first half of 2013.

Having hosted the experience, Genoa now numbers among a group of twenty cities around the world that regularly host this event: Milan, Vienna, Monaco, Frankfurt, Hamburg, Tallinn, Moscow, Holon (Israel), Johannesburg, New York, Atlanta, Buenos Aires, Hyderabad (India), Singapore, Bangkok, Hong Kong, Shanghai, Taipei (China), Tokyo and Seoul.

The new project involves installing the "Dialogue in the Dark" experience on a barge moored in front of the Museum of the Sea, which was donated by Fincantieri. Until now, the barge had hosted public functions (Urban Lab offices).

Currently, the Entities involved are performing ongoing checks and obtaining the necessary certifications for the structure (security systems, fire prevention certificate, access restrictions, etc.), which are required in order to transform it into a suitable venue to host the event

### DIALOGUE IN THE DARK IN GENOA: THE NUMBERS RELATING TO THE FIRST EXPERIENCE (2011-2012)

260 square metres of surface structure; 23,000 visitors, 6,000 students and 700 participants at the Happy hour in the dark; 50 participants at the dinner parties in the dark; 14 blind guides.

Number of people employed: 14 blind guides and 6 people, including secretarial and organisational positions. Media visibility: more than one hundred articles and reports from local media, in hardcopy format and online. Opening days: the exhibition was open for 227 days with an average of almost 100 visitors per day

YOU CAN SEE, BUT NOT WITH YOUR **EYES. LEARN ABOUT USUAL** THINGS FROM AN UNUSUAL PERSPECTIVE.

# A GAS PIPELINE TO SUPPORT HOUSEHOLDS AFFECTED BY FLOODING

# The project for a new, safer and more efficient network

PRACTICAL HELP **TO ENCOURAGE** A RETURN TO **NORMALITY** AND INCREASED TOURISM.

In 2012, ERG, in collaboration with IREN Mercato, decided to design and implement a new gas pipeline network completely free of charge in the municipality of Vernazza, including the village of Corniglia.

The infrastructure will replace the LPG network that was destroyed by the floods of 25 October 2011.

The new pipeline will be 11 km long, will serve 706 users and will facilitate the

transition from LPG to methane gas. In this way it was possible to eliminate the LPG tanks and a direct connection to the national grid, with easier management and greater safety and continuity of supply guarantees.

The work has made a real contribution to the return to normality and the resumption of tourism in the villages which, in an area such as Cinque Terre, represents an important source of income for the local community ...



The route of the new pipeline

### **COMMUNITY**

### THE SAN GIOVANNI PROJECT

### An initiative to support disadvantaged groups and protect the environment

The San Giovanni Project is the result of a three-year agreement between ERG and Consolidas, a consortium of cooperatives in the network of social enterprises, CGM Welfare Italy. The agreement provides support for a cooperative formed by workers from disadvantaged groups (people with disabilities and people receiving treatment at the psychiatric services of the Provincial Health Unit of Syracuse) who are engaged in gardening activities. This initiative was made possible through stakeholder engagement activities in the community, which emphasised the need for action in the areas of assistance to disadvantaged groups and the enhancement of public urban areas.

Launched in January 2012, the project was entrusted to the "Green Service" cooperative which is responsible for maintaining the public garden in Piazza San Giovanni in Syracuse, a place that is regularly frequented by families with small children. This was made possible through

an agreement with the Municipal authority of Syracuse, which entrusted the management of the green area to Consolidas. The San Giovanni Project is designed to implement and test a governance system organised in the community, involving many actors, all of whom are focused on

### common development goals:

- → consolidas ensures the availability of funds through the three-year agreement with ERG, to properly support the rehabilitation programmes;
- → the Provincial Health Authority of Syracuse ensures the continued care and rehabilitation of patients within their Mental Health Service, with the opportunity to provide therapeutic support for three years;
- →the Municipal authority of Syracuse, depending on its programme, assigns the management and maintenance of green areas to private entities, providing the community with the use of an area at risk of degradation

Piazza San Giovanni in Syracuse

**A PROJECT** 

TO PROMOTE

**SOCIAL AND** 

**OCCUPATIONAL** 

REINSERTION.



### RESTORATION PROJECTS

As part of its activities in the community of Syracuse, ERG has contributed to the restoration of the wooden choir of the basilica Santuario di San Sebastiano and the creation of the stained glass windows in the Chiesa Madre in Melilli

# WHEN THE PUBLIC AND PRIVATE SECTORS JOIN **FORCES**

### ERG and ISAB support the well-being of cancer patients and their families

The Survivors Project is the three-year continuation of a collaboration between the Provincial Health Authority of Syracuse, ISAB and ERG Group and Project RAO (Ambulatory Oncology Network), established in 2007. The start-up was made possible thanks to our contribution that enabled the service to be managed across three hospital areas in the province of Syracuse (Avola, Augusta and Lentini), inspired by a new concept in treating cancer patients according to criteria of proximity and affordability. Since its inception, approximately 1, 000 people affected by cancer have been able to benefit from the service.

Thanks to early diagnosis and scientific advances, the life expectancy of cancer patients is rapidly increasing, therefore, dedicated assistance and support is required for families who are caring for their loved ones.

This will involve a considerable effort from private and public entities, including the education and training of professional oncologists to ensure the well-being of all patients and their families, paying attention to the needs of people of different ages.

Specifically, the initiative involves opening and managing an ambulatory clinic for cancer suffers with a survival prognosis of more than 3 years. Patients receive support for all aspects of their general, physical and psycho-social health based on existing experience, the international literature on the subject and the needs expressed during doctor-patient visits.

To date, the activity has been carried out in the Department of Oncology at the Avola Hospital

### ERG SYRACUSE SUMMER CAMP

"Estate Ragazzi in Gamba" an initiative (now in its seventh year) reserved for children of ERG Group employees in Sicily. The programme of activities is based at the ERG Club, home to ERG's social club, Dopolavoro ERG ISAB of Città Giardino (Melilli) and is designed to be a continuation of the traditional summer camp.

The ERG Club is equipped with gyms, swimming pools and rooms which can be used by groups of young people. In the months of July and August, the centre accommodates about 200 boys and girls aged from 7 to 15 years who are committed to taking courses in sailing, scuba diving and music, under the guidance of the leaders of a social cooperative authorised by the *Dopolavoro* social club

**DEDICATED SUPPORT FOR THOSE WHO HAVE RECOVERED** FROM CANCER **AND SUPPORT TO THOSE** WHO WANT TO

**OVERCOME IT.** 

# OTHER COMMUNITY INITIATIVES

### PROTECTION OF HEALTH AND THE ENVIRONMENT



# enERGia project

The "enERGia project" is an initiative organised by the Municipal authority of Melilli and ERG for the members of the three Senior Citizen Clubs in Melilli, Villasmundo and Città Giardino: it consists of group dancing and light exercise classes, given in halls managed by the Municipal authority. The implementation of the "enERGia Project" improves the quality of the services offered by the Municipal authority to the senior citizens of the three clubs and is a concrete example of collaboration between the public and private sectors.

## **Flooding** in Genoa

Following the disastrous flood that hit the city of Genoa on 4 November 2011, the ERG Group contributed to the refurbishment of the gym of a school in the area of Genoa worst hit by the flooding.

Renovation works are expected to be completed by the end of the school year 2012-2013.



"Saline di Priolo" **Nature** Reserve

ERG has been working with LIPU (Italian League for Bird Protection) for over 10 years to support initiatives that make use of the Saline di Priolo Nature Reserve, which it manages. This site, nestled in the centre of an industrial zone in Sicily, is a stopover for European migratory birds that have overwintered in Africa. In 2012, as part of a series of publications on the protected area, ERG financed the publication of a book on the flora of the Reserve.

#### **CULTURE AND KNOWLEDGE**

## Global Wind Day

Global Wind Day is an international campaign to promote awareness of wind energy as an inexhaustible source of clean energy. In Italy, the event is coordinated by ANEV (National Association of Wind Energy) in collaboration with EWEA (European Wind Energy Association) and GWEC (Global Wind Energy Association). In 2012, the event was held in Basilicata and ERG was one of its main sponsors.



#### **Boot Camp**

In 2012, the Young Entrepreneurs Group of Confindustria Genoa, with the educational coordination and planning of Confindustria's Alta Scuola offered its members the opportunity to take part in two days of unique training as regards content, speakers and learning methods.

The first "Boot Camp" was characterised by an innovative intense training format for Young Entrepreneurs, where theory and practice were combined to create useful skills to allow young entrepreneurs to deal with the difficult context in which Italian companies currently operate.



#### **Syracuse** Almanac

Since 2008, ERG and ISAB have promoted the publication of a collection of all news items related to the province of Syracuse as a useful tool to help students, researchers and journalists to understand the local environment.

The Almanac is produced in collaboration with Assostampa.

## The Magna Carta **Foundation**

ERG is a founding partner of the Magna Carta Foundation, which, since 2004, has promoted scientific research, cultural reflection and the development of proposed reforms on the main themes of political debate.

## The Civita **Foundation**

ERG is a member of CIVITA, an association that promotes and manages Italy's cultural heritage and protects, promotes and uses its artistic assets through shows, cinema and European projects.



#### **INDA Foundation**

ERG is a sponsor of the National Institute of Ancient Drama (INDA), which has staged classical works at the Teatro Greco in Syracuse since 1913 and promotes classical culture both in Italy and throughout the world.

#### YOUNG PEOPLE AND SPORT



#### Drivemotion

In response to the high rate of accidents in urban areas and in line with the objectives established by the Italian Road Safety Plan in accordance with the European Union, in 2012, ERG renewed its position as main sponsor of the sixth edition of the Drivemotion safe driving project.

Through sponsorship by many organisations, the Drivemotion Safe Driving Centre offered approximately 300 novice drivers in the province of Genoa a safe driving course completely free of charge, including theoretical and practical modules.

The project is a genuine awareness campaign that focuses on the proper use of cars with the aim of training young drivers to be more aware and responsible on the road, teaching them to control the car, improving their driving skills in critical situations and making them more aware of their driving limitations in relation to driving.



