

In search of more and better energy

SUSTAINABILITY REPORT 2012





In search of more and better energy

SUSTAINABILITY REPORT 2012

2012 SUSTAINABILITY REPORT

Background	6
Messages	16
Sustainability at Galp Energia	20
Governance model, codes of conduct and transparency	23
Risk management	26
Exploration and production of oil and natural gas	29
GALP ENERGIA'S ENVIRONMENTAL PERFORMANCE IN PARTNERSHIPS	35
Strategy for climate change	37
REFINING RENEWABLE ENERGIES AND CLEANER FUELS CARBON FOOTPRINT GALP ENERGY SOLUTIONS FOR ENERGY EFFICIENCY	41 42 44 45
Management of health, safety, environment and quality	47
MANAGEMENT SYSTEMS	52
Sustainable management of resources	53
ENVIRONMENTAL PERFORMANCE BIODIVERSITY WATER-RELATED RISKS	54 59 61
Occupational safety and health	62
	Messages Sustainability at Galp Energia Governance model, codes of conduct and transparency Risk management Exploration and production of oil and natural gas GALP ENERGIA'S ENVIRONMENTAL PERFORMANCE IN PARTNERSHIPS Strategy for climate change REFINING RENEWABLE ENERGIES AND CLEANER FUELS CARBON FOOTPRINT GALP ENERGY SOLUTIONS FOR ENERGY EFFICIENCY Management of health, safety, environment and quality MANAGEMENT SYSTEMS Sustainable management of resources ENVIRONMENTAL PERFORMANCE BIODIVERSITY WATER-RELATED RISKS

10	Human capital	66
10.1	THE GALP ENERGIA ACADEMY	70
11	Social investment in the community	72
11.1 11.2 11.3 11.4	MISSÃO UP UNIDOS PELO PLANETA BIOFUELS: INVOLVEMENT WITH THE COMMUNITY ALLIANCE FOR ROAD SAFETY AND PREVENTION THE GALP ENERGIA FOUNDATION	74 75 76 77
12	Stakeholders engagement	78
12.1 12.2 12.3 12.4	RELATIONSHIP WITH CUSTOMERS RELATIONSHIP WITH SUPPLIERS, CONTRACTORS AND PARTNERS LABOUR RELATIONS RELATIONS WITH OTHER STAKEHOLDERS	82 83 84 85
13	Innovation and technology	86
13.1 13.2 13.3 13.4	PETROLEUM AND GAS INSTITUTE R&D IN EXPLORATION & PRODUCTION R&D IN REFINING DEVELOPMENT OF NEW PRODUCTS AND SERVICES	87 87 88 88
14	Appendices	91
14.1 14.2 14.3	APPENDIX I – ASSURANCE LETTER APPENDIX II – GRI TABLE – KEY SUSTAINABILITY INDICATORS APPENDIX III – STATUS OF THE LIST OF COMMITMENTS FOR THE 2012	92 93
14.4	SUSTAINABILITY STRATEGY APPENDIX IV – ABBREVIATIONS, INITIALS AND ACRONYMS	102 104
1 1.7	ALLENDIA IV ADDICE VIATIONS, INVITATES AND ACCOMING	107

00. Background





This year Galp Energia publishes its seventh sustainability report which covers the Company's activities in this field, in 2012.

01

BACKGROUND

The information included in this report only covers the activities of companies in which Galp Energia holds a stake of at least 50%. This information does not include offshore exploration and production projects.

This report is addressed to all Company stakeholders, whose expectations were taken into account to define the contents, subject matter and indicators included therein.

This document further includes Galp Energia's strategic priorities in terms of sustainability, as well as the main commitments and goals to be implemented in the near future.

Still as far as sustainability is concerned, the report will also focus activities developed in the fields of exploration and production of oil and gas, risk management, environmental performance, health and safety, human capital, relations with stakeholders and social responsibility, including related indicators. Stock of the situation is taken in relation to the Company's strategy in terms of climate change, particularly highlighting the results gathered from stakeholders' views.

Information presented herein is condensed, therefore, it should be viewed jointly with that available on this subject on Galp Energia website – www.galpenergia.com. Additional information can also be sourced from the Company's annual accounts and governance reports, which are also available on the same website.

This report has been prepared in accordance with the third version of the Global Reporting Initiative (GRI3) guidelines and related performance indicators. Whenever performance indicators are not calculated using the methodology proposed by the GRI, this will be explicitly reported and the methodology used by Galp Energia will be acknowledged.

This report has an A+ GRI rating. Appendix II includes a correlation table between the contents of this report and the said level's requirements.

GRI rating							
		C	C+	В	B+	Α	A+
Compulsory	Self-declared						V
Optional	Checked by a third party						✓
орионан	Checked by the GRI						

The 2012 sustainability report has been verified by PricewaterhouseCoopers & Associates – Chartered Accountants Ltd., an accredited third party.

The following contacts may be used for the clarification of any doubts or to send suggestions about the content of this report.

Galp Energia, SGPS, S. A.

Public Company Corporate strategy and investor relations

Rua Tomás da Fonseca, Torre C 1600-209 Lisboa

Tel.: +351 217 240 866 Fax: +351 217 242 965

e-mail: investor.relations@galpenergia.com

www.galpenergia.com

1UELA

Participation in two E&P projects.

Galp Energia in the world



Eight E&P projects in Portugal. Integrated refining system comprising two refineries. Marketing of oil products across a broad network, including 1,367 service stations in the Iberian Peninsula. Second largest natural gas player.

12.4 mton SALES OF REFINED PRODUCTS

4 bcm
OF NATURAL GAS
TO DIRECT CLIENTS²



Eight E&P projects.

MOROCO

s.

OTHER WASHINGTON

Marketing of oil products through a network of 69 service stations, in Cape Verde, Gambia, Guinea-Bissau and Swaziland.



Supply contracts for 6 bcm of natural gas per year.

AL GUI

Present across 20 E&P projects. Working interest production of 10.3 kboepd in 2012.



Present in one natural gas liquefaction project.



RESOURCES¹

PROJECTS



Present in two E&P projects.

GROWING ENERGY

Galp Energia has been expanding its exploration and production portfolio and is currently involved in over 50 projects. It is the Company's goal to produce 300 kboepd in 2020, representing a growth of over 10 times the production in 2012.

This unparalleled growth in the industry will be supported by the resilient contribution of the Refining & Marketing and Gas & Power business cash flows, whose activities are centred in the Iberian Peninsula, where the Company is a leading player.

FAR EAST



Main destination of 2 bcm annual sales of LNG.

ANGOLA

75Tcf
NATURAL GAS
DISCOVERIES

WORKING INTEREST
PRODUCTION IN
2012²

Five E&P projects. Annual sales in oil products of 247 kton.

Present in seven E&P blocks.

BACKGROUND



One E&P project, namely for production and liquefaction of natural gas. Oil product distribution with a network of 32 service stations.



Two E&P projects.



Exploration & Production



Refining & Marketing



Gas & Power

¹ Considers the 3P reserves and the 3C contingent resources as of the end of 2012, as certified by DeGolyer and MacNaughton.

Values regarding 2012.

³ Based on sales in the trading segment in 2012.



Multi-energy in Galp Energia's value chain

Value chain for oil, natural gas and electricity

0il

Exploration & Production

The Company's objective is to produce 300 kboepd in 2020, which represents a production level 10 times higher than that of 2012.

By the end of 2012, the volume of 3P reserves, on a net entitlement basis, reached **783 mboe**.

Refining

The refining capacity was **330 kbopd**. Sales of refined products amounted to **16.4 mton**.

Service stations

Distribution of oil products:

1,367 service stations in the Iberian Peninsula.

1,486 service stations around the world.

Natural gas

Second biggest natural gas operator. Number of natural gas clients ('000): **1,262**. Volumes sold (thousand m³): **6,253**. Natural gas distribution network (km): **11,948**.

Electricity

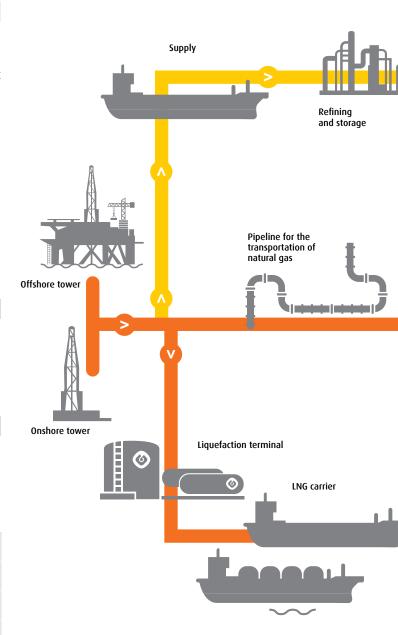
Market share by volume: 3.6%.

Market share by number of clients: 5.5%.

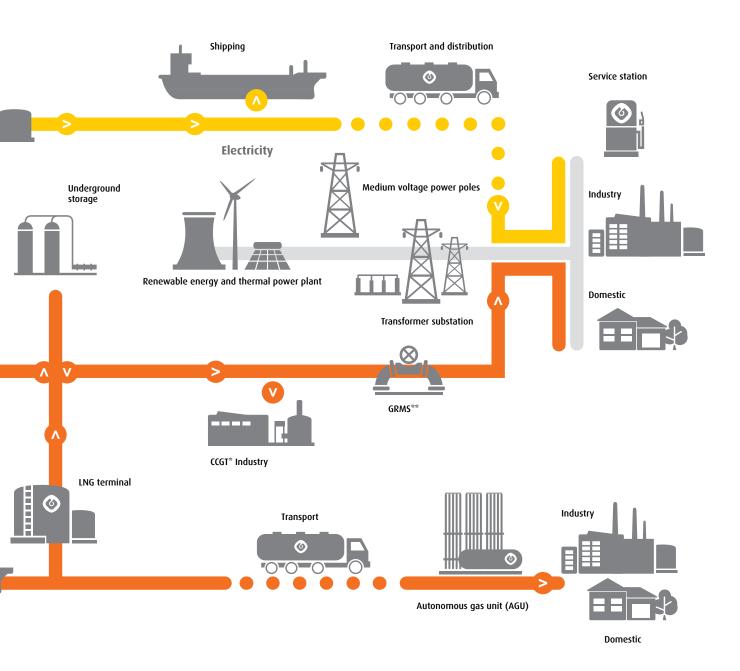
Galp Power sales: 615.7 GWh.

Segment distribution by annual energy consumption	Very high voltage	3%
	High voltage	7%
	Medium voltage	62%
	Low voltage (special)	13%
	Low voltage (normal)	15%

Sales of electricity to the grid (GWh)	2009	2010	2011	2012
	706	1,202	1,201	1,298



BACKGROUND





Natural gas

Electricity

Transport via fuel tanker

^{*} Combined cycle gas turbine station (CCGT). ** Gas regulation and metering station (GRMS).



Main events

2012	
February	Galp Energia announces the discovery of large natural gas reserves in offshore Mozambique. Galp Energia, partner in the consortium for the exploration of area 4 of the Rovuma basin, in offshore Mozambique, announces the discovery of large natural gas reserves in the Mamba North 1 prospect, located in that area.
April	Appointment of Galp Energia's new governing bodies for the 2012-2014 term.
June	Galp Energia holds a meeting with national SME to encourage business opportunities. Joint initiative with Portuguese Investment and External Trade Agency (AICEP) and Business Association for Innovation (COTEC). Over 400 company representatives attended the meeting.
August	The Matosinhos refinery receives oil produced by Galp Energia in Brazil for the first time. Oil produced by Galp Energia in the Lula field of the Santos basin, in Brazil, is delivered for the first time to Leixões harbour. The 138 thousand tonnes (kton) of "Lula" crude, corresponding to seven thousand lorry loads of crude oil, were offloaded using monofloats, an offshore installation for unloading high-capacity ships at high sea, and transported to supply Galp Energia's refineries.
September	Galp Energia is included in Dow Jones Sustainability Indexes (DJSI) – Silver Class and Sector Mover distinction.
December	Galp Energia signs farm-in agreement in offshore Morocco (E&P). Galp Energia announces the signing of a farm-in agreement with the Australian company, Tangiers Petroleum Limited (Tangiers), for the acquisition of a 50% share in the Tarfaya Offshore. Galp Energia will become the operator of the Tarfaya Offshore area, a role which is currently held by Tangiers.

Awards and recognitions

GALP ENERGIA JOINS THE GROUP OF THE MOST SUSTAINABLE COMPANIES IN THE WORLD

In September 2012, Galp Energia joined the DJSI, both on a European and global level, entering the global index for companies whose financial, social and environmental performance are rated as the most sustainable in the world.

In addition to joining the DJSI World, which includes 15 companies from the Oil & Gas sector, the Company joined the exclusive DJSI Europe, which includes five companies from the sector.

After being recognised as one of the most sustainable companies in the world by joining the DJSI, Galp Energia was also distinguished with two awards by RobecoSAM in the Oil & Gas Producers sector.

The RobecoSAM Silver Class 2013 award is attributed to companies which have achieved a score within a range of 1% to 5% from the score of the leading player within the sector.

RobecoSAM Sector Mover 2013 is directed to companies which have achieved the largest proportional improvement in terms of its sustainability performance compared to the previous year.

The DJSI were established in 1999. These were the first indexes designed to monitor the financial performance of major worldwide companies, for which the creation of values is governed by the highest sustainability standards. The 2012-2013 DJSI includes 340 companies selected from the 2,500 world's largest listed companies.









CARBON DISCLOSURE PROJECT – AWARD FOR BEST IMPROVER IN THE IBERIAN SAMPLE 2012

Galp Energia was awarded Best Improver in the Iberian Sample 2012 by the Carbon Disclosure Project (CDP).

The Carbon Disclosure Leadership Index (CDLI) highlights Iberian companies showing a consistent and transparent approach in the disclosure of information relating to the management of climate change issues and the understanding of their impact on the company, acting as an assessment tool for investors and other stakeholders.

In 2012, the CDLI included 12 Iberian companies that best met the CDP questionnaire, including four Portuguese companies, one of these being Galp Energia.

CDP is a non-governmental non-profit organisation holding the largest database on the corporate management of climate change related issues.

GALP ENERGIA LISTED ON THE WORLD'S 100 MOST SUSTAINABLE COMPANIES

Galp Energia joined the Global 100 most sustainable companies for the first time.

The Company was ranked at number 62 within the Global 100 and was classified as the 5th best in the energy sector, thus receiving recognition for its sustainability policies from the world's most credible corporate sustainability ranking.

The Global 100 created by Corporate Knights consists of a selected group of the top 100 large-cap companies in the world, assessed using a series of sustainability criteria. In total, the 2013 ranking includes companies from 22 countries and six continents.

Corporate Knights is an independent company established in 2002, which carries out research on media and investments.

SMART GALP PROJECT IS FINALIST IN THE WORLD SMART CITY AWARDS 2012

Smart Galp, a pilot project for the integrated monitoring of three energy sources – electricity, natural gas and fuels – was one of the top six projects in the international competition World Smart City Awards 2012, in the "Innovative Initiative" category.

The World Smart City Awards is an initiative which takes place at the Smart City Expo World Congress, an event which brings together 120 public and private bodies, companies and universities.

In the 2012 event, which was held at Fira Barcelona, there were 106 candidates from 65 cities across 18 countries.

GALP FUEL STATIONS DISTINGUISHED BY CONSUMERS' CHOICE

Galp Energia was awarded Consumers' Choice with the "Best Service Station" award. Galp Energia's service stations achieved the top score in all of the assessment criteria (discounts and promotions; good service; complementary services – ATM, car wash, shop; speed of service; fuel quality; levels of hygiene/cleanliness of the station; customer loyalty/points cards and staff friendliness), when compared to its competitors.

BEST LEADER AWARDS – MANUEL FERREIRA DE OLIVEIRA CONSIDERED THE BEST PRIVATE BUSINESS MANAGER

Galp Energia's Chief Executive Officer (CEO), Manuel Ferreira De Oliveira, won the prize for Best Leader of a Private Company, in an initiative run by the weekly newspaper *Sol* and by Leadership Business Consulting. The Best Leader Awards that recognise leaders who stand out and inspire society aims to promote the importance of leadership.

GALP ENERGIA HAS THE BEST CORPORATE WEBSITE ON THE INTERNET

According to the KWD Webranking 2012-2013, Galp Energia was ranked as the Portuguese company with the best corporate website. This study, which represents a benchmark in online communications, encompassed the top 500 companies in Europe based on their market capitalisation. Galp Energia was ranked at number 65 in the European ranking.



EUROPEAN INVESTOR RELATIONS PERCEPTION STUDY

In March 2012, Galp Energia won first place in the Best Investor Relations Officer category for the European Oil & Gas sector from an assessment evaluation carried out both by investors as well as by analysts.

The European Investor Relations Perception Study, which awarded this prize, is carried out each year by the Institutional Investor magazine encompassing 825 analysts and fund managers from 436 financial institutions from all over the world, and 1,467 analysts from the top 146 global investment banks. Galp Energia was the only Portuguese company to achieve top marks for its sector, from both investors and analysts.

EXTEL 2012

In June 2012, Galp Energia won first place in the Extel 2012 Survey for the Investor Relations category, in Portugal. Extel is carried out annually by Thomson Reuters and encompasses over 700 European companies. In 2012, around 2,250 fund managers from 60 countries and 2,270 sell side analysts voted in the survey.

APPC AWARD BEST AWARDS 2012 – CRC AT GALP ENERGIA WINNER FOR THE 2012 UTILITIES SECTOR

The Customer Relations Centres (CRC) for the Gas & Power sectors (G&P) and the Fuel Distribution Sector for Galp Energia were awarded first and second place respectively in the APPC Best Awards 2012.

These awards, organised by the Associação Portuguesa de Contact Centers (Portuguese Association of Contact Centres), aim to provide recognition for companies that stand out for providing excellent customer service.

Main economic data

BACKGROUND

CORE ECONOMIC INDICATORS			
	2011	2012	% Change
Turnover (€m)	16,804	18,507	10%
Other operating income (€m)	183	137	(25%)
Goods sold and other operating costs (€m)	14,597	16,213	11%
External supplier and services (€m)	914	990	8%
HR operating costs (€m)	327	337	3%
Interest and similar costs (€m) ⁽¹⁾	164	133	(19%)
Dividends (€m) ⁽¹⁾	118	270	129%
Tax			
Income tax (€m) ⁽¹⁾	187	132	(29%)
Tax on oil products (ISP) (€m) ^{(1) (3)}	2,400	1,969	(18%)
Other taxes (€m)	15	17	13%
Direct economic value generated (€m)	16,987	18,644	11%
Direct economic value distributed (€m)	16,328	18,101	11%
Accumulated or retained economic value (€m)	649	543	(16%)
Investment in the community (€m)	5.5	9.1	65%
I&D expenses (€m) ⁽²⁾	9.7	n. a.	
Significant financial benefits received from the State (€m)	2	1.8	(10%)
Average payment period for suppliers (days)	53	30	(43%)
Net profit IFRS (€m)	433	343	(21%)
Net profit RCA (€m)	251	360	43%
Investment (€m)	1,000	940	(6%)
Net assets (€m)	10,155	13,909	37%
Financial debt (€m)	3,504	1,697	(52%)
Ebitda IFRS (€m)	1,090	1,038	(5%)
Ebitda RCA (€m)	797	1,016	27%
Ebit IFRS (€m)	642	542	(16%)
Ebit RCA (€m)	395	585	48%
Investment and expenses in environment, quality and safety (€m)	49.9	55.6	11%
Working interest production (kboepd)	20.8	24.4	17%
3P net entitlement reserves (mboe)	709	783	10%
Sales of refined products (mton)	16.3	16.4	1%
Sales of natural gas (millions of m³)	5,365	6,253	17%

⁽¹⁾ Results are reported as cash flow.

⁽²⁾ Ongoing consolidation of the amount.

⁽³⁾ The tax on oil products was not included in the calculation of the direct economic value generated and distributed because is a specific indicator of the activity of Galp Energia in Portugal.



Chairman's message

Safe energy for all is one of the main driving forces for economic prosperity. Currently, as global society is going through profound geopolitical and geoeconomical change, sustainability is a strategic factor for the entire energy sector, as cornerstone for responsible, balanced and ongoing action.

The challenge that the energy sector is facing is herculean: according to the World Energy Outlook published by the International Energy Agency, global demand for energy may increase by around 30% by 2035. This increase in demand will be fuelled by booming middle classes in China and India. It is undeniable that the world will need more energy and on a large scale, more oil and gas.

This trend puts an enormous amount of pressure on ensuring relevant, diversified and affordable energy supply, but it also makes the mitigation of the environmental impacts caused by the energy sector more complex.

Therefore, to satisfy the world's energy needs and also limit the increase in prices, a large part of the solution lies in exploring new frontiers for oil and gas. Over 50% of newly discovered hydrocarbons found in the world over the last decade are located in deep and ultra-deep water. Amongst countries where the 10 most important discoveries occurred, three of them are Portuguese-speaking countries.

Galp Energia is in the front line of this trend as it focuses a large part of its work on exploration and production in deep offshore waters, particularly in the Brazilian pre-salt layer and, more recently in the natural gas zone of Rovuma in offshore Mozambique.

This is why the value placed on qualified human capital at all stages of Galp Energia's value chain is a decisive factor for the future. Exploration and production requires huge technological innovation to extract hydrocarbons from complex geological formations, ensuring, at the same time, that operations are environmentally safe. In refining business, thanks to the big investments that have recently been made, we've not only become more efficient but we've also become net exporters of diesel fuel. Our international trading will be playing an increasing role in Galp Energia's activities, heavily leveraged by the oil and natural gas production that the Company will have in the next few years.

To sum up, sustainability of the energy sector is closely connected with operational excellence, talent management and innovative eco-efficient technology, if it wants to create solutions that will increase the productivity of resources, valuing the environment and the surrounding communities.

Our profits create wealth for the countries where we operate, based on our ethical values and social responsibility. We are in different countries but we are recognised by the same demanding values of social and environmental responsibility. We create growth and employment around us. The community and our employees, suppliers and customers benefit from our success. This has been proven by the fact that Galp Energia has



Américo Amorim, Chairman of Galp Energia's Board of Directors.

joined the five top oil and gas companies in the DJSI, one of the most important sustainability indexes in the world.

Galp Energia's social responsibility commitment is to create shared value with its stakeholders. In order to continue meeting this goal over a long period, the Company's sustainability is at the top of our priorities.

The key to continuing making part of the most sustainable companies in the world is to work with our eyes turned to the future.

Américo Amorim

Chairman of Galp Energia's Board of Directors

01 0 MESSAGES

CEO's message

Companies and financial markets cannot ignore the fact that ecosystems are crucial for a successful financial performance. The very valuable services and products that they provide – from energy and water resources, carbon storage and fertile soil for agriculture – are essential for a sustainable economic development.

And even more so when the human population is predicted to increase from the current seven billion to nine billion by 2050. This trend places enormous pressure on the world's population in terms of access to and efficient use of resources, especially energy resources, not only due to the undeniable need for them, but also the need to mitigate negative environmental impacts.

We believe that energy innovation has to be one of the most efficient and sustainable ways to combat climate change. This is because it generates new technologies which are capable not only of being efficient and productive in the value chain, but also using energy sources with a smaller carbon footprint.

This is why Galp Energia has adopted sustainability as a strategic vector to conduct its business. In our Company, the production and distribution of the energy that we sell is carried out using the most stringent operational, environmental and social efficiency criteria, ensuring the economic viability and reinforcing the most advanced technological skills, especially in exploration, production and refining activities. For example in Brazil, one of our core areas, as with Mozambique and Angola, the drilling of wells in ultra-deep waters requires solid investment in cutting-edge technology and complex and demanding advanced security systems.

With its sustained investment in the development of human capital in the areas of exploration and production (where the work force increased by 23% in 2012), Galp Energia is also helping to increase the amount of less carbonic hydrocarbons in the world, taking part in the discovery in Mozambique of whole new natural gas region of global size.

In 2012 the consortium in which Galp Energia holds a 10% stake to operate area 4 of Rovuma basin in the Mozambican offshore, made important natural gas findings. After drilling a total of seven exploration and assessment wells, the estimate of natural gas resources currently in the deposit (GIIP) is 75 Tcf. The production phase is due to start in 2018 with two 5 millions tonnes per year (mtpa) trains.

In 2012 Galp Energia added 12 new exploration and production projects to expand its E&P portfolio both geographically and geologically (to a total of 52 projects), namely in Namibia, Morocco and Portugal, with further exploration projects in East Timor, Uruguay and Equatorial Guinea.

As a result of the investments made in the exploration, assessment of findings and development projects, exploration resources (*mean estimate unrisked*) increased by 14% in 2012 to 3,203 million barrels of oil equivalent (mboe), following recent acquisitions of areas for exploration, namely in Morocco



Manuel Ferreira De Oliveira, Galp Energia's CEO.

and in Namibia. 3C resources increased by 21% in 2012 to 3,245 mboe, mainly supported by exploration activities carried out during 2012, in Mozambique, and by assessment activities, in Brazil. 3P reserves increased by 10% in 2012 to 783 mboe, supported by evaluation and development activities carried out in the Lula/Iracema field in the pre-salt Santos basin in Brazil.

With these results, Galp Energia's goal to produce 300 thousand barrels of oil equivalent per day (kboepd) in 2020 is secured in terms of access and resources.

Following our strategic plans for sustainability, it is imperative to comply with plans and exhaustive procedures to minimise the risk of incidents. The operational performance of drilling activities has shown a marked improvement, due mainly to a good learning curve and to adopting the most advanced technological solutions.

Based on this our Company continues to run training and research programmes such as, for example, the GeoER programmes (Geo-Engineering of Carbonate Reservoirs), the partnership with the prestigious Heriot-Watt University (HWU), the EnglQ (a PhD programme in Refining Engineering, Petrochemistry and Chemistry) and the Petroleum and Gas Institute (ISPG), a great initiative set up in partnership with seven of Portugal's most prestigious universities.

ISPG is an association for research and advanced training, whose aim is to coordinate research and development work (R&D) with Portuguese and international universities and institutions by structuring a solid and stable partnership

to create a network of expert knowledge. This institute was established by Galp Energia with the help of the seven largest Portuguese universities, and it may extend to include institutions from other nations.

Galp Energia does not just focus its intellectual resources on energy production, but also on the creation of more efficient and intelligent solutions for energy use. This is why the Company persists in innovating its services through Galp Energy Solutions, implementing efficient energy management systems for industry, services and transport.

Another part of the economic pillar is that 2012 marks the end of the project for converting and improving the energy efficiency of the Sines and Matosinhos refineries, marking the start of a new business era for Galp Energia Refining. At the Sines refinery, the commercial production of diesel fuel has started using the new hydrocracker, increasing our production and consolidating our self-sufficiency for that liquid fuel.

In our sea transportation of crude oil and refined products which covers over 50 countries and we adopt the strictest vetting and operational procedures for it. The distribution network for oil based products in Portugal, Spain, Guinea Bissau, The Gambia, Cape Verde, Angola, Swaziland, Mozambique and in Malawi requires ongoing training of our employees, the application of strict practices and operational processes and a suitable level of investment, which we do in accordance with our sustainability policy.

For the distribution of natural gas, our focus is on the safety of operations and installations, paying particularly close attention to gas leaks. This area achieved performance indices that were well above the sector benchmark for these areas.

In preparation for the future, Galp Energia is also supporting the development of renewable energies, with particular focus on biofuels, which play an increasing role in the global energy mix. The Company's projects in this area already meet the strictest requirements resulting from the proposals to change European policy on biofuels, presented in October 2012, which denotes the great importance of these demands with the creation of Galp Energia's climate change strategy, as well as the Company's positive contribution to the global effort to reduce greenhouse gases (GHG).

Another important factor is the Company's health, safety and environment (HSE) strategy which is made freely available to everyone who works for Galp Energia.

In the social pillar, 2012 was profoundly marked by our corporate responsibility policy. This policy forms the basis for Galp Energia's ethical, environmental, social and economic actions and is incorporated in the organizational culture, thus guaranteeing that social responsibility is one of the main axis for strategy, action and communication for the Group, in all geographical locations, contexts and realities in which it operates.

Within this area, one of the most relevant actions carried out was the issuing of a general directive viewing the introduction of a standard clause in all contracts entered by Group companies with suppliers, contractors and other stakeholders to adopt the Group's Code of Ethics provisions.

Another important initiative is the Company's involvement in the Alliance for Road Safety and Prevention (APR – Aliança para a Prevenção Rodoviária) whose mission is to mobilise society in general around road traffic safety issues coordinating and creating conditions for research, awareness-raising and improvement of Portuguese drivers behaviour.

Within the scope of the social pillar, it should also be noted that, as far as biofuels are concerned, in both initiatives in Brazil and in Mozambique, the strictest criteria are applied in terms of sustainable relations between agricultural holdings and the communities: preventing competition for soil used in the food chain, reinforcing food safety by supporting local agriculture and promoting family businesses.

The combination of these actions shows that sustainability is part of the day-to-day management at Galp Energia which consolidates and creates value for all stakeholders. We achieved international recognition when Galp Energia joined the list of the top five Oil & Gas companies in the DJSI, and was ranked amongst the top 100 most sustainable companies in the world by the Corporate Knights, in Davos, 2013.

Galp Energia believes that successful companies only prosper in successful societies. This is why our value creation is inclusive and generates progress for the communities around us. To continue to maintain this level in the long term, the Company's sustainability is based on the ability to continue to be profitable and to provide sufficient remuneration for the financial resources invested.

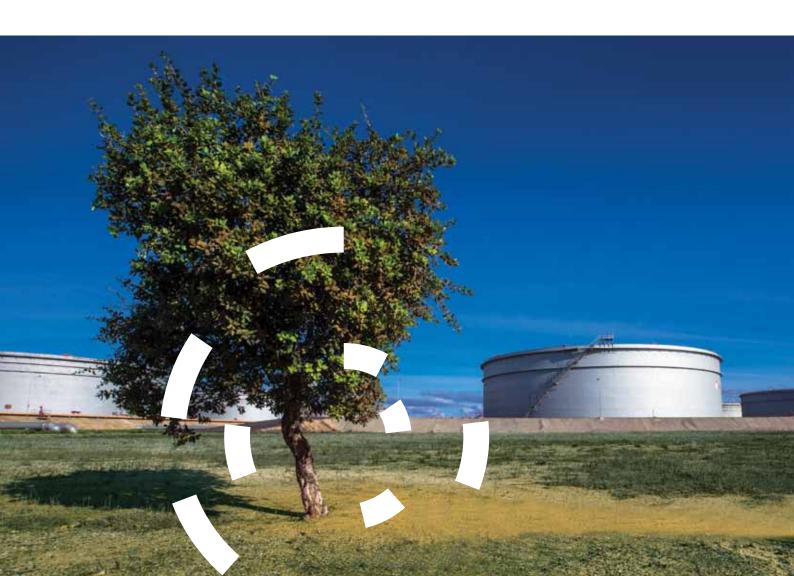
This sustainability report and the activities detailed therein are the result of the dedication, skill and hard work of many individuals. I offer my deepest thanks to each and every one of our employees and business partners that have contributed to the results described here.