## **ERG Ravano Trophy**

The 28th edition of the ERG Ravano tournament - 19th Paolo Mantovani Cup, scored yet another record in terms of participation with over 4,500 boys and girls getting involved in the five different sporting disciplines: men's football, women's football, basketball, volleyball and rugby.

The largest schools tournament in Europe (source: the Italian Football Association, F.I.G.C.) involved boys and girls in the last two years of primary school and, for the first time, even in the third year (it had previously been limited to the last two years of primary only) from the four provinces of Liguria and Southern Piedmont for 15 days of fun and excitement.

The joy and involvement of participants in team sports is the spirit of the tournament and these same values have been continuously expressed for the last 28 years.

The most important prizes are not those awarded to the winning teams of each discipline, but the very special awards such as the "Fair Play Cup", which is awarded to the team that is judged to be the most sporting, a prize for the best-behaved supporters, a prize for the youngest participant and a prize for the best referee.

ERG, together with U.C. Sampdoria, confirms its commitment to sharing these "unique" values of sports and social activities.



#### **Electricity Day**

On 1 December 2012, ISAB Energy hosted the Electricity Day during which over 200 students in the last year of technical institutions in the province of Syracuse learned about electricity production. The plant technologists took the students on a tour of the plant during which the plant's complex systems were described in detail. Of particular interest was Control Room, where the students were able to admire the technology used to control production activities.



## **School Project** 2012

ERG, in partnership with ISAB, manages and promotes a range of educational activities designed to provide training and sporting opportunities for young people from primary school up until the last year of secondary school. In particular, the 21st edition of the Archimedes and Electra Trophy involved primary and secondary school pupils in a football tournament.

The "A helmet is worth a life" ("Un casco vale una vita") campaign, in collaboration with the provincial command of the Carabinieri of Syracuse, saw ERG and ISAB staff collaborate with officers and non-commissioned officers of the Carabinieri to provide training on the issues of safety on the roads and in the workplace.

As partners of Junior Achievement Italy, ERG and ISAB sponsor the "Enterprise in Action" event in Sicily, which encourages upper secondary students to develop business projects.

## **ERG Sports** Centre

ERG promoted the recovery and development of the ERG Sports Centre in Syracuse, encouraging the use of the facilities by smaller sports clubs and local schools in the area.

#### **COMMUNITY**

## THE GARRONE FOUNDATION AND EXCELLENCE IN POST-GRADUATE EDUCATION

Continuing its commitment to educational and cultural projects with increasing focus on creating permanent value in the community

Investing in the future by focusing on young people as an essential resource to respond to the crisis: this is the main conviction that resulted in the establishment of the Edoardo Garrone Foundation's post-graduate training project.

This commitment began in 2006 with the launch of the School of Postgraduate Studies in the Economics of Cultural Tourism "Edoardo Garrone Chair" in Syracuse, created with a view to offering young graduates and professionals advanced training in the development and management of the tourist resources of cultural products.

Due to the quality of the teaching curriculum, established over the previous seven programmes, the "Edoardo Garrone Chair" has now become a benchmark of specialised training in Italy.

The innovative aspect of the courses offered regards the intensive formula that provides a complete training programme in a short period (6 to 8 weeks), combining lectures, workshops, field work and guest speakers of high cultural and international importance.

Equipped with a faculty of experts and professors from the best Italian and foreign universities, and with the collaboration of the University of Catania - which actively participates in the teaching curriculum and recognises 12 credits for participants - the "Edoardo Garrone Chair" offers a highly specialised training programme in Cultural Tourism Management

**ADVANCED** TRAINING ON THE THEMES OF CREATION. **DEVELOPMENT** AND **MANAGEMENT** OF TOURIST **AREAS AND** THE CULTURAL PRODUCT.



for motivated young people to become leaders of initiatives to redevelop areas.

In particular, two distinctive elements of the training programme provide real opportunities for students and facilitate their integration into the labour market: the business start-up laboratory (with exercises, lectures by consultants and experts, first-hand experiences and the preparation of business plans) and the "Edoardo Garrone Chair" Prize of 5,000 euros awarded to the student with the best project at the end of the course to help bring the project to fruition.

The course is completely free for the 25 participants of each programme: young people aged between 23 and 35 years old - first and second level graduates, graduates of the old university system, or industry professionals - who are carefully selected on the basis of their CV, merit and a subsequent interview.

To confirm the validity of the "Edoardo Garrone Chair" project, more than 300 applications were received in 2012; 160 students participated in the seven programmes, mostly from Sicily but with increasing numbers from all over Italy (without distinction between northern, central and southern Italy) and, in some cases, even from abroad (Brazil, Santiago de Compostela and China).

Following on from the experience of Syracuse, in 2012 the Post Graduate Specialisation Course "Cultural tourism for the development of local communities", promoted by the Edoardo Garrone Foundation in Santa Margherita (GE), in collaboration with the University



of Genoa and the Municipal authority of Santa Margherita Ligure. With this initiative, the Garrone Foundation also aims to confirm Santa Margherita Ligure as a centre of Postgraduate Specialised Training in Cultural Tourism Management, and a permanent laboratory for tourism marketing, an important opportunity for local and national development.

Completing its offering in the field of higher education, since 2009, the Garrone Foundation has promoted the Scuola di Alta Formazione al Management in Turin in collaboration with the Giovanni Agnelli Foundation and the Pirelli Foundation and together with the Association du Collège des Ingenieurs in Paris, and in 2011, it launched the first Master in Political Economy in collaboration with the University of Genoa.

## A COMPREHENSIVE, **CROSS-CUTTING TEACHING PROGRAMME**

In addition to post-graduate specialisation courses, the Edoardo Garrone Foundation offers the following programmes aimed at primary school children and secondary school boys and girls:

→ "Reading at School" (Scuola Leggendo), created to develop the reading skills of primary school children, the initiative involves about 2,500 pupils in primary schools in Genoa, Savona, Imperia, La Spezia, Cuneo, Monza and Syracuse;

COMPREHENSIVE. **CROSS-CUTTING TEACHING PROGRAMME** WHICH IS **UNIQUE AT A** NATIONAL LEVEL.

- → "Discover Genoa" (Genova Scoprendo) a fun and educational journey that has encouraged over 300 secondary school students to discover their local community and the historical, artistic, cultural and industrial heritage of the city;
- → "Tech to School" an initiative that involves about 800 secondary school boys and girls in Genoa with a view to encouraging them to take scientific and technological subjects

#### OTHER CULTURAL INITIATIVES BY THE GARRONE FOUNDATION

In addition to postgraduate training and education, which are the pride of its cultural programmes, the Edoardo Garrone Foundation promotes and organises high quality cultural events intended for the general public: literary events, history and philosophy lectures with distinguished scholars, conferences and debates on current issues, contemporary art exhibitions and events.

The Edoardo Garrone Foundation also promoted the "WOW! Genoa Science Centre" project, a science promotion/awareness centre dedicated to hosting interactive science and technology exhibitions - an innovative approach in Italy - representing the best international production of entertainment with an educational purpose aimed at young people, families and schools



WOW Genova Science Centre

#### HIGH OUALITY ONLINE COMMUNICATION

## Excellent results again in the 2012 CSR Online Awards and KWD Webranking results

Online communication is becoming more and more challenging. In fact, stakeholders are becoming more demanding and the criteria for evaluating the effectiveness and timeliness of the information published are increasingly stringent.

Despite this, in 2012 the online corporate communication strategy of our Group achieved significant results.

2012 CSR ONLINE AWARDS

In November 2012, the results of the CSR Online Awards were published, conducted by Lundquist. ERG scored a total of 51.5 points (compared to the Italian average of 34 points) and was placed 15th out of 85 companies.

To provide a broader view of the "Italian situation," in 2012, Lundquist expanded its research and increased the number of companies surveyed from 50 to 85, including 15 large non-listed companies (based on revenue) engaged in CSR communications.

In particular, social criteria were focused on in 2012: social networks (LinkedIn, Facebook and Twitter) stand out among the tools through which users request companies to provide constant, real time updates.

Two of the most distinctive features of the analysis are the assessment of the degree of stakeholder involvement and whether their expectations are met, especially in terms of dialogue: by using social media, dialogue should in fact be continuous, with the timely updating of content and the inclusion of news related to CSR projects and activities, beyond the mere dissemination of the Sustainability Report.

Visual communication is another key point of the research: the focus shifts from "text and tables" to the use of infographics, interactive charts, video and image galleries.

With regard to the Sustainability section, ERG defended its ranking of the past few years by breaking down the contents of the latest version of the Sustainability Report on its website in a consistent manner, improving the distribution of topics and following the triple bottom line reporting logic.

#### 2012 KWD WEBRANKING

In December 2012, CorrierEconomia published the results of the eleventh edition of KWD Webranking Italy, the analysis of on-line institutional communication carried out by KW Digital (the digital division of Hallvarsson & Halvarsson) in collaboration with Lundquist. The analysis considered the 102 largest Italian listed companies by market capitalization.

ERG scored 58.1 points (compared to the Italian average of 32.5 points) and was ranked 17th, the same position as in 2011.

THE ERG **WEBSITE SCORED 51.5 POINTS AGAINST** A NATIONAL **AVERAGE OF 34** POINTS.

**ERG WAS** PLACED 17<sup>TH</sup> **IN THE 2012 EDITION** OF KWD WEBRANKING. The assessment criteria protocol changed dramatically in 2012 and, in this analysis also, the weight of social media is greatly increased: research not only considers the company's presence in the different channels, it also assesses how they are used and what information is shared. Even the areas dedicated to Corporate Governance, CSR and Employer Branding have been given greater emphasis in the analysis, however, the most important area remains that of financial information (41 of 100 points).

Analysis of the results shows that the sector that recorded the best performance in terms of scoring is the one that groups the energy companies together (the Utilities and Oil & Gas sectors are merged into this group), which achieved an average score of 49%, even higher than the European average.

One of the most interesting aspects that emerged from the research is that online communication has become an established tool of choice for conveying **corporate identity**: a non-static, dynamic communication model which is continuously evolving to provide users with information on the company, its business and its values

#### ERG INTERACTIVE PROFILE

During 2012, a new online initiative was launched: the interactive profile, a mini site dedicated to ERG's identikit. Its objective is to provide up-to-date information on the Group to users from within and outside the company, characterised by the versatility and flexibility that is typical of the interactive tool.

Unlike a printed brochure, where the content can quickly become obsolete and unusable, the interactive profile is always up to date and complements our idea of sustainability by reducing the impact generated by printed copies. The document can be produced immediately and is customisable: by selecting the area of interest, it is possible to download content related to the required section and generate a document that meets specific user requirements =



#### A SERVICE AREA THAT PROTECTS THE ENVIRONMENT

## The photovoltaic plant at the "Gelso Bianco Nord" motorway service area between Palermo and Catania is operational

Improving the quality and quantity of services offered to customer and paying particularly close attention to reducing the impact that the fuel distribution plants have on the environment. On this basis, planned works were carried out by ERG Oil Sicilia to redevelop the "Gelso Bianco Nord" Motorway Service Area on the A19 from Palermo to Catania.

The new layout of the area includes the

installation of a photovoltaic plant, a dedicated area for charging electric cars and the distribution of fuels with limited environmental impact (LPG).

Interventions were also carried out to provide more general environmental protection:

- → purification of the surface water runoff from the forecourt:
- →double walls for tanks and pipes, with a continuous cavity monitoring system;
- → creation of a unique ecological area for the temporary storage of waste and for recycling;
- →an ecological area for dogs and other pets.

The Photovoltaic plant consists of 60 modules with a capacity of 10.20 kWp and was installed on the platform of the service area, with a surface area of around 400 m<sup>2</sup>.

The plant was commissioned in June

2012 and has already produced 10,219 kW of electricity, resulting in a CO2 emissions saving of about 4 tonnes.

An area for recharging electric cars was created beside the refuelling area for light vehicles. These are two stations with two different types of sockets for charging cars (Universal Schuko and CEE 16A single-phase 2P+T interlocked sockets) and an information panel on which the other charging points in the area are indicated.

To date, this area is still little used due to the poor uptake of electric vehicles and the long charging times required by current batteries. However, we are confident that this technology will experience rapid development, therefore the service area is already fully prepared to meet this type of need



The plant on the roof of the service area

10,219 KW OF ENERGY **PRODUCED WITH** A SAVING OF 4 TONNES OF CO..

## ERG GROUP PERFORMANCE DATA AND INDICATORS

#### GROUP ECONOMIC AND FINANCIAL RESULTS

		2012	2011	2010
Total revenues (1)	millions of Euro	8,288	6,798	7,899
EBITDA	millions of Euro	332	192	238
EBITDA at replacement cost (2)	millions of Euro	346	156	213
EBITDA at adjusted replacement cost (3)	millions of Euro	458	284	305
EBIT at replacement cost (2)	millions of Euro	197	12	59
EBIT at adjusted replacement cost (2)	millions of Euro	216	37	86
Net income of which Group net profit	millions of Euro millions of Euro	200 151	96 65	43 10
Group net profit at adjusted replacement cost (4)	millions of Euro	12	(49)	(20)
Cash flows from operations	millions of Euro	163.6	(76.5)	119
Adjusted net financial indebtedness	millions of Euro	722	1,179	1,082
Net invested capital	millions of Euro	2,484	2,842	2,614
Capital expenditures (5)	millions of Euro	77	82	201
Financial leverage	%	21	34	28

For the definition and reconciliation of results at adjusted replacement cost, please refer to the section "Alternative performance indicators" of the 2012 financial statements.

- (1) net of excise taxes.
- (2) not including inventory gains (losses) and non-recurring items.
- (3) adjusted values also include the contribution, attributable to ERG, of the results of TotalErg S.p.A. (joint venture with TOTAL), of LUKOIL Renew GmbH (joint venture with the LUKOIL Group) and of ISAB S.r.l.
- (4) does not include inventory gains (losses), non-recurring items and related applicable theoretical taxes. The values also match the adjusted values. (5) investments in tangible and intangible fixed assets.

Net invested capital in 2012 includes EUR 3.1 million from grants provided by Public Administration to ERG Renew for plants.

Total revenues in 2012 include EUR 95 thousand in grants from Public Administration or the European Community for employee training activities. The activities of the ERG Group do not include loans to political parties.

#### **ERG SHARES**

		2012	2011	2010
Year-end reference price	Euro	7.63	8.78	10.45
Highest price 01/02/2012	Euro	8.95	10.74	10.83
Lowest price 21/05/2012	Euro	4.28	7.60	8.96
Average price	Euro	6.20	9.29	9.92
Average volume	No.	360,453	211,888	344,063

## OPERATING DATA AND INDICATORS

		2012	2011	2010
Total electricity production of which from renewable energy sources	GWh GWh	8,219 1,222	7,436 740	6,688 453
Market share of domestic power generation	%	2.9	2.6	2.3
Sales of electricity	GWh	9,074	8,084	7,502
Market share of electricity sales	%	2.7	2.4	n.a.

## **ENVIRONMENT AND COMMUNITY**

		2012	2011	2010
Energy consumption (primary sources) (1) of which feedstock of which Natural Gas of which other primary sources	TJ TJ TJ TJ	64,713 37,345 22,641 4,728	(2) 62,532 33,944 22,948 5,641	59,575 31,266 21,809 6,540
Indirect energy consumption of which electricity	TJ TJ	791 782	710 690	720 696
Efficiency of thermoelectric power plants		0.206	<sup>(2)</sup> 0.207	<sup>(2)</sup> 0.217
Direct CO <sub>2</sub> emissions	kt	4,382	4,128	3,998
Indirect CO <sub>2</sub> emissions (imported energy)	kt	94.3	87.1	92.8
$NO_{\chi}$ emissions	t	1,314	1,206	1,505
SO <sub>2</sub> emissions	t	683	940	1,336
Particulate emissions	t	66	67	62
CO <sub>2</sub> avoided through renewable energies	kt	492	307	197
$\mathrm{SO_{z}}$ avoided through removal of sulphur from charge	kt	77	79	71
Thermoelectric CO <sub>2</sub> Index	kt/GWheq	0.58	0.57	0.60
Thermoelectric $\mathrm{NO}_{\mathrm{x}}$ Index	t/GWheq	0.17	0.18	0.23
Thermoelectric SO <sub>2</sub> Index	t/GWheq	0.09	0.14	0.20
Thermoelectric Particulate Index	t/GWheq	0.009	0.010	0.009
Seawater withdrawals for plant cooling systems	millions of m³	299	284	298
Ground-water withdrawals from wells	millions of m³	9	7	8
Water returned to the natural cycle	% of withdrawals	93.7	89.2	87.2
Waste produced of which hazardous waste of which non-hazardous of which sent for recycling	kt kt kt %	12.7 2.2 10.5 44	12.3 3.1 9.2 25	14.2 2.4 11.8 28
Petroleum product losses	No. of events	_	-	-
Petroleum product losses	m³	_	-	-

<sup>(1)</sup> Conversion factor 1 ktoe = 41.868 TJ.(2) Correction of erroneous data from the 2011 Sustainability Report.

## PERSONNEL, ORGANISATION OF WORK AND INDUSTRIAL RELATIONS

		2012	2011	2010
Employees at 31/12 of which at the Genoa site of which at the Syracuse site	No. % %	613 42 53	652 43 51	714 43 49
Executives of which at the Genoa site	No. %	44 73	51 73	56 75
Middle Managers	No.	154	163	168
Administrative staff	No.	328	348	383
Workers	No.	87	90	107
Other external collaborators	No.	36	49	53
University graduates	%	45.2	44.5	44.1
School leaver's diploma	%	48.9	48.6	48.9
Female workforce	%	20.9	21.0	20.9
Average employee age	Year	42.9	41.6	41.8
Average time at company	Year	20.9	17.4	12.1
Staff turnover	%	9.0	16.0	13.3
Absenteeism	%	2.6	2.1	2.7
Part time employees	%	4.1	2.8	2.6
Percentage of overtime	%	8.5	10.5	10.5
Unionisation rate	%	33.9	32.7	33.5
Ongoing labour disputes	No.	9	7	8
Strikes	hours	99	142	35

## DETAILED ANALYSIS OF PERSONNEL - 2012

	< 30 YEARS	30/50 YEARS	> 50 YEARS	TOTAL
Executives	-	27	17	44
Middle Managers	-	119	35	154
Administrative staff	11	247	70	328
Workers	15	61	11	87
Group Total	26	454	133	613

	MEN	WOMEN	TOTAL
Executives	43	1	44
Middle Managers	115	39	154
Administrative staff	240	88	328
Workers	87	_	87
Group Total	515	137	613

	MEN	WOMEN	TOTAL
Genoa	150	107	257
Rome	17	2	19
Syracuse (Priolo)	305	17	322
Periphery	13	2	15
Group Total	485	128	613

	MEN	WOMEN	TOTAL
Fixed-term contract - Full time	20	2	22
Permanent contract - Full time	465	101	566
Permanent contract - Part time	-	25	25
Group Total	485	128	613

	MEN	WOMEN	TOTAL
Employees that availed of parental leave	2	30	32
Persons returning from parental leave	2	26	28
Personnel still at work after 12 months	2	30	32
Personnel resigning due to maternity	_	-	-

	EMPLOYEE	PROTECTED CATEGORY	TOTALE
Executives	44	-	44
Middle Managers	147	7	154
Administrative staff	298	30	328
Workers	80	7	87
Group Total	569	44	613

GROUP PROFILE | ECONOMIC RESPONSIBILITY | ENVIRONMENTAL RESPONSIBILITY | SOCIAL RESPONSIBILITY | DATA AND INDICATORS | GRI | OIL |

## **TRAINING**

		2012	2011	2010
Total training	hours	30,717	24,197	28,423
Average training per employee	days/emp.	6.2	4.4	5.1
Personnel trained	No.	572	439	n.a.