A thank you is also owed to members of our governing bodies who always encourage us to be ever more demanding when it comes to defining and applying the sustainability policies that are essential for ensuring the long term future of our Company.

Manuel Ferreira De Oliveira

Galp Energia's CEO

02. Sustainability at Galp Energia



Galp Energia is an integrated energy operator, covering the whole value chain; its activities range from the exploration and production of crude oil and natural gas to refining and marketing of oil products, the distribution and marketing of natural gas and electricity.

Galp Energia's mission is to create value for its shareholders taking into account the economic, social, environmental backgrounds and their importance to the achievement of goals in a sustainable way. Whilst carrying out its strategy, the Company aims to follow best sector practices and be innovative, particularly in the field of energy efficiency.

In 2012, with the support of the Sustainability Committee presided over by a member of the Executive Board, and with the involvement of those responsible for the different corporate and business areas, the strategic priorities identified were again confirmed.

The Company strengthen its commitment to include in its goals and decisions, actions and measures viewing a more sustainable development.

STRATEGIC PRIORITIES

- To improve performance in safety, health and the environment.
- 2. To foster a culture of ethical behaviour.
- 3. To combat climate change.
- 4. To engage **stakeholders** and get closer to communities.
- 5. To value **human capital**.
- 6. To promote **innovation**.

While preparing its sustainability plan, Galp Energia went beyond the political and regulatory framework in force. The Company also considered other critical aspects such as: the expectations of the stakeholders; best practices in the sector; the impact of the business on developing countries; the environmental, social or government criteria used by the analysts and asset managers when assessing their investment portfolio; and the universally accepted principles for human rights, labour, the environment and anticorruption standards.

14

Process of defining the sustainability plan



As a result, a sustainability plan of action was defined for all business and regions where Galp Energia operates, approved by the Sustainability Committee, also responsible for supervising and ensuring it is accomplished.

The sustainability plan consists of a number of commitments as well as respective terms and responsibilities to be applied in the short term.

Strategic priority	Initiative/Action	Goal
thics, conduct and human rights	Complete the membership process to the UN Global Compact.	2013
	Provision of training on sustainability, the code of ethics, combating corruption and protecting human rights available for all employees through an e-learning tool.	2013-2015
	Creation of an independent means of reporting violations to the code of ethics and other unacceptable behaviour, the creation of an independent investigative committee.	2013
Human capital	Extend the 360° appraisal system to all team-leading employees.	2014
	Continue the work plan of defining and implementing human resource policies at the various affiliates in Africa and in operations in Brazil.	2013-2014
	Assess the satisfaction of Galp Espanha employees.	2014
	Develop training initiatives with employees in Africa.	2013-2017
stakeholders/Relationship with customers	Implement Galp Energia brand repositioning reinforcing the topic of sustainability, which will involve getting input from stakeholders.	2013-2014
	Appoint a customer Ombudsman to analyse and manage customer complaints.	2013
	Create customer observatories (company and private).	2013
	Against a background of increasing energy costs and taking into account its impact on customers' budgets, develop offers with advantageous conditions, namely the Galp On service, a competitively priced tariff plan for the electricity and natural gas free market.	2013-2014
	Extend the process of assessing customer satisfaction in different areas (pilot project in Mozambique to start in 2013).	2013-2015

Strategic priority	Initiative/Action	Goal
Stakeholders/Surrounding communities	Assess social responsibility projects impact developed based on the London Benchmarking Group's methodology.	2013
	Define the critical financial Key Performance Indicators (KPI) related with social responsibility.	2014
	Continue the programme for raising awareness and publicising safety conditions with the community – APR project.	2013-2015
	Foster participation in volunteer programmes promoted by Galp Voluntária.	2013-2017
	Develop and implement a social responsibility programme based on the Millennium Goals that cover various regions where Galp Energia operates.	2013-2015
	Promote the use of the cleanest energy solutions in the local communities in the different countries where Galp Energia operates.	2013-2017
	Implement a social responsibility management system in Portugal and in other countries (Spain, Brazil, Angola and Mozambique).	2015
	Promote environmental education programmes and social communication programmes aimed at communities in Brazil, located in the areas of direct influence of the undertakings.	2013
	Develop a plan for setting up a technology college in Mozambique.	2013-2014
	Create a technical training programme in Exploration & Production (E&P) for Mozambicans.	2013-2014
Stakeholders/Supplier and partner relations	Improve qualification process of suppliers by implementing new tools in the suppliers management platform.	2013-2015
	Strengthen the audit process of key suppliers, ensuring compliance with sustainability requirements, namely EQS requirements and the code of ethics.	2013-2015
	Review the procurement policy, reinforcing environmental and social concerns.	2013-2015
Health, safety and environment	Integrate environmental, quality and safety (EQS) objectives and goals when assessing employees performance.	2013
	Increase the coverage of certifications according to ISO standards, namely in Matosinhos refinery and in the Gijon factory.	2013
	Implement the audit programme to the G+ System.	2013-2017
	Promote training programmes and raise awareness to the G+ System, water, air, safety and health.	2013
Safety, health and the environment/Minimising impacts	Ensure integration of the best techniques available in operational requirements and assessment of the impacts on new businesses.	2013
	Develop a corporate strategy for the sustainable management of soils within Galp Energia.	2013
	Prepare a guide on soil and underground water management, based on standard risk assessment methodologies and management of risks associated with soil and underground water contamination.	2013
Safety, health and the environment/Reduce the depletion of resources	Develop and publish documents to complement the <i>Guia de Boas Práticas para a Gestão da Biodiversidade</i> (Guide to Good Practices for Biodiversity Management): select locations to operate and assess the impacts on biodiversity.	2013
	Implement campaigns to combat desertification/deforestation in Malawi, Mozambique, The Gambia and in Guinea-Bissau.	2015
	Promotion of an efficient use of water in administrative and industrial activities.	2015
	Determine the water footprint in activities carried out in areas where water is scarce.	2013
	Develop a corporate strategy for the sustainable management of Galp Energia Group's waste.	2013
	Develop the 100R® certification project with Ponto Verde Serviços and implement recommendations stemming from the diagnosis to maximise the recovery of urban-equivalent waste in administrative activities, promoting environmental awareness amongst employees (Torres Lisboa, R. Alecrim, CLC, lojas Tangerina).	2013
Safety, health and the environment/Promoting safety	Develop a road safety plan for the transport of goods and products for Brazil and Mozambique (E&P and Biofuels).	2013-2015
	Prepare a guide with Galp Energia's vetting policy (maritime safety).	2013
	Develop awareness raising and prevention programmes on AIDS, malaria and tuberculosis for Africa's operations.	2013-2017
Climate change	Implement Galp Energia's strategy for climate change.	2013-2017
	Increase the importance of natural gas in Galp Energia's portfolio.	2013-2017
Innovation	Implement the R&D strategic plan for exploration and production operations in Brazil.	2013-2017
	Develop the Galp Energia refining R&D centre in partnership with the universities.	2013
	Promote R&D projects on the strategic axis defined: energy efficiency, sustainable mobility and renewable energy, in alignment with the corporate strategy.	2013-2017
Corporate governance	Create a Corporate Governance Evaluation Committee.	2013
	Create directives on directors' equity holdings.	2013

For further information on the stock of the situation of the actions set forth in the 2012 sustainability strategy see appendix III.

03. Governance model, codes of conduct and transparency



In 2011 the production of internal regulations was particularly fruitful. These standards viewed to regulate relations between the Company and its respective employees and between them and third parties in terms of ethics and transparency in management, specifically:

- in combating corruption through the approval and publication of the regulatory standard (RS) RS-02/11 which sets forth the Company's anticorruption policy;
- by creating and approving a suitable code of ethics for the whole of Galp Energia.

In 2012, Galp Energia was mainly committed to implementing the standards published in 2011 as well as to their application and the development of supporting measures.

Sustainability Committee

In 2012 Galp Energia formalised the Sustainability Committee, with the aim of ensuring that sustainability principles were integrated in the management process of the Group companies, promoting best practices in all business, corporate and services areas.

The Committee meets four times a year and is presided over by an executive director.

Objectives

- To reinforce sustainability as one of the Company's key values.
- To promote the policies, principles and practices contributing to a sustainable growth in all regions where Galp Energia operates.
- To direct and ensure the consistent development of corporate strategic plans viewing the consolidation of the Group's strategic sustainability plan.
- Coordinate the integration of sustainability principles and practices throughout the Company's businesses and operations.

Corporate responsibility policy

On 23 February 2012, RS-02/12 setting forth the corporate responsibility policy was approved by the Executive Committee of Galp Energia SGPS, S. A. - Public Company. This standard establishes a policy which will govern Galp Energia's action in the ethical, environmental, social and economic fields, integrating them in Company's organisational structure and ensuring that social responsibility becomes one of the main strategic axis of the Group's strategy, action and communication in all geographies where it operates. To ensure a better understanding of this policy, a specific email address was created to respond to any queries from employees on its application.

Corporate management of contributions and donations

Following the publication of the anticorruption policy (and the subsequent RS-05/11 Management of the Relation with Government Administration, which also supports the anticorruption policy) on 12 April 2012, the Executive Committee of Galp Energia, SGPS, S. A., approved the standard on the corporate management of contributions and donations.

The main goal of this rule is to establish directives clearly defining the institutional representation policy for the whole group, and establishing internal rules concerning contributions and donations given by the Group, in order to adequately estimate the costs and benefits associated to each initiative, and finally ensure an adequate return for the Company.

Violation of these general standards established in the RS is a serious matter which may result in a disciplinary procedure.

Internal communication principles

During meeting held on 21 June 2012, the Galp Energia SGPS Executive Committee also approved RS 07/12, which established the principles for internal communication. The main purpose of this standard is to promote integration and commitment of employees and the Company to understanding the mission, promote the values and align the Company's culture, through the production, collection and consistent treatment of its contents and an efficient management of the internal means of communication available. The standard also contributed to the materialisation and internal disclosure of the ethics and transparency principles adopted by the Group.

Monitoring and checking committees

The monitoring committees created to ensure the correct implementation and interpretation of the anticorruption standards and code of ethics, recorded the following interventions requested by employees.

	Anticorruption Monitoring Committee	Ethics Compliance Committee
Requests for opinions received	2	6
Conclusions	Of these interventions, the Committee felt that none of the situations represented an effective violation of the internal standards.	None of the interventions expressly concluded that the code of ethics had been violated.
Results	One of the situations sent to the Internal Audit Division. Monitoring and clarification requests/complaints did not give rise to any disciplinary proceedings	*Some opinions sent to evaluate and make decisions on behalf of managers. It is recommended that they are checked for inconsistencies with the Company's interests. *Intervention requests did not give rise to any disciplinary proceedings.

Auditing process

Provisions in the code of ethics, approved by Galp Energia's Executive Committee, which establish the values, behaviour and practices that should be followed by all those who work for the Group, form, where likely to be verified, part of the framework present in all audit proceedings carried out by the Internal Audit Division. These proceedings may consist of specific auditing tests or be included in the audits to the activities and businesses of Galp Energia Group. The same model of action is followed for the anticorruption policy and other supporting procedures.

Training behaviour change initiatives

Multiple training actions on the subject of business ethics and Galp Energia Code of Ethics continued to be provided

GOVERNANCE MODEL, CODES OF CONDUCT AND TRANSPARENCY

to Galp Energia's ever-growing workforce within the scope of the Galp Energia Academy and Conhecer+ programmes. 240 hours of training were provided in total.

Extended coverage of Galp Energia's code of ethics

Within the area of foreign relations, one of the most relevant actions was the general introduction in contract drafts prepared jointly by the Legal Services and the Procurement Services of a clause binding the counterparties, specifically partners, suppliers and others to the provisions of the Galp Energia Group's code of ethics.

This action ensures the compliance with one of the commitments adopted in 2011 and shows how much importance the Company places on the aspects covered by the code of ethics, seeking to extend them beyond the limits of the Company.

UN Global Compact

In 2012 Galp Energia started an analysis of the requirements needed to join the UN Global Compact, a United Nations initiative, which aims to adopt and support the 10 universally accepted principles for human rights, labour standards, the environment and anticorruption as well as on how to align the strategy and activities developed using these principles.

Extractive Industries Transparency Initiative

In 2010 Galp Energia declared that it would adhere to and support compliance with the principles of the Extractive Industries Transparency Initiative (EITI). In 2012 this commitment was continued with the aim of improving transparency and promoting attempts to make the extracting industry more responsible.

The EITI is a global standard that promotes transparency regarding the income generated from extraction and production of mining resources, including oil and gas. It is a strong and flexible way of monitoring and conciliating the payments of operating companies and the government revenue of the country detaining the resources.

Pursuant to these procedures, the sums allocated to the Brazilian and Mozambican state bodies were the following.

 Payments to state-owned entities

 Country
 2011
 2012

 Brazil
 €32,070,132
 €111,448,571(°)

 Mozambique
 €42,392
 €302,388

The principles of the EITI, agreed at Lancaster House Conference, in June 2003, form the basis of the initiative and can be found at http://eiti.org/eiti/principles.

DECLARATION OF SUPPORT FOR EITI FROM GALP ENERGIA, ON THE OCCASION OF THE EITI 6^{TH} GLOBAL CONFERENCE, MAY 23^{TH} , 2013

Transparency and good governance are fundamental guiding principles at Galp Energia. That is why our Company sees the activity developed by the EITI as part of a major transformational movement towards the transparent governance of the financial resources generated by the oil and gas extraction business. Indeed, we support more countries joining the EITI, given its beneficial effects in the creation of a fairer and more transparent market.

The main objective of the EITI is to encourage the increased transparency of profits generated by the extractive industry. In order to make this possible, the EITI has created conditions for the various stakeholders to work more closely together: governments, businesses, NGOs and financial institutions.

Transparency requires everything to be clear and true, and in this way confidence is transmitted to all those involved. In this environment those involved have to be more responsible, so that local communities understand the importance of business investment for their sustainable development.

For this reason, the involvement of civil society in the various EITI groups helps increase transparency when rendering the accounts. Indeed, the EITI is undoubtedly an example of the practice of multistakeholder sustainability, promoting the common good and healthy relationships between businesses, governments and civil society. That is why we will always support those who wish to establish more transparency in the oil and gas business.

Manuel Ferreira De Oliveira

Galp Energia's CEO

⁽¹⁾ Based on the exchange rate on 31-12-2012.

04. Risk management



Main risks

Galp Energia groups its main risks into four main categories: strategic, financial, operational and external. The Company believes these could have a negative impact on its strategy, stakeholders, namely its employees, the regions in which it operates, its operations, its results and assets. Consequently these results can have an impact on shareholder return including dividend distribution and the price of Galp Energia's shares.

Throughout 2012 the risks faced by Galp Energia were reviewed and re-assessed. The fact that the following risks are emphasised does not rule out the possibility that other risks of equal or greater importance may exist.



Furthermore, as this is an important issue, actions being taken by the Company's Board of Directors to mitigate some of these risks are identified and disclosed, when appropriate.

Risk management and internal control system

Risk management

Galp Energia has defined policies and processes to monitor, measure and manage its exposure to risk. The purpose of the Company's risk management policy is to support business segments in achieving their goals whilst monitoring the potential impact of risks on their results.

Risk Management Model

With the aim of defining the most effective and efficient model of risk management, the Board of Directors decided to make autonomous the activity of risk management at the end of 2012. The risk and insurance department's corporate risk management area aims to promote and implement group risk management policies defined by the Executive Committee.

It aims to ensure that the risk management system is used effectively through: ongoing monitoring of its suitability and efficiency; the monitoring of corrective measures used to redress any potential faults in the system; permanent monitoring of levels of risk and the implementation of control mechanisms for the range of risks to which Galp Energia is exposed.

The relationship model also enables the Group's business units (BU) and companies to use a centralised risk management system for corporate risk management. This sector will monitor local risk control and management units ensuring that they are in line with defined policies and strategies and the consistency of principles, concepts, methodologies and tools for evaluating and managing risk for all the Group's BU.

Internal control system

The internal control system consists of a set of policies and procedures adopted in order to ensure the fulfilment with reasonable success of the Galp Energia Group's objectives in the following subjects: carrying out business in an orderly and efficient manner; safeguarding its assets; preventing and detecting fraud and errors; complying with laws and regulations; and ensuring that financial reports are reliable.

This system is based on the guidance of the Committee of Sponsoring Organizations of the Treadway Commission (COSO) on the main features of Galp Energia's internal control approach, namely, environmental control, risk assessment, monitoring, and information and communication.

Control environment

Environment control is the starting point and the basis for other components of risk control. The control environment comprises the overall attitude, ethical awareness and the initiatives of the Executive Committee, being an example for employees and other stakeholders of the Group.

The introduction of a code of ethics, designed to provide a set of guidelines for the personal and professional conduct of all employees, contributes to the fulfilment of the Company's mission, vision and values. This document is available on the Group's website.

Galp Energia's internal control environment also comprises the internal standards and procedures for delegating powers of authority, which ensure adequate scrutiny of management decisions, according to their nature and substance.

The supervisory board is responsible for supervising the effectiveness of the risk management system, internal control and internal audit, as well as annually assessing the workings of systems and internal procedures, thereby strengthening the internal control environment. The recommendations deemed justified by the Supervisory Board are sent to the Executive Committee.

Risk assessment

Galp Energia has been promoting the systematisation of the assessment of risks and the internal control systems at the level of BU. These analyses are aimed at risks identified and managed by BU, which are also responsible for managing them.

00 01 02 03 04 05 06 07 08 09 10 11 12 13 14

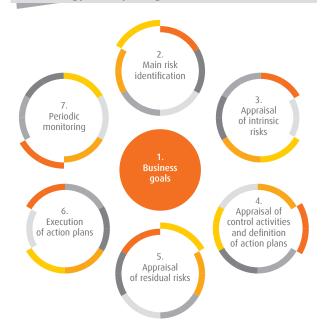
Since inherent risks and the effectiveness of internal controls are a function of endogenous and exogenous variables, this process is not static. Thus, risk reassessments must be regularly conducted to the Group's main businesses to guarantee the alignment of the BU's response to risks with the risk profile decided by the Executive Committee.

RISK MANAGEMENT

Generally, assessments of risk analysis and internal control start by identifying and classifying the main risks facing the achievement of the objectives of the BU, as well as the control systems in place to mitigate them. To assess the effectiveness of the portfolio of implemented control systems, residual risks are measured and the existence of possible deviations from the risk appetite set for the unit are checked.

Finally, BU announce their residual risk committing to a response plan designed to mitigate, transfer, avoid or accept residual risk. This process is in accordance with the method illustrated by the following chart, which shows the sequence and dependencies of the several activities.

Methodology for Galp Energia's risk assessment



Monitoring

The Supervisory Board supervises the adoption of those principles and policies that identify and monitor the main financial and operational risks arising from the Group's activities, as well as the measures designed to monitor, control and disclose such risks.

Operational audits, compliance audits, financial audit and reviews of information systems are conducted in order to test the effectiveness of implemented internal control mechanisms. Each year, an audit plan is set up based on the outcome of the assessment of the residual risk of several processes and BU, which is approved by the management at Galp Energia.

As part of their roles the Statutory Auditor and external auditors carry out the internal audits required for the legal accounts certificate of Galp Energia's individual and consolidated accounts.

Information and communication

The process of disclosing Galp Energia's financial information is monitored by the management and supervisory bodies as well as the BU and corporate services. The investor relations and corporate strategy department prepares the documents for presentation of financial information to the capital markets based on information provided by the BU, Accounting and Treasury and the Corporate Planning and Control Departments.

Prior to their publication, these documents are sent to the management and supervisory bodies. In this manner, all documents containing financial information are approved by these two bodies prior to their publication.

For more information on the main risks, the risk management policy and the internal control system and risk management, consult Galp Energia's report and accounts 2012.

More information at

http://www.galpenergia.com/EN/Investidor/ GovernoCorporativo/GestaoRisco/Paqinas/GestaoRisco.aspx

05. Exploration and production of oil and natural gas

5.1 GALP ENERGIA'S ENVIRONMENTAL PERFORMANCE IN PARTNERSHIPS



EXPLORATION AND PRODUCTION OF OIL AND NATURAL GAS



Galp Energia holds an exploration and production portfolio of 50 projects, across 10 countries, at various stages of exploration, development and production. The Company focuses its activity on three core areas – Brazil, Angola and Mozambique, but there have been major efforts to diversify its exploration portfolio both geographically and geologically. Thus, during 2012, Galp Energia added 16 new projects, namely in Namibia, Morocco and Portugal and also has exploration projects in East Timor, Uruguay and Equatorial Guinea.

The exploration and production activity will continue the strategy of the coming years, focus on the development of reserves and resources of the cluster in the Santos pre-salt basin; on the exploration and development of natural gas discoveries in Mozambique; on the exploration and development of new projects in offshore Angola; and on the exploration and analysis of new opportunities.

Main indicators				
	2009	2010	2011	2012
Average working interest production (kboepd)	14.7	19.5	20.8	24.4
Average net entitlement production (kboepd)	9.7	11.8	12.1	18.1
Average sale price (\$/bbl)	59.8	75.3	107.1	101.3
Operational costs (\$/bbl)	10.5	10.4	15.9	13.3
Amortizations (\$/bbl)	17.3	29.5	34	20.6
EBITDA RCA	112	186	251	374
Operational result RCA (€m)	67	61	130	245
Investment (€m)	193	341	299	653

To date, Galp Energia has not taken part in any exploration projects using non conventional resources.

Reserves and resources

Oil reserves and resources were analysed by an independent entity, the consultants DeGolyer and MacNaughton (DeMac).

 In 2012 the Reserve Life Index reached 18.1 years and the Reserve Replacement Ratio, 169%. Both ratios calculated using base working interest. It is important to refer that the world class discoveries made in the Rovuma basin in Mozambique did not contribute to the performance ratio as they are not yet seen as reserves.

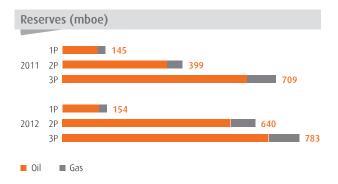
Reserves and resources (mboe)				
	2009	2010	2011	2012
Proved reserves (1P)	25	128	145	154
Proved and probable reserves (2P)	35	397	399	640
Proved, probable and possible reserves (3P)	35	574	709	783
Contingent resources (3C)	3,065	2,356	2,672	3,245
Exploration resources	1.640	2.550	2.821	3,203

It is important to highlight that the 3P reserve base reflects an increase of 10% compared to the previous year, primarily due to the progress of Brazil's development production project.

Natural gas reserves at the end of 2012 were approximately 13% of the total 3P reserves in line with that confirmed at the end of 2011.

The 2P reserves increased by 60% to 640 mboe. Tests to predict future production were also used enabling a more extensive knowledge of the Lula/Iracema field.

The share of natural gas resources as a proportion of the total contingent resources was 37% at the end of 2012 compared to 34% in 2011, due to the success of exploration activities in Mozambique. Shares in Brazil represent 69% of the total contingent resources whilst natural gas resources in area 4 in Mozambique represented 24% of the total resources.



Production

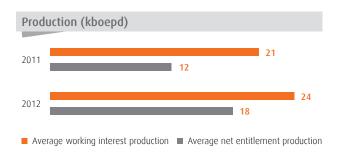
Deliver profitable production growth, reaching a production level of 300 kboepd in the next decade

The success of exploration activities in the pre-salt Santos Basin and in Mozambique ensures an unprecedented increase in production for Galp Energia in the next decade.

Galp Energia should reach a production of approximately 300 kboepd in 2020 which is 12 times more than current production levels.

13

In 2012, Galp Energia had an average working interest production of 24.4 kboepd, i.e. an increase of 17% compared to 2011.



This development was due mainly to increased production in Brazil which contributed 10.3 kboepd, mainly due to the development of the Lula-1 project. Of this, 1.7 kboepd was from the activity of natural gas.

In the next few years the 2012 trend will be maintained, with a progressive increase in production in Brazil, and a decrease in production of the fields in block 14 in Angola.

In terms of carbon dioxide emissions (CO₂) it was emitted 187 thousand tonnes (ktCO₂), in 2012, compared to 171 ktCO₂ in 2011.

Featured activities

Galp Energia established a commitment to creating value, fundamentally through exploration activities, and active management of its portfolio is considered essential to ensure the sustainability of exploration and production.

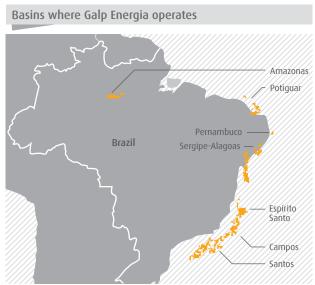
Opportunities to enter new areas are assessed taking into account different strategic factors defined by the Company including:

- level of risk diversification, materiality and value creation
- the possibility to benefit competitive advantages.

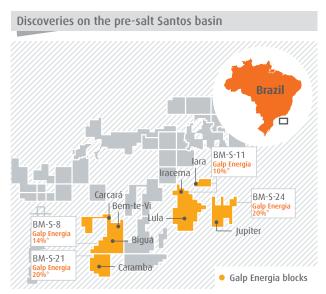
In 2012, the analysis of new opportunities in exploration projects was intensified and focused on access to three new areas, including an onshore block in Portugal, three blocks in offshore Namibia and eight licences in offshore Morocco. These areas contributed a total of 1.3 billion barrels of oil equivalent (bnboe) to the Company's portfolio of mean unrisked exploration resources.

In terms of the exploration activities undertaken in 2012, the successive discoveries of natural gas in Mozambique stand out, where six exploration wells were completed and assessed. Other highlights include the drilling of wells in the Santos pre-salt basin, namely in the Carcará area, in BM-S-8, and the Jupiter NE well, in the BM-S-24 block, which revealed important.

Brazil



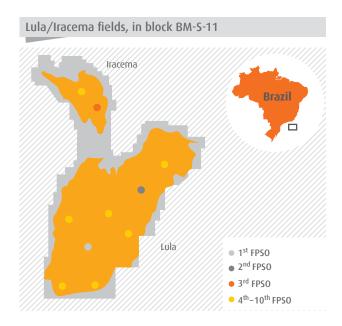
Projects in the Santos basin



*Stake held by its subsidiary Petrogal Brasil.

Currently, the major development projects in Galp Energia are in the ultra-deep water pre-salt cluster of the Santos basin. The discoveries made since 2006 have positioned this basin as a world-class province, in which Galp Energia has been present from the earliest stages of exploration.

Galp Energia plans to have 14 floating, production, storage and offloading (FPSO) units in production in the pre-salt Santos basin by the end of 2018, in the Lula, Iara, Jupiter and Carcará projects. Currently, Galp Energia has an FPSO in production in the Lula field, the Cidade de Angra dos Reis FPSO.



The development plan for the Lula field included the installation of nine FPSO in addition to the FPSO already in production, with a total capacity of around 1.4 million barrels of oil per day (mbopd).

The construction of part of these units in Brazil means not only maximising local involvement in the development of the Lula field, but also the development of Brazilian industry, which will make an important contribution to the development of Galp Energia petroleum resources in the region.

The delivery of the FPSO built in Brazil will be decisive for the progress of the Lula project, and they are planned to enter into production between the years 2016 and 2017.

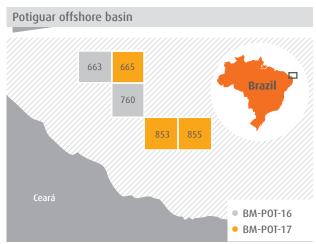
Also as part of developing resources in Brazil, the partnership in block BM-S-11 is committed to developing R&D projects. In this context, the partnership has already been developing work to maximise the return on pre-salt projects, notably by increasing the recovery rate of oil. All equipment allocated to projects in the pre-salt Santos basin are prepared and sized to ensure the inclusion of new recovery techniques resulting from these projects. This is the case with the alternating injection of CO₂ into reservoirs to increase the recovery rate from the fields, and the possibility of drilling additional wells beyond those foreseen.



Other fields in the pre-salt of the Santos basin

Regarding the Carcará and Jupiter discoveries, the partnership continues to undertake a number of activities in preparation for the development of these important finds, with a commitment to the commercial launch of both projects in 2018.

Projects in other Brazilian basins



In the Potiguar basin, located in the Brazilian equatorial margin, the drilling of the first exploration well, to investigate the Ararauna prospect in block POT-M-760, has been postponed until the first half of 2013.

In terms of the BM-POT-17 contract, in 2013, the partnership aims to drill two exploration wells, in order to investigate the Pitú and Tango prospects.

In Pernambuco-Paraíba basin, located in the northern part of the rift basins at the opening of the South Atlantic, Galp Energia has a presence in three blocks. In 2012, 3D seismic data acquired in 2010 was reassessed and technical studies were conducted to develop prospects with potential to be drilled in the second phase of exploration. The decision to move to this phase, which includes the commitment to drill an exploration well on the block, should be made in 2013.

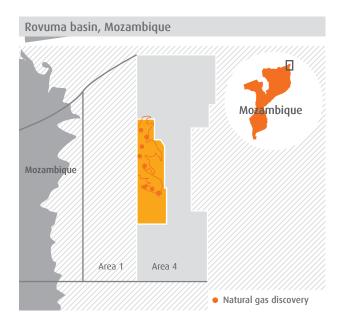
At the end of 2012 Galp Energia started drilling a second exploration well in block BM-ES-31 in the Espírito Santo basin.

This well aims to investigate the Pão-de-Mel prospect, previously named Boca Maldita, and should be finished during the first half of 2013.

In the Campos basin, Galp Energia's partnership will take part in the exploration of block C-M-593 prior to drilling the first well in 2013 with the aim of researching the Obsidiana prospect in the shallow waters of that basin.

In 2012 activities in the offshore Amazon basin focused on continuing the seismic acquisition work which required a more complex logistical process due to the potential environmental impacts in the region and the characteristics of the ground.

Mozambique



In 2012, the partnership for the exploration of area 4 in the Rovuma basin, offshore Mozambique, made several natural gas discoveries, whilst completing six wells in the area.

Currently there is an estimated 75 trillion cubic feet (Tcf) of natural gas in the deposit (GIIP). The partnership estimates that the resources in reserves that are exclusively located in area 4 extend to 27 Tcf. This is a particularly relevant amount given that it allows the area 4 partnership more flexibility to develop the project, compared to developing reserves between that area and area 1.

Exploration and evaluation activities in 2013 will include the drilling of two appraisal wells in the Mamba structure, as well as drilling new exploration wells, in particular for measuring the oil potential in the K Bulge prospect in the south of area 4. In order to enhance the sustainable presence of Galp Energia in Mozambique, in 2012 the Company signed a strategic cooperation agreement with the National Hydrocarbon Company (ENH), a company from the Republic of Mozambique. In addition to cooperation at technical, operational and financial level, the agreement provides for cooperation on joint analysis and evaluation of new opportunities in the region.

Angola

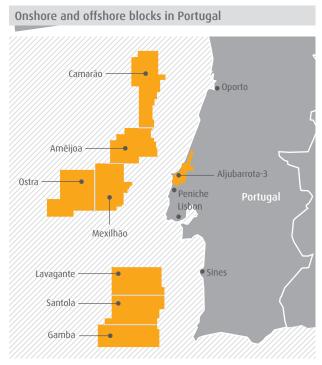
In Angola, Galp Energia holds assets in block 14, with three areas currently in production in block 14K, and in blocks 32 and 33, located in offshore Angola. The Company is also taking part in the first integrated natural gas project in the country, Angola LNG II.

In 2012, the exploration and evaluation campaign continued and Gengibre-3 and Caril-2 wells were drilled.

Portugal

As part of strengthening the exploration portfolio, in 2012 Galp Energia acquired a 50% interest in the Aljubarrota-3 onshore block, operated by Porto Energy. However, Galp Energia has an option to become operator of the block, and can choose to acquire a 25% stake in each of the six other concessions from Porto Energy in Portugal.

Currently, the exploration portfolio in Portugal includes eight blocks, a block onshore and seven blocks offshore in the Peniche and Alentejo basins.



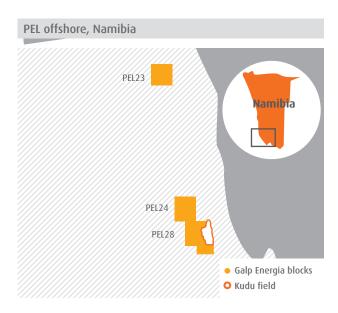
In 2012 exploration work involved drilling an onshore exploration well. In spite of not finding sufficient volumes of natural gas to justify the well's success, the well was drilled to gain increased knowledge of the structure, on which the programme of future exploration will be based.

Exploration activities in the offshore basins involved the completion of 3D seismic acquisition data in the Alentejo basin, which begun in 2011, and sampling was carried out below the sea floor to help study the generation, maturation and migration of hydrocarbons in the Alentejo and Peniche.

In 2013, planned work involve the analysis of all the evidence gathered during the year 2012 to identify prospects for the first exploration well in 2014.

Namibia

In 2012 Galp Energia signed a farm-in agreement with the Brazilian company HRT Participações em Petróleo S. A. (HRT), to acquire a 14% stake in three licence for oil exploration (PEL) located offshore in Namibia, namely PEL 23 in the Walvis Basin, and PEL 24 and PEL 28 in the Orange basin.

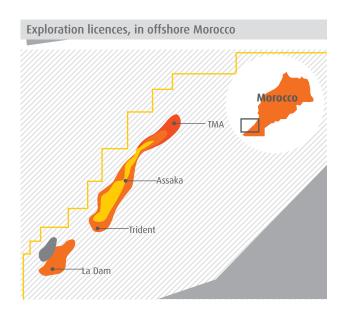


According to Galp Energia internal estimates of volumes and risk, the main objectives of the three prospects point to a total potential of 8 billion barrels (bnbbl) of exploration resources (mean unrisked estimate), an oil discovery scenario with a 20% to 30% probability of success.

The exploration programme for 2013 envisages the drilling of three exploration wells on prospects already identified, two in PEL 23 and one in PEL 24.

Morocco

In 2012 Galp Energia guaranteed a farm-in agreement with the Australian company Tangiers to acquire a share of 50% of the Tarfaya Offshore area, thus becoming the operator for this area.



The Tarfaya Offshore licence are located in a little explored area, but in a proven petroleum system. Several prospects have already been identified, including the Assaka, Trident, Tarfaya Marin-A (TMA) and La Dam prospects.

The exploration programme provides for the drilling of an exploration well in the Trident prospect the main goal in the area by mid-2014, which is estimated to have 450 million barrels (mbbl) (mean unrisked estimate), with an associated probability of success of 21%.

Uruguay

Galp Energia has been present in areas 3 and 4 of the Punta del Este basin since the first round of bidding for offshore licences there.

In 2012, studies focused on the interpretation of the 2D seismic data acquired earlier for the two blocks, and studies on geological modelling of the basin. In 2013 3D seismic data will be acquired in both areas, notably for – 1,200 km 2 in area 4 and 2,000 km 2 in area 3 –, with the goal of identifying prospects to start drilling from 2014.

East Timor

Galp Energia is present in East Timor through its participation in four offshore blocks. In 2012 the work carried out was mainly focussed on evaluating all the data that had been collected previously, namely through the first hole drilled in that area, which was considered to be dry.

The increasing importance of natural gas in Galp Energia's exploration and production portfolio

Galp Energia is in the process of diversifying its portfolio with oil and natural gas projects. The considerable discoveries in Mozambique continue to play a decisive role.

The analysis of proved reserves shows that the weight of natural gas increased considerably over the last few years. In 2012, this weight reached 20% of the proved reserves, compared to 18% recorded in 2011. It should be noted that the recent world class discoveries in the Rovuma basin are not included in this exercise as they are considered to be Galp Energia's contingent resources.

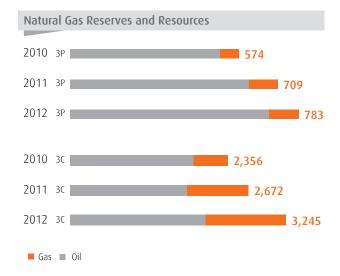
Production of natural gas should increase on a sustained basis over the next decade, namely on the back of the projects developed in Brazil, where natural gas accounts for approximately 20% of production, and the start of the natural gas project in Mozambique.

Galp Energia currently takes part in the following natural gas projects.

 In Mozambique, the deposit (GIIP) is estimated to contain natural gas resources of 75 Tcf. The scale of these discoveries has turned this into one of the biggest natural gas projects in the world. Over the next decade Mozambique will become one of the world's main exporters of natural gas. Galp Energia's presence and the partnerships developed in Mozambique mean that the Company is well positioned to follow the progress of these projects.

- EXPLORATION AND PRODUCTION OF OIL AND NATURAL GAS
- In the Lula field, the associated project for the development
 of natural gas continues to proceed in accordance with the
 established plan. The Lula-Mexilhão pipeline is operating
 since September 2011, carrying natural gas from the FPSO
 Cidade de Angra dos Reis. It is anticipated that the capacity
 of the pipeline, 10 million cubic metres (millions of m³)
 per day, will be enough to carry the natural gas produced
 by the three production units.
- In 2012, the project for the second Lula-Cabiúnas pipeline, with planned capacity of offtaking 15 millions of m³ of natural gas per day, has progressed according to plan and is expected to start operating in the second half of 2014. Other options are currently being evaluated for the extraction and marketing of natural gas from the Santos basin, including the construction of additional pipelines, as well as the possibility of building a floating liquefied natural gas (FLNG) unit.
- In Equatorial Guinea, Galp Energia holds 15% of an integrated natural gas project. In 2012 the government of Equatorial Guinea initiated a process to redefine the general project framework, which should be completed in 2013.

 In the LNG II project in Angola, the drilling of the Etele Tampa well was completed in 2012, and the partnership started various studies to gauge the potential of natural gas resources and define future exploration activities.



5.1 Galp Energia's environmental performance in partnerships

In accordance with ${\rm CO_2}$ offsetting as established in Brazilian legislation, the BM-S-11 partnership, where Galp Energia operates, carries out ${\rm CO_2}$ offsetting through contributions to Fundo Amazônia.

Fundo Amazônia aims to use resources offered through voluntary donations for non-refundable support of preventive measures, monitoring and fighting against deforestation as well as the promotion of conservation and the sustainable use of the Amazon forests. Fundo Amazônia can also use up to 20% of their resources to support the development of systems to monitor deforestation (source: http://www.fundoamazonia.gov.br/FundoAmazonia/fam/site_pt).

To date, the partnership has donated \$2,368,020 to Fundo Amazônia.

The partnership also takes part in the forest restoration project at Parque de Pedra Branca (Rio de Janeiro). This project began in 2009 when IBAMA started financial compensation for burning gas at BM-S-11. As an alternative it was suggested that compensation was made through a carbon dioxide equivalent ($\rm CO_2e$), offcapture project, with the reforestation of 204 hectares or 10%, representing around 60,000 tonnes of $\rm CO_2e$ ($\rm tCO_2e$).

The plantation started in June 2010. To date, 73% of the area has been planted but due to the land being very rocky (making planting access difficult and limiting the amount of plants that could be planted), only 47% of the plants could be planted. The end of planting is expected for 2014 and after this date it will be necessary to maintain it for 30 years.

By the end of 2012 around 3.1 million Real were invested, which equates to around 47% of the amount initially expected

(6.6 million Real) for this project which should be completed in 2014.

Galp Energia contributed in the proportion of its partnership (10%) to the planned programmes.

Environmental programmes

The environmental projects developed under licences for the block activities include social communications programmes, environmental education programmes for workers and environmental education programmes in the surrounding communities. In 2012 Petrogal Brasil carried out environmental education programmes for workers.

In 2012, the BM-S-11 partnership started and monitored a range of social media programmes, environmental education programmes for workers and the surrounding communities involved with each of the licensed installations.

Safety, health and the environment in deep and ultra-deep offshore

Strict criteria for protecting the environment, operational safety and health are systematically integrated into the decision-making process for the design and implementation of exploration projects and the production of the respective operations.

Drilling wells in ultra-deep waters requires exceptional safety measures and measures for protecting the environment. Cutting-edge technical and operational technology is needed to achieve this.

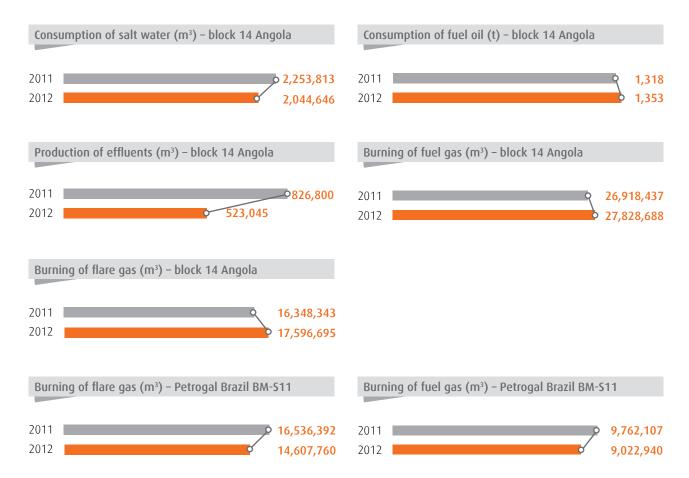
Compliance with exhaustive plans and procedures is vital in order to minimise the risk of accidents and enable very

positive progress in terms of the operational performance of drilling activities, largely due to the learning curve and to adopting new technological solutions.

Environmental performance

Summary								
	Salt water consumption	Effluents production	CO ₂ emissions	Flare gas burning		Fuel gas burning		Fuel oil
	m³	m³	tCO ₂ e	mmscf	m³	mmscf	m³	ton
2011	2,253,813	826,800	170,677	1,161	32,884,735	1,295	36,680,544	1,318
2012	2,244,646	523,045	186,793	1,137	32,204,455	1,301	36,851,628	1,353.24(1)

(1) In 2012, in addition to what is reported in the table, a further 4,730 tonnes were consumed at the following facilities: block 32, area 4, Sonagas, in Mozambique and RIGS. This consumption was due to drilling activities.



06. Strategy for climate change

- 6.1 REFINING
- 6.2 RENEWABLE ENERGIES AND CLEANER FUELS
- **6.3** CARBON FOOTPRINT
- **6.4** GALP ENERGY SOLUTIONS FOR ENERGY EFFICIENCY



At a time of global economic uncertainty, the need to tackle climate change poses new challenges. Taking into account the World Energy Outlook 2012, which reflects on the outcome of United Nations conferences on climate change, as well as initiatives taken by the G-20 and by Asian-Pacific Economic Cooperation (APEC), it was established the New Policies Scenario. This scenario as compared to the Scenario 450 is considered realistic and very likely to be achieved.

In the New Policies Scenario, the world will follow a path that will result in emissions level corresponding to an increase in temperature over the long term by over $3.5\,^{\circ}$ C.

The Scenario 450 predicts the temperature increase will remain at $2\,^{\circ}$ C as against pre-industrial levels, with a greenhouse gas content of 450 ppm of CO₂e in the atmosphere.

As a means of responding to the challenges reiterated here either through regulation or international standards, in 2012 Galp Energia dedicated itself to a climate change strategy, defining actions, objections and goals, the implementation of which is described in this report.

Axis I	Reduce fuel-associated emissions at different stages of the life cycle				
	Reduce fuer-associated emissions at different stages of the file cycle				
1.1 Exploration & Production	To maximise the use and preservation of natural gas resources and minimise CO_2 emissions.				
	To increase the importance of natural gas in Galp Energia's E&P portfolio.				
	The analysis of proved reserves shows that the weight of natural gas increased considerably over the last few years. In 2012, this weight reached 20% of the proved reserves, compared to 18% recorded in 2011.				
1.2 Refining	To invest in conversion projects for two refineries until 2011, to suit the market demand for fuel.				
	 2012 marks the end of the conversion projects at the Sines and Matosinhos refineries. At the Sines refinery, commercial production of diesel fuel has started using the new hydrocracker with a processing capacity of 43 thousand heavy vacuum diesel fuel barrels per day. 				
1.3 Biofuels	To replace 10% of transport fuel with renewable energy sources (RES) by 2020, guaranteeing a minimum of 60% reduction in GHG emissions during the life cycle.				
	To produce raw-materials for biofuels: around 1,000 hectares of Jatropha curcas Linn. (JCL) were planted or sowed in Mozambique; around 17,000 hectares were planted out of a total area of 30,300, to achieve in 2013; see note 2.5. 				
1.4 Transporting fuel	To promote the transition to sea and railway transport.				
	Continue transporting biodiesel (FAME) by ship to Matosinhos and by train to Sines.				
	The transportation of jet by train from Sines to Faro airport.				
	Extended use of fuel pipelines from refineries.				
	New pipeline between Sines port and the refinery.				
1.5 Life cycle and carbon	To develop models to analyse fuels' life cycle and to calculate the carbon footprint.				
footprint	The calculated carbon footprint for 2012: 3,807 ktCO.e.				

Axis II	Promote energy efficiency and incorporate renewable energy
2.1 Refining	To gradually implement energy efficiency measures in the refineries, in order to optimise procedures and minimise consumption To promote the progressive improvement with regard to CO ₂ emissions, achieving the goal of 40 kg of CO ₂ /complexity weighted tonne (CWT), which corresponds to a decrease by 16% in the reference indicator "Emissions of CO ₂ /CWT" relating to the amount of 47.8 kg of CO ₂ /CWT, recorded in 2007-2008, the year of reference.
	• Specific emissions in $kgCO_2/CWT$ remained in decline in 2012, with a level of around 43.1 kg CO_2/CWT .
	• In the Sines refinery there was a drop by 6.5% in the Energy Intensity Index (EII) with reference to 2008.
	• In the Matosinhos refinery there was a drop in consumption corresponding to an accumulated reduction for 2008 representing 11.8% of the EII.
2.2 Natural gas cogenerations	To promote the installation and exploration of natural gas cogenerations in industrial and services units.
	The refinery cogenerations are fully operational.
	• In 2012, Galp Energia built a cogeneration unit with an installed power of 8.8 megawatts-hour (MWh) for a customer.
2.3 Natural gas	To promote the use of natural gas as a cleaner fossil fuel.
	 For Galp Energia's industry sector customers, the amount of natural gas consumed increased in 2012 as compared to 2011: natural gas consumption (2011): 22.1 terawatts-hour (TWh); natural gas consumption (2012): 22.9 TWh.
2.4 Fuel distribution and others	To implement projects that promote energy efficiency.
	• Development and extension of the ecopostos network up to 63 units (energy efficiency concept introduced in Galp Energia's service stations).
	 Project G-Light (behavioural change) implemented in Galp Energia's network of service stations: reduction up to 4% in electricity consumption.
	 Pilot-projects of eco-driving and Energetically Efficient Fleet projects involved around 130 employee vehicles and were established with the aim of achieving an overall fuel saving of 15%.
	• Lubricants Factory in Matosinhos – Reduction of fuel oil consumption by 55%, from 2010, by improving the process, replacing equipment and implementing energy efficiency measures.
2.5 Biofuels	Portugal – Include 6.75% by volume of biodiesel by 2014 and 10% in energy content of biofuels by 2020.
	Spain – Include 4.1% in energy content of biofuels before 2015 and achieve the 10% in energy content of biofuels by 2020
	For 2013 as new measures for checking the sustainability criteria imposed under directive 2009/28/CE, for both Portugal and Spain, Galp Energia will continue its policy of using renewable fuels for its transport, also requesting information from suppliers on the sustainability of the biofuels acquired. The aim is to introduce 5.5% of renewable energy as fuel in Portugal and in Spain the percentage will be defined in compliance with the legislation in force in the markets in which they operate.

2.5 Biofuels (cont.)	In 2012: • introduce 276,000 m³ of biodiesel (5% of diesel in energy content) in Portugal which represents a reduction of 210,000 tCO ₂ e; • introduce 235,000 m³ of biodiesel in Spain (7% of diesel in energy content) and bioethanol (4.1% in energy content), which represents a reduction of 290,000 tCO ₂ e.
2.6 Production of renewable energy production	To develop wind and solar projects.
	• In 2012 29.81 gigawatts-hour (GWh) were produced at the Vale Grande wind farm.
	Continue the strategy for using around 400 MW of wind energy.
	Install photovoltaic projects totalling around 1.5 MW.

	Programmes to promote energy efficiency in Galp Energia's customers
2.7 Galp Energy Solutions	To help Galp Energia's customers to optimise their energy consumption by promoting energy efficiency and sustainability in the industry, buildings and transport.
	 In 2012, the Energy Efficient Hotel Project was launched at the Hotel Corinthia, which predicts energy savings of 2.02 GWh/year. This project was extended to three other hotels, offering potential total savings of 1.7 GWh/year, corresponding to Santarém Hotel and Hotel Reid's.
	 To develop and implement energy efficiency concepts adapted to fit customers activities such as: Energy Efficient University Campus, Energy Efficient Hotel; Energy Efficient Fleet, Energy Efficient Car Park and the Energy Efficient Superstore.
	To develop energy efficiency projects for Galp Energia's industrial customers.
2.8 Galp 20-20-20 programme	To enable university garantees to practice and get training in energy efficiency process in buildings and industrial.
	• In 2012, postgraduate courses sponsored by Galp Energia carried out 30 studies on energy efficiency in organisations and companies. Since 2007, about 131 energy efficiency projects were developed in the Portuguese business and public structure.
2.9 Smart Galp programme	To develop domestic energy management systems that are easy to use, designed for Galp Energia's customers.
	 The Smart Galp project allows Galp Energia's domestic customers to use a service that monitors their use of electricity, natural gas and fuels using an interactive online portal. This solution is being used for 120 customers and in 2013 a comprehensive analysis will be carried out of its impact on the customers' energy performance.

Axis III	To actively participate in the development of sustainable mobility solutions		
3.1 Electric mobility	To take part in the national project for electric mobility – Mobi-e.		
	 At the same time as the electric mobility proposal was defined for Galp Energia's customers, a network of fast charging points was set up at the fuel stations and a normal charging solution was installed in private areas. 		
3.2 Natural gas for vehicles	To boost the use of natural gas for vehicles.		
	• In 2012 Galp Energia continued to promote its strategy of marketing natural gas for vehicles as the cleanest fuel.		
3.3 Road test of new vehicle technology	To promote partnerships with the automobile industry to test how viable new propulsion technology is.		
	 Galp Energia and Toyota ended the Living Lab project in September 2012. It was a sustainable mobility project that had started in 2010. The conclusions reached by the Living Lab Galp Toyota project allowed us to introduce improvements in the current model which is being marketed. 		
3.4 Strategic studies on mobility	To take part in strategic studies on the perspectives on different new propulsion technologies and their different supply infrastructures.		
	• Galp Energia established a partnership with the University of Coimbra to create an R&D centre for fuel. One of the main aims is to develop cleaner and more eco-efficient liquid fuels.		
	• Galp Energia continues to take part in working groups, conferences and sessions related to mobility.		

Axis IV	To develop jointly with scientific and technological system (SCT) projects and activities that help the fight against climate change
4.1 Capture and carbon storage	Participation in COMET project – Study of carbon capture and storage (CCS) possibilities in southern Europe and Morocco.
	This project was completed in 2012. The main conclusions drawn from this study took the following parameters into account: • transport costs (pipeline, boat, train and land transport); • assess the geological potential of CO ₂ storage and transport, taking into account the properties of the ground as well as how it can be used; • the synergies and obstacles for developing infrastructures;
	As part of this project a TIME-COMET model application was developed to predict the CO ₂ emissions transport costs.
4.2 Intelligent management of power grids	Participation in REIVE project – Development of a technological platform for intelligent management of power grids.
	Galp Energia monitored this project which enabled them to develop appropriate technological solutions, alongside the electricity network to promote a progressive and sustained change in the paradigm of mobility. At the same time, they supported the progressive integration of micro-generation systems and the integration of renewable energies in the Portuguese electricity producing system.
4.3 New technological	To take part in the creation and funding of Instituto de Energias Offshore (institute of offshore energy), within WavEC.
infrastructures	The formalisation process for WavEC – Offshore Renewables, where Galp Energia took part as a member of the steering committee, was completed in 2012.
	WavEC is a centre for offshore energy research that develops projects and services in partnership with the business sector.
	For more information see http://www.wavec.org/.
4.4 PhD level training on Refining	To promote advanced PhD level training in energy and environmental efficiency for refining at the AIPQR.
	For more detailed information, see chapter 13.

Performance

Cogenerations					
	Total 2011	Carriço	Powercer	Sinecogeração	Total 2012
Power (MW)	121.2	32.0	7.2	82.0	121.2
Natural gas consumption (millions of m³)	306.1	63.4	15.8	228.0	307.2
Fuel gas consumption (millions of m³)				14.1	14.1
Electrical production (GWh)	897.5	246.9	38.1	641.1	926.1
Thermal production (GWh)	1,916.7	318.1	86.8	1,579.4	1,984.3
CO ₂ emissions (t)	670,836	136,021	33,891	516,223	686,135

Natural gas energy efficiency		
	2011	2012
Periodic inspections of gas receiving facilities (GRF)	111	143
Awareness-raising initiatives on safety and operation of GRF	9	6
Energy audits for industrial customers of natural gas	3	5
Customers' energy-efficiency training programmes	11	5
Thermographic analysis to industrial customers	25	28
Consumption monitoring and energy management system	4	12

Power generation from renewable sources (MWh/year)		
	2011	2012
Vale Grande wind farm	10,988.0	29,810.0
Parkalgar photovoltaic facility	144.4	169.3
Ecoposto photovoltaic facility	63.7	64.7
Total	11,196.1	30,044.0

Natural gas for vehicles		
	2011 (1)	2012
Public transport companies	13,082,819	12,725,765
Other/private	53,140	65,665
Total	13,135,959	12,791,430

⁽¹⁾ Correction to the breakdown of figures for 2011.



The main objective of the upgrade project for the Matosinhos and Sines refineries, involving a total investment of €1,400 m, was to increase diesel production mainly at the expense of

fuel oil production, in line with market needs and in order to

make the refining facility more complex, efficient and flexible.

The year 2012 marks the completion of the upgrade project for the Sines and Matosinhos refineries and the start of a new era for Galp Energia's refining business. In Sines refinery, commercial production of diesel fuel began using the new hydrocracker. This equipment has a processing capacity of 43 thousand barrels of heavy vacuum diesel fuel per day and, as the centrepiece of the upgrade project, it involved the installation of 585 new systems in the Sines refinery, commissioned throughout 2012.

Matosinhos refinery

With the new processing units already in operation, several tests were carried out prior to starting cogeneration with the gas turbine, which is now in the stabilisation phase.

Sines refinery

The third quarter of 2012 saw the commissioning of subsystems, integrated into the hydrocracking complex, and some of the new units entered into production.

In late 2012, procedures began for starting the hydrocracker, which is now in operation and is expected to stabilise during the first quarter of 2013.

Energy and GHG emissions at Galp Energia refineries

In 2012, additional improvements were made to the EII (Energy Intensity Index). Through better energy integration of the new units as well as the revamping of the H-3001 atmospheric distillation furnace, and the contribution of other small investments, Matosinhos refinery managed a cut down in consumption corresponding to a cumulative reduction by 11.8% of the EII compared to 2008. Despite the low use rate, a result of the current economic climate, which has

significantly damaged energy performance, (every 3% of utilisation rate corresponds to an increase of about 1 point in EII), Sines refinery achieved a reduction by 6.5% of the EII, compared to 2008.

With cogeneration in full operation at Matosinhos refinery and with the new Sines refinery units expected in 2013, the energy efficiency goals of the refinery upgrade will be reached.

GHG emissions remained well below the allowances allocated under the European Union Emissions Trading Scheme (EU ETS).

2012 was a key year for monitoring performance regarding CO_2 emissions from refineries, and represented the gradual transition from traditional monitoring (CO_2 emissions per load processed) to monitoring in accordance with the benchmarks recommended for the sector under the EU ETS. In 2013 the free allocation of allowances will be based on the ranking of the 10% most efficient installations in terms of CO_2 emissions per CWT. In relation to 2008, the reference period for commitments undertaken, Galp Energia's refinery complex improved its benchmark indicator by 10%, thereby maintaining the challenge of achieving incremental improvements for this benchmark.

Energy Management System certification

In 2012 the Sines refinery obtained Energy Management System (EMS) certification in accordance with standard ISO 50001:2011, thereby demonstrating their commitment to the values of energy efficiency.

Various areas of the Company were involved in implementing the certification project through awareness-raising initiatives and meetings to promote participation, encouraging the submission of ideas to improve energy efficiency. Specific measures were also developed with the corporate areas of Galp Energia (Purchasing, Human Resources and others) such as: introducing energy performance requirements in the specifications for market consultation, defining responsibilities

and assignments in job descriptions, and including energy initiatives in training plans.

The EMS was designed and implemented taking into account organisation by processes, which is the basis for the quality management system, in the same way that they had previously been based on environmental and safety management systems. Thus, it was possible to implement the Integrated Management System for the Environment, Quality, Safety and Energy (IMSEQSE), creating the necessary synergies between different areas.

During the EMS certification project, the aspects of energy were identified and detailed (type of energy - fuel, electricity, steam etc. - and type of usage - consumption, recovery, production etc.) for each process. The significant energy aspects were then calculated (using four significance levels) based on a methodology combined with other Galp Energia risk assessment methodologies. In addition, significant energy aspects were studied in detail to define energy baselines, and monitoring assessed real energy savings.

6.2 Renewable energies and cleaner fuels

Biofuels

In order to ensure the social, environmental and economic sustainability of the biofuel it produces, Galp Energia's strategy for biofuels includes using them throughout the value chain.

In pursuing this strategy, in 2012 agro-industrial production of vegetable oils in Mozambique and Brazil was being fully implemented in the field.

In Mozambique, the crop areas of JCL (Jatropha curcas Linn.), planted by Galpbúzi Agroenergia, S. A., and MocamGalp - Agroenergias de Mocambigue, S. A., totalled over 1,000 hectares in 2012. These areas are used for experimentation, improvement of production technology, seed production and training of work teams.

MoçamGalp (a local company in partnership with ECOMOZ Energias Alternativas Renováveis, Lda., and PETROMOC, S. A. R. L.), together with the Chimoio Centre for Training and Seed Production, with 160 hectares of JCL plantations, (which terminated their business activities this year), carried out work in Zambézia Province, in Mocuba in the district of Lugela.

In 2012, work continued on the infrastructure (access roads) and completion of the preparation of the first 500 hectares. In early 2013, the planting of JCL in this area will be completed.

In Brazil, in the north-eastern state of Pará in late 2012, Belém Bioenergy Brasil, S. A. (Belém project), began the third stage of planting with the preparation of an area of about 17,000 hectares, which will result in a total area of about 30,000 hectares planted with Dendém palm (Elaeis guineensis Jacq.) by the end of the 2012-2013 campaign.

With the completion of this campaign more than half of the project goal will have been performed, which is planned to reach 48,000 hectares by the time it ends in 2014. Thus, anticipation completion of the project the first significant harvest of fruit is planned for 2014, although the first bunches of fresh fruit will have already been harvested in 2013.

This project is expected to produce an average of 250 kton of palm oil per year, in abandoned areas which are thereby being rehabilitated. This output will be turned into second generation biofuel in Portugal, using processes which ensure a reduction of over 60% in the life cycle of the alternative mineral resource.



Transport of seedlings for planting.

The Enerfuel project – Production of biodiesel

Galp Energia began a project to produce biodiesel in Portugal itself from non-food raw materials, which is expected to begin production in 2013. The unit has a maximum capacity of 25,000 tonnes per year and uses raw materials classified as waste or debris that will be transformed in a special unit. This unit is one of only three such facilities existing in the Iberian Peninsula, and is being renovated and made suitable for the processing of raw materials.