	MEN HOUR/EMPLOYEE	WOMEN HOUR/EMPLOYEE	MEN HOURS	WOMEN HOURS	TOTAL 2012
Executives	36.6	32.0	1,572	32	1,604
Middle Managers	42.0	29.3	4,834	1,143	5,977
Administrative staff	43.8	28.3	10,521	2,494	13,015
Workers	116.3	-	10,121	-	10,121
Total			27,048	3,669	30,717

## **SAFETY**

	MEN	WOMEN	TOTAL 2012	T0TAL 2011	TOTAL 2010
Workplace accidents					
Genoa	1	-	1	1	-
Rome	_	-	-	-	-
Syracuse (offices)	-	-	-	-	-
Syracuse (plants)	-	-	-	-	1
Periphery (Palermo + Catania + mobile personnel)	-	-	-	-	-
Companies no longer in scope from an accounting perspective	_	-	-	-	3
Total			1	1	4

		2012	2011	2010
Frequency index no. of accidents per million hours worked		1.02	0.9	3.4
Severity index total no. of days lost per thousand hours worked		0.04	0.01	0.03
Work-related deaths	No.	-	-	-
Third-party company injuries (1)	No.	-	1	-
Frequency index – third-party companies (1)		-	0.77	-
Severity index – third party companies (1)		-	0.03	-
Man days worked by third-party companies (1)	No.	132,406	162,672	170,502

<sup>(1)</sup> Data refers to the Priolo site.

## HSE ECONOMIC AND ADMINISTRATIVE RESOURCES

		2012	2011	2010
Total HSE expenses (1) of which investments of which current expenses	millions of Euro millions of Euro millions of Euro	44 19 25	37 11 26	25 5 20
HSE equivalent staff as % of Group total	%	8.3	12.3	16.1
Level of ISO 14001 and OHSAS 18001 certification of organisations operating in industrial sites	%	100	80	64
Safety checks and HSE audits in the field (1)	No.	1,201	1,262	1,199
Safety walks (1)	No.	75	78	41

<sup>(1)</sup> Data refers to the Priolo site.

#### **CUSTOMERS**

		2012	2011	2010
ERG Oil Sicilia outlets	No.	306	306	309
TotalErg retail outlets	No.	3,248	3,383	3,322
ERG Power - Number of industrial site customers		11	11	11

## **SUPPLIERS**

		2012	2011	2010
Active suppliers (at least one order) with registered offices or a billing address in Italy with registered offices or a billing address in Sicily	No. % %	1,432 92 22	1,638 91 24	2,541 n.a. 15
man registered emises of a bitting dataless in energy	70			20
Qualified suppliers	No.	1,650	1,674	2,140
Average qualification time	days	130	149	206
% of tenders (of total value of purchases)	%	53	61	67
% of tenders (of total number of purchases)	%	26	24	n.a.
Ships rejected by screening process	%	13	19	13



# Statement **GRI Application Level Check**

GRI hereby states that ERG spa has presented its report "Sustainability report 2012" to GRI's Report Services which have concluded that the report fulfills the requirement of Application Level A.

GRI Application Levels communicate the extent to which the content of the G3.1 Guidelines has been used in the submitted sustainability reporting. The Check confirms that the required set and number of disclosures for that Application Level have been addressed in the reporting and that the GRI Content Index demonstrates a valid representation of the required disclosures, as described in the GRI G3.1 Guidelines. For methodology, see www.globalreporting.org/SiteCollectionDocuments/ALC-Methodology.pdf

Application Levels do not provide an opinion on the sustainability performance of the reporter nor the quality of the information in the report.

Amsterdam, 3 May 2013

Nelmara Arbex

**Deputy Chief Executive** Global Reporting Initiative



The Global Reporting Initiative (GRI) is a network-based organization that has pioneered the development of the world's most widely used sustainability reporting framework and is committed to its continuous improvement and application worldwide. The GRI Guidelines set out the principles and indicators that organizations can use to measure and report their economic, environmental, and social performance. www.globalreporting.org

Disclaimer: Where the relevant sustainability reporting includes external links, including to audio visual material, this statement only concerns material submitted to GRI at the time of the Check on 25 April 2013. GRI explicitly excludes the statement being applied to any later changes to such material.

		IN ACCORDANCE WITH GRI G3.1 GUIDELINES - 2011 + EUSS	С	C+	В	B+	A	A+
MANDATORY	Company self-declaration			<b>⊢</b> ⊖		<b>⊢</b> Ω	1	L G
OPTIONAL	Checked by third parties			REPORT		REPORT	& A	REPORT
OPTIONAL	Checked by GRI						GRI CHECKED	

GRI/G3.1 INDICATORS Total	Partial	Not covered	n/a: not applicable
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* The joint ventures TotalErg S.p.A., ISAB S.r.l. and LUKERG Renew GmbH are excluded from scope from an accounting perspect	ive

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
PROFILE				
1 STRATE	GY AND ANALY:	SIS		
1.1		4-5		6.2
1.2	•	4-5; 8-10; 17-19; 22-23; 27-31; 33; 35; 57-59		6.2
2 ORGAN	ISATION PROFII	IF.		
2.1		Cover		
2.2		8-10; 29		
2.3		8-10; 29		6.2
2.4	•		The list of ERG sites is available in the "Contacts" section of the corporate website www.erg.it	
2.5		8-10; 12; 41		
2.6		16	See also the "Shareholders" section on the corporate website www.erg.it	
2.7		8-10; 12; 41;121		
2.8		8-10; 16; 41; 116; 118		
2.9		8-10; 16		
2.10		23;113-114		
EU1		8-10; 12; 41		
EU2		11; 41; 116		
EU3		8-10; 117; 121		
EU4	n/a		ERG does not manage electricity transmission and distribution activities.	
EU5		41; 58-59		

GROUP PROFILE | ECONOMIC RESPONSIBILITY | ENVIRONMENTAL RESPONSIBILITY | SOCIAL RESPONSIBILITY | DATA AND INDICATORS | GRI OIL |

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
	T PARAMETERS			
Report p		0.0	C: COCT II FROM A COLUMN BOOK	
3.1	•	29	Since 2007, the ERG Sustainability Report has been published in June every year.	
3.2	•	29	Since 2007, the ERG Sustainability Report has been published in June every year.	
3.3	•	29	Since 2007, the ERG Sustainability Report has been published in June every year.	
3.4			See the "Contacts" section of corporate website www.erg.it	
3.5		27-28; 30-31; 33		
3.6		27-29		
3.7		27-29		
3.8		8-10; 29; 116		
3.9	•	11; 27-29; 41; 64; 116-117		
3.10		27-29; 41; 117		
3.11		27-29; 41; 117		
GRI cont	ent index			
3.12		122-135		
Assuranc	ce			
3.13			ERG does not subject the Sustainability Report to external auditing.	7.5.3
4 GOVER	NANCE COMMIT	MENTS, ENGAGEMENT OF S	STAKEHOLDERS	
Governa		,		
4.1		15-19; 22		6.2
2		16		6.2
4.3		15-16	See the "Governance" section of the corporate website www.erg.it	6.2
4.4	•	15-18; 98-101	See also "Shareholders' Meeting Regulations" section of the corporate website www.erg.it	6.2
<b>4.</b> 5		15-16; 95-97		6.2
4.6		15; 17-19		6.2
4.7	•	15-16	See the "Corporate Governance" section of the corporate website www.erg.it	6.2
4.8		4-5; 18; 22-25; 30-31	See the Code of Ethics available on corporate website www.erg.it	6.2
4.9		15; 22-25; 27-28; 33;		6.2
4.10		15; 22-25; 95-97		6.2

GROUP PROFILE | ECONOMIC RESPONSIBILITY | ENVIRONMENTAL RESPONSIBILITY | SOCIAL RESPONSIBILITY | DATA AND INDICATORS | GRI OIL |

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
Commitm	ent to externa	l initiatives		
4.11		17-19		6.2
4.12		125	ERG does not adhere to codes of conduct, principles and charters developed by external bodies/associations.	6.2
4.13		20-21; 58-59; 107		6.2
Stakeholo	der engagemen	t		
4.14		30-31		6.2
4.15		30-31		6.2
4.16		20-21; 30-31; 38-40; 48-49; 98-102; 104-105; 107-109; 113-114		6.2
4.17		30-33; 81; 98-100		6.2
ECONOMI	C PERFORMANO	CE INDICATORS		
DMA	1	17-19; 22-25; 35; 40; 44-45; 48-49; 54-55; 57-59; 88; 102-112; 116; 118; 121		6.2, 6.8
EU6		8-10; 33; 41-42; 44-45; 55-56; 66-70; 74-75		
EU7			The retail business unit was sold in January 2012. The remaining industrial customers use the electricity and the steam produced for their production cycles.	
EU8		8-10; 44-45; 54-55; 70-71; 74-75		
EU9	n/a		ERG does not possess – either directly or through shareholdings – shares in companies that manage nuclear power plants.	
Economic	performance			
EC1		35		6.8, 6.8.3, 6.8.7, 6.8.9
EC2		17-19; 22-25; 40; 44-45; 54-55; 57-59		6.5.5
EC3			ERG does not manage any independent company pension plan.	
EC4		116		
Market p	resence			
EC5	•		Area regulated by the National Labour contract and supplementary agreements.	
EC6		48-49; 121		6.6.6, 6.8, 6.8.5, 6.8.7
EC7		88; 118	The ERG Group guarantees equal opportunities as part of its hiring procedures.	6.8, 6.8.5, 6.8.7

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
Indirect of	economic impa	ct		
EC8		30; 33; 102-112		6.3.9, 6.8, 6.8.3, 6.8.4, 6.8.5, 6.8.6, 6.8.7, 6.8.9
EC9		30; 33; 102-112		6.3.9, 6.6.6, 6.6.7, 6.7.8, 6.8, 6.8.5, 6.8.6, 6.8.7, 6.8.9
EU10		12; 41	The information required refers to the corporate strategy available on the company website www.erg.it	
EU11		41; 62; 117		
EU12	n/a		ERG does not manage electricity transmission and distribution activities.	
ENVIRON	MENTAL PERFOI	RMANCE INDICATORS		
DMA	1	8-10; 20-21; 33; 35; 40; 44-47; 54-55; 57-65; 70-71; 74-75; 77-79; 117		6.2, 6.5
Raw Mate	rials			
EN1		117		6.5, 6.5.4
EN2	n.a.		Our activities do not involve the use of recycled materials.	6.5, 6.5.4
Power ge	neration			
EN3		117		6.5, 6.5.4
EN4		117	Indirect energy consumption is covered by purchases from the national grid. Refer to the most recent calculations by GSE-Terna.	6.5, 6.5.4
EN5	-	8-10; 40; 54-55; 57-59; 62; 64		6.5, 6.5.4
EN6		8-10; 20-21; 33; 35; 44-47; 54-55; 57-60		6.5, 6.5.4
EN7			The plants produce the energy they need for their own production processes. The energy purchased on the market is only used for temporary requirements.	6.5, 6.5.4
Water				
EN8		74-75;117		6.5, 6.5.4
EN9		74-75;117		6.5, 6.5.4
EN10	1	64; 117	Water withdrawals mainly relate to sea water used to cool the plants and apparatus. Once the drawdown cycle is terminated, the water is returned to the water source after its quality has been suitably monitored.	6.5, 6.5.4

Biodivers EN11 EN12 EU13	ity n/a ■	61; 63-65;	ERG does not possess or manage lands in natural areas with high levels of biodiversity.	6.5, 6.5.6
EN12	•			6.5, 6.5.6
EU13		70-71; 74-75		6.5, 6.5.6
		61; 63-65; 70-71; 74-75		
EN13	•	61; 63-65; 70-71; 74-75		6.5, 6.5.6
EN14	-	61; 63-65; 70-71; 74-75		6.5, 6.5.6, 6.8.3
EN15	n/a		ERG does not possess or manage lands in natural areas with high levels of biodiversity.	6.5, 6.5.6
Emissions	s, effluents and	l waste		
EN16		61; 117		6.5, 6.5.5
EN17	•		There are no other indirect emissions of significant weight that stem from the company's operations.	6.5, 6.5.5
EN18	-	57-59; 60-61; 63-65; 70-71; 74-75		6.5, 6.5.5
EN19	•		ERG does not emit substances that are harmful to the ozone layer as part of its industrial activities.	6.5, 6.5.3
EN20		61-62; 117		6.5, 6.5.3
EN21		64; 74-75; 117		6.5, 6.5.3
EN22		117		6.5, 6.5.3
EN23		117		6.5, 6.5.3
EN24		117		6.5, 6.5.3
EN25		64; 74-75		6.5, 6.5.3, 6.5.4, 6.5.6
Products	and services			
EN26	•	57-59; 60-61; 63-65; 70-71; 74-75		6.5, 6.5.4, 6.6.6, 6.7.5
EN27	n/a		Fuels are marketed via the ERG Oil Sicilia network and sold as "loose" products.	6.5, 6.5.3, 6.5.4, 6.7.5
Complian	ce			
EN28	-		There were no fines or non-monetary sanctions for failure to comply with environmental regulations and laws.	6.5
Transport				
EN29			This indicator is not regarded as significant for the activities carried out by the Group.	6.5, 6.5.4, 6.6.6
General				
EN30		57-59; 64; 77-79; 121		6.5

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
PERFORM	ANCE INDICATO	ORS ON SUITABLE WORKIN	G PRACTICES AND CONDITIONS	
DMA	•	18; 72-73; 77-84; 86-87; 90-91; 94-97; 105; 118-120		6.2, 6.4, 6.3.10
Employm	ent			
EU14	•	18; 24; 77-80; 84; 86-87; 89; 94-95; 120		
EU15		118	Given the extremely recent introduction of the new pension law it hasn't been possible to quantify this indicator.	
EU16		19; 22-25; 46-53; 64; 74-75; 77-79; 81-84		
LA1		118-119		6.4, 6.4.3
LA2		90-91; 118		6.4, 6.4.3
LA3			All employees enjoy the same benefits in relation to their professional position.	6.4, 6.4.3, 6.4.4
LA15		86-87; 119		6.4, 6.4.4
EU17		120		
EU18		78		
Industria	l relations			
LA4			92% of employees adhere to the Italian Energy and Oil Collective Labour Agreement, while the other 8% adhere to the Industrial Business Managers Collective Labour Agreement.	6.4, 6.4.3, 6.4.4, 6.4.5, 6.3.10
LA5			Regulatory and compensation-related aspects refer to the National Collective Labour Agreement.	6.4, 6.4.3, 6.4.4, 6.4.5
Health ar	nd safety in the	e workplace		
LA6		80; 86-87		6.4, 6.4.6
LA7		72-73; 82-83; 120		6.4, 6.4.6
LA8	•	77-79; 81; 84; 94-95; 105		6.4, 6.4.6, 6.8, 6.8.3, 6.8.4, 6.8.8
LA9	•	80	With respect for the provisions of the Italian Energy and Oil Collective Labour Agreement.	6.4, 6.4.6
Training a	and education			
LA10		18; 24-25; 77-79; 94-95; 120		6.4, 6.4.7
LA11		18; 24-25; 77-80; 84; 86-88; 94-95		6.4, 6.4.7, 6.8.5
LA12		96-97		6.4, 6.4.7
Diversity	and equal opp	ortunities		
LA13		16; 118-119		6.3.7, 6.3.10, 6.4, 6.4.3
LA14	•		Wages are regulated by the Italian Energy and Oil Collective Labour Agreement and the Code of Ethics, which prohibits discrimination of this type.	6.3.7, 6.3.10, 6.4, 6.4.3, 6.4.4

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
HUMAN I	RIGHTS PERFORM	MANCE INDICATORS		
DMA		22-24; 48-49; 87		6.2, 6.3, 6.3.3, 6.3.4, 6.3.6, 6.6.6
Investme	ent and procure	ment practices		
HR1	-	22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.3, 6.3.5, 6.6.6
HR2	•	22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.3, 6.3.5, 6.4.3, 6.6.6
HR3	•	22-24; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.5
Non-disc	rimination			
HR4			No incidents were recorded in 2012.	6.3, 6.3.6, 6.3.7, 6.3.10, 6.4.3
Freedom	of association a	and collective bargaining	3	
HR5	•	22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.3, 6.3.4, 6.3.5, 6.3.8, 6.3.10, 6.4.3, 6.4.5
Child lab	our			
HR6		22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.3, 6.3.4, 6.3.5, 6.3.7, 6.3.10, 6.6.6
Forced la	bour			
HR7		22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.3, 6.3.4, 6.3.5, 6.3.7, 6.3.10, 6.6.6
Security	practices			
HR8	•	22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.5, 6.4.3, 6.6.6
Indigeno	us rights			
HR9			No violations were recorded in 2012.	6.3, 6.3.6, 6.3.7, 6.3.8, 6.6.7
Assessm	ents			
HR10	•	22-24; 48-49; 87	ERG carries out its activities at national/European level where such aspects are protected by the law.	6.3, 6.3.3, 6.3.4, 6.3.5
Correctiv	e action			
HR11			No violations were identified in 2012.	6.3, 6.3.6
SOCIETY	PERFORMANCE I	INDICATORS		
DMA	•	17-18; 20-21; 63-65; 70-75; 104; 116		6.2, 6.6, 6.8
EU19	n/a		Company activities do not involve infrastructure development energy planning.	