This project is expected to create about 65 jobs, 15 directly and 50 indirectly. A reduction of around 90 ktCO₃e is expected as a result of substituting around 25 kton of diesel for FAME (fatty acid methyl esters). This represents a positive environmental input, because it boosts the market in waste raw materials which are thereby reused.

Ventinveste wind project

2012 was the first full year of operation of the Vale Grande wind farm, with a total power of 12.3 MW from six turbines located in the Serra do Açor hills.

The annual output of the Vale Grande wind farm was 29.81 GWh, which represents 54% of annual electricity consumption for 2010 in Arganil where it is located.

Vale Grande wind farm	
Annual production [GWh/year]	29.81
Emissions avoided [tCO ₂ /year]	21,628
Imports of natural gas and coal avoided [€m/year]	11

The construction of the Picos Vale do Chão wind farm was postponed as a result of difficulties associated with the current economic situation. This wind farm, with an output of 22.5 MW consisting of 11 wind turbines in the Serra da Lousã hills, had its licensing completed in late 2011.

With regard to projects in the licensing stage, a major milestone was reached with the creation of Douro Sul wind farm, the largest Ventinveste wind farm, with a total of 68 turbines totalling a power output of 139.4 MW. It will consist of two wind farms, at Moimenta and Sernancelhe, about 25 km apart. Connection to the grid will be through

a high voltage electricity line (400 kV) about 17 km long, connecting the Moimenta wind farm to the Armamar substation owned by REN. In 2012, the environmental licensing processes were completed, with RECAPE approval (environmental compliance reports for the final project with DIA) and implementation of the projects, both wind farms and electricity lines. For this wind farm work has continued to obtain agreements with landowners and the licensing processes were completed with the local councils of Moimenta da Beira and Sernancelhe.

Environmental studies were also carried out, along with work required for the licensing of other projects under development at Ventinveste, totalling 225 MW.

Cogenerations

Agroger: construction and operation of the facility

In 2012, Galp Energia built a cogeneration plant with an installed capacity of 8.8 MW for Primores do Oeste, a customer from the horticultural production sector in Torres Vedras.

In this facility, the burning of natural gas will serve to produce electrical power and hot water from heat recovery of exhaust and engine cooling gases to heat the customer's greenhouses.

One of the main features of this facility is the recovery of CO₂ from burning natural gas, which will be duly processed and channelled to the greenhouses to stimulate photosynthesis, thus reducing the impact of air emissions from this facility.



6.3 Carbon footprint

In line with commitments made in 2011, Galp Energia continued to calculate its carbon footprint in 2012. Collecting this information is of particular importance because it allows us to track and analyse the sources of the Company's CO_2 emissions.

The calculation methodology takes into account the considerations listed below.

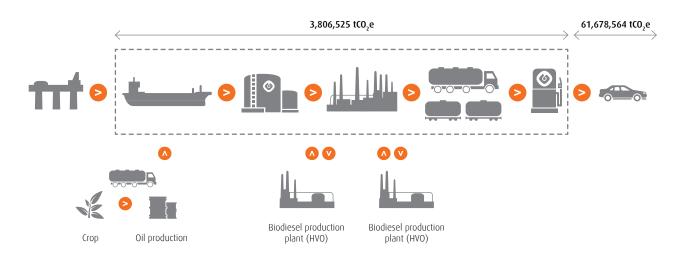
- To include all activities undertaken by the Galp Energia Group, namely companies in which it holds more than 50% or where it is the operator, including in particular the transport of raw materials, intermediate and end products.
- To report emissions from E&P assets not operated by Galp Energia, due to the growing importance that this activity represents for the Group's results.

- To consider at least the major GHGs: CO₂, CH₄ and N₂O.
- To present emissions separately according to the final use of the products it sells, in order to ascertain the relative importance of their carbon footprint.
- To present the carbon footprint for all petroleum products, natural gas and electricity sold, broken down according to the main activities of the Company.
- To base the calculation of the carbon footprint on the Galp Energia system of performance monitoring and reporting.

Summary of emissions in 2012					
Unit: tCO ₂ e	A1	A2	A3	Total	0/0
E&P ^(a)	186,793	0	0	186,793	4.91%
Refining ^(b)	2,722,032	187,594	0	2,909,626	76.44%
Power ^(c)	169,913	36	0	169,949	4.46%
Supplies & Logistics	1,100	3,276	236,444	240,821	6.33%
Distribution & Retail ^(d)	228,915	22,079	33,481	284,475	7.47%
Corporate activities	10,972	1,552	2,156	14,680	0.39%
Others ^(e)	33	149	0	182	0.00%
Total	3,319,758	214,685	272,081	3,806,525	100.00%

⁽a) Galp Energia work interest.

Limits of the carbon footprint in 2012



⁽b) Includes production of lubricants at Matosinhos, aromatics plant and Sinecogeração.

⁽c) Includes the cogenerations of Carriço and Powercer.

⁽d) Includes fugitive emissions from natural gas distribution.

⁽e) Includes the production of lubricants at Gavá (SP).

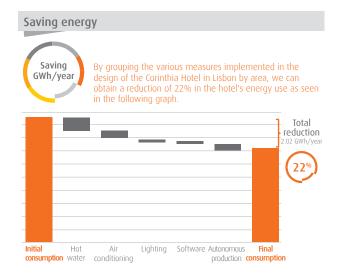
6.4 Galp Energy Solutions for energy efficiency

The energy-efficient hotel

With an integrated approach to all energy vectors of a hotel, it is possible to identify various solutions and measures to optimise its energy use, increase energy independence, and reduce energy costs and CO_2 emissions associated with its operation.

Corinthia Hotel

In 2012, the Energy Efficient Hotel project was implemented at the Corinthia Hotel. This project, developed in 2011, involves several energy efficiency measures, including: the conversion of HVAC systems and water heating systems; remodelling of central heating, a solar panelled heating system, cogeneration systems and management systems for energy performance.



In addition to the new solutions and change in processes resulting from this project, it is worth noting the complementary work done on changing behaviours and raising awareness of the various aspects of energy efficiency:

- energy efficiency training for all employees of the Corinthia Hotel to raise awareness of this issue;
- preparation of a manual of good practices for the hospitality sector on energy efficiency;
- online publication of energy indicators, in order to reinforce the commitment of all stakeholders to achieving results.

In 2012, the concept of an "energy efficient hotel" was extended and implemented for the customers listed below.

The energy-efficient hotel customers				
	Characteristics	Annual energy consumption	Energy savings	
Santarém Hotel	Approximate area of 9,000 m², 100 rooms and eight conference rooms	1.4 GWh	711 MWh/year	
Reid's Hotel	Total area of about 20,000 m² and 170 rooms	6.6 GWh	1 GWh/year	
Alvor Park Hotel	Approximate area of 15,000 m² and 196 rooms	5.0 GWh	n. a.	

The network of sustainable university campuses

Implementation of energy efficiency projects in cooperation with the University of Aveiro (UA), the University of Beira Interior (UBI) and Instituto Superior Técnico (IST), to identify the energy efficiency measures needed to eliminate waste and thereby reduce the energy bill, which is around €5 m. These are projects which involve a floor area exceeding 300,000 m², distributed over 100 buildings in all of the universities.

Installation of five solar plants totalling 688 kW in the buildings of the University of Lisbon, with Galp Energy Solutions assuming responsibility for the investment costs.

Development of a project for decentralized renewable energy production through the installation of four solar plants that will produce approximately 1,028,480 kWh/year of energy. The construction of these plants led to the installation of 2,627 photovoltaic panels with a unit power of 245 W, which equates to 644 kW installed power and 557 kW connection power. The plants were installed at the Science Department in Refectory One, at the Psychology Department and at the Institute of Education.

The energy-efficient fleet

In February $\bar{20}12$, Galp Energy Solutions took up the challenge of introducing the concept of the energy-efficient fleet at Galp Energia.

This project involved implementing a solution for about 130 employee vehicles spread across nine locations, and was established in order to obtain an overall saving of 15% in fuel through the adoption of a more energy-efficient driving style.

An installed device emits acoustic warnings during driving, collects data from vehicles and is linked to an online portal, allowing for the monitoring of fuel consumption and CO₂ emissions in real driving conditions.

The online portal solution offers a set of relevant indicators (distance travelled, acceleration and braking rates, speed profiles) as well as individual and group assessment on efficient driving. Based on analysis of the data collected, it is possible to plan specific training activities aimed at different driving profiles, and assess the impact that behavioural changes may have on safety and efficiency of fuel consumption.

- It was monitored 150 days of driving, 100,000 trips over 1,125,000 km and 21,800 hours of driving.
- On a 10 point scale for ranking an energy-efficient fleet, the Galp Energy fleet scored eight points.
- The weekly saving in fuel consumption ranged between 17% and 25%.

The energy-efficient car park

The implementation and start-up in 2012 of the project to optimise energy performance in the operation of the car park (Parque do Chão do Loureiro) involved a management system for lighting and ventilation, as well as a 20 kW photovoltaic panel. This design achieved a reduction of around 50% in the car park's energy use.

The energy-efficient hypermarket

In 2012, it was developed the concept of the energy-efficient hypermarket, adding the potential for improving the energy efficiency and environmental impact of this type of facility. For this project, it was considered specific features and technologies and the most efficient solutions available.

E-Leclerc project

It was development of an energy efficiency project in the food distribution facilities of customer E-Leclerc in Entroncamento,

based on an energy performance contract. This project has identified measures that will provide savings of about 800 kWh/year, equivalent to about 25% of the energy bill. Measures identified included: replacing the existing lighting technologies by more efficient ones, reducing waste in the frozen-food sections by introducing doors; optimising consumption in refrigeration systems by the introduction of new controllers and a system of continuous monitoring of refrigeration parameters; introduction of new air monitoring and replacement of the HVAC chiller in offices.

Energy efficiency for industrial customers

With the focus on energy efficiency amongst customers, Galp Energy Solutions has developed customised solutions for the industrial sector. The highlights in 2012 include:

- installation for three industrial customers of several mini-generation photovoltaic plants, with a total output of about 750 kW;
- implementing heat recovery measures for autonomous energy production and energy-efficiency measures that will result in the reduction of energy consumption by more than 57% at a wood fibre treatment factory;
- the implementation of various measures, providing energy savings of around 11 GWh/year, representing about 12.5% of total energy consumption for a customer in the textile sector.



07. Management of health, safety, environment and quality

7.1 MANAGEMENT SYSTEMS



13 14

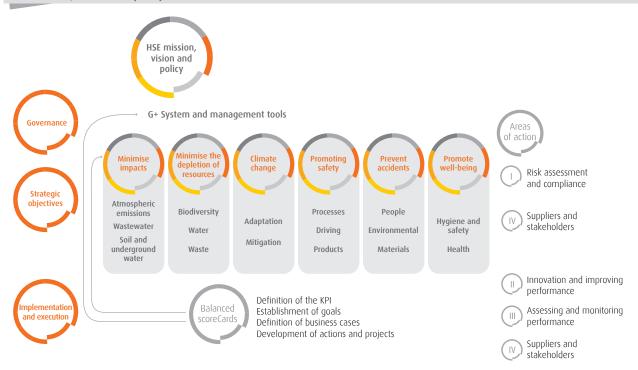
11

12

HSE corporate strategy

Galp Energia's health, safety and environment (HSE) strategy for 2013-2015 has the following functional structure.

HSE mission, vision and policy



There are three levels to the HSE strategy – governance, strategic objectives and implementation and execution applied according to the following principles:

- I. monitoring and performance evaluation;
- II. risk assessment and compliance;
- III. innovation and performance improvement;
- IV. suppliers and stakeholders.

The level of governance constitutes the management matrix for the Organisation's HSE performance. The cornerstone of this level is the G+ System and the instruments that derive from it or interact with it.

The strategic objectives are the topics with the greatest material interest with regard to performance, considering iteratively the interest of stakeholders and the risks inherent in the activity, as well as the ongoing operational situation, geography and expansion of activities. This definition is directed at operational risks, bearing in mind that the others derive from these: regulations, reputation and litigation.

Strategic objective



The level of implementation and execution contributes to reviewing management tools and to dynamically and interactively redefining the strategic objectives.

In 2013 the strategy is underpinned by 80 activities, some of which form part of the sustainability strategy. The most important activities are listed on the Galp Energia website.

Corporate strategy for quality management

The 2012-2014 strategy for quality management, based on the Galp Energia quality policy, is structured around the key performance vectors indicated below.

Processes and systems: structure of the corporate governance model for EQS systems.

- **Products:** Q2C programme implementation and intervention in sector standardisation.
- Risk management: minimising risk in operational and regulatory processes and activities.

08

- Improvement management: increasing the effectiveness of EQS corporate audits and monitoring and reporting key performance indicators.
- People: developing skills of quality managers and auditors and boosting EQS Internal Auditors Pool.

Risk management



Participation in legislative processes

National Low Carbon Roadmap

The aim of the National Low Carbon Roadmap (RNBC), presented by the Portuguese Government, is to carry out a pilot study into the technical and economic feasibility of reducing GHG emissions in Portugal. The RNBC also aims to pinpoint strategic guidelines for various sectors of activity and serve as an aid to the development of future national plans to reduce emissions, including the National Climate Change Plan 2020 and the low carbon sectoral plans.

Recognising the strategic importance of RNBC, Galp Energia expressed its position in the public consultation process through its involvement in the drafting the document "Impacts of RNBC 2050 on the refining, distribution and marketing of petroleum products," presented by the Portuguese Association of Oil Companies (APETRO).

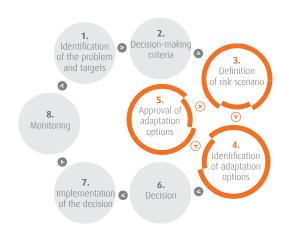
Galp Energia's position, together with APETRO, was to construct a consensus for a realistic proposal on costs, ensuring a sustainable energy supply in Portugal and guaranteeing a secure supply to all citizens.

National Strategy for Adapting to Climate Change

Under the National Strategy for Adaptation to Climate Change (ENAAC), in 2012 Galp Energia participated in the forum coordinated by the Directorate-General for Energy and Geology (DGEG), as a member of the energy subgroup.

As a result of the subgroup's reflection, the energy sector's contribution was compiled into a report alongside other work undertaken by other strategic sectors for the ENAAC in preparation for the Portuguese Environmental Agency (APA).

Methodology for identifying risk scenarios and/or operational implications and definition of adaptation plans for climate change



Fact sheet on climatic risk to the facilities	Risk scenarios associated with Galp Energia's infrastructures
Options and benefits of adaptation, obstacles in the implementation process and criteria/ associated priorities	Adaptation options which apply in the short-term, across the whole Company and to all infrastructures and new investments

National Plan for the Efficient Use of Water

Recognising the importance of water when managing the impacts of its activities, Galp Energia, took part in the public consultation process on the National Plan for the Efficient Use of Water. The Company supports the integration of this plan with regional and local management of water resources at river basin level, promoting the best available techniques in the industry.

Seveso

Galp Energia followed and participated actively in the process of revising the Seveso Directive, both through national agencies and the European Association for Environment, Health and Safety in Refining and Distribution (CONCAWE), in its Safety Management Group. The review process, which began in 2010, culminated in the adoption of Directive 2012/18/EU – Seveso III. The Portuguese state will transpose it into national law by 2015, a process that Galp Energia will continue to monitor.

Product quality

In 2012, Galp Energia held stakes in several national and international organisations that lead developments in product quality, anticipating the risks of changing specifications and consolidating strategic scenarios. At European level, the Company took part in working groups at CONCAWE, EUROPIA and CEN, where they discussed future fuel specifications.

IMPACT ON THE FUNCTIONALITY OF THE INFRASTRUCTURE

	Geographical impact		
	Local	Regional	National
No loss of functionality			
Short-term or less significant interruption of the service	0	0	•
Serious impact or interruption of the service; physical failure in the infrastructure	0	•	•
■ Limited			

14

VULNERABILITY MATRIX FOR THE MAIN INFRASTRUCTURES OPERATED BY GALP ENERGIA

Main infrastructures	Rainfall	Temperature
	2020 2030 2060 2060 2080	2020 2030 2060 2060 2080
Sines refinary and Matosinhos refinary	0000	0000
Sines and Leixões oil terminal and Mitrena warehouse	$\circ \circ \bullet \bullet$	•••
Sines refinary CLC pipeline	\bigcirc \bigcirc \bigcirc \bigcirc	0000
Main infrastructures	Storms	Wind
	2020 2030 2060 2080	2020 2030 2060 2080
Sines refinary and Matosinhos refinary	0000	0000
Sines and Leixões oil terminal and Mitrena warehouse	$\bigcirc\bigcirc\bigcirc$	••••
Sines refinary CLC pipeline		

DEVELOPMENTS IN 2012

Participation in the review process of European standards EN 228, EN 590 and EN 14214 on the specifications of gasoline, diesel fuel and FAME respectively.

Participation in the national technical committee where the Portuguese standard NP EN 14214 is being prepared for the seasonal characteristics of FAME.

Monitoring the process of drafting Directive 2012/33/EC, published in November 2012 amending Directive 1999/32/EC on the sulphur content of marine fuels. Throughout the process of developing this policy, Galp Energia commented actively on successive versions of the document, arguing the need for the requirements to be aligned with the international MARPOL requirements, given the characteristics of the global market for marine fuels.

Value chain: suppliers and contractors

Given the importance of contractors for the performance of the Galp Energia Group, G+ System includes "management of HSE contractors." To support the implementation of this component, Galp Energia has an internal standard that details the requirements to be applied at each stage of the relationship cycle with suppliers. In 2012, the audit process for supplier qualifications was redesigned by establishing requirements and methods for use in qualification audits. After identifying the list of critical suppliers, an audit plan was established for qualification, including an HSE component. As a result of these audits, the suppliers are "motivated" and supported to establish and develop an action plan for their continual improvement.

New channels of communication were also created with contractors to ensure conformity with Company requirements, for example, carrying out specific training sessions taught by the operational areas of Galp Energia; the involvement of contractors in carrying out training exercises on emergency plans; undertaking Preventive Safety and Environmental Observations (OPAS), follow-up meetings and publishing minutes; regular events, and so on.

White Fuel Quality Guarantee Programme (Q2C)

Q2C is a programme that aims to consolidate Galp Energia's processes and activities with regard to quality assurance of gasoline and diesel fuel, with an approach that encompasses the entire value chain. In 2012, it developed a set of initiatives to improve practices at Galp Energia facilities. For this purpose, a management team was appointed and working groups were set up to put the Q2C system into practice. Specific training initiatives were also carried out on risk management applied to product quality.

Q2C OBJECTIVES

To demonstrate and consolidate before third parties the Group's ability to create a product with superior levels of reliability.

To involve all the Company management units (MU) and subsidiary companies in the quality guarantee for gasoline and diesel fuel.

To develop a system of quality assurance, the Q2C system, with universal applicability.

To promote and consolidate a network of knowledge-oriented value creation, based on spreading aspects of scientific, technical, economic and legal expertise within the Company that relate to the quality of Galp Energia products.

To ensure that design and development projects for new products follow a methodology that ensures their intrinsic quality and are approved at the highest level of the Company.

To mitigate operational risk, anticipating risks arising from changes in specifications and ensure the effectiveness of the quality management of these products.

Internal audits programme

08

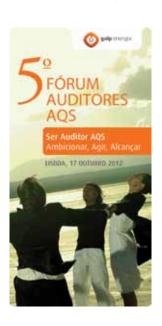
In 2012, 53 audits were conducted, involving 74 internal auditors, a total of 116 participations, and five external auditors with 20 participations.

These audits resulted in a ratio of non-compliance observed and improvement opportunities detected of 0.68, which can be compared with a ratio of 0.52 found by the external audits. Such results reflect not only the Company's efforts to continually improve its operations, but also confirm Galp Energia's ability to detect non-compliance.

Auditors' Forum

In 2012, the 5th EQS Auditors' Forum was held, attended by around 100 participants. The main addressees in the open session were the Galp Energia EQS auditors as well as members of top management.

This forum stressed the importance of EQS internal audits for managing processes and the continual improvement of Company procedures and activities, and recognised the effort and contribution of EQS auditors to this end.



7.1 Management systems

In 2012, Galp Energia used balanced scorecards (BSC) in environment, quality and safety, covering the various BU and corporate areas, to keep track of the performance of top managers. In addition to the BSC have also added quarterly environmental performance reports were prepared, with detailed analysis of trends, internal and external benchmarking, identification of risks, challenges and strategic actions for various activities, and analysis of how far objectives and goals have been achieved.

G+ System

The G+ System, a reference point for HSE activities at Galp Energia, meets the main legal and regulatory requirements and internationally recognized certification standards, reflecting the specific activities of the Company. It also allows the Company to identify and manage the risks inherent in the operation and the entire project, equipment and asset life cycle, to ensure continual improvement in HSE performance.

AG+ SYSTEM AUDITS

In 2012, the process of conducting audits of the G+ System was instituted, underpinned by an annual plan that takes the maturity and risk level of the Company's activities into consideration.

These audits focus on the level of implementation of the requirements of the G+ System manual in various Galp Energia BU. They use an evaluation grid based on the internal HSE benchmark in order to identify the stage of development for each of the 22 components and define action plans based on priority criteria.

Area managers form part of the audit teams, thereby capitalising not only on the inspection exercise, but also on the exchange and promotion of best practice in the Company.

Galp Energia qualifications

In 2012, Galp Energia kept all their certifications and accreditations and obtained three new qualifications, bringing the total to 48 certifications. These are the new qualifications:

14

- certification in quality (ISO 9001) and the new strand of energy (ISO 50001) of the Sines refinery;
- · accreditation of the Probigalp laboratory.

Maintaining and obtaining these qualifications reflects the Company's commitment to continual improvement.

Galp Energia qualifications	
Qualifications	No.
ISO 9001	23
ISO 14001	10
OHSAS 18001	10
ISO 50001	1
ISO/IEC 17025	4

08. Sustainable management of resources

- 8.1 ENVIRONMENTAL PERFORMANCE
- 8.2 BIODIVERSITY
- 8.3 WATER-RELATED RISKS



8.1 Environmental performance

	2011	2012	% Variation
WATER CONSUMPTION			
Consolidated Galp Energia – Water consumption (10³ m³)	9,641	9,370	
Refining (4)	7,585	7,759	2%
Lubricants – Gavá plant	1.46	1.57	7%
Cogeneration (1)	151.82	125.84	(17%)
Supplies and Logistics			
Liquid fuel storage depots – Portugal	14.3	68.7	379%
Liquid fuel storage depots – Spain	5.78	2.85	(51%)
LPG storage depots	0.63	0.68	8%
Terminals (3)	166	270	63%
Distribution/retail			
NG distributors	7.6	3.2	(58%)
Service stations – Portugal	1,270	594	(53%)
Service stations – Spain (10)	414	307	(26%)
Aviation	1.8	5.4	200%
Corporate activities – Buildings – Portugal	17.58	17.92	2%
Others (10) (11)	n. a.	217.0	
RECYCLING WATER			
Refining (10 ³ m ³) ⁽⁵⁾	891	1,081	21%
WASTEWATER PRODUCED			
Consolidated Galp Energia – Wastewater produced (10³ m³)	4,049	4,758	
Refining (5)	4,010	3,920	(2%)
Cogeneration (1)	17.8	32.2	81%
Supplies and Logistics			
Liquid fuel storage depots – Portugal	21	15	(25%)
Liquid fuel storage depots – Spain	n. a.	11	
Service stations – Portugal (10) (11)	n. a.	382	
Service stations – Spain (10) (11)	n. a.	308	
Gavá plant (10) (11)	n. a.	2	
Others (10) (11)	n. a.	88	

Energy consumption and production			
	2011	Total	% Variation
FUEL GAS CONSUMPTION			
Refining (5) (10 ³ t)	308	324	5%
NATURAL GAS CONSUMPTION (GJ)	15,081,284	15,697,599	
Consolidated Galp Energia – Natural gas consumption (t)	335	391	
Refining (5)	272	305	12%
Cogeneration (1)	63.1	66.5	5%
Corporate activities – Buildings – Portugal	0.030	0.027	(11%)
Others (10) (11)	n. a.	18.81	
FUEL WASTE CONSUMPTION (GJ)	7,919,400	6,844,828	(14%)
Refining (5) (10 ³ t)	197	170	(14%)

	2011	2012	% Variation
GAS OIL CONSUMPTION (GJ)	15,102	52,303	
Consolidated Galp Energia – Gas oil consumption (10³ t)	0.35	1.33	
Matosinhos refinery	n. a.	0.079	
Lubricants – Gavá plant	0.02	0.01	(47%
Supplies and Logistics			
Liquid fuel storage depots – Portugal	0.20	0.26	28%
LPG storage depots	0.074	0.068	(8%
Terminals ⁽³⁾	0.05	0.02	(57%
Cogeneration (10) (11)	n. a.	0.306	
Aviation (10) (11)	n. a.	0.215	
Biofuels (10) (11)	n. a.	0.12	
Distribution/retail (Serviexpress and Gasinsular) (10) (11)	n. a.	0.085	
Others (10) (11)	n. a.	0.23	
ELECTRICITY CONSUMPTION (GJ)	2,334,053	2,381,514	
Consolidated Galp Energia – Electricity consumption (GWh)	648	662	
Refining (4)	565	576	2%
Lubricants – Gavá plant	0.514	0.509	(1%
Cogeneration (1)	0.146	0.111	(24%
Supplies and Logistics			
Liquid fuel storage depots – Portugal	1.28	1.22	(4%
Liquid fuel storage depots – Spain	1.44	1.33	(7%
LPG storage depots	1.8	1.3	(28%
Terminals (3)	6.51	6.38	(2%
Distribution/retail			
NG distributors	1.16	0.75	(35%
Service stations – Portugal	26	29	129
Service stations – Spain (10)	38	35	(7%
Aviation	1.55	0.16	(90%
Corporate activities			
Buildings – Portugal	4.31	4.19	(3%
Buildings – Spain (10)	0.69	0.66	(4%
Others (10) (11)	n. a.	5.0	
FLESTRICITY PRODUCTION (CIVIL)	4 222	424	
ELECTRICITY PRODUCTION (GWh)	1,332	1,361	20
Refining (5)	1,032	1,049	29/
Cogeneration (1) Pictribution (retail Convice stations Portugal	289	283	(2%
Distribution/retail – Service stations – Portugal	0.064	0.065	19
HEAT PRODUCTION (GWh)			
Cogeneration (1)	391	318	(19%

n. a.

Emissions			
	2011	2012	% Variatio
CO ₂ EMISSIONS			
Consolidated Galp Energia – CO ₂ (t)	3,591,600	3,349,807	
Refining (5)	2,783,706	2,909,626	5%
Lubricants – Gavá plant	188	182	(3%
Cogeneration (1)	172,715	169,949	(2%
Supplies and Logistics			
Liquid fuel storage depots – Portugal	984	1,215	24%
Liquid fuel storage depots – Spain	347	389	129
LPG storage depots	698	636	(9%
Terminals (3)	1,802	2,135	18%
Distribution/retail			
NG distributors	229,216	229,159	0%
Service stations – Portugal	6,806	11,566	70%
Service stations – Spain	8,941	10,218	14%
Aviation	402	51	(87%
Corporate activities			
Buildings – Portugal	1,201	1,428	19%
Buildings – Spain	167	193	15%
Frota Galp Energia – Portugal	13,069	10,142	(22%
Frota Galp Energia – Espanha	1,107	760	(31%
Plane journeys	3,178	2,138	(33%
Train journeys	33	18	(45%
NO _x EMISSIONS			
Consolidated Galp Energia – NO _x emissions (t)	4,592	4,678	
Refining ⁽⁵⁾	4,591.49	4,549.16	(1%
Gavá plant (2)	0.05	0.00003	(100%
Cogeneration (10) (11)	n. a.	129	
Others (10) (11)	n. a.	128.58	
SO ₂ EMISSIONS			
Consolidated Galp Energia – SO ₂ emissions (t)	6,392	5,216	
Refining (5)	6,390	5,198	(19%
Lubricants – Gavá plant (2)	1.73	1.06 x10 ⁻⁶	(100%
Others (10) (11)	n. a.	18	
PARTICLE EMISSIONS			
Consolidated Galp Energia – Particle emissions (t)	439	463	
Refining (5)	439	445	19
Others (10) (11)	n. a.	18	
VOC emissions			

Refining

	2011	2012	% Variation
Consolidated Galp Energia – Hazardous waste (t)	15,921	22,755	
Refineries (4) (2)	13,911	15,460	11%
Cogeneration (1)	9.98	4.44	(55%)
Supplies and Logistics			
Liquid fuel storage depots – Portugal (2)	292	427	46%
LPG storage depots	25	35	39%
Terminals (3) (2)	1,680	2,415	44%
Distribution/retail			
Aviation (11)	3	37	-
Service stations – Portugal (10) (11)	n. a.	2,987	
Service stations – Spain (10) (11)	n. a.	888	
Others (10)	n. a.	502	
Consolidated Galp Energia – Non-hazardous waste (t)	4,495	10,257	
Refineries (4) (2)	4,359	4,400	1%
Cogeneration (1)	3.09	0.63	(80%)
Supplies and Logistics			
Liquid fuel storage depots – Portugal	n. a.	1,308	
Liquid fuel storage depots – Spain (10) (11)	n. a.	186	
LPG storage depots	133	192	44%
Terminals (3)	n. a.	403	
Distribution/retail			
NG distributors (10) (11)	n. a.	1,050	
Service stations – Spain (10) (11)	n. a.	466	
Probiogalp (10) (11)	n. a.	424	
Biofuels (10) (11)	n. a.	160	
Corporate activities (10) (11)	n. a.	277	
E&P – Petrogal Brazil (10) (11)	n. a.	1,144	
Others (10) (11)	n. a.	248	

Transportation of products			
	2011	2012	% Variation
Consolidated Galp Energia – Transportation of products (km)	46,155,049	41,805,584	
Portugal	29,446,333	27,334,158	(7%)
Spain	16,708,716	14,165,952	(15%)
Others (10) (11)	n. a.	305,474	

Activity indicators			
	2011	2012	% Variation
Feedstock treated (10³ t)	11,822	12,565	
Feedstock treated in the refineries	11,817	12,551	6%
Feedstock treated at the Gavá plant	5.2	3.5	(33%)
Probiogalp (10) (11)	n. a.	10.1	
Product movement (10³ t)			
Liquid fuel storage depots – Portugal	4,078	3,452	(15%)
Liquid fuel storage depots – Spain	4,292	1,505	(65%)
Terminals – Portugal ⁽³⁾	8,775	23,459	167%
LPG storage depots	301	343	14%

 $[\]ensuremath{^{(1)}}$ The data includes cogeneration at Carrico and Powercer.

⁽²⁾ The value reported in 2011 was corrected.

⁽³⁾ The value includes Sigas.

⁽⁴⁾ Includes aromatics plants, Sinecogeração and the Matosinhos lubricants factory.

 $^{^{(5)}}$ Includes aromatics plants, Matosinhos lubricants factory and Sinecogeração.

⁽⁶⁾ The increased waste quality reported is due to the cleaning and repair of the tanks in the Santa Maria aero installation.

⁽⁷⁾The values correspond to the percentage defined for offshore activities which are not operated by the Company.

 $^{^{(8)}\!}$ The values were calculated using the Greenhouse Gas Protocol and IPIECA.

 $^{(9)}\mbox{The}$ values take into account equivalent \mbox{CO}_2 emissions including scopes 1 and 2.

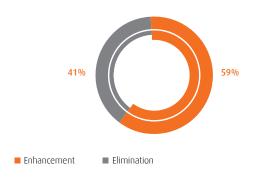
Considerations of the environmental report

- In 2012, as the internal indicator report tool was implemented, the scope of the facilities taken into account was increased.
- The environmental report activities for 2011 and 2012, operations
 that were not Galp Energia's responsibility were excluded.
 The report on environmental indicators for exploration and
 production activities in partnerships where Galp Energia is involved
 is carried out in chapter 05 of this report.
- For establishing the NO_x, SO₂ and particulate matter emissions from the refineries, for Sines the reported emissions correspond to the emissions calculated from burning fuel waste, fuel gas and natural gas in the combustion plants. The overall emissions, from the process and the combustion plants are reported based on continual monitoring.

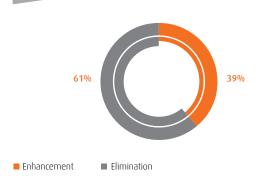
Clarifications on the results

- The increased water consumption and waste production in the aviation sector was due to a one-off tank cleaning operation.
- Changes will be introduced to the methodology for measuring the volume of wastewater from cogeneration.
- As the amount of waste produced by Powercer (cogeneration)
 was low, the waste was sent to a waste yard belonging to
 Sociedade Central de Cervejas (SCC) and managed by that company.
 Powercer supplies saturated steam to SCC's plant facilities.
- The electricity emission rate increased significantly (by over 50%) in 2012.
- A reduction in gas oil consumption was recorded for the Gavá plant.

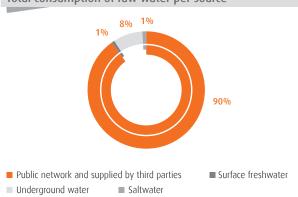
Non-hazardous waste



Hazardous waste



Total consumption of raw water per source



⁽¹⁰⁾ Indicators that were not subject to verification.

⁽¹¹⁾ Extending the scope.

Efficient consumption of resources



Project 100R

In 2012, Galp Energia began its participation in the 100R project, a voluntary environmental certification from Ponto Verde Serviços (100R®), whose main objectives are to ensure that all urban solid waste or waste designated as urban is duly taken to the most appropriate final destination, and promote the Company's environmental position with customers and employees.

In 2012, physical classification of waste was carried out and the analysis of this report will lead in 2013 to initiatives aimed at optimising the internal management of waste.

Operational efficiency and rationalisation of IS/IT resources

Datacenter

Galp Energia has approximately 400 servers in its datacenter, 65% of which are virtual servers. With this division of load, there is an estimated monthly reduction in energy

consumption, compared with the consumption if all servers were physical, of about 16,750 kW.

The measure of efficiency of a datacenter called power usage effectiveness (PUE)¹ is, in the case of the Galp Energy datacenter, 1.24. In other words, for every 1.24 watts of total power consumed, 1 watt is delivered to end computer equipment and the remainder is consumed by the cooling system. This figure stands out from most datacenters, whose PUE is around 2.5.

Printing system

As part of a process of rationalisation and optimisation of IT resources, in 2012 about 100 machines (printers, faxes and scanners) were collected for recycling. Some of these devices were definitively removed and replaced by new machines that reduce the cost per printed page by about 10 times (considering the cost of the cartridge relative to the number of prints).

In addition, a system for managing printing was implemented, designated *follow you*, which prints documents only after user authentication with the machine. This can be done on any machine covered by the system, thereby preventing copies from being forgotten and therefore wasted, and increasing security. It is estimated that by introducing this system, the monthly average number of copies that had been in the order of 1.1 to 1.2 million per month, was reduced to between 900,000 and 1 million per month.

The goal remains of reducing these amounts to about 700-800 thousand copies per month, through the adoption of additional measures, including linking the cost of copies to users and the installation of an application on the computer for each employee to report their monthly quantities produced, with encouraging messages for more efficient use of resources.

Other initiatives for efficient use of resources developed by the Company can be seen on the Galp Energia website.

8.2 Biodiversity

The commitment to safeguarding biodiversity is common to all geographical areas where Galp Energia operates, and includes the environmental dimension of sustainability strategy.

In 2012, Galp Energia published the *Guia de Boas Práticas* para a Gestão da Biodiversidade (Guide to Good Practice for Managing Biodiversity), introducing a regulatory environment that recognises the importance of biodiversity conservation for operating performance, reputation, the level of regulatory risk and access to resources and capital. This document provides guidance on how to integrate biodiversity into management systems, assessment processes, and impact mitigation and monitoring, as well as providing an explanation of biodiversity. It also provides guidance on whether to start an operation or not, taking into account the specific aspects related to biodiversity. The leaflet on managing biodiversity is available on the Galp Energia website.

The OIKOS Project – Cooperation and development

The biofuels project has from the beginning sought to align itself with the strategy laid down by the government of Mozambique, namely the development of renewable energy and consequent reduction in GHG emissions. This is contributing to improving quality of life in the community through sustainable forest management. The positive carbon balance generated by plantations of JCL can be improved through sustainable management of forest areas allocated to ongoing projects, including the right to use and benefit from the land (DUAT), but not used due to environmental criteria for the planting of oilseeds.

The European Union pre-selected a project led by OIKOS – Cooperation and Development, in partnership with the Institute for Scientific and Tropic Research (IICT), entitled Enhancing

¹ Power Usage effectiveness = Total facility power/IT equipment Power.

REDD + Strengthening Stakeholder Involvement in Forest Management and REDD Activities in Mozambique, in which Galp Energia is associate partner. This participation includes the transfer of all forest inventory work prepared for the area in question, establishing the Company as an active partner in work to be done with communities.



Biodiversity and Galp Energia facilities

In the Iberian Peninsula, Galp Energia's industrial facilities are not located in protected areas. In situations where there is proximity to these areas, adequate safety measures are in place to prevent accidents that could threaten the quality of the environment. Activities that could cause damage to biodiversity and the ecological balance are subject to an environmental impact assessment, and monitoring and mitigation measures are proposed to safeguard the environment.

Galp Energia, as part of its participation in renewable energy development through Ventinveste, ensured that the Vale Grande wind farm was designed and built to address ongoing biodiversity issues. The Company thereby reached a compromise between the economic sustainability of the project and biodiversity conservation. Implementation of a monitoring plan is under way, aimed at specific flora, vegetation and habitats, as well as birds and bats, the wildlife groups potentially most affected by this type of project. For more information, see the Galp Energia website.

A feature of exploration and production operations is the procedure for developing an environmental monitoring report during the licensing phase, which includes an initial study

of the site to identify the state of biodiversity. This review is conducted by an external body.

In the biofuels project in 2012, there were improvements in sustainable performance practice, in the choice of land earmarked for new planting:

- in the Belém Project (Brazil), the basic criterion for selecting plots, according to the rules of the Roundtable on Sustainable Palm Oil (RSPO), is if the date of deforestation was prior to 2006. Compliance with the community policy on renewable energy is guaranteed;
- there are systematic archaeological studies prior to entering any planting area and socio-environmental studies are carried out for each site;
- in Mozambique, choosing new areas involves an assessment of biomass by aerial photography and drawing up forest inventories, using independent organisations.

Within the biofuels project, in addition to carrying out a life cycle assessment whenever changes are made in cultural itineraries, plantations are managed sustainably through practices that preserve biodiversity. These practices include:

- the absence of intensive soil disturbance, keeping a permanent natural or sown covering (Puerária, in Brazil);
- respect for vegetation previously marked up as having conservation value, and protection of water lines, discontinuing of plantations, complying with best practices and Brazilian legislation on areas of special intervention and permanent conservation areas;
- conservation of a special protection area of native forest equivalent to the project area planted, ensuring the preservation of natural biodiversity in an area equivalent to the project area;
- the rational use of pesticides and herbicides.

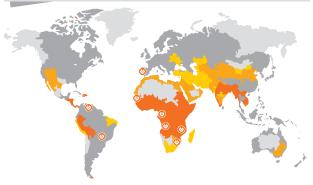
In 2012, Galp Energia introduced a tool linked to the United Nations Environment Programmes (UNEP) database which can locate all Galp Energia facilities in protected areas and areas rich in biodiversity, and identify the number of species on the International Union for Conservation of Nature (IUCN) Red List.

8.3 Water-related risks

Despite awareness that water management is not a separate area of management activity, particularly with regard to HSE, in 2012 this topic deserved renewed reflection, in line with developments in the paradigm that has arisen within discussion forums on sustainable water management. The action strategy for sustainable water management, established in 2012, is therefore based on a study carried out by the Company and developed according to the same axis and approaches of HSE corporate strategy.

In 2012, Galp Energia launched a series of initiatives for monitoring and assessing the risks related to water use, including a study on the risks associated with water use and measurement of the water footprint in the cultivation of palm tress and JCL for biofuel production. See Galp Energia website to find out more about corporate strategy, these studies and good Company practices with regard to sustainable water management.

Geographical distribution of Galp Energia facilities



- Water shortages The development of water resources is either close to or exceeds sustainable limits. Over 75% of river flow is used in agriculture, industry and domestic use. This definition related to the availability and supply of water implies that dry areas are not necessarily areas where there is a water shortage.
- Trend for water shortages Over 60% of river flow is used.
- Economic water shortages Human, institutional and financial access to water is limited even if water is available in the area to satisfy human needs. Water resources are abundant in relation to water consumption, with less than 25% of river flow being used by humans, regardless of malnutrition.
- Reduced or no water shortages Abundant water resources compared to use, being under 25%.
- Not available.

Source: http://www.fao.org/nr/water/art/2007/scarcity.html

Studies on water-related risks

Galp Energia has carried out a study on the risks associated with water use using the Global Water Tool for Oil & Gas, developed by the International Petroleum Industry Environmental Conservation Association (IPIECA) in collaboration with the World Business Council for Sustainable Development (WBCSD). The analysis covered storage and terminals (in Portugal, Spain and Africa), exploration and production (Angola and Brazil), refining (Portugal), manufacture of lubricants (Spain), planting of crops for biofuel production (Mozambique and Brazil) and cogeneration (Portugal).

The analysis identified Galp Energia facilities whose geographical location is affected by economic or physical scarcity of water, as well as the annual index of relative water stress associated with these locations.

09. Occupational safety and health



Process safety

Galp Energia aims to achieve zero accidents, by complying with the demanding standards for occupational safety and health (OSH). Achieving this goal requires leadership and

the effective management of all aspects of safety associated with the various processes and operations involving the entire life cycle of facilities and products.

Safety



Aims to create and maintain work conditions that promote employee health and safety and enables standards of physical, mental and social well-being, preventing injuries and work-related risks.



e.g.: slipping, tripping over, falls, cuts, burns and death...



Aims to manage and integrate systems, equipment and processes by applying appropriate design principles and good engineering and operational practices, preventing the release of hazardous substances and/or energy in a non-controlled way, avoiding accidents with serious human, material and environmental consequences.



e.g.: fires, explosions, spills, contamination, loss of a facility...

In 2012, the Galp Energia manual on process safety was drafted, which aims to define measures and metrics to assess the effectiveness of measures or protective barriers that prevent major accidents. Significant effort has been made to identify and minimise losses of product containment as well as to implement and communicate relevant corrective measures. Since many of the major industrial incidents occur in transient situations, requirements for pre-start-up of equipment and facilities were drawn up.

Galp Energia has continued the CONCAWE tradition of benchmarking in this sector. Since 2009 a comparison is made between the Company's results and those of their European counterparts, according to API 754 – Process Safety Performance Indicators of the Refining and Petrochemical Industries. Internally, are reported any process safety events that challenged existing barriers but did not generate consequences were reported.

Product safety

Under REACH, some of the registration dossiers submitted to the European Chemicals Agency (ECHA) in 2010 were updated in 2012 with the following objectives:

- to review chemical safety evaluation (CSA) reports to align the hazard classifications of substances with the regulations on classification, labelling and packaging (CLP);
- to correct information about the description of uses of intermediates substances;
- to describe the use under strictly controlled conditions of intermediate substances.

Diagnoses studies were also carried out for the implementation of REACH at Galp Energia's main facilities, and a number of potential improvements were identified.

During 2012, there was a review of the safety data sheets of products that Galp Energia sells in order to adapt them to current legislation and ensure that customers have reliable safety information on them. In contrast, for situations in which the downstream user is Galp Energia, contacts were made with suppliers to ensure that there is updated safety information internally relating to purchased products.

Travel manual

The growth in business activity and the progressive internationalisation of Galp Energia have required greater movement from its employees. Thus in 2012, Galp Energia developed and approved the travel manual which seeks to ensure the safety, protection, health and welfare of employees.

Further information is available about this document on the Galp Energia website.

Damage caused by third parties

A SUCCESS STORY: DAMAGE CAUSED BY THIRD PARTIES TO THE NATURAL GAS INFRASTRUCTURE

One of the major risks associated with the natural gas infrastructure is damage by third parties, i.e., the damage caused by third parties to roadworks that affects the integrity of buried natural gas pipelines. These risks arise from the possibility of an ignition source being present, where the release of flammable gases may lead to fires or explosions.

Group of excellence

A group of excellence was created, led by top management, with the participation of several representatives from various relevant areas, in order to analyse problems, identify root causes and actions that could prevent these occurrences and their impact.

Initiatives

Through the group of excellence, new procedures for reporting and for investigating incidents were established. Simultaneously, a media and awareness campaign was

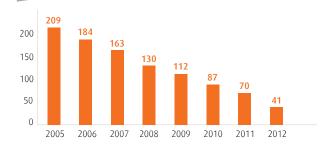
carried out amongst authorities, municipalities and construction companies operating below ground, and numerous training programmes were held for the technical staff of these bodies.

Following agreements established with other operators of underground infrastructure, and to prevent incidents, a geographical information system was created to provide immediate and reliable access to the records of the various underground infrastructures.

Results

Since the creation of the group of excellence and the implementation of the proposed initiatives, occurrences of damage by third parties have been systematically falling. Since the 184 incidents reported in 2006, there has been a decrease of around 78%.

Occurrence of damage by third parties to the NG network

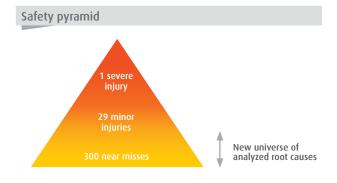


Near misses

Preventing incidents – Reporting near misses

In the belief that all accidents are preventable, the reporting process was renewed in 2012 in order to encourage communication and investigation of near misses. Being similar in kind to more serious incidents, the root causes are common. With this practice, the recommendations that prevent accidents are properly implemented.

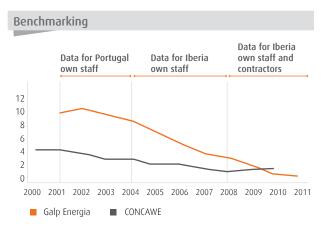
The significance of reporting and investigating near misses



The safety pyramid developed by H.W. Heinrich (1931) suggests, in a particular activity, a statistical relationship between events from different severity levels according to the following proportion: for every 300 near-miss incidents there will be 29 minor and one major injury. Ignore near misses may mean ignoring a root cause that may prove to be the cause of a major accident, with more serious and damaging consequences for the organisation. Thus, failure to report and investigate a near-miss could mean losing the opportunity to prevent one severe accident.

Performance - graphs

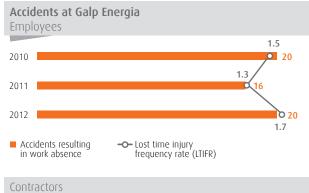
CONCAWE benchmarking for the frequency indicator of accidents resulting in lost workday injuries

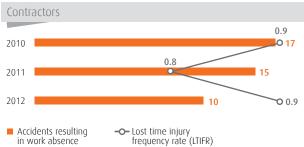


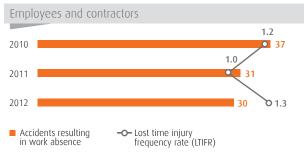
The cumulative result of 2012 was that 30 accidents resulting in lost work day injuries occurred for 23.8 million hours worked, making an indicator of 1.3 (Iberia and E&P), a figure that is lower than the CONCAWE average.

Although the number of accidents resulting in lost work day injuries has decreased, the frequency indicator is above the target and the figure for the same period of the previous year, a result of the significant reduction in the number of hours worked, due to the completion of the draft master plan. If the number of hours worked in 2012 had been similar to 2011, the frequency indicator would be 0.9.

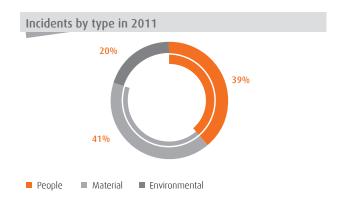
Number of accidents resulting in sick leaves and related frequency indicator

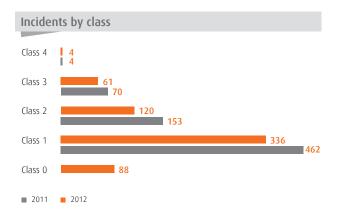






Note: does not include Biofuels and International Oil BU.





In 2012, there were four class 4 accidents, namely:

- accident with high level material damage blast furnace AL-H1 at the Sines refinery;
- fatality of an contractor employee struck by sheet metal while working in a trench at the service of Galp Energia;
- accident involving a tanker at the service of Galp Energia hit by a speeding car;
- carbon monoxide poisoning.

The last two accidents occurred in conditions beyond the control of Galp Energia. All these accidents were investigated in detail, leading to the establishment of prevention plans and measures to prevent their recurrence.

Galp Energia employees		
	2011	2012
Absenteeism (%)	3.3	2.4
Fatality (no.)	0	0
Occupational illness (no.)	0	0

Sectoral guides on environmental responsibility and tools to assess environmental risk

Galp Energia has actively participated in the working group created by APETRO for the development of a basic method, translated into sector guides applicable to the oil industry which are necessary to fulfil the requirements of Decree-Law 147/2008.

Thus, in 2012, the work plan was completed with the provision of sector guides and an online platform to evaluate the environmental risk associated with the marketing and distribution of petroleum products.

For more information, consult the sector guides.

10. Human capital

10.1 THE GALP ENERGIA ACADEMY





Employees play a key role in the success of an organisation, and Galp Energia views the management, development and enhancement of human and intellectual capital as the cornerstones of its sustainability strategy. In 2012, Galp Energia continued and consolidated the process of expanding and developing human resources in Brazil and in Africa as a result of its growing activities in these regions.

Development of human capital Exploration & Production

The transformational growth of human resources in the E&P segment was maintained in 2012 with a 23% increase in staff in this area. The Brazilian affiliate played an important role in the recruitment of technical staff in geoscience and petroleum engineering, but also by providing multiple business support resources in the areas of environment, quality and safety, human resources, legal requirements, auditing and taxation, among others.

The human resources project gained new impetus with the development of appropriate policies and practices for the legal framework regarding the adoption of:

- preventive measures for occupational health and work;
- the code of ethics:
- anticorruption policies.

In human resources management, it should be noted that Sinopec acquired part of the capital in Petrogal Brazil, who in turn recruited technical and support staff. This event encouraged greater multiculturalism within the Group, respecting diverse traditions, origins and teamwork in an environment predominated by Galp Energia's prevailing policies and practices.

Also of note was the growth of suitability, management and competitiveness of specific technical careers in the areas of exploration and production. A new framework for career management techniques was developed in the areas of geosciences and petroleum engineering, which aims to fit the specific sector's job market, promoting alignment and greater ability to attract and retain talent.

Distribution in Africa

2012 can be seen as a year of consolidation and continuity of processes and projects initiated during the previous year, an attempt at main-streaming practices and human resource policies in African affiliates in the retail business sector.

Performance evaluation

In 2012, the performance evaluation process covered about 96% of employees in the Galp Energia Group, demonstrating the continuing efforts of the Organisation to achieve a goal of 100%, by implementing this process across all businesses and geographical areas of the Group, in particular Brazil and Africa. It should also be noted, that about 10% of employees are rated according to the 360° methodology. This methodology is intended to assess management positions performance. Approximately 90% of management positions were evaluated.

Attracting and retaining talent

GPS programme

In 2012, the functional mobility programme allowed about 82 employees to change job through internal recruitment or guided mobility.

International mobility

The international expansion of the Galp Energia Group, either upstream or downstream, has encouraged internal mobility on an international scale. At the end of 2012 there was a total of 28 expatriates in various geographical areas where Galp operates. Twelve of these moves occurred during the year under review.

In addition, in the E&P segment, Galp Energia welcomed five new foreign professionals from international recruitments during 2012.

Generation Galp programme

The programme for recruiting young graduates to Galp Energia continued for the 15^{th} year.

The take-up rate for 2011-2012 was approximately 90%, involving 41 young employees.

Positioning itself as one of the links to the academic world, a total of 44 workshops and programme presentations were held in 2012, in collaboration with various Company service and business areas.

Training

In 2012, the highlight was the development of four autonomous programmes taking place in parallel with the implementation of the annual training plan.

Programme CBC – Basic Skills for Managers – This programme began in 2011 and has provided a total of about 20,000 hours of training to around 320 lower managers from the Galp Energia Group. This programme focuses on the development of leadership skills, team management and communication, and also aims to deepen cross-departmental understanding within the organisation, including its activities and its corporate value chain. In 2012, 5,152 hours of training were provided.

Conhecer + programme – Begun in 2012, this consists of inter-departmental training directed at about 1,200 Galp Energia employees. With 60,000 hours of training provided over a period of three years, this programme aims fundamentally to strengthen the in-depth knowledge of the Company and to develop the behavioural skills of teamwork, communication and interpersonal skills. In 2012, 3,998 hours of training were provided.

COMEX programme – This initiative is directed at the Company's 180 commercial agents and has resulted in about 5,700 hours of training. The aim of this programme is to enhance the business skills of the entire sales force, from those associated with prospecting customers to those needed to provide after-sales service, fostering further cross-selling between businesses.

OPEX programme - Begun in the last quarter of 2012, this programme will, over four years, cover 221 console operators and beyond the five operational areas under the direction of Sines refinery operations, with a total of 103,870 hours of training. This training will be provided by the Escola Tecnológica do Litoral Alentejano, an organisation with extensive experience in conducting training activities for operators in other industrial facilities located within the industrial hub of Sines.

In the annual training plan, the following initiatives appear.

Annual plan Training in the environment, quality, • 373 training sessions. safety and health Total of 26,986 hours. Participation of 1,408 employees. • Conferences specialising in themes Themed Tuesday Conferences which are relevant to the Company. 1,864 participants. 18 sessions held Flexible e-Training E-learning in areas such as management of investment projects, behavioural management and technical expertise in exploration, production and refining.

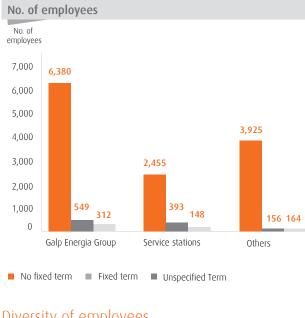
Labour relations

Because human capital is an essential pillar for Company success, Galp Energia assumes a commitment to accept, support and implement the core values of the right to work and to employment.

By respecting the freedom of association and the effective recognition of the right to collective bargaining and ensuring environmental, health and safety (EHS) conditions, Galp Energia develops and participates in activities within the framework of labour relations, including meetings with the Commission on Safety and Health at Work, with the Workers' Council and trade unions (see chapter 12).

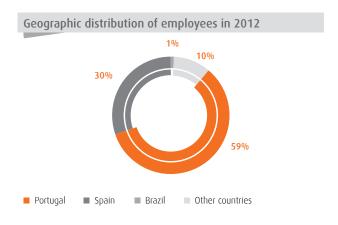
Performance Type of contract

Galp Energia gives priority to permanent employment contracts. As at 31 December 2012, around 88% of the 7,241 employees held permanent contracts of employment. Around 98% are full-time employees.



Diversity of employees

The geographical spread of Galp Energia employees has changed due to the consolidation of existing businesses. Of note is the increasing number of Galp Energia employees in Brazil, which was mainly due to growth in exploration activity. Overall, there was a continuing trend for an increasing number of employees in countries outside Portugal.

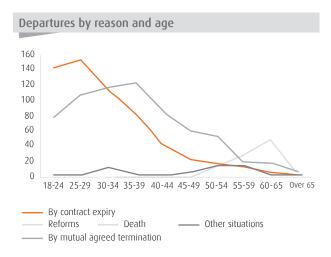


The gender distribution was similar to previous years, with a predominance of male employees This imbalance, characteristic of the sector, is due largely to a predominance of activities in Refining and in Africa.

Professional categories	Total	18-24	25-29	30-34	35-39	40-44	45-49	50-54	55-59	60-65	+ 65	Female	Male
Executive/top management	59	0	0	0	2	7	16	12	14	8	0	5	54
Middle/general management	195	0	0	1	23	30	56	45	29	10	1	39	156
First line management/ supervisors	491	0	0	22	102	90	97	79	64	35	2	162	329
Specialists groups	2,016	38	213	290	346	326	260	265	202	75	1	713	1,303
Other employees	4,480	210	554	840	836	624	483	447	331	151	4	1,904	2,576
Total	7,241	248	767	1,153	1,309	1,077	912	848	640	279	8	2,823	4,418

Staff turnover

In 2012, 1,389 employees left Galp Energia, which corresponded to a turnover rate of 19%: around 8% for women and about 10% for men. This rate is mainly due to the fuel supply business, where there is a high turnover of staff in service areas. Excluding service areas, the turnover rate would be about 5%.



General training

During 2012, there were 185,486 hours of training, 24% more than in 2011, and there were about 25.4 hours per employee.



Remuneration and performance evaluation

Remuneration and performance evaluation		
	2011	2012
Percentage of variable remuneration depending on individual performance	65%	65%
Percentage of variable remuneration depending on shared objectives	35%	35%
Total performance appraisal indicators for the Company		
Percentage of employees appraised per objective	68.1%	92.0%
Percentage of employees with 360° appraisal	9.0%	9.2%

Return on investment in human capital

The effectiveness of human capital management is evaluated consistently at Galp Energia. In 2012, the Company continued to measure the financial impact of human capital policy.

The financial impact of human capital policy is calculated using a formula for the return on investment (ROI) of human capital, developed by PriceWaterhouseCoopers, in the European Human Capital Effectiveness Report. The ROI of human capital is calculated using the ratio of total operating income, minus operating costs not related to human resources, to human resources operating costs.

ROI of human capital at Galp Energia		
	€m	1
	2011	2012
Total operating income	16,987	18,644
Total operating costs	16,345	18,102
HR operating costs	327	337
Non-HR operating costs	16,018	17,765
ROI Galp Energia human capital (€)	2.96	2.61

The results show that each euro invested in employees in 2012 generated a return of approximately €2.61 for Galp Energia. This means that every euro invested in salaries and social benefits generated an economic return of more than double.

The reduction in the ROI of human capital is mainly due to the fact that, in 2012, operating costs not related to human resources increased more than revenues in the same period. It should be noted that there were variations in amortisations, provisions and E&P operating costs.

Organisational climate

Continuing the diagnosis and monitoring work on the organisation's climate started in 2009, at the end of 2012 the Company promoted a new survey to assess climate evolution in seven factors relating to the levels of satisfaction and personal motivation.

1,439 employees participated in the survey, of whom 331, belonging to Galp Energia Spain, participated for the first time.

The participation rate fell, compared to the previous year, to about 14.8 percentage points, which could be due to the deep restructuring which took place in 2012 within the Company and the current crisis in Portuguese society.

This latest assessment of the climate within the Company reveals a slight decrease in satisfaction factors evaluated. The "stringency levels" factor was the most highly rated, with virtually no change over the previous year.

Organisational Climate survey – Factors assessed

	Clarity	Staff commitment	Flexibility	Training	Remuneration	Responsibility	Stringency levels	Response rates
2011 ^(a)	4.40	4.59	4.37	3.80	4.04	4.39	4.58	58.76
2012 ^{(a) (b)}	4.34	4.54	4.26	3.75	3.95	4.33	4.58	43.95
Variation 2012 vs 2011	(1.4%)	(1.0%)	(2.6%)	(1.3%)	(2.2%)	(1.5%)	0.1%	(14.81%)

⁽a) Results - average from all responses.

⁽b) Includes participation from Spain.



10.1 The Galp Energia Academy

The Galp Energia's Academy, Training & Assessment Centre is responsible for all the Company's advanced training, ensuring maximum quality and customisation of courses taught, and is an important tool in managing internal networking by the heterogeneous nature of the groups formed.

The goal of the Academy is to promote and manage integrated projects and innovative training aimed at developing management skills and behavioural techniques, in partnership with leading Portuguese and Brazilian higher education institutions. In this way it contributes to maximising human potential, creating the conditions for success and producing excellence from the Organisation in the long term.

The Galp Energia Academy has approximately 1,000 employees eligible for the programme and it is structured on the four pillars of advanced training, which are described below.

FormAG – Advanced Management Training is a course given to all senior executives in the Company, as well

as high-potential employees in the areas of advanced management, energy and behaviour in order to prepare them for leadership roles. It is a structured course on three levels, with formal assessment of each module.