EU20         ■ 64; 77-79; 82-83           Community           Community           Solution (EV)           Any new constructions and substantial changes to plants are subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape and territorial issues.         6.3.9, 6.8.8.8.8.8.8.8.8.8.8.8.8.8.8.8.8.8.8.8		COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
Community           S01         ■	EU20			There was no outplacement of personnel in 2012.	
S01         Any new constructions and substantial changes to plants are subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape and territorial issues.         6.3.9, 6.5.3, 6.5.6, 6.8           EU22         There was no outplacement of personnel in 2012.         6.3.9, 6.5.3, 6.5.6, 6.8           S09         Any new constructions and substantial changes to plants are subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape and territorial issues.         6.3.9, 6.5.3, 6.5.6, 6.8           S010         6.3-65; 70-75; 104         6.3.9, 6.5.3, 6.5.6, 6.8           Corruptions           S02         17-18; 20-21         6.6.6.6.3           S03         18         6.6.6.6.3           S04         17-18; 20-21         6.6.6.6.3           S05         20-21         6.6.6.6.3           S06         20-21: 116         The activities of the ERG Group do not include loans to political parties.         6.6.6.4.6.8,3           Anti-collusion measures           S07         No cases were recorded in 2012.         6.6, 6.6.3, 6.6.7, 6.8.7           PERFORMANCE INDICATORS ON PRODUCT RESPONSEITITY           D04         22-23; 46-47; 50-51; 77         ERG does	EU21		64; 77-79; 82-83		
subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape and territorial issues.  EU22	Commun	ity			
Any new constructions and substantial changes to plants are subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape and territorial issues.  S010	S01			subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape	6.3.9, 6.8, 6.8.3, 6.8.9
Subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape and territorial issues.    So10	EU22			There was no outplacement of personnel in 2012.	
Corruption           502         17-18; 20-21         6.6, 6.6.3           503         18         6.5, 6.6.3           504         17-18; 20-21         No cases were recorded in 2012.         6.6, 6.6.3           Political Contributions (approach to politics/institutions)           505         20-21         6.6, 6.6.4, 6.8.3           506         20-21; 116         The activities of the ERG Group do not include loans to political parties.         6.6, 6.6.4, 6.8.3           Anti-collusion measures           S07         No cases were recorded in 2012.         6.6, 6.6.5, 6.6.7           Compliance           S08         No penalties were recorded in 2012.         6.6, 6.6.3, 6.6.7, 6.8.7           PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY           DMA         22-23; 46-47; 50-51; 77         6.2 Goes not manage electricity distribution activities.           EU23         n/a         ERG customers are mainly business customers.           Health and safety of consumers           PR1         22-23; 46-47; 50-51; 77         The products sold are not subject to life cycles.         6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5           PR2         No cases of non-compliance were recorded in 2012.         6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5 <td>S09</td> <td>•</td> <td></td> <td>subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape</td> <td>6.3.9, 6.5.3, 6.5.6, 6.8</td>	S09	•		subject to environmental impact assessment (EIA) procedures which provide for the involvement of interested parties (local communities) to analyse the associated environmental, landscape	6.3.9, 6.5.3, 6.5.6, 6.8
502         17-18; 20-21         6.6,6.6.3           503         18         6.6,6.6.3           504         17-18; 20-21         No cases were recorded in 2012.         6.6,6.6.3           Political Contributions (approach to politics/institutions)           505         20-21         6.6, 6.6.4, 6.8.3           506         20-21; 116         The activities of the ERG Group do not include loans to political parties.         6.6, 6.6.4, 6.8.3           Anti-collusion measures           507         No cases were recorded in 2012.         6.6, 6.6.5, 6.6.7           Compliance           Solution Transport Solution Tessport Solution Solution Tessport Solution Solution Product RESPORT Solution Product RESPORT Solution Activities Solution Product Solution Soluti	S010		63-65; 70-75; 104		6.3.9, 6.5.3, 6.5.6, 6.8
503         18         6.6,6.6.3           504         17-18; 20-21         No cases were recorded in 2012.         6.6,6.6.3           Political Contributions (approach to politics/institutions)           505         20-21         6.6, 6.6.4, 6.8.3           506         20-21; 116         The activities of the ERG Group do not include loans to political parties.         6.6, 6.6.4, 6.8.3           Anti-collusion measures           507         No cases were recorded in 2012.         6.6, 6.6.5, 6.6.7           Compliance           PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY           DMA         22-23; 46-47; 50-51; 77         ReG does not manage electricity distribution activities.           EU23         n/a         ERG customers are mainly business customers.           Health and safety of commerces           PR1         22-23; 46-47; 50-51; 77         The products sold are not subject to life cycles.         6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5           PR2         No cases of non-compliance were recorded in 2012.         6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	Corruptio	on			
SO4         17-18; 20-21         No cases were recorded in 2012.         6.6, 6.6.3           Political Contributions (approach to politics/institutions)           SO5         20-21         6.6, 6.6.4, 6.8.3           SO6         20-21; 116         The activities of the ERG Group do not include loans to political parties.         6.6, 6.6.4, 6.8.3           Anti-collusion measures           SO7         No cases were recorded in 2012.         6.6, 6.6.5, 6.6.7           Compliance           SO8         No penalties were recorded in 2012.         6.6, 6.6.3, 6.6.7, 6.8.7           PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY           DMA         22-23; 46-47; 50-51; 77         6.2, 6.6 os not manage electricity distribution activities.           EU24         n/a         ERG does not manage electricity distribution activities.           EU24         n/a         ERG customers are mainly business customers.           Health and safety of consumers           PR1         22-23; 46-47; 50-51; 77         The products sold are not subject to life cycles.         6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5           PR2         No cases of non-compliance were recorded in 2012.         6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	S02		17-18; 20-21		6.6,.6.6.3
Political Contributions (approach to politics/institutions)  S05	S03		18		6.6,.6.6.3
S05	S04		17-18; 20-21	No cases were recorded in 2012.	6.6,.6.6.3
So6 20-21; 116 The activities of the ERG Group do not include loans to political parties.  Anti-collusion measures  SO7 No cases were recorded in 2012. 6.6, 6.6.5, 6.6.7  Compliance  SO8 No penalties were recorded in 2012. 6.6, 6.6.3, 6.6.7, 6.8.7  PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY  DMA 22-23; 46-47; 50-51; 77 ERG does not manage electricity distribution activities.  EU24 n/a ERG customers are mainly business customers.  Health and safety of consumers  PR1 22-23; 46-47; 50-51; 77 The products sold are not subject to life cycles. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5  PR2 No cases of non-compliance were recorded in 2012. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	Political	Contributions	(approach to politics/inst	itutions)	
Anti-collusion measures  SO7 No cases were recorded in 2012. 6.6, 6.6.5, 6.6.7  Comptiance  SO8 No penalties were recorded in 2012. 6.6, 6.6.3, 6.6.7,6.8.7  PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY  DMA 22-23; 46-47; 50-51; 77 ERG does not manage electricity distribution activities.  EU24 n/a ERG customers are mainly business customers.  Health and safety of consumers  PR1 22-23; 46-47; 50-51; 77 The products sold are not subject to life cycles. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5  PR2 No cases of non-compliance were recorded in 2012. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	S05		20-21		6.6, 6.6.4, 6.8.3
No cases were recorded in 2012.  Compliance  So8 No penalties were recorded in 2012.  No penalties were recorded in 2012.  PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY  DMA 22-23; 46-47; 50-51; 77 ERG does not manage electricity distribution activities.  EU24 n/a ERG customers are mainly business customers.  Health and safety of consumers  PR1 22-23; 46-47; 50-51; 77 The products sold are not subject to life cycles.  No cases of non-compliance were recorded in 2012.  6.6, 6.6.5, 6.6.7, 6.7.4, 6.7.5  PR2 No cases of non-compliance were recorded in 2012.	S06	•	20-21; 116		6.6, 6.6.4, 6.8.3
Compliance  S08 No penalties were recorded in 2012. 6.6, 6.6.3, 6.6.7,6.8.7  PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY  DMA 22-23; 46-47; 50-51; 77 6.2, 6.6, 6.7  EU23 n/a ERG does not manage electricity distribution activities.  EU24 n/a ERG customers are mainly business customers.  Health and safety of consumers  PR1 22-23; 46-47; 50-51; 77 The products sold are not subject to life cycles. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5  PR2 No cases of non-compliance were recorded in 2012. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	Anti-coll	usion measure	S		
No penalties were recorded in 2012.    Color	S07			No cases were recorded in 2012.	6.6, 6.6.5, 6.6.7
PERFORMANCE INDICATORS ON PRODUCT RESPONSIBILITY  DMA  22-23; 46-47; 50-51; 77  EU23  n/a  ERG does not manage electricity distribution activities.  EU24  n/a  ERG customers are mainly business customers.  Health and safety of consumers  PR1  22-23; 46-47; 50-51; 77  The products sold are not subject to life cycles.  6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5  PR2  No cases of non-compliance were recorded in 2012.  6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	Compliar	ice			
DMA       ■ 22-23; 46-47; 50-51; 77       6.2, 6.6, 6.7         EU23       n/a       ERG does not manage electricity distribution activities.         EU24       n/a       ERG customers are mainly business customers.         Health and safety of consumers         PR1       ■ 22-23; 46-47; 50-51; 77       The products sold are not subject to life cycles.       6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5         PR2       ■ No cases of non-compliance were recorded in 2012.       6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	S08			No penalties were recorded in 2012.	6.6, 6.6.3, 6.6.7,6.8.7
DMA       ■ 22-23; 46-47; 50-51; 77       6.2, 6.6, 6.7         EU23       n/a       ERG does not manage electricity distribution activities.         EU24       n/a       ERG customers are mainly business customers.         Health and safety of consumers         PR1       ■ 22-23; 46-47; 50-51; 77       The products sold are not subject to life cycles.       6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5         PR2       ■ No cases of non-compliance were recorded in 2012.       6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	PERFORM	ANCE INDICATO	ORS ON PRODUCT RESPONS	SIBILITY	
EU23 n/a ERG does not manage electricity distribution activities.  EU24 n/a ERG customers are mainly business customers.  Health and safety of consumers  PR1 22-23; 46-47; 50-51; 77 The products sold are not subject to life cycles.  6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5  PR2 No cases of non-compliance were recorded in 2012.  6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5		_			6.2, 6.6, 6.7
EU24 n/a ERG customers are mainly business customers.  Health and safety of consumers  PR1 22-23; 46-47; 50-51; 77 The products sold are not subject to life cycles.  6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5  PR2 No cases of non-compliance were recorded in 2012. 6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5	FII23	n/a		FRG does not manage electricity distribution activities	
PR1       22-23; 46-47; 50-51; 77       The products sold are not subject to life cycles.       6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5         PR2       No cases of non-compliance were recorded in 2012.       6.3.9, 6.6.6, 6.7, 6.7.4, 6.7.5					
PR1			nsumers	Salara Sa	
6.7.4, 6.7.5				The products sold are not subject to life cycles.	
EU25 There were no injuries to third parties in 2012.	PR2	•		No cases of non-compliance were recorded in 2012.	
	EU25			There were no injuries to third parties in 2012.	

	COVERAGE	REFERENCES	COMMENTS	REFERENCES ISO 26000
Labelling	g of products an	d services		
PR3	•		ERG mainly markets 'loose' products in compliance with the laws in force through the retail outlets of the ERG Oil Sicilia network.	6.7, 6.7.3, 6.7.4, 6.7.5, 6.7.6, 6.7.9
PR4	•		No cases of non-compliance were recorded in 2012.	6.7, 6.7.3, 6.7.4, 6.7.5, 6.7.6, 6.7.9
PR5			No specific customer satisfaction analyses were carried out during the year. Only the opinions of users at renovated motorway service areas were requested.	6.7, 6.7.3, 6.7.4, 6.7.5, 6.7.6, 6.7.9
Marketin	g communicatio	on		
PR6	•		The company does not adhere to voluntary codes with regard to marketing activities.	6.7, 6.7.3, 6.7.6, 6.7.9
PR7			No cases of non-compliance were recorded in 2012.	6.7, 6.7.3, 6.7.6, 6.7.9
Respect	for privacy			
PR8			No complaints were made in 2012.	6.7, 6.7.7
Complian	nce			
PR9			No complaints were made in 2012.	6.7, 6.7.6
EU26	n/a		ERG does not manage electricity distribution activities.	
EU27	n/a		ERG does not serve residential customers.	
EU28	n/a		ERG does not manage electricity distribution activities.	
EU29	n/a		ERG does not manage electricity distribution activities.	
EU30		41		

4 oil

TOTALERG

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## HEALTH, SAFETY, ENVIRONMENT AND QUALITY: THE THEMES OF OUR COMMITMENT

## There are many TotalErg initiatives aimed at achieving the best performance with regard to HSE

When the company was established, TotalErg defined its ethical principles and rules of conduct and incorporated them into its Code of Conduct, a tool to ensure reliability and to protect the assets and reputation of the company.