EnglQ – Refining Engineering, Petrochemistry and Chemistry is a course that aims to train highly qualified professionals in the field of Refining, Petrochemicals and Chemistry. This programme has three components: a doctoral programme, advanced training and tailor-made modules. The fourth season (2012-2013) started in October 2012 and has 10 Galp Energia employees participating in the advanced training modules and two employees in the tailor-made modules. As regards the PhD module, in 2012 two new R&D projects in the refineries were started up.

GeoER – Advanced Training in Geo-Engineering of Carbonate Reservoirs is a course for employees who have or wish to develop a career in E&P, one of the strongest expanding sectors in the Group. The aim of this course is to promote strong multidisciplinary integration of geophysicists, geologists and engineers. Galp Energia and Petrobras have

developed this programme in partnership with five Portuguese universities and two Brazilian universities (UNICAMP – Universidade Estadual de Campinas, and UNESP – Universidade Estadual Paulista). The first year of GeoER had 18 participants, of which two belong to the ENH, eight to Petrobras and eight to Galp Energia, a total of 16,800 training hours.

CompeC – Advanced Training in Sales Skills is a course that aims to equip employees with specialised business skills. The course will commence in 2013 and will cover approximately 155 employees.

Table showing performance									
	No. of hours	No. of participants							
The Galp Energia Academy	21,696	277							
FormAG ¹ – Advanced Management Training	12,096	255							
EnglQ – Refining Engineering, Petrochemistry and Chemistry – 3 rd edition	2,880	14							
GeoER¹ – Advanced Training in Geo-Engineering of Carbonate Reservoirs	6,720	8							

¹ These hours include training, seminars, conferences and workshops.



11. Social investment in the community

- 11.1 MISSÃO UP | UNIDOS PELO PLANETA
- 11.2 BIOFUELS: INVOLVEMENT WITH THE COMMUNITY
- 11.3 ALLIANCE FOR ROAD SAFETY AND PREVENTION
- 11.4 THE GALP ENERGIA FOUNDATION





Policy and management system for corporate responsibility

Galp Energia's corporate responsibility policy was approved in 2012 and subsequently implemented. This implementation started with disclosure and communication of the policy throughout the entire Company network in all geographical areas where Galp Energia operates.

In the second phase, the goal is to design and implement a management system for corporate responsibility (MSCR) which, during the pilot project, will cover five countries: Portugal, Spain, Angola, Mozambique and Brazil. The MSCR intends to equip Galp Energia with a "set of interrelated and interacting components to establish and implement the policy and objectives of social responsibility" (NP 4469-1:2008).

This project started with a diagnosis aimed at identifying the gaps between current Organisational practices in various areas, including corporate governance, human rights, labour practices, the environment, operating practices, consumer and community development, and the requirements and recommendations of the prevailing standards of social responsibility in each of these countries.

- Portugal, Angola and Mozambique NP 4469-1:2008, NP 4469-2:2010 and ISO 26000:2011.
- Spain IQNet SR10:2011 and ISO 26000:2011.
- Brazil NBR 16001:2012 and ISO 26000:2011.

The results of this diagnostic phase, which will be presented in the first quarter of 2013, will set out a plan for the implementation of the MSCR.

Social investments

In terms of social investment and community development, Galp Energia undertakes in its corporate responsibility policy to promote initiatives around strategic areas: preventing and road safety, the environment and energy efficiency, education and training, and health and well-being. Where necessary, it will use the internal volunteer programme, Galp Voluntária.

Galp Energia business volunteering



The environment and energy efficiency

- Faça mais por menos Internal campaign
- Missão UP Unidos pelo Planeta
- Work with UNESCO and Enacol to publicise information about water (Cane Verde)



Prevention and road safety

Alliance for Road Safety and Prevention



Education

- Partnership with EPIS Association of Entrepreneurs for Social Inclusion
- Partnership with Entreajuda
- Employability Passport K'Cidade
- Training in IT with Galp Energia's retired workers association
- School book collection and exchange O saber não tem preço...
- Karingana Wa Karingana partnership
- Awarding study grants through Sonangalp (Angola)
- Donations to Santa Isabel Children's Charity (Angola)
- Supporting Pintinho school library and the training center Jerónimo Usera (Enacol, Cape Verde)
- Supporting the living marine life biodiversity exhibition, Vida, Mar e Muita História para Contar (Enacol, Cape Verde)
- Extending knowledge of the safe use of butane gas (Cape Verde)
- Partnership with the Santo António do Porto hospital (The Gambia)



Health and well-being

- Um Dia Diferente!, initiative partnership with Centre for Rehabilitative Medicine of Alcoitão (CMRA)
- Adherence to the HIV, OIT and conduct code of the Company
- Participation in GIRO 2012 Grace, Intervir, Recuperar e Organizar
- Reformar Reparações Solidárias programme
- Partnership with the Comunidade Vida e Paz
- · Clothes collection campaign Trocar para Reciclar...
- · Big Christmas initiative
- Galp Bonus Bónus Solidário campaign
- Movimento 1 Euro campaign
- Support for the Centro de Apoio à Velhice de Lhanguene e à Paróquia de N.ª Sr.ª da Amparo (Mozambique)
- Petrogal Mozambique support for Casa do Gaiato de Maputo (Mozambique)
- · Petrogal Mozambique support for the International Music Festival
- (Mozambique)
- Sponsorship of the Baía das Gatas festival (Enacol,Cape Verde)
- Support for the Marcha Contra a Droga. Partnership with the United Nations on Drugs and Crimes and the National Drugs Enforcement Agency (The Gambia)
- Support for the "End hunger, walk the world event" (Swaziland)
- Support for the handicapped (Guinea-Bissau)
- Petromar support for children (Guinea-Bissau)

In 2012, Galp Voluntária continued to promote corporate volunteering actions in the surrounding communities where Galp Energia operates. The details of the initiatives are available on the Galp Energia website.

Galp Voluntária – performanc	e indicators		
	2011	2012	Balance (2011/2012)
Hours of corporate volunteering	2,532	3,525	6,057
Volunteers	385	508	893
Projects developed	16	54	70
Bodies involved	15	184	184 ⁽¹⁾

 $^{^{(1)}}$ The institutions that received support in 2011 also received it in 2012, which explains why the accumulated amount is equal to that for 2012.

The contributions made to philanthropic initiatives and social responsibility amounted to €9,170.8 k, including management costs. The classification of these contributions followed the methodology of the London Benchmarking Group.

Motivation		
Charity offers	€276,361.20	3%
Investment in the community	€8,545,303.17	94%
Commercial initiatives	€229,485.10	3%
Total	€9,051,149.47	100%

€61,062.10	1%
€48,458.75	0%
€236,820.82	3%
€1,415,446.20	16%
€299,673.91	3%
€6,866,138.27	76%
€42,165.88	0%
€81,383.56	1%
	€42,165.88 €6,866,138.27 €299,673.91 €1,415,446.20 €236,820.82

Club Galp Energia

In 2012, the Club Galp Energia strengthened its relationship with its members and stakeholders contributing to the solidification of a corporate culture based on Galp Energia values.

Club Galp Energia	
Club Galp centres	Main activities
North	Inauguration of a social and sports centre, CGEnorte Health Club.
Centre	More than 120 social, cultural, sports and recreational activities undertaken, with the emphasis on solidarity.
South	Focus on greater diversity and improving what's offered to members.

11.1 Missão UP | Unidos pelo Planeta

Missão UP | Unidos pelo Planeta, a nationwide educational project aimed at students in the first and second cycles of compulsory education, aged between six and 12 and their respective teachers, carers and parents, completed its second season during the academic year 2011–2012.

Galp Energia promotes Missão UP under its policy of social responsibility, seeking to raise awareness amongst the school community about issues related to existing energy sources. This project encourages the involvement of children to make them responsible for forming opinions about and changing their behaviour towards improvements in energy efficiency and sustainable transport in school and at home.

As well as the information available online at www.missaoup.com, a letter is sent to schools to present the project, along with the rules for the Brigadas Positivas contest

and the Galpshare championship. This publicity campaign has increased the number of schools involved and Galp Energia employees have taught 209 classes.

Challenge I – Brigadas Positivas

Missão UP | Unidos pelo Planeta challenged students to organise themselves into small groups and create Brigadas Positivas. Each brigade decides on a mission to promote efficiency in energy consumption and more sustainable transport. To fulfil its mission, each brigade suggests and engages in activities inside and outside of school among colleagues, friends and parents, explaining to them how they are helping the Planet.

At the end of the school year, these brigades and their missions were evaluated by the jury in conjunction with a report that summarises all activities undertaken, and prizes were awarded to schools and students with the best work.

Challenge II - Galpshare online game

In 2012, another challenge was launched online, the Galpshare game. The goal is to promote the responsible use of cars through car-sharing schemes. The winner was the person who took the most people, travelling by the shortest route, polluting the environment the least, gaining the opportunity of planting more trees.

The Galpshare online game involved a Galpshare schools championship, which can be accessed at http://campeonato.jogogalpshare.com, comprising both within-school and inter-schools stages.

Results achieved

Performance of second seaso	on of Missão UP
Schools signed up	2.210
Teachers involved	2,319 15,000
Students involved	196,000
Students taking part in Energy lessons	7,000
Galpshare online championship "Cabemos todos?"	584 schools signed up
Missão UP website (www.missaoup.com)	19,129 visits, with 90,215 visits to the web page and 80.74% new visits

	Brigadas Positivas	Galpshare online
Schools signed up	230	584
Teachers involved	1,950	4,350
Students involved	27,500	62,800

11.2 Biofuels: involvement with the community

The cornerstone of Galp Energia's strategy for biofuels is a responsible involvement with local communities, deemed crucial for the sustainability of the business from every standpoint.

In this context, social responsibility activities were continued in Mozambique and in Brazil.

Mozambique

Contribution to food safety – In the district of Cubá, 7.7 hectares of corn were planted, from which were harvested 3.5 tonnes of grain destined for the families of employees. Also in the context of food safety, in 2012, in the district of Búzi, in the province of Sofala, 25 hectares of corn were planted on non-irrigated land, from which 3.2 tonnes of grain and about 2.5 tonnes of flour were distributed to the Galpbúzi employees.

Production and sale of JCL to small farmers – During 2012, in the district of Búzi, 15 tonnes of JCL seed were obtained from family farms (about 200 small farmers). This development activity contributed to the food safety of the neediest populations, providing them with a yield that will give them access to markets. In addition, a training and disclosure session on cultivation of JCL was held at the Experimental Centre of Chissamba, where local farmers had an opportunity to become familiar with the cultivation techniques of JCL.

In an initiative to promote partnership, groups of farmers were formed and during a pilot phase, were provided with equipment and insecticides in the form of credits and/or at the time of purchase of the raw material. Besides, seeds were distributed and the development of the resulting seed bed was monitored.



In the context of social activity, the following actions were also performed:

- signing of a protocol with the Agricultural School of the Catholic Mission of Barada, district of Búzi, for practical internships at the Experimental Centre of Chissamba;
- support provided by Moçamgalp for the transport of the produce from the existing small vegetable gardens (cassava, corn, etc.), at the end of the season, as well as for land development in new plantation areas, at the chosen locations by the targeted population;
- logistical support, provided by Galpbúzi, with the participation of Galp Energia, to the District Service of Education, Youth and Technology, with the transport of teachers to remote areas and distribution of final exams for secondary education by the district of Búzi.



Brazi

Palm production – Family farms, with planting area of 7 to 10 hectares, for the production of palm, corresponding to a total of 85 hectares, distributed by:

- Thailand 62 family production units, with a total of 620 hectares planted;
- Tomé Açu 23 family production units, with a total of 230 hectares planted.

For 2013, the following objectives were established:

- Thailand 185 production units selected, for approval by the banking body, out of a total of 1,800 hectares for planting;
- Tomé Açu 8 production units selected by the banking body, out of a total of 80 hectares.

11.3 Alliance for Road Safety and Prevention

As Portugal has an accident rate above European Union average, in 2012 Galp Energia started a project directed at different stakeholders, known as Alliance for Road Safety and Prevention (APR – Aliança para a Prevenção Rodoviária) which is sponsored by the Presidency of Portuguese Republic.

Mission

To help mobilise society in general to deal with the issue of preventing road accidents and road safety, creating conditions for carrying out research, raising awareness and improving driving habits, reducing fatal car accidents in Portugal.



Brings national bodies and experts as well as customers and other Galp Energia stakeholders together to address safety and traffic accident prevention.

Platform consisting of 20 companies and 20 bodies, with a total of 65 people.

The APR project was conceived considering five stages, the first two having been completed in 2012:

- diagnosis and involvement of stakeholders;
- research study on the attitudes and behaviours of Portuguese people regarding road casualties;
- defining an action plan, based on the results of the study;
- realisation;
- defining a strategy for assessment of the plan.

In the context of the APR, the study on the attitudes and behaviours of the Portuguese regarding road casualties was prepared by the ISCTE – Instituto Universitário de Lisboa (IUL).

Results obtained pinpoint segments requiring priority action, namely among young men between 18 and 24, young adults between 25 and 34, and service drivers.

Those less inclined to display at-risk behaviours include women and drivers who have never had accidents as possible ambassadors for change in road behaviour.

Detailed information is available at the Galp Energia site on the Internet.

APR action plan for 2013

The APR programme of activities for 2013 will be in accordance with the conclusions of the study, in order to achieve the objective of consistent mobilisation that simultaneously unites the efforts of all stakeholders. With regard to the action plan for 2013, APR will act in two big plans: business and society. In the business axis, the APR will contribute to strengthening the creation of a culture of safety and road prevention involving customers, suppliers, among others, through specific actions in the field. In terms of the society axis, the APR will lend visibility to the topic and optimise synergies among the different agents – non-governmental organisations (NGO), third sector, children, youth, among others - namely through awareness activities on road prevention and safety. A tool will also be created for sharing information, services and actions, uniting synergies that allow the creation of an alliance around the topic, capable of meeting the objectives proposed to reduce road casualties in Portugal.

11.4 The Galp Energia Foundation

As a follow-up to its mission, the Foundation supported and developed projects as main sponsor and also in partnership with other entities.

Casa da Música – Educational Service Supporter

Throughout 2012, the Galp Energia Foundation assumed the role of supporter of the Educational Service at the Casa da Música. One example of this partnership was the special concert for World Children's Day, which was supported by the Foundation and the refinery in Matosinhos, bringing to the stage true "sculpture instruments", made from materials used in refining or from factory waste materials arising from it.

The Foundation also took part in preparing the fifth edition of the show Sonópolis, re-edited annually by Casa da Música.

Portuguese Paralympic Committee

The partnership signed between the Galp Energia Foundation and the Portuguese Paralympic Committee was aimed at preparing athletes to participate in the 2012 Paralympic Games. The results achieved proved the success of this project, with the Portuguese athletes winning a total of five medals.

Dress for Success collection of professional clothing for women

The mission of Dress for Success, selected by the Foundation as organisation of the month, is to promote the economic independence of disadvantaged women, offering them professional clothing for job interviews, as well as the tools necessary for career development.

· Sala D. João VI - Ajuda National Palace

Under the initiative, One Hall, One Sponsor, the Galp Energia Foundation embraced the project of restoring and reconstituting the sala D. João VI of the Ajuda National Palace. The restoration work, begun 8 March 2010, was completed in 2012, with renovation of the hall ceiling.

Raríssimas – Associação Nacional de Deficiências Mentais e Raras (Portuguese Association for Mental Disorders and Rare Diseases)

The Casa dos Marcos aims to be a centre of reference in the clinical, social and education areas of rare diseases. The Galp Energia Foundation was one of two supporters of this project which, in 2012, was in the process of completing construction.

Energia Solidária

With the third edition of the Energia Solidária Campaign, the Galp Energia Foundation and the BU Gas & Power (G&P) continued a partnership whose objective is to donate gas equipment to needy private social welfare institutions (IPSS) in the districts of Lisbon and Setúbal. In 2012, support was provided to another eight IPSS, which were able to improve the conditions of services provided to their users.

Virtual Gallery

One of the commitments of the Foundation in the cultural context is the enrichment of the Virtual Gallery, which was launched in 2011, at www.fundacaogalpenergia.com. Thus preparations have been made to add an additional group of art work, which is scheduled for the beginning of 2013.

Other projects developed

The activity of the Galp Energia Foundation in 2012 also involved other partnerships and projects that had been developed throughout previous years.

- As a member of management of the APR, the Foundation helped prepare a research study on the attitudes and behaviour of the Portuguese regarding road accidents (developed with the ISCTE – IUL academic partnership).
- The Foundation is involved in editing two books on the refining and gas sectors in Portugal, which aim to help consolidate national industrial history.
- As an associate member of the Association of Entrepreneurs for Social Inclusion (EPIS), the Foundation actively supported this institution in promoting good educational practices and fighting academic failure.

More information is available at: www.fundacaogalpenergia.com



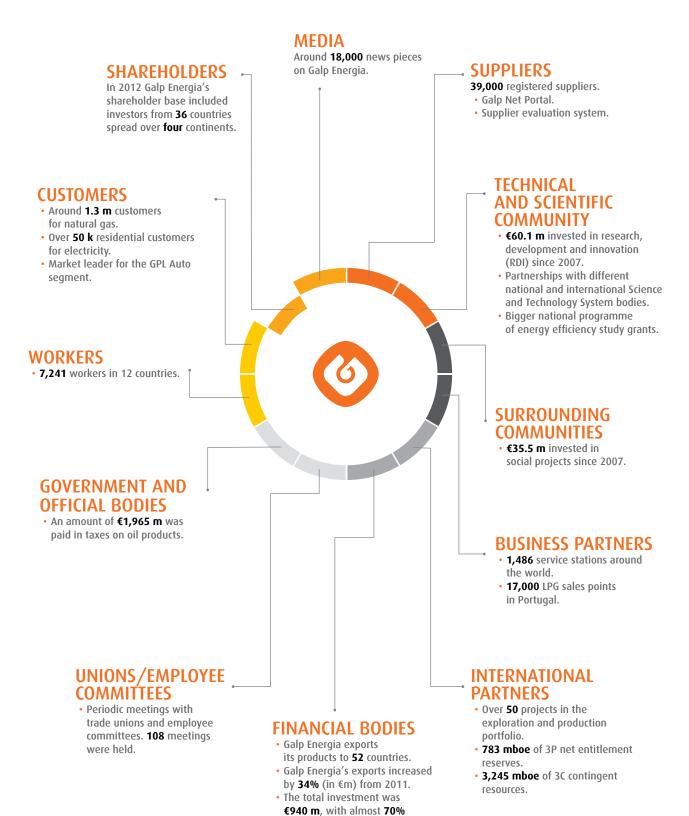
Sala D. João VI - Ajuda National Palace.

12. Stakeholders engagement

- 12.1 RELATIONSHIP WITH CUSTOMERS
- 12.2 RELATIONSHIP WITH SUPPLIERS, CONTRACTORS AND PARTNERS
- **12.3** LABOUR RELATIONS
- 12.4 RELATIONS WITH OTHER STAKEHOLDERS



STAKEHOLDERS NETWORK



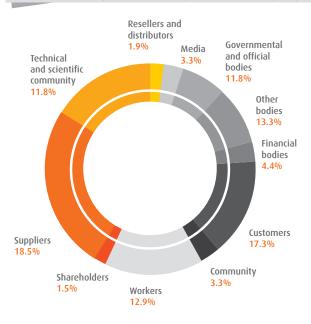
of that from the E&P business.

Dialogue with stakeholders

The consultation of stakeholders carried out in 2012-2013 consisted of a sample of 271 stakeholders selected from various Galp Energia business sectors and corporate services, including: shareholders, workers, customers, the technical and scientific community, financial, government and official bodies, suppliers, the media, resellers and distributors and other bodies.

The response rate was 57% corresponding to a total of 155 interviews carried out by phone, virtual platform and email in December 2012 and January 2013.

Breakdown of responses according to stakeholder group



General picture Sustainability performance

Stakeholder perception as to the global assessment of Galp Energia's performance in sustainability issues evolved quite positively, as compared to results of the survey carried out in 2010-2011.

Image and reputation

When inquired about the reputation and image of Galp Energia with respect to economic performance, vision and leadership, ethics and social responsibility, environmental practices, labour practices and service quality, the stakeholders identified each of these areas positively. Most noteworthy is the classification of economic performance, which reached an average of 83% of responses considered positive.

Economic dimension

Economic performance

47%

Galp Energia has a history of economic-financial performance which is above the market average.



Galp Energia has interesting perspectives on future growth and improving its profitability.



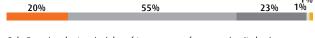
Galp Energia has a positive positioning compared to the competition in the different markets in which it operates.



Galp Energia is a company that is dedicated to exploration and production as a growing strategic vector.



Galp Energia integrates sustainability principles into its development strategy.



Galp Energia adopts principles of transparency for managing its business and in the decision making processes.

1%
12%
52%
30%
5%







Environmental dimension

Environmental practices

Galp Energia is an environmentally responsible company that strives to minimise the overall environmental impact of its operations.





Social dimension

Labour practices

29%

Galp Energia should be regarded as a good Company to work for.



54%

 $\mbox{\sc Galp}$ Energia offers its workers the hygiene and safety conditions required to carry out their roles.

Galp Energia is a company that can attract and retain talented employees

through an appropriate career development programme. 48%

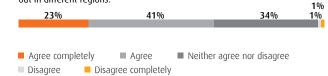
Ethics and social responsibility

Galp Energia adheres to principles of equality when dealing with its business partners (customers, suppliers and workers).



Galp Energia carried out work in the social responsibility sector that makes a significant contribution to the community. 3% 47% 31%

Galp Energia ensures that human rights are protected in the work it carries out in different regions.





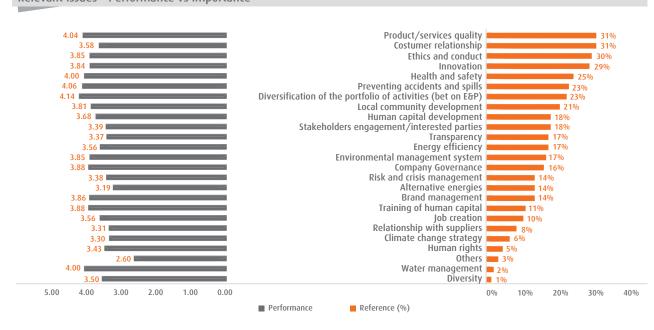
Relevant topics

1%

Within the scope of Galp Energia's activity, most stakeholders continue to give more relevance to the social and economic dimensions. The five issues considered most relevant include four topics (relating to the customer, product quality/service, ethics and conduct, innovation) from the economic pillar and one topic (health and safety) from the social pillar.

In general, Galp Energia is perceived as performing well in the areas which stakeholders deem more relevant.

Relevant issues - Performance vs importance





Sustainability report – Knowledge of the publication of the sustainability report

There was a positive development regarding knowledge of the publication of the 2011 sustainability report, resulting from measures adopted in the communication and disclosure of this report, namely through the institutional site on the Internet and electronic mail.

Relationship with stakeholders – Level of involvement

With respect to the relationship with stakeholders, about 72% of those surveyed classified the level of involvement between the Company and stakeholders as positive.

12.1 Relationship with customers

Index of brand awareness

In the portuguese energy market, global awareness of the Galp Energia brand reached, in 2012, results higher than those of the previous year (88% vs 80%). These results are obtained from the brand tracking study, done by an independent body, and correspond to the indicator "spontaneous awareness", that measures the number of times that Galp Energia is, spontaneously, named by those interviewed.

Evaluation of brand image

The brand tracking study also evaluated the attributes of the Galp Energia's brand image. The degree of agreement amongst those interviewed is shown in the following graph.

Customer satisfaction index

Galp Energia uses the methodology of ECSI Portugal, the national index of customer satisfaction, a system of measuring the quality of goods and services available on the national market, through customer satisfaction.



Customer satisfaction index

	Image	Expectations	Perceived quality	Perceived Value	Satisfaction	Complaints	Loyalty
Bottled gas	7.97	7.80	8.08	5.95	7.74	6.98	7.05
Natural gas (regulated market)	7.93	7.86	7.90	6.57	7.73	7.43	7.07
Natural gas (free market)	7.77	7.60	7.80	6.35	7.29	6.94	6.84
Perceived quality	7.74	7.65	7.76	6.63	7.17	7.00	6.88
Perceived value	7.69	7.89	7.74	6.25	7.16	7.03	6.72

Scale: 1 (weak) - 10 (strong) above 6 and the customer is considered to be satisfied.

Service satisfaction index distance (overall) and face-to-face (NG)			
	2011	2012	
Overall satisfaction with distance service (overall)	78.4%	79.3%	Sampling: 10,176 surveys
Overall satisfaction with face-to-face service (NG)	82.6%	81.6%	Sampling: 2,999 surveys

Programme Estrela

The programme Estrela was created with the objective of evaluating the customer satisfaction of those who frequent the Galp Energia service stations on a daily basis. The aim, therefore, is to actively contribute to uniformity and continued and sustained improvement in the quality of service provided to the customers of these service stations.

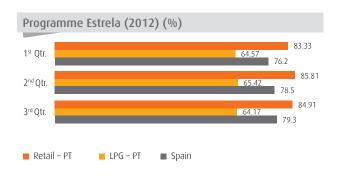
Results for Galp Energia Portugal

In 2012 the Galp Energia service stations achieved a level of performance of 85% of the overall service rating.

Results for Galp Espanha

In the service stations of Galp Espanha, in 2012, the goal set forth was to achieve a general service rating of 80%. The result obtained was 80.38%.

In general customers Galp Espanha's service stations are quite pleased with the customer service (7.8 out of 10).



Against a backdrop of rising energy prices, during 2012 Galp Energia continued to develop customer loyalty programmes in order to help customers manage the effect of this increase on their respective budgets. Of these programmes, the most notable are the following.

- Galp On With the opening up of the electricity market, this
 offer combines electricity and natural gas supply, with direct
 discounts on the receipt.
- Galp Sonae MC Partnership Crossed offer of 10 cents/litre discount accumulated on the Sonae MC card (national market leader in the retail food sector, with about 180 shops). The customer receives a discount coupon of 10 cents/litre for purchases in Sonae MC shops, to be rebated at Galp Energia service stations.
- Campaigns offering goods and services through exchange of Fast card points (fuel loyalty card).

It should be noted that Galp Energia has established various partnerships with companies/entities, that involve giving customers fuel vouchers (discount and value).

For more information, please see the Galp Energia site on the Internet.

12.2 Relationship with suppliers, contractors and partners

In developing activities throughout its entire value chain, Galp Energia establishes partnerships and subcontracts suppliers and service providers. Managing relationships deserves utmost attention, for the risks and opportunities they provide, both for operations, and with regard to reputations. For this reason, there is a constant concern by the Company that the work of these bodies be aligned and in accordance with the requirements of Galp Energia with regard to the environment, quality, ethics, conduct and safeguarding of human rights.

This commitment materialises throughout the process of selection, qualification and performance evaluation for suppliers of goods or services. Considering the existing integration between the objectives and the areas of focus for the HSE strategy and the management supply chain, this topic is also reported in chapter "07 Management of health, safety, environment and quality", of this report.

The method of risk assessment method for risks associated with the contracts is identified by virtue of the severity of the potential consequences in various areas (image; business/customer; operations; compliance; environmental impact; exposure to agents harmful to health; occurrences; damages or losses) and the respective probability of occurrence.

The evaluation of the contractors performance is done through a system for managing, auditing and monitoring of compliance with the established HSE requirements.

When the contractors operate at Galp Energia's facilities, all of the policies, rules and objectives are also applied to them, and thus the objective of "zero accidents" goal applies to internal and external workers.

Due to the specific nature of the G&P business and as is common practice in the sector, the qualification and evaluation which is carried out for suppliers is based on their respective reputation, credibility and product quality.

In the same way, in the trading of crude, since the community of crude suppliers is quite restricted, commercial relationships are based on the reputation of the suppliers on the market, a determining factor of the buyer's decision.

Activities developed

In 2012, the procurement activity of Galp Energia (except raw materials) for purchasing materials and services corresponded to €486 m acquired from national (72%) and international (28%) suppliers.

In compliance with the obligations assumed for 2012, Galp Energia added clauses to its contracts with suppliers, contractors and partners, which gives them the obligation to act according to Galp Energia's code of ethics and code of conduct, aimed to combat corruption, as well as safeguard human rights.

During the year under review, Galp Energia conducted six audits that involved on site visits, both announced and unannounced, and personal interviews with managers and employees. The Company also did about 15 visits through the Achilles system.

Regarding the evaluation of aspects of corporate and social responsibility of its suppliers, Galp Energia already has available information on 906 suppliers that maintained some relationship with the Company. Of these suppliers, 438 invoiced in 2012 and had an evaluation indicated in the following table, resulting from answers to the Achilles questionnaire.

Supplier distribution by classification			
Classification		Total suppliers	
A+		141	
Α		242	
В		55	
B: 0 to 19%	A: 20 to 59%	A+: 60 to 100%	

Galp Day with SME's – Galp Energia promote encounters with national SME's to encourage business opportunities

Galp Energia, in partnership with the AICEP and with the COTEC, met with its main – and potential – suppliers

and contractors to let them know of their growth projects for the next few years and present in detail the business areas in which Galp Energia acts and in which it needs to acquire external goods and services – E&P, Refining & Distribution and G&P. The initiative also included presentations on the rules followed by Galp Energia in qualifying its suppliers.

The meeting brought together over 400 company representatives, mostly small and medium sized, and from such varied sectors as information technology, engineering and projects, industrial services and maintenance, metallurgy, environmental management, safety, civil construction, transports, health services, research centres, marketing and advertising, among others.

The initiative aims to contribute to the development of the qualifications of the Portuguese entrepreneurial fabric with the highest international standards of quality environmental performance and safety. Thus, the companies enabled to collaborate with Galp Energia will be able to operate in any part of the world.

The opening session was attended by Manuel Ferreira De Oliveira, Galp Energia's CEO, Pedro Reis, Chairman of AICEP Portugal Global, and Daniel Bessa, Chairman of COTEC Portugal.

12.3 Labour relations

Committee on Occupational Health and Safety

The Committee on Occupational Health and Safety is composed of representatives elected directly by the employees and by responsible units designated by the Board of Directors, and is assisted by the responsible party for the Office of Health, Safety and the Environment and by the medical coordinator of Occupational Medicine.

This committee meets bi-monthly to analyse and prepare opinions, recommendations or proposals on matters within the scope of the OSH, namely standards and regulation, indicators of deaths, accident reports, activity of the subcommittees of the OSH for the various facilities, among others.

In 2012, six meetings were held.

Meetings with the Workers' Committee

The Board of Directors, represented by the director of human resources, meets monthly with the Workers' Committee,

the body elected to represent them before Company management, for analysis, discussion, information and clarification regarding all aspects of the life of the Company which they feel need to be addressed.

In 2012, 37 meetings were held.

Meetings with union organisations

Meetings are held on an annual basis with the union organisations representing the workers of the Group's companies for negotiation and updating of issues, namely of a pecuniary nature, defined in the collective bargaining instruments

In 2012, 65 meetings were held.



12.4 Relations with other stakeholders

Employees

In 2012, various support systems for internal communication continued to be encouraged by Galp Energia, which formed the mygalp integrated system.

Support for Galp Energia's internal communication



mygalp intranet Intranet the main tool for internal communication.



mygalp newsDigital weekly newsletter.



mygalp magazine

Magazine printed bi-monthly with 9,000 copies, available in Spanish and English.



mygalp video, mygalp extra, mygalp reports, mygalp info, mygalp mytime e mygalp move

Constituted as ways to communicate at different time intervals and with a format designed to improve communication with employees.

Investors

At the end of 2012, Galp Energia's shareholder base included investors from 36 countries, spread over four continents.

In addition to ensuring the disclosure of all relevant facts on the strategy and the activities of the Company and all of the shareholders, in a transparent, regular and opportune manner, Galp Energia meets regularly with institutional investors, having held over 320 meetings in 2012, in Europe, North America and, for the first time, in Asia.

Galp Energia also holds the Annual Capital Markets Day, an event exclusively dedicated to financial analysts and institutional investors, in which it announces the updating of the strategic and financial plan.

In 2012, Galp Energia began publishing a monthly newsletter aimed at those involved in the capital markets.

Governmental entities

Galp Energia and a group of governmental bodies such as FAI, ADI/QREN, FP7 and FSE/HPOP work together to identify new development projects to work on. Joint projects translate into benefits for all stakeholders. The following table shows some examples.

Entity	Project
FAI	Galp 20-20-20; Smart Galp; Negajoules Counter
QREN	Petrodemetallisation
FP7	Ginseng; COMET
НРОР	Training for Innovation and Management (Advanced Training – EnglQ programme).
SIFIDE	Innovation projects

Media

In 2012, Galp Energia continued its strategy of communication with the media, reflected in the indicators presented below.

Contact with the media		
Туроlоду	No.	
News	17,858	
Press releases	71	
Contacts in response to journalists	180	
Contacts based on press data	1,100	
Training programmes for journalists	4	
Press conferences	3	

Science and Technology System

In an era in which technological challenges of the energy sector are always increasing, the construction of an open, dynamic and multidisciplinary innovation network is a strategic factor of prime importance for business success.

In this sense, Galp Energia has been establishing a network of partnerships with various bodies from the national and international Scientific and Technological System (SCT), especially in the countries where it operates, distinguished by agility, capillarity and dynamic creativity in the development of shared competences.

Thus, Galp Energia aims to have an integrated approach in training and research, and has been creating a structure and organisation capable of responding to these demands and challenges.



13. Innovation and technology

- 13.1 PETROLEUM AND GAS INSTITUTE
- 13.2 R&D IN EXPLORATION & PRODUCTION
- 13.3 R&D IN REFINING
- 13.4 DEVELOPMENT OF NEW PRODUCTS AND SERVICES





Galp Energia decided to strengthen its partnership with the SCT, creating the Petroleum and Gas Institute (ISPG), Association for Research and Advanced Training.

This model was materialised in the Strategic Plan for R&D+Innovation of Galp Energia 2013-2017, the objective

of which is to consolidate the internal knowledge and an effective network of collaboration in R&D, with global competitive conditions, maintaining and developing a level of scientific and technological maturity of international reference in the areas of E&P, Refining, Gas and Electricity and Biofuels.

13.1 Petroleum and Gas Institute

Technological competitiveness is vital for business success in the petroleum and gas sector, and fundamental for new challenges in deep water petroleum exploration. Indeed, according to the latest data from the Director-General for Competitiveness and Industry of the European Commission, in 2011, about 7,700 million euros were jointly invested in R&D by the 10 largest world operators.

Taking advantage of the opportunity to invest in Brazil 1% of the gross revenue from production of the oil fields covered by

the regulation on special participation by the Brazilian national agency for oil, natural gas and biofuels (ANP) Galp Energia decided to strengthen its partnership with the SCT, through the creation of the ISPG.

With this association, Galp Energia seeks to coordinate the efforts of research, development and advanced training by structuring a solid partnership with Portuguese and international universities and institutions, gathering a network of highly qualified knowledge.

13.2 R&D in Exploration & Production

GeoER programme

GeoER is a research and advanced training initiative conducted in partnership by Galp Energia and Petrobras, along with five universities: three Portuguese (UTL/IST, UA and Faculdade de Ciências da Universidade de Lisboa (FCUL)) and two Brazilian (UNESP and UNICAMP).

The objective is to form staff teams to respond to the challenges faced in the deep water exploration of petroleum. This initiative also aims to promote a strong multidisciplinary integration of geophysicists, geologists and engineers, in order to give these professions transversal skills in these subjects. In summary, developing skills, aptitudes and research methods in the domain of geo-engineering of carbonate reservoirs.

In the 2012 edition, 840 hours of training were provided per participant, with eight students from Galp Energia, eight from Petrobras and two from ENH. A new edition is predicted for 2013.

Partnership with HWU

In 2012, a partnership was begun with HWU, one of the most reputable global university centres in the petroleum and gas industry. Galp Energia financed the participation of five students in five joint industrial projects (programmes financed by the industry) to develop intensive knowledge in the field of enhanced oil recovery.



Part of the anchoring system of the FPSO Cidade de Paraty.



13.3 R&D in Refining

EnglQ programme

The EnglQ programme - PhD and advanced training in Refining Engineering, Petrochemistry and Chemistry – is one of the structural training tools in R&D and development of human capital at Galp Energia. This programme is conducted in partnership with five universities in the areas of chemicals, petrochemicals and refining. In three years of existence, it has trained 50 staff technicians and started 11 PhD projects in the area of refining.

In 2012, a new PhD project was begun and the nine PhDs started in 2009 were continued. One of this is a Petrodemetallisation project, ongoing at the Professor Ramôa Ribeiro Research Centre - Sines refinery, with the help of a pilot unit that allowed mimicking the operation of a hydrocracking unit of heavy diesel fuel, i.e., performing tests in near-industrial conditions and with petroleum loads with a high level of contaminants.

New EnglQ PhD programme: Visbreaking Neural Networks

Developing, testing and validating a model to predict the revenue of products and their respective properties, associated with a visbreaking unit, using neural networks.

Following the investments made in the refineries, a vacuum distillation unit (VDU) was constructed, with the aim of increasing production of diesel fuel, at the Matosinhos refinery, viewing to produce heavy vacuum diesel fuel, and a visbreaker unit (VBU). The aim is to use a thermal cracking process, to maximise the conversion of vacuum waste into lighter products (gas + naphtha + visbreaker diesel fuel).

The estimate of revenues and properties of the products resulting from the VBU assumes a very relevant importance in predicting the unit's performance, playing a decisive role in the optimisation process. In addition, correct operation of the unit is important to ensure the optimal period of the maintenance cycle and minimise energy consumption.

Galp Energia R&D Centre in the Refining area

In 2012, Galp Energia inaugurated the Professor Ramôa Ribeiro Research Centre at the Sines refinery, which integrates pilot units that replicate laboratory-scale operation of the main units of the refinery itself, which may represent significant gains in improving procedures and significant savings with the possibility of evaluating new processes in a controlled laboratory environment.

Ginseng project

Galp Energia, through the European GINSENG project -Performance Control in Wireless Sensor Networks, financed by the Seventh Framework Programme, consolidated the knowledge on new technological frontiers in wireless monitoring, in highly demanding industrial circles. The GINSENG R&D initiative, completed in 2012, consisted of a partnership of six universities from six different countries, the SAP software company and Galp Energia.

In certain circumstances, this type of network of wireless sensors may be an alternative to traditional cabling in need of replacement, for which installation and maintenance costs are on average, 60% lower.

13.4 Development of new products and services

Energy efficiency Smart Galp – Trifuel Approach

The Smart Galp project – an innovative solution for monitoring energy consumption - allows domestic customers of Galp Energia to access a service for monitoring electricity, natural gas and fuels, through an interactive online portal, and thus reduce their energy bill.

In 2012, a portal was developed displaying functions such as:

- exhaustive monitoring of electricity consumption;
- attributing efficiency levels and access to monthly energy efficiency reports;
- rate simulator to define the best rate for the customer;
- control of equipment through smart sockets;
- service to receive and visualise e-bills.



The main objective of this pilot project, operating with a group of 120 customers, is to promote the management of demand for energy, encourage behavioural changes and apply energy efficiency methods at home and/or in the car. During 2013, an exhaustive analysis will be made on the impact of this solution in energy performance of Galp Energia's customers.



The Smart Galp project was recognised internationally and was classified as among the six best in the World Smart City Awards 2012 contest, in the category "Innovative Initiative", in the context of Smart City Expo World Congress (see chapter 00 Background).

Galp 20-20-20

In 2012 the Galp 20-20-20 programme completed one more edition. In the context of this programme, 30 scholarships were granted to university students, allocating them to 30 companies, for the purpose of developing sustainable energy management projects.

The largest national scholarship programme for applied research in energy efficiency, selects the best projects every year:

- at UA, a solution was selected consisting of applying neural networks to empirical learning on the operation of a machine to process pulp, viewing energy optimisation;
- at IST, an award was given for developing efficient energy management for the stadium of the Sporting Football Club of Portugal;
- at Faculdade de Engenharia da Universidade do Porto (FEUP), recognition was given for the development of a software which, besides calculating energy consumption, allows assisting in the budgeting process, including all direct and indirect production costs, for a company in the textile industry.

Since 2007, about 131 energy efficiency projects were developed in the Portuguese business and public structure.

Negajoules Counter – Management system for industrial energy

Galp Energia, in partnership with UA, developed a project for managing energy in the environment. Besides monitoring all energy consumption, the Negajoules Counter, allows measurement of the amount of energy being saved in real time.

For this purpose, software was developed to process and manage information obtained from analysis of the balance of energy of a productive system, allowing the quantification of the thermodynamic imperfections and, as a result, defining the limit of the system's efficiency. By comparing basic information with the current consumption of the productive system, we obtain the level of theoretical energy waste, i.e., the Negajoules (overall, the energy that could be saved).

The Negajoules solution will have its prototype version in 2013, which will be tested in various small and medium industrial companies.

Galp Innovation Network on social networks

The Galp Innovation Network, an open innovation platform of Galp Energia with the SCT, began in 2012 and had a profile on the LinkedIn social network. The objective is to facilitate contact with researchers, scientists, students and professionals from the energy sector who wish to share knowledge and develop projects with Galp Energia.

MobilityLiving Lab Galp Toyota

Galp Energia and Toyota completed, in September 2012, the Living Lab sustainable mobility project, started in 2010. Throughout this period, it was tested, in a real environment, the use of three hybrid Toyota Prius Plug-In vehicles, assigned to three Galp Energia employees.

The project involved the collection and monitoring of data regarding the behaviour of each driver, analysed with the support of the Institute of Mechanical Engineering of IST (IDMEC-IST), and aimed to determine energy and environmental gains, behavioural changes caused by the new technology, adaptability of the technology to mobility patterns in Portuguese cities, barriers and constraints, and receptiveness to this type of technology.

Still in the context of this project, two Toyota Prius Plug-In vehicles were used intensively and widely by various partners and various organisations in a total of about 80,000 km travelled. In all, 158 trials were recorded with institutional partners, more than 20 trials from the Group and more than 20 presentation events of the hybrid electric plug-in concept.

The conclusions reached by the Living Lab Galp Toyota project allowed us to introduce improvements in the current model which is being sold.

CONCLUSIONS

- The use of the hybrid vehicle leads to less aggressive driving, due to a substantial reduction in excessive stops and starts.
- Maximising the electric component depends on three factors: frequent recharging, smooth driving and short trips
- With respect to consumption, in an evaluation of the life cycle, and for the use profiles analysed, the plug-in vehicle uses 28% less energy than the conventional hybrid and 32% less than diesel.
- The emission of ${\rm CO_2e}$ is 35% less compared with a conventional hybrid, and 40% less compared with the diesel equivalent.

Nucleus of R&D of fuel

Galp Energia established a partnership with the Universidade de Coimbra to create a R&D nucleus of fuel, with one of the main objectives being the development of cleaner and environmentally efficient fuel. The laboratory structure of this R&D centre will also develop activities aimed at certifying the same in the Coordinating European Council (CEC), an international entity responsible for creating standardised methods of tests and trials of fuels and lubricants.



Project 3GFORCE – Diesel Fuel and liquefied petroleum gas

Within the scope of the partnership between Galp Energia and IDMEC-IST, in 2011 a project was started to characterise the use of diesel cycle engines operating as hybrids, using a mixture of diesel fuel and liquefied petroleum gas (LPG) propane as fuel, in heavy-duty passenger and commercial vehicles.

This project will be completed in 2013.

Via Verde

In 2012, Galp Energia consolidated the new fill up concept by introducing the Via Verde payment system in its service stations.

The Via Verde service became a payment method available for customers, with the identifier associated with a payment method and allowing the operation to be performed more quickly. This solution is being implemented in around108 fuel service stations.

Horus project (managing leaks)

The Horus project, a partnership between Galp Energia and the Instituto Superior de Engenharia de Lisboa (ISEL), resulted in the development of a system for managing authorisations for fuel refills based on identifying vehicle tags, which prevents refilling if the tag shows a history of leaks in the database. In 2012, the pilot experiments were tested and completed in the service stations of Queijas, Montijo N/S and Montijo S/N in real conditions.

Galp Energia submitted this innovative process project to APETRO, so that the concept could be disclosed to its peers.

Contractors

Galp Energia developed R&D studies of products in the bituminous field, co-mentoring the work of two masters students of the Universidade Nova de Lisboa and of Universidade de Aveiro.

The work was developed on bituminous binders and bituminous mixtures.

The conclusions of the studies were presented at the Ibero-American Asphalt Congress, in Rio de Janeiro, and the EAPA & Eurobitume Congress, in Istanbul.

Development of new lubricants

Galp Energia invests continually in developing more efficient products with less environmental impact, in particular in the reduction of environmental waste generation.

Development of new lubricants		
Development	Impact	
Reformulation of GALP TRANSGEAR	Lower impact regarding consumption and with a growing decrease in the formation of environmental waste.	
Reformulation of GALP CY M 680	Improvement regarding the useful life of equipment.	
Creation of GALP SPECIAL CLEANOIL	Greater productive efficiency and decrease in waste arising from cleaning of the line (industry customers).	
Creation of GALP TEX P	Directed to the textile industry, to prevent threads from breaking.	
Creation of Galp Galáxia LPG 10W40	Operating improvement of vehicles and decrease in gases polluting the atmosphere.	



14. Appendices

- **14.1** APPENDIX I ASSURANCE LETTER
- 14.2 APPENDIX II GRI TABLE KEY SUSTAINABILITY INDICATORS
- 14.3 APPENDIX III STATUS OF THE LIST OF COMMITMENTS FOR THE 2012 SUSTAINABILITY STRATEGY
- 14.4 APPENDIX IV ABBREVIATIONS, INITIALS AND ACRONYMS



14.1 Appendix I – Assurance letter



To the board of Directors of Galp Energia, SGPS, S. A.

Independent verification report of the Sustainability Report 2012 (Free translation from the original in Portuguese)

Introduction

In accordance with the request of Galp Energia, SGPS, S. A. (Galp Energia), we performed an independent verification of the "Sustainability Report 2012" (Report), regarding the performance indicators listed in the Scope below, included in the "GRI index" and presented in different sections of the Report. Independent verification was performed according to instructions and criteria established by Galp Energia, as referred in the Report, and according to the principles and extent described in the Scope below.

Responsibility

Galp Energia's Board of Directors is responsible for all the information presented in the Report, as well as for the assessment criteria and for the systems and processes supporting information collection, consolidation, validation and reporting. Our responsibility is to conclude on the adequacy of the information, based upon our independent verification standards and agreed reference terms. We do not assume any responsibility over any purpose, people or organization.

Scope

Our procedures were planned and executed using the International Standard on Assurance Engagements 3000 (ISAE 3000) and having the Global Reporting Initiative, version 3 (GRI3) as reference, in order to obtain a moderate level of assurance on both the performance information reported and the underlying processes and systems. The extent of our procedures, consisting of inquiries, analytical tests and some substantive work, was less significant than in a full audit. Therefore, the level of assurance provided is also lower.

The verification of the management self declaration on the application level of the Global Reporting Initiative GRI3, based on GRI's Reporting Framework Application Levels, consisted on the verification of consistency with the applicable requirements.

Part of the information required by GRI3 is available on the "Annual Report and Accounts 2012" and the "Corporate Governance Report 2012", documents that should be used to obtain a full understanding of the developed activities, the corporate governance and the Group's performance.

The following procedures were performed:

- (i) Inquiries to management and senior officials responsible for areas under analysis, with the purpose of understanding how the information system is structured and their awareness of issues included in the Report;
- (ii) Identify the existence of internal management procedures leading to the implementation of economical, environmental and social policies;
- (iii) Testing the efficiency of process and systems in place for collection, consolidation, validation and reporting of the performance information previously mentioned;

- (iv) Confirming, through visits to sites, that operational units follow the instructions on collection, consolidation, validation and reporting of performance indicators;
- (v) Executing substantive procedures, on a sampling basis, in order to collect sufficient evidence to validate reported information;
- (vi) Comparing technical data related to greenhouse gas emissions and primary energy consumption validated by the independent assurer under the European Emission Trading Scheme;
- (vii) Comparing financial and economic data with those in the "Annual Report and Accounts 2012" audited by the external statutory auditor, to appraise the external validation of the reported information;
- (viii) Comparing data related to refineries with previous data verified by us in the scope of the assurance of Sines and Matosinhos Data Books;
- (ix) Validation of the material themes included in the Report based on the materiality principle of standard AA1000APS and GRI3, through the comparison of the Report's content with the content of peer companies' Sustainable Reports;
- (x) Verifying the existence of data and information required to reach level A, self declared by Galp Energia for applying the GRI3.

Independence

We develop our work in line with standard ISAE 3000 independence requirements, including compliance with PwC's independence policies and code of ethics of the International Ethics Standards Board of Accountants (IESBA).

Based on our work described in this report, nothing has come to our attention that causes us to believe that internal control related to the collection, consolidation, validation and reporting of the performance information referred above is not effective, in all material respects.

Based on the assumptions described on the scope, we conclude that the Report includes the data and information required for level A, according to GRI3.

As external auditors of Galp Energia, our opinion about financial data is expressed in the "Annual Report and Accounts 2012".

Lisbon, June 3, 2013

PricewaterhouseCoopers & Associados S.R.O.C., Lda. Represented by:

António Joaquim Brochado Correia, ROC





14.2 Appendix II – GRI table – Key sustainability indicators

1 Stra	1 Strategy and analysis			
1.1	Chairman's message.	Chapter 01 – Page 17-19		
1.2	Description of the main impacts, risks and opportunities.	Chapter 02, Chapter 04 and Chapter 07 – Page 21-22; 27-28; 48-50		

2 Organisational profile			
2.1	Name of organisation.	Chapter 00 – Page 7	
2.2	Main brands, products and/or services.	Chapter 00 – Page 8-11	
2.3	Operational structure of the organisation.	AR&A 2012 – Chapter 5 – Page 53	
2.4	Location of the organisation's headquarters.	Chapter 00 – Page 7	
2.5	Countries in which the organisation operates.	Chapter 00 – Page 8-11	
2.6	Type and legal nature of the organisation.	AR&A 2012 - Chapter 05 - Page 51	
2.7	Markets served.	Chapter 00 – Page 8-11	
2.8	Size of the organisation.	Chapter 00 – Page 8-11; 15	
2.9	Significant changes made.	AR&A 2012 – Chapter 05 – Page 51-52	
2.10	Awards/recognitions received.	Chapter 00 – Page 12-14	

3 Para	ameters of the report	
Profile	of the report	
3.1	Period to which the information refers.	2012
3.2	Date of the most recent report.	The last report was in 2011
3.3	Report cycle.	Annual
3.4	Contacts for issues related to the report or its content.	Chapter 00 – Page 7
Scope a	and limits of the report	
3.5	Process for defining the content of the report.	Chapter 00 – Page 7
3.6	Limits of the report.	Chapter 00 – Page 7
3.7	Other limitations of a specific scope.	Chapter 00 – Page 7
3.8	Basis for preparing a report regarding joint ventures, subsidiaries, leased facilities, subcontracted operations and other organisations that could significantly affect the comparability between periods and/or between organisations.	Chapter 00 – Page 7
3.9	Techniques for measuring data and the bases for calculations.	Chapter 00 – Page 7
3.10	Explanation of the nature and consequences of any reformulation of information contained in previous reports.	Chapter 00 – Page 7
3.11	Significant changes compared with previous years.	Chapter 00 – Page 7
Index o	f the contents of the GRI	
3.12	Table which identifies the location of each element of the GRI report.	Appendix II – Page 93-100
Verifica	tion	
3.13	Current existing policies and procedures for providing external checks on the report.	Chapter 00 and Appendix I – Page 7; 92

4.1	Governance structure.	AR&A 2012 – Chapter 05 – Page 53-55
4.2	Indication whether the chairman of the highest governing body is also an executive director (and his duties within the management of the organisation).	AR&A 2012 – Chapter 05 – Page 53-55
4.3	Declaration of the number of independent or non-executive members.	AR&A 2012 – Chapter 05 – Page 53-55
4.4	Mechanisms which allow shareholders and workers to make recommendations to the highest governing body.	Chapter 3 and Chapter 12 – Page 24-25; 85-86 CGR 2012 – Page 57
4.5	Relationship between remuneration of the members of the highest governing body, executive board and other executives and the performance of the organisation (including social and environmental performance).	AR&A 2012 – Chapter 05 – Page 54-56
4.6	Processes in effect at the highest governing body to ensure that conflicts of interest are avoided.	CGR 2012 – Chapter II – Page 29
4.7	Process to determine the qualifications and knowledge of the members of the highest governing body to define the strategy of the organisation for issues related to economic, environmental and social topics.	CGR 2012 – Chapter II – Page 40-53

14	7
APPE	NDICE

4.8	Mission statements and values, codes of conduct and internal principles relevant to economic, environmental and social performance, as well as the status of their implementation.	Additional information may be found at: http://www.galpenergia.com/EN/agalpenergia/ ogrupo/Paginas/MissaoeValores.aspx
4.9	Procedures of the highest governing body to supervise the identification and management by the organisation of economic, environmental and social development, including relevant risks and opportunities, as well as the adhesion or compliance with internationally agreed standards, codes of conduct and principles.	Chapter 03 – Page 24 CGR 2012 – Chapter II – Page 22-23
4.10	Processes for self-evaluation of the performance of the highest governing body, especially with respect to economic, environmental and social performance.	CGR 2012 – Chapter II – Page 22-23
Commi	ments with external initiatives	
4.11	Explanation of how the precautionary principle is treated by the organisation.	Chapter 04 – Page 27-28
4.12	Letters, principles or other initiatives developed externally of an economic, environmental and social nature which the organisation subscribes or endorses.	Chapter 03, 07, 08, 11 – Page 25; 52; 60-61; 74-75
4.13	Participation in associations (such as industry federations) and/or national/international defence organisms.	Galp Energia participates or is a partner in various national and international associations and bodies, such as: APETRO, APREN, Energyin, CONCAWE, AIPQR, CIP, CCIAP, WavEC, AdEPorto, ADENE, Europia, ATIEL, COTEC, ITG, APETRO, AGN, Marcogaz.
Stakeho	older participation	
4.14	List of the organisation's main stakeholders.	Chapter 12 – Page 79
4.15	Basis for identifying and selecting stakeholders.	The stakeholders were identified according to the criteria of Standard AA1000, namely criteria of influence, dependence, and responsibility, in order to identify the critical and key stakeholders.
4.16	Means of consulting stakeholders.	Chapter 12 – Page 79-85
4.17	Main issues and concerns raised by the stakeholders as a result of the consultation, and how the Organisation responds to these issues and concerns.	Chapter 12 – Page 79-85

An approach to management, objectives, performance, policies and contextualisation Page 15; 21-22; 24-25; 28-29; 70-71; 73.

Aspe	ct: economic performance	
EC1	Direct economic value created and distributed (including revenue, operating costs, donations and other community investments, retained earnings, and payments to suppliers of capital and governments).	Chapter 00 – Page 15
EC2	Financial implications and other risks and opportunities for organisation activities, due to climate change.	Galp Energia identified the financial implications and other risks and opportunities due to climate change. For more detailed information, please consult the response to the Carbon Disclosure Project 2012 questionnaire from Galp Energia, available at: https://www.cdproject.net/Sites/2012/42/7042/Investor%20CDP%202012/Pages/DisclosureView.asp:
EC3	Coverage of obligations regarding the organisation's benefit plan.	Chapter 00 – Page 15 AR&A 2012 – Chapter 06 – Page 70
EC4	Significant financial benefits received from the state.	Chapter 00 – Page 15
Aspe	ct: presence in the market	
EC5	Variation in proportion between the lowest salary and the local minimum wage, in the main operating units.	The average proportion between the lowest salary paid at Galp Energia and the national minimum wage is 2.85. Scope: main operating units of Galp Energia in Africa and Brazil.
EC6	Policy, practices and proportion of expenses to local suppliers (€k).	Galp Energia has no policy applied to local suppliers in the operating units. The policy is the same for all geographical areas where it operates. Whenever possible, a single, central contract is used for all companies and businesses. Chapter 12 – Page 83



Procedures for local hiring and proportion of members of upper management recruited from the local community in key operating units.

The hiring criteria are uniform for the Galp Energia Group, which, whenever possible, gives preference to internal competition. When we need to resort to the external market, at least three candidates are always considered.

Employees with top positions

Countries	Expatriates	Locals	Total employees	% of top positions held by individuals from the total community
Angola	3		3	0%
Brazil	5	9	14	64%
Cape Verde		45	45	100%
Spain	3	58	61	95%
Gambia	1	5	6	83%
Guinea-Bissau	1	4	5	80%
Netherlands	1		1	0%
Mozambique	3	4	7	57%
Swaziland	1	2	3	67%
Switzerland	1		1	0%

Aspe	ct: indirect economic impacts	
EC8	Development and impact of investments in infrastructures and services provided, essentially for public benefit through commercial commitment in genders or non-profits.	Galp Energia is in the process of joining the London Benchmarking Group, with this report showing the first financial year performed according to this methodology. Chapter 11 – Page 73-77
EC9	Identification and description of significant indirect economic impacts, including the extension of the impacts.	Chapter 02 and 11 – Page 22; 73-77

An approach to management, objectives, performance, policies and contextualisation Page 15; 21-22; 24-25; 28-29; 38-40; 48; 52.

	t: materials	
EN1	Consumption of raw materials.	Chapter 08 – Page 57
EN2	Materials used that are recycled waste from external sources.	Galp Energia does not use materials from recycling
Aspec	t: energy	
EN3	Direct consumption of energy, segmented by primary source.	Chapter 08 – Page 54-55
EN4	Indirect consumption of energy, segmented by primary source.	Galp Energia acquires electrical energy from the suppliers Galp Power and EDP. For more information on the primary energy associated with the production of electricity for each supplier, please consult the website for the Electricity Services Regulatory Entity (ERSE), available at: http://www.erse.pt/pt/desempenhoambiental/rotulagemenergetica/comparacaoentrecomercializadores/Paginas/default.aspx
EN5	Energy saved due to improvements in conservation and efficiency.	Chapter 06 and 08 – Page 38-40; 59
EN6	Initiatives to provide products and services with low energy consumption, or which use energy created by renewable resources, and the reduction in the need for energy resulting from these initiatives.	Chapter 06 – Page 38-40
EN7	Initiatives to reduce the indirect consumption of energy and the reduction achieved.	Chapter 06 – Page 38-40
Aspec	t: water	
EN8	Consumption of water, segmented by source.	Chapter 08 – Page 54
EN9	Sources of water that are significantly affected by water abstraction.	Not available.
EN10	Percentage and total volume of recycled and reused water.	Chapter 08 – Page 54
Aspec	t: biodiversity	
EN11	Location and areas of lands belonging to the organisation, leased or managed by it, in protected areas rich in biodiversity, outside the protected areas.	Chapter 08 – Page 60
EN12	Significant impacts of the activities, products and services of the organisation on biodiversity in protected areas and in areas rich in biodiversity outside the protected areas.	Chapter 08 – Page 60
EN13	Habitats protected or restored.	Not defined.
EN14	Strategies, existing measures and future plans for managing the impacts on biodiversity.	Chapter 08 – Page 60
EN15	Number of species on the IUCN Red List and on national conservation lists with habitats in areas affected by operations, listed by extinction risk level.	In studies of the assessment of environmental impact performed at the refineries, no significant impact was found in species included on the IUCN



Aspect	t: emissions, wastewater and waste	
EN16	Total emissions of greenhouse gases, direct and indirect, by energy source.	Chapter 06 and 08 – Page 44; 56
EN17	Other indirect emissions of relevant greenhouse gases, by weight.	Chapter 06 and 08 – Page 44; 56
EN18	Initiatives to reduce the emissions of greenhouse gases and the reduction achieved.	Chapter 06 and 08 – Page 38-40; 59
EN19	Emissions of substances that are destroyers of the ozone, by weight.	Galp Energia does not manufacture products that emit substances that destroy the ozone layer.
EN20	$NO_{x'}$ SO_{x} and other significant atmospheric emissions.	Chapter 08 – Page 56
EN21	Total of wastewater classified by quality and destination.	Chapter 08 – Page 54
EN22	Total quantity of waste by type and by treatment method.	Chapter 08 – Page 57
EN23	Number and total volume of significant spills.	In 2012, 21 occurrences were recorded of loss of containment, excluding gaseous losses, greater than 150 litres (total released and that reached the environment). The amount released that reached the environment was 44.8 m³, excluding gaseous losses and losses less than 150 litres.
EN24	Weight of waste transported, imported, exported or treated considered dangerous under the terms of the Basel Convention - Annexes I, II, III and VIII, and percentage of loading of waste transported internationally.	Not applicable.
EN25	Identification, size, protection status, and value of the biodiversity of sources of water (and respective ecosystems or habitats) significantly affected by the discharge and by the drainage of water performed by the relating organisation.	Water discharges are subject to licensing. We assume that compliance with the standards of discharge determines that there shall be no impact on biodiversity. On the other hand, Galp Energia monitors underground water and performs AQR, from which results the conclusion that there is no impact on ecosystems (see sustainability report 2009, page 87). Note: the preceding does not include Galp Internacional since Galp Energia does not have, at this time, information that would allow to affirm this.
Aspect	t: products and services	
EN26	Initiatives to mitigate the environmental impact of the organisation's products and services and the extent to which the impact can be mitigated.	Chapter 06 and 08 – Page 38-40; 59
EN27	Percentage recovered from products sold and their respective packaging.	According to European regulation, Galp Energia transfers responsibility for managing wastes from packaging and the respective valuation to an entity authorised for this purpose at the national level (see sustainability report 2008, page 67). These entities must comply with national recycling objectives.
Aspect	t: compliance	
EN28	Monetary value of significant fines and total number of non-monetary sanctions for failure to comply with environmental laws and regulations.	In 2012, nine infraction proceedings were filed directly related to the environment, the total amount of which is not available since there is wide range of amounts.
Aspect	t: transport	
EN29	Significant environmental impacts of the transport of products and other goods and materials used in the organisation's operations, as well as workers' transport.	Chapter 06 and 08 – Page 38-40; 44; 54-56
Aspect	t: general	
EN30	Total costs and investments for environmental protection, by type.	Protecting air quality and climate: €7,752,874. Waste water management: €5,144,101. Waste management: €1,860,956. Protection and recovery of soil, underground and surface water: €7,919,481. Protection against noise and vibration: €2,248. Other environmental protection activities: €5,123,128.