The Code is applicable to corporate bodies, employees at all levels and third parties involved for any reason (agents, attorneys, brokers, consultants, dealers, affiliates and suppliers). Health, Safety, Environment and Quality, the fundamental basis for an approach to these issues, are an integral part of the Code, demonstrating the high level of our commitment in this area.

## **HEALTH AND SAFETY** Safety performance and consequent actions

Compared to the good performance in 2011, in 2012 an increase in workplace injuries was recorded by TotalErg and its subsidiaries. These occurred when driving company cars and during minor maintenance and manual work. The severity of these injuries was on average minor. For all accidents, corrective and preventive actions were identified and implemented. With regard to mobile workers, for example, training courses on safe driving have been organised, as well as activities to raise awareness about the

# TOTALERG

risks of the road. TotalErg also defined and disclosed some operational information on the methods of analysing traffic accidents and of verifying incorrect behaviour while driving (serious penalties under the Highway Code).

The Group also has a software package to manage accidents and hazardous situations, with the aim of improving the structure of the root cause analysis and the monitoring of corrective action taken, as well as the traceability of all stages of the analysis process.

#### **Education**, information and awareness

In addition to training on safe driving, in 2012 a training programme aimed at all employees was established in accordance with Italian Legislative Decree no. 81/08, applying the requirements of the State-Region Agreement of December 2011 and refresher training was also provided for managers and supervisors.

TotalErg also continued to raise safety awareness among staff by maintaining a presence in the various internal corporate media (intranet, Safety Point, corporate magazine and ad hoc brochures) and also by organising meetings on road safety, targeting both employees (to coincide with World Safety Day) and their families (in collaboration with the Park Traffic School in Rome).

Another achievement of particular note is the "Safety is no laughing matter" campaign ("La sicurezza non è uno scherzo"), which will continue in 2013 (see featured article).

#### **Installations**

With regard to the wholly-owned facilities, TotalErg launched a Map of service stations with LPG fuel. The aim was to identify any sites that are of particular interest due to their urban position and/or special facilities provided.

At the level of the Wholesale deposits, it was decided to rationalise the storage tank farm, not only to leverage intra group synergies, but also reduce the level of environmental and safety risks. This has been possible due to the decrease in the total number of active storage tanks and investments designed to raise their standard (level sensors and alarms, double walls, reconstruction of the base of air tanks).

#### **ENVIRONMENT** Soil and subsoil

In 2012 TotalErg gradually broadened the scope of the Map of environmental risks of its distribution network, which had been launched in 2011. This methodology allows sites with a greater risk profile to be identified in order to plan suitable mitigating actions for each site.

With regard to the Rome refinery, the remediation of contaminated sand in Fiumicino was completed and a safety containment project (MISOP) was started with regard to the groundwater pumped from the perimeter.

MISOP activity was also completed at the Pantano di Grano Site.

#### **Emissions**

The thermal power plant, used by the subsidiary Bitumtec to produce bitumen, was converted from oil to LPG, thus reducing its overall emissions.

#### **Increasing staff awareness**

TotalErg organised an internal competition, "The environment that we would like," ("L'ambiente che vorremmo") where employees were requested to propose ideas that could contribute to reducing the impact of the company and its activities on the environment.

The most interesting proposals will be assessed during 2013 with a view to implementing them.

#### THE ENVIRONMENT THAT WE WOULD LIKE ("L'AMBIENTE CHE VORREMMO")

This was an internal competition, launched in April 2012, in which each employee was able to propose an idea that could contribute to reducing the company's impact on the environment. The award ceremony took place during a Reception held by TotalErg in January 2013. The winners were selected by the Executive Committee from among those who had won awards every two months. The 3 winners received a voucher for an electric bicycle with pedal assistance

#### **MANAGEMENT SYSTEMS** AND CERTIFICATIONS

In 2012, the implementation of the Health, Safety and Environment Management Model, in accordance with the provisions of Italian Legislative Decree No. 231/01, led to the identification and resolution of management gaps by the various operational units, mostly consisting of procedural alignments.

As at 31 December 2012, the key plants of the TotalErg circuit (the Rome refinery, the annexed Shared Deposit and the deposits in Trecate and Savona) were certified according to international management standards ISO 14001 (environmental management systems) and OHSAS 18001 (Workplace Health and Safety Management Systems).

Almost all of the activities and operating sites included in the TotalErg's consolidation scope also benefit from ISO 9001 certified Quality Management Systems

#### SAFETY IS NO LAUGHING MATTER

("LA SICUREZZA NON È UNO SCHERZO")

TotalErg's internal communication campaign on safety was launched in November and will continue in several stages throughout 2013. Objective: to empower all employees, encouraging them to recognize the weaknesses of their working environment, to change their behaviour and report any exceptions so that they can be corrected in a timely manner. The posters, which will gradually be rolled out throughout the year, represent the different realities of TotalErg with a view to demonstrating that safety involves everyone, at all levels, not just specialists.

The messages show everyday gestures that are potentially risky and can exacerbate an already potentially dangerous situation. In order to provide examples of improper behaviour, the main character performs real stunts.

The first theme addressed was the issue of "safety when working at height."

In February 2013, the second theme instead focused on "road safety".

To ensure that all employees were able to associate the campaign with their everyday lives, it was decided to set the scenarios in TotalErg sites (the Maritime Department of the Rome refinery in Fiumicino, the Totalgaz deposit in Viterbo, the Viale del Tintoretto service station in Rome and the Head Offices). For each theme, posters and leaflets will be issued accompanied by a slogan that will reinforce the message. In addition a backstage film was published on the intranet and on the internal corporate screens to show that every image was carefully prepared in order to allow their execution in complete safety

# PHOTOVOLTAIC POWER IN THE REFINERY, THE ENERGY OF GOOD TEAMWORK

With almost 200 kWp of capacity, the new photovoltaic plant on the roof of the warehouse was commissioned in April/May 2012

TotalErg continues to pay attention to the environment. In this regard, the construction of the photovoltaic plant on the roof of the warehouse of the Rome refinery began in March. This installation marks the refinery's first contact with the world of renewable energy.

With around 198 kWp of capacity, the photovoltaic power plant is the result of a great team effort, leveraging the motivation, complementary skills and synergies within the TotalErg Group.

In fact, TotalErg's Sustainability and Operational Risk Division took an "old idea" that had originated in the Refinery a few years ago and evaluated it as economically beneficial, in the wake of several initiatives related to the 4th Feed-in Tariff (Conto Energia IV) of 2011.

HSEQ Management and the Refinery Maintenance Department therefore carried out a detailed feasibility analysis in order to turn the idea into a viable project. With its experience in energy services, Restiani did the rest of the work, installing the plant on the basis of on a "turnkey" contract, which became operational in April/May 2012.

The installation of the panels was preceded by the preparation of a detailed safety plan that identified the risks (such as workers or equipment falling over the edges of the roof, workers or equipment slipping down the sloped roof, or the glass roof skylights breaking with the risk of pieces of glass falling into the warehouse), which allowed us to identify all of the preventive and protective measures to be taken to ensure that every activity carried out put safety first, according to standard practice at the Refinery.

The optimal exposure and slope of the warehouse's pitched roof will provide the plant with an annual electricity output of over 240 MWh, avoiding about 107 tonnes of CO<sub>2</sub> emissions into the atmosphere



Photovoltaic plant at the Rome Refinery

THE PLANT **WILL PRODUCE OVER 240 MWH** OF ELECTRICITY PER YEAR, **AVOIDING 107** TONNES OF CO, EMISSIONS.

# TOTALERG GROUP DATA AND INDICATORS

## **ECONOMIC RESULTS**

		2012	2011
Total revenues	millions of Euro	11,973	12,186
EBITDA	millions of Euro	90	223
EBIT	millions of Euro	(1)	134

#### **PROCESSING**

		2012	2011	2010
Refinery processing	kt	3,854	5,179	4,846
Refinery processing	thousands of barrels/day	77	104	97

#### **OUTLETS**

		2012	2011	2010
Retail outlets	No.	3,248	3,383	3,322
Market share (gasoline + diesel)	%	11.2	11.8	12.0
Average retail throughput	mc/outlet at period end	1,023	1,148	1,247
Wholly-owned outlets	No.	1,940	2,036	2,035
Outlets offering LPG and/or methane*	No.	40	33	n.a.
Car wash facilities*	No.	89	77	77
of which equipped with water recycling systems	No.	39	45	45

 $<sup>^{\</sup>star}$  Data refers to wholly-owned, directly managed plants only

#### **PERSONNEL**

	MEN	WOMEN	TOTAL
Executives	64	3	67
Middle Managers	227	43	270
Administrative staff	516	381	897
Workers	238	1	239
Group Total	1,045	428	1,473

	TOTAL
Fixed-term contract - Full time	1,296
Permanent contract - Full time	65
Part time	139
Group Total	1,473

#### PHOTOVOLTAIC ENERGY

		2012	2011	2010
Outlets with photovoltaic installations	No.	4	4	n.a.
Installed power	MWp	0.031	0.031	n.a.
Electricity produced	MWh	37	37	n.a.
Other photovoltaic installations	No.	5	1	n.a.
Installed power	MWp	0.450	0.127	n.a.
Electricity produced	MWh	353	37	n.a.