An approach to management, objectives, performance, policies and contextualisation Page 15; 21-22; 24-25; 28-29; 38-40; 48; 52; 67-68; 70-71; 73; 84.

Aspect: employment			
LA1	Total manpower by job type (full time or part time), type of work contract (full or part time) and by region.	Chapter 10 – Page 68	
LA2	Job creation and turnover per age bracket, gender and region.	Chapter 10 – Page 69	



LA3	Benefits for full-time employees, which are not attributed to temporary or part-time employees.	Mandatory benefits/conditions established in the Labour Code:
		 safety in the workplace/prohibition against wrongful dismissal; maximum length of working time; minimum rest periods; paid holidays and their respective subsidy; christmas bonus; minimum wage and payment for overtime; conditions for occasional assignment of workers; professional training; health and safety in the workplace; workplace accident insurance/right to reparation of damages arising from accidents in the workplace; protecting parental rights; labour protection for minors;
		 labour protection for minors; status of working student; equal treatment and non-discrimination; prohibition against harassment. Awards and variable remuneration: award for reduction of labour accidents; award for productivity (Galp Energia Group); award for productivity (Petrogal); variable remuneration (performance management system); spot bonus.
Aspect:	labour/management relations	
LA4	Percentage of employees covered by negotiation agreements.	The percentage of employees is 80.02%.
LA5	Minimum announcement period for changes in the operations of the reporting organisation, including whether it is specified in union agreements.	There is no minimum period for prior notice in relation to operating changes, and whenever there are changes, the employees shall be advised.
Aspect:	occupational health and safety	
LA6	Percentage of total manpower represented on health and safety committees, made up of managers and workers, who assist in monitoring and advising on occupational health and safety programmes.	The percentage of employees represented on health and safety in the workplace committees is 38.16%.
LA7	Type of injuries, days lost, absenteeism rate, and number of work-related deaths.	Chapter 09 – Page 65
LA8	Education, training, counselling, prevention and risk control programmes, to assist employees, their respective families, or members of the community, with regards to illness.	Chapter 10 and 11 – Page 68; 73; 77
LA9	Topics related to health and safety covered by formal agreements with trade unions.	More information may be found on page 70 of the sustainability report 2005-2006 at www.galpenergia.com.



Aspe	t: training and education		
LA10	Number of hours of training.	Chapter 10 – Page 69; 71	
	Number of participants. Number of hours of training per employee.	Average hours	
	Average hours of training per category profissional.	Executives	49
		Supervisors	62
		Managers	62
		Specialists	13
		Other	41
LA11	Programmes for managing skills and lifetime learning which support the employability of employees and assist them in managing career objectives.	Chapter 10 – Page 69-71	

Programme contents for competency management	Hours
Administrative and secretarial	456
Environment	192
Environment, quality and safety	8,348
Storage and logistics	35
Behaviour and leadership	15,613
Accounting and finance	5,195
Commercial management and marketing	18,536
General management	22,713
Legal	776
Languages	34,079
Quality	1,058
Human resources	1,384
Meetings and outdoors	199
Safety and health	16,644
Health, safety and environment	1,098
Seminars/conferences	4,481
Information technology systems	9,558
Technical	45,122

LA12	Percentage of employees who regularly receive performance and career development analyses.	The percentage of employees is 68.53%.
Aspect	: diversity	
LA13	Composition of management and the group responsible for corporate governance, proportion of men/women, age brackets, minorities and other indicators of diversity.	Chapter 10 – Page 68
LA14	Ratio between the average salary attributed to men, and the average salary attributed to women, in the same professional category.	This information is not included: Ratio of average RBA (F/M) Executive Level = 1.251 Ratio of average RBA (F/M) Management Level = 0.869 Ratio of average RBA (F/M) Non-management Level = 0.868

An approach to management, objectives, performance, policies and contextualisation Page 15; 21-22; 24-25; 28-29; 52; 73.

Aspe	t: investment and procurement practices	
HR1	Percentage and total number of significant investment contracts which include clauses referring to human rights or which were submitted to evaluations pertaining to human rights.	Chapter 03 and 12 – Page 25; 83 In 2012, Galp Energia introduced in the drafts of contracts a standard clause binding the counterparties, namely, partners, suppliers or others, to the provisions of the code of ethics and conduct of the Galp Energia Group. In the future it will be determined the percentage and total number of investments that include clauses regarding human rights or that have undergone assessments related to human rights.



HR2	Percentage of companies hired and critical suppliers which were submitted to evaluations referring to human rights and the measures taken.	Chapter 12 – Page 83 In 2012, Galp Energia introduced in the drafts of contracts a standard clause binding the counterparties, namely, partners, suppliers or others, to the provisions of the code of ethics and conduct of the Galp Energia Group. In the future it will be determined the percentage of critical suppliers and contractors that were assessed regarding human rights safeguards and undertaken measures.
HR3	Total number of hours of training in policies and procedures regarding relevant aspects of human rights for the operations, including the percentage of employees who benefited from training.	Galp Energia has no specific training programme for employees regarding the aspects of human rights.
Aspec	t: non-discrimination	
HR4	Total number of discrimination cases and the measures taken.	In 2012, there did not exist, or no suit was filed with the characteristics described.
Aspec	t: freedom of association and trade unions	
HR5	Operations identified in which the right to exercise freedom of association and collective bargaining could be significantly at risk and the measures taken to support this right.	There were none.
Aspec	t: child labour	
HR6	Operations identified as having a significant risk of using child labour and the measures taken to contribute to abolishing child labour.	Galp Energia does not feel that its activity has a significant risk of the occurrence of child labour.
Aspec	t: forced and compulsory labour	
HR7	Operations identified as having a significant risk of the occurrence of forced labour comparable to slavery and the measures taken to contribute to its eradication.	Galp Energia does not feel that its activity has a significant risk of the occurrence of forced or slave labour.
Aspec	t: practices and safety	
HR8	Percentage of safety personnel trained in policies and procedures regarding relevant aspects of human rights for the organisation's operations	Galp Energia has no specific training programme for safety personnel regarding the aspects of human rights.
Aspec	t: indigenous rights	
HR9	Total number of violations of the rights of indigenous populations, and actions taken.	In 2012, there did not exist, or no suit was filed with the characteristics described.

An approach to management, objectives, performance, policies and contextualisation Page 15; 21-22; 24-25; 28-29; 52; 67-68; 73.

Aspec	Aspect: community				
SO1	Nature, scope and effectiveness of any programmes and practices to evaluate and manage the impacts of operations on the communities, including entry, operation and exit.	Chapter 11 – Page 73-76			
Aspec	t: corruption				
S02	Percentage and total number of business units analysed regarding the risks associated with corruption.	In 2012, there was no suit with the characteristics described.			
S03	Percentage of employees trained in the organisation's anticorruption policies and procedures.	Chapter 03 – Page 25			
504	Activities in response to the occurrence of instances of corruption.	There were none.			
Aspect: public policy					
S05	Positions regarding public policies and participation in preparing public policies and lobbies.	Meetings with parliamentary groups from the Assembly of the Republic, meetings with local and municipal governments. Chapter 07 – Page 49 and 50			
506	Total amount of financial contributions and contributions in kind for political parties, politicians or related institutions.	There were none.			
Aspec	t: unfair competition				
S07	Total number of legal actions for reasons of unfair competition, anti-trust, monopoly practices and respective results.	There were none.			
Aspec	Aspect: compliance				
S08	Monetary value of significant fines and total number of non-monetary sanctions for failure to comply with laws and regulations.	87 offences that could reach €55,949.			

00 01 02 03 04 05 06 07 08 09 10 11 12



13

of capital and acquisitions.

Chapter 06 - Page 40

Chapter 08 - Page 60

Chapter 05 – Page 36 Chapter 05 – Page 36

Vented not available.

Not available.

An approach to management, objectives, performance, policies and contextualisation Page 15; 21-22; 24-25; 28-29; 52; 73.

Aspe	ct: consumer health and safety	
PR1	Phases of the life cycle of products and services in which the impacts on health and safety are evaluated aimed at improvement, and the percentage of products and services subject to these procedures.	With the entry into effect of new measures for checking the sustainability criteria imposed under Directive 2009/28/CE, for both Portugal and Spain, Galp Energia will continue its policy of using renewable fuels for its transport, also requesting information from suppliers on the sustainability of the biofuels acquired. For more information, see page 84 of the sustainability report 2010.
PR2	Total number of occurrences of non-compliance with legislation and voluntary codes related to the impacts of the products and services and consumer safety, by type of result.	There were none.
Aspe	ct: labelling of products and services	
PR3	Type of information on the products and services requested by the procedures, and percentage of products and services subject to these requests for information.	Galp Energia provides information on the dangers associated with the products it markets, as well as recommendations for their safe use, through safety data sheets and labelling instructions prepared according to legislation in effect and later placed on packaging. There is an internal procedure that regulates the preparation, obtaining and internal and external distribution of the safety data sheets and labelling instructions.
PR4	Number of occurrences of non-compliance with legislation and voluntary codes regarding information and labelling of products and services, by type.	In 2012, there was one occurrence.
PR5	Practices related to customer satisfaction, including the results of research on the issue.	Chapter 12 – Page 82 and 83
Aspe	ct: publicity	
PR6	Programmes for adherence to laws, standards and voluntary codes related to marketing communications, including advertising, promotion and sponsorships.	All marketing communications, including advertising promotion and sponsorships are within the legal framework of Decree-Law No. 300/90 of 23 October.
PR7	Total number of occurrences of non-compliance with legislation and voluntary codes regarding advertising and marketing, including advertising, information and labelling of products and services, by type.	18 offences for misleading advertising.
Aspe	ct: customer privacy	
PR8	Total number of complaints recorded regarding violation of customer privacy.	There were none.
Aspe	ct: agreement	
PR9	Monetary value of (significant) fines for failure to comply with laws and regulations regarding supply and use of products and services.	As to the amount of each offence, it has not yet been defined, since only a range of amounts has been established.
Aspe	ct: oil and gas sector supplement	
0G1	Volume and type of estimated proved reserves and production.	Chapter 05 – Page 30-35
0G2	Total amount invested in renewable energy.	The annual total amount invested in renewable energies by Galp Energia was €35,925,801. The investment in 2 nd generation biofuels represent about 90% of the total amount invested. The annual investment in renewable energies by Galp Energia represents 4% of the expenses of capital and acquisitions.

0G3

0G4

0G5

0G6

0G7

evaluated and monitored.

Volume of water produced.

Volume of flared and vented hydrocarbons.

Total of renewable energy created, broken down by source.

Amount of drilling residues and strategy for their disposal.

Number and percentage of relevant operational units in which the risk of biodiversity has been



OG8	Lead, benzene and sulphur content in fuels.	The Galp Energia refineries do not use lead in their fuels.
	zeog, serizene and sophial content in rocks.	in their fuels. The reduction of lead content in fuels implies the acquisition of crude oils with a lower sulphur content and/or the use of units that reduce the sulphur content in fuels. In 2012, construction was completed on a hydrocracker at the Sines refinery that will allow us to obtain diesel components with reduced sulphur levels (project guarantee below 9 ppm. In March 2013, will meet to produce diesel fuel with sulfur content below 1 ppm). The Matosinhos refinery also started out 2012 with a new Claus unit for sulphur recovery. For all fuels, the Galp Energia specification complies with applicable national limits for benzene and sulphur. In 2012 there was no change in the national specification for sulphur or benzene content of fuels. Galp Energia provides customers with safety data sheets for their products, which refer to their main physical and chemical characteristics, as well as safety and environmental aspects such as: identification of the dangers; first aid; fire fighting
		measures; measures to be taken in the event of accidental leaks; handling and storage; control of exposure/personal protection; toxicological information, ecological information; information regarding transport; exposure scenarios.
		Galp Energia notifies its customers of the estimated CO ₂ emissions associated with fuel consumption by providing this information on the detailed invoices. In the case of fuel marketed in filling stations, the detailed invoice is replaced by displaying the information on sign posts. The Galp Energia provides diverse information regarding marketed fuels, including, in different cases, information regarding emissions, consumption and vehicle protection, when applicable.
0G9	Operations where indigenous communities are present or affected by the activities of the company and specific ongoing strategies.	Not applicable.
0G10	Number and description of significant conflicts with local communities and indigenous populations.	Not applicable.
OG11	Number of facilities that were dismantled and/or are in the process of being dismantled.	Galp Energia has a standard procedure – NPG-038, that establishes the minimum HSE requirements to be applied in the processes of deactivating establishments/installations that are part of the Galp Energia Group, proposing structures of deactivation plans and contents to be developed by the BU/MU and companies of the Group, adaptable to the characteristics and the risk associated with the establishments/facilities.
	Reporting complaints related to the dismantling (community) or notifications from the government regarding the dismantling.	There were none.
0G12	Operations where relocations occurred and the number of families relocated and a description of how their lifestyles were affected in the process.	There were none.
0G13	Number of safety events in the process, by type of activity (refining, upstream, etc.)	Safety events in the process – Tier 1: 5. Safety events in the process – Tier 2: 18.
0G14	Volume of biofuels produced and purchased which comply with sustainability criteria.	In 2012, Galp Energia did not have its own production of biofuels. Chapter 06 – Page 38; 39; 42

0 01 02 03 04 05 06 07 08 09 10 11 12 13



14.3 Appendix III – Status of the list of commitments for the 2012 sustainability strategy

Strategic priority	Initiative/action	Goal	Execution status
	Creation of a Sustainability Committee composed of representatives of the different offices of Galp Energia; definition of duties, values, commitments, meetings, among others (see chap. 02).	2012	Completed
HSE	Adhere to the Company code of conduct and national HIV initiative in the context of the Labour Platform against AIDS (see chap. 11).	2012	Completed
	Establish and communicate objective demands of HSE (see chap. 07).	Continuing action	Completed
	Implement the BSC in the capacity of tools for monitoring and top management of the performance of the HSE (see chap. 07).	2012	Completed
	Process Safety – Implementation of API 754 – Process Safety Performance Indicators – to its full extent (see chap. 09).	2012	Completed
	Promote and audit implementation of the HSE management system of Galp Energia – G+ System (see chap. 07).	2012	Completed
	Keep updated the inventory of dangerous substances and review the internal regulation, according to the REACH regulation (see chap. 09).	2012	Completed
	Initiate risk assessment associated with the use of water in the activity of Galp Energia and measure the respective impacts, in order to support the development of a strategy of water management in situations of water crisis or risk of scarcity (see chap. 08).	2012	Completed
	Prepare a guide for managing biodiversity at Galp Energia, identifying best practices, metrics, methodologies and principles; publish the characterisation of the impact on biodiversity of the operating areas considered critical (see chap. 08).	2012	Completed
Ethics and conduct	Include clauses in the drafts of contacts entered into by the companies of the Galp Energia Group with suppliers, service providers and other partners, requiring them to comply with the code of ethics and conduct of Galp Energia, to fight corruption and safeguard human rights (see chap. 12).	1 st quarter 2012	Partially completed
	Perform auditing plan to comply with code of ethics (see chap. 03).	2012 and subsequent years.	Partially completed
	Include, in the training plan for all Galp Energia employees, a specific model on the code of ethics, fighting corruption and safeguarding human rights (see chap. 03).	2012	Partially completed
	Complete the process of adhesion to the UN Global Compact (see chap. 03).	2012-2013	Partially completed
Climate change	Implementation of the strategy of Galp Energia for climate change presented in chapter 06 (see chap. 06).	Continuing action	Partially completed
	Communicate and operate the plan of adaptation to climate changes of the facilities of Galp Energia (see chap. 07).	2012	Completed
	Increase the importance of natural gas in the portfolio of exploration and production of Galp Energia (see chap. 05).	2012 and subsequent years.	Completed
	Calculate and disclose the carbon footprint of Galp Energia (see chap. 06).	2012	Completed
	Submit publicly the questionnaire of the CDP, from the date in the sustainability report (see chap. 00).	2012	Completed
Stakeholders	Relationship with customers		
	Implementation of the programme Voz do Cliente, through systematic surveying of customers (focus groups, meetings with customers and resolving complaints).	2012	Partially completed
	Adaptation of the customer loyalty programme to the context of the increase in energy prices and its weight on the customers' budgets (see chap. 12)	2012	Completed
	Establishing quantitative goals and objectives for customer satisfaction such as KPI in customer relations management (CRM).	2012	Completed
	Systematic analysis of satisfaction of Galp Energia customers in all relevant business areas, in the countries where it operates.	2012-2013	Completed
	Approximation to communities		
	Raising awareness of Galpshare on social networks (Facebook), to reduce mobility costs through a system of car pooling (see chap. 12).	2012	Completed
	Applying a matrix of assessment of the social responsibility and volunteer projects, implementing also the methodology of the London Benchmarking Group (see chap. 11).	2012	Partially completed
	Promoting the programme of Galp Voluntária business volunteers, aimed at four major action points: education, environment and energy efficiency, health and well-being, and road safety.	2012	Completed
	Objective of reaching 500 volunteers and 5,000 volunteer hours, by the end of the year (see chap. 11). Progressively expand social responsibility actions to all regions where Galp Energia operates directly	2012 Continuing action	Completed Completed
	(see chap. 11). Guarantee support to national and international projects of importance in the field of health aimed	Continuing action	Completed
	at the well-being of the communities where Galp Energia operates (see chap. 11). Develop a long-term programme, named APR, aimed at changing road behaviour, increasing road	23.1	zompreteo



Strategic priority	Initiative/action	Goal	Execution status
Stakeholders	Stakeholder involvement		
(cont.)	Promote the involvement of stakeholders in all projects in the area of social responsibility – 30, in APR – and Galp Voluntária – 25, in special actions (see chap. 11).	2012	Completed
	Develop a programme to promote consultations, visits and informal meetings with the community in activity locations (see chap. 11).	Continuing action	Completed
Human capital	Continue the work plan of definition and implementation of human resources policies in the various affiliates in Africa, encouraging transversality, predictability and transparency (see chap. 10).	2012-2013	Completed
	Development and increasing use of the e-learning model, namely through an Intralearn platform (see chap. 10).	2012-2014	Completed
	Define annual goals for the satisfaction level of employees, continuing to promote climate surveys (see chap. 10).	2012	Completed
	Broadening the evaluation system to 360° to all employees with duties of team leadership (see chap. 10).	2014	Completed
	Continue with the investment in programmes of health training, safety and the environment, and the implementation of courses in classroom environment, b-learning and e-learning (see chap. 10).	Continuing action	Completed
	Guarantee attendance at the advanced training course in Management at the Galp Energia Academy by upper management and eligible employees with high potential, aimed at developing future leaders (see chap. 10).	2015	Completed
	Guarantee the development of new competences or the strengthening of existing ones in technical and critical functions for the organisation, through advanced training courses at the Galp Energia Academy, in partnership with well-known universities for the subjects in question (see chap. 10).	Continuing action	Completed
Innovation	Definition and implementation of the strategic R&D plan for research and development in Brazil (investment of approximately \$30 m in a 5-year period) (see chap. 13).	2012-2016	Completed
	Development of the R&D Centre for Refining of Galp Energia, in partnership with universities (see chap. 13).	2012-2013	Completed
	Present the Galp Innovation Network, through social networks (Facebook, LinkedIn) for defined groups of users (see chap. 12).	1 st quarter 2012	Completed
	Creation of a nucleus of R&D for fuels, in partnership with universities (see chap. 13).	2012	Partially completed
	Structure an internal management system for relations with the SCT (see chap. 12).	2012	Completed



14.4 Appendix IV – Abbreviations, initials and acronyms

€: Euro.

€k: thousands of euros. **€m**: millions of euros. **\$:** American Dollar.

ADENE: Agência para a Energia (Portugal's agency for energy). ADEPORTO: Agência de Energia do Porto (Oporto's agency for energy)

AGN: Associação Portuguesa das Empresas de Gás Natural (Portuguese Association of Natural Gas Companies).

AGU: autonomous gas unit.

AICEP: Agência para o Investimento e Comércio Externo de Portugal (Portuguese Investment and External Trade Agency).

AIPQR: Associação das Indústrias da Petroquímica, Química e Refinação (Industries Association of Petrochemicals, Chemicals and Refining).

ANP: Agência Nacional do Petróleo, Gás Natural e Biocombustível (Brazilian national agency for oil, natural gas and biofuels).

APA: Agência Portuguesa do Ambiente (Portuguese Environmental Agency).

APEC: Asia-Pacific Economic Cooperation.

APETRO: Portuguese Petroleum Company Association.

API: American Petroleum Institute.

APR: Aliança para a Prevenção Rodoviária (Alliance for Road Safety and Prevention).

APREN: Associação Portuguesa de Energias Renováveis (Portuguese Association for Renewable Energies). **ATIEL:** Association Technique de l'Industrie Européenne

des Lubrifiants. **bbl:** oil barrel.

bcm: billion cubic metres.

bnboe: billion barrels of oil equivalent.

bnbbl: billion barrels. **BSC:** balanced scorecards.

BU: business unit.

CBC: Competências-Base de Chefias (Basic Skills for Managers).

CCGT: combined cicle gas turbine.

CCIAP: Câmara de Comércio e Indústria Árabe-Portuguesa (Chamber of Commerce and Industry Arabic-Portuguese).

CCS: carbon capture and storage.

CDLI: Carbon Disclosure Leadership Index.

CDP: Carbon Disclosure Project. **CEC:** Coordinating European Council.

CEO: chief executive officer.

CIP: Confederação Empresarial de Portugal (Business Confederation of Portugal).

CLP: classification, labelling and packaging.

CMRA: Centro de Medicina de Reabilitação de Alcoitão (Centre for Rehabilitative Medicine of Alcoitão).

co₃: carbon dioxide.

CO₂e: carbon dioxide equivalent.

COMET: transport infrastructure for CO₂ in the Western

Mediterranean.

CONCAWE: European Association for Environment, Health and Safety in Refining and Distribution.

COSO: Committee of Sponsoring Organizations of the Treadway Commission.

COTEC: Associação Empresarial para a Inovação (Business Association for Innovation).

CRC: Centros de Relacionamento com o Cliente (Centres for Customer Relations).

CRM: customer relations management. **CSA:** chemical safety evaluation. **CWT:** complexity weighted tonne. **DeMac:** Degolyer and Macnaughton.

DGEG: Directorate-General for Energy and Geology.

DJSI: Dow Jones Sustainability Index. **DUAT:** right to use and benefit from land.

E&P: Exploration & Production.

EBIT: earning before interest and taxes.

EBITDA: earning before interest, taxes, depreciation

and amortisation.

ECHA: European Chemicals Agency.

ECSI: European Customer Satisfaction Index.

EII: Energy Intensity Index.

EITI: Extractive Industries Transparency Initiative.

EMS: Energy Management System.

ENAAC: Estratégia Nacional de Adaptação às Alterações Climáticas (National Strategy for Adaptation to Climate Change).

ENH: Empresa Nacional de Hidrocarbonetos (National Hydrocarbon Company).

EPIS: Associação de Empresários pela Inclusão Social (Entrepreneurs Association for Social Inclusion).

EQS: environment, quality and safety. **ERSE:** Electricity Services Regulatory Entity. **EU ETS:** European Union Emissions Trading Scheme. **EUROPIA:** representative of the European oil industries.

FAI: Fundo de Apoio à Inovação (innovation incentives system).

FAME: fatty acid methyl esters.

FCUL: Faculdade de Ciências da Universidade de Lisboa. **FEUP:** Faculdade de Engenharia da Universidade do Porto.

FLNG: floating liquefied natural gas unit. **Foundation:** The Galp Energia Foundation. **FPSO:** floating, production, storage and offloading.

G&P: Gas & Power.

Galp Energia: Galp Energia, SGPS, S. A., Group or Company.

GHG: greenhouse gases. **GIIP:** Gas Initially In Place. **GRF:** gas receiving facilities. **GRI:** Global Reporting Initiative.

GRMS: gas regulation and metering station.

Gt: gigatonne. **GWh:** gigawatt-hour.

HPOP: Human Potential Operating Programme.

HR: human resources.

HRT: HRT Participações em Petróleo, S. A. **HSE:** health, safety and environment.

HWU: Heriot-Watt University.

IBAMA: Instituto Brasileiro do Meio Ambiente dos Recursos Naturais Renováveis (Brazilian Institute for the Environment and Natural Resources).

RDI: research, development and innovation.

IDMEC: Instituto de Engenharia Mecânica do Instituto Superior

IICT: Instituto de Investigação Científica e Tropical (Institute for Scientific and Tropical Pessarch)

for Scientific and Tropical Research). **IMSEQSE:** Integrated Management System for the

Environment Ovality Cafety and Energy

Environment, Quality, Safety and Energy.

IPIECA: International Petroleum Industry Environmental

Conservation Association.

IPSS: Instituições Particulares de Solidariedade Social (Private



Social Welfare Institutions).

IRC: Portuguese corporate income tax.

ISCTE-IUL: ISCTE – Instituto Universitário de Lisboa. **ISEL:** Instituto Superior de Engenharia de Lisboa.

ISPG: Instituto do Petróleo e Gás (Petroleum and Gas Institute).

IST: Instituto Superior Técnico.

ITG: Instituto Tecnológico do Gás (Gas Technology Institute). **IUCN:** International Union for Conservation of Nature.

JCL: Jatropha curcas Linn.

k: thousand.

kbbl: thousands of barrels.

kboepd: thousands barrels of oil equivalent per day.

kbopd: thousand barrels of oil.

km: kilometres.km²: square kilometre.

KPI: key performance indicators. **ktCO**₂: kilotonnes of carbon dioxide.

kton: thousand tonnes.

kV: kilovolt.kW: kilowatt.kWh: kilowatts-hour.LNG: liquefied natural gasLPG: liquefied petroleum gas.

LTIFR: Lost time injury frequency rate.

m: million.m²: square meters.m³: cubic meters.

Marcogaz: Technical Association of the European Natural Gas

Industry.

mbbl: millions of barrels.

mboe: million barrels of oil equivalent. **mbopd:** million barrels of oil per day. **millions of m³:** millions of cubic meters.

mmscf: billion cubic feet.

MSCR: management system for corporate responsibility.

mton: million tonnes.

mtpa: million tonnes per annum.

MU: management unit. **MW:** megawatt. **MWh:** megawatts-hour. **NG:** natural gas.

NGO: non-governmental organisation.

OIT: oil income tax.

OPAS: preventive safety and environmental observations.

OSH: occupational safety and health. **PEL:** petroleum exploration licence. **Petrobras:** Petróleo Brasileiro, S. A.

Petrogal: Petróleos de Portugal - Petrogal, S. A.

ppm: parts per million. **PS:** process safety.

PUE: power usage effectiveness.

QREN: Quadro de Referência Estratégica Nacional.

R&D: research and development. **R&M:** Refining & Marketing. **RCA:** replacement cost adjusted.

REACH: Registration, Evaluation, Authorisation, Restriction

of Chemicals.

RES: renewable energy sources. **RNBC:** National Low Carbon Roadmap.

ROI: return on investment. **RS:** regulatory standard.

RSPO: Roundtable on Sustainable Palm Oil. SAM: sustainability asset management. SAP: Systems, applications, and products. SCC: Sociedade Central de Cervejas. SCT: Science and Technology System. SHE: Safety, healtly, environment. SME: small and medium enterprises.

Tcf: trillion cubic feet.

tCO₂: tonnes of carbon dioxide. **tCO₂e:** tonnes of CO₂ equivalent.

TMA: Tarfaya Marin-A.
ton or t: tonne.
TWh: terawatts-hour.
UA: Universidade de Aveiro.
UBI: Universidade da Beira Interior.

UNEP: United Nations Environment Programme.

UNESP: Universidade Estadual Paulista.

UNICAMP: Universidade Estadual de Campinas.

VBU: visbreaker unit. **VDU:** vacuum distillation unit.

WBCSD: World Business Council for Sustainable Development.





TEXT REVISION **Letrário**

UNCREDITED PHOTOGRAPHS THROUGHOUT THE REPORT

Manuel Aguiar

DESIGN AND CONCEPTION

Plot Content

Revised on July 11st, 2013



Galp Energia, SGPS, S. A.Public Company
Corporate Strategy and Investor
Relations Division

Rua Tomás da Fonseca, Torre C 1600 – 209 Lisboa Tel.: +351 217 240 866

Fax: +351 217 242 965

e-mail: investor.relations@galpenergia.com

www.galpenergia.com