#### **ENVIRONMENT AND COMMUNITY\***

		2012	2011	2010
Waste produced	kt	11.2	12.3	11.4
from site reclamation and new constructions sent for recycling	%	92 96	88 89	59 37
non-hazardous	%	68	83	88
Petroleum product losses	No. of events	2	3	5
Petroleum product losses	m³	0.04	2.7	21.5

 $<sup>^{\</sup>star}$  Data refers to wholly-owned, directly managed plants only, excluding the Rome refinery

#### **SAFETY\***

		2012	2011	2010
Employee accidents	No.	7	2	16
Frequency index no. of accidents per million hours worked		3.36	0.910	6.806
Severity index total no. of days lost per thousand hours worked		0.034	0.005	0.226
HSE training	hours	6,981	5,714	7,791

 $<sup>^{\</sup>star}$  Data refers to wholly-owned, directly managed plants only, excluding the Rome refinery

## **ECONOMIC RESULTS\***

		2012	2011	2010
Total revenues	millions of Euro	11,609	11,898	10,676
EBITDA	millions of Euro	49	176	145
EBIT	millions of Euro	(20)	110	73

<sup>\*</sup> Values calculated according to Italian accounting principles

#### **SALES**

		2012	2011	2010
Total sales	kt	8,131	9,926	9,100
of which domestic retail market	kt	2,645	3,084	3,282

#### **PERSONNEL**

	2012	2011	2010
Employees at 31/12	662	703	779

#### DETAILED ANALYSIS OF PERSONNEL - 2012

	MEN	WOMEN	TOTAL
Executives	55	3	58
Middle Managers	157	39	196
Administrative staff	230	156	386
Workers	22	-	22
Group Total	464	198	662

	TOTAL
Permanent contract - Full time	630
Fixed-term contract - Full time	20
Part time	12
Group Total	662

# RAFFINERIA DI ROMA S.P.A. PERFORMANCE DATA AND INDICATORS

#### **PROCESSING**

		2012	2011	2010
Refinery processing	kt	2,302	3,534	3,298

#### **ENVIRONMENT AND COMMUNITY**

		2012	2011	2010
Energy consumption (primary sources) of which Natural Gas	ktoe ktoe	119 109	166 139	157 122
CO <sub>2</sub> direct emissions	kt	276	407	411
NO <sub>x</sub> emissions	t	315	342	459
SO <sub>2</sub> emissions	t	788	1,525	2,043
Particulate emissions	t	3	2	5
Water withdrawals	thousands of m <sup>3</sup>	1,368	1,514	1,715
Water reused in production processes	%	15	15	15
Waste produced	kt	4,213	13,897	1,930
from site reclamation and new constructions	% %	- 19	73 81	- 31
sent for recycling non-hazardous	%	54	90	26
Petroleum product losses	No. of events	7	6	9
Petroleum product losses	$m^3$	14	*135	27.5
Level of ISO 14001 and OHSAS 18001 certification	%	100	100	100

<sup>\*</sup> Entirely recovered

#### SAFETY

		2012	2011	2010
Employee accidents	No.	2	1	2
Frequency index no. of accidents per million hours worked		4.68	2.19	4.25
Severity index total no. of days lost per thousand hours worked		0.46	0.12	0.09
HSE training	hours	1,432	2,700	2,960

#### **PERSONNEL**

	2012	2011	2010
Employees at 31/12	235	263	263

## DETAILED ANALYSIS OF PERSONNEL - 2012

	MEN	WOMEN	TOTAL
Executives	3	-	3
Middle Managers	31	1	32
Administrative staff	107	13	120
Workers	80	-	80
Group Total	221	14	235

	TOTALE
Permanent contract - Full time	227
Fixed-term contract - Full time	6
Part time	2
Group Total	235

## HEALTH, SAFETY AND THE ENVIRONMENT

Health, Safety and the Environment are considered by ISAB to be guiding principles for the sustainable development of its activities.



The adoption and maintenance of risk prevention management systems confirms the company's commitment in this regard.

In 2012, ISAB maintained a strong commitment to promoting its leadership values and ensuring the prompt execution of daily activities with the active involvement of all staff.

With a view to increasing transparency towards other companies, the Health, Safety and Environment Policy Document was published which includes the main measures to be adopted and respected in relation to accident prevention, occupational health and environmental protection by parties that enter into agreements with ISAB.

#### **SAFETY**

During 2012, all of the activities related to the Safety Project were completed



on time, maintaining high focus on the behavioural aspects that, more than the technical ones, are key factors in risk mitigation strategies.

In this regard, periodic "safety dialogues" held with the general workforce have been a major driving force in growing the safety culture.

Work continued on the review and improvement of procedures and numerous training sessions were carried out, with a final assessment of the level of learning obtained by trainees.

As regards relations with the Regional Technical Committee, in 2012 proceedings were concluded with regard to the updating of the Safety Report (2010 edition) for the south plants.

During the year, significant investments in security included completing the doubling of the fire resistant line at the Super pier and continuing (according to plan) upgrade works on the fire protection system in individual departments on the north site.

Following the inspections carried out by Det Norske Veritas in 2012, the management systems in place were found to be compliant with reference standards UNI EN ISO 14001:2004 and BS OHSAS 18001:2007

The maintenance of the certification of management systems confirms ISAB's commitment to the continuous improvement of its safety performance while protecting the environment.

The positive trend of the environmental and safety incident data demonstrates the benefits achieved.

## **ENVIRONMENTAL CHARACTERISATION** AND THE RECLAMATION OF INDUSTRIAL SITES

With regard to the ISAB South Plants site, in August 2011, ISAB adhered to the Programme Agreement by signing a transaction and approving, as part of the Services Committee, the "Plan for the reclamation of the Refinery's soil and water strata."

With regard to project timelines, in 2012 activities to strengthen the pumping and reclamation systems were carried out.

#### **ENVIRONMENT**

In 2012, ISAB initiated a series of investments required to comply with the provisions of the Integrated Environmental Authorisation obtained at the end of 2011. The investment focuses mainly on reducing and monitoring emissions into the atmosphere.

The main activities include:

- → the installation (to supplement existing infrastructure) of systems to continuously monitor atmospheric emissions from the chimneys of the North Plant and the adaptation of similar systems in the South Plant;
- →the implementation of systems to recover vapours that are generated on the docks during the loading of light products;
- → the installation of equipment to monitor the flow of gas in the flares;
- → the installation of double chambers in some reservoirs;
- →a census of all of the equipment and plant components that can determine fugitive emissions;
- >the construction of covers for the car wash heat exchangers to reduce and trap emissions;
- →the installation of a video surveillance system to monitor the flares at the Refinery.

#### **HEALTH**

In 2012, as part of its Healthcare Protection Programme, ISAB continued numerous initiatives aimed at preventing emerging diseases in the community based on assessments by the Ministry of Health and the World Health Organization.

The main initiatives include the Cute Project, promoted in order to identify skin diseases at risk of precancerous changes, which was conducted in collaboration with the Dermatology Unit of the Provincial Health Unit in Syracuse

# ISAB S.R.L. PERFORMANCE DATA AND INDICATORS

#### **ECONOMIC RESULTS\***

		2012	2011	2010
Total revenues	millions of Euro	2,269	2,142	1,939
EBITDA	millions of Euro	206	131	140
EBIT	millions of Euro	109	33	53

<sup>\*</sup> Values calculated according to Italian accounting principles

#### **PROCESSING**

		2012	2011	2010
Refinery processing on behalf of third parties	kt	13,077	11,829	13,464
Refinery processing on behalf of third parties	thousands of barrels/day	262	237	269

#### **SAFETY**

		2012	2011	2010
Total accidents	No.	1	2	-
Frequency index no. of accidents per million hours worked		0.61	1.12	-
Severity index total no. of days lost per thousand hours worked		0.01	0.10	-
Frequency index – third-party companies		1.13	1.02	1.87
Severity index – third party companies		0.01	0.02	0.02
Level of ISO 14001 and OHSAS 18001 certification	%	100%	100%	100%
HSE training	hours	26,539	23,619	23,415

GROUP PROFILE | ECONOMIC RESPONSIBILITY | ENVIRONMENTAL RESPONSIBILITY | SOCIAL RESPONSIBILITY | DATA AND INDICATORS | GRI OIL

## **ENVIRONMENT AND COMMUNITY**

		2012	2011	2010
Energy consumption (primary sources) of which Natural Gas	ktoe ktoe	714 231	652 169	819 226
CO <sub>2</sub> direct emissions	kt	2,554	2,467	2,636
$NO_{\chi}$ emissions	t	1,797	1,672	1,942
SO <sub>2</sub> emissions	t	6,547	5,489	7,358
Particulate emissions	t	191	157	118
Water withdrawals of which seawater	millions of m <sup>3</sup> millions of m <sup>3</sup>	304 299	308 304	269 264
Water returned to the natural cycle	%	87.5	98.5	97.9
Water discharge – Oils	t	24	23	16
Waste produced from site reclamation and new constructions sent for recycling non-hazardous	kt % % %	877 98 6 5	682 96 3 3	568 93 4 4
Petroleum product losses	No. of events	1	2	6
Petroleum product losses	$m^3$	230	n.a.	615

## PERSONNEL, ORGANISATION OF WORK

	2012				2011	
EMPLOYEE POSITION	F	M	TOTAL	F	M	TOTAL
Executives	1	19	20	1	21	22
Middle Managers	5	120	125	6	126	132
Administrative staff	36	403	439	35	416	451
Workers	-	386	386	-	414	414
Overall total	42	928	970	42	977	1,019

	2012				2011	
TYPE OF CONTRACT	F	М	TOTAL	F	М	TOTAL
Full time permanent staff	36	852	888	38	880	918
Full time fixed-term staff	-	-	-	-	-	-
Part time permanent staff	4	-	4	4	-	4
Part time fixed-term staff	-	-	-	_	_	-
Fixed-term contract	2	12	14	-	17	17
Apprentices Profession Full time	-	64	64	-	80	80
Overall total	42	928	970	42	977	1,019
Average number of employees			995			1,060
Turnover			0.07%			9.81%
Unionisation rate			63.8%			64.80%

#### TRAINING 2012

		F	М	TOTALE
Professional	hours	40	54,418	54,458
Institutional	hours	24	912	936
HSE	hours	1,168	25,811	26,979
Staff trained (No. of staff trained based on average no. of employees)	%	98	95	35

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