This report describes RasGas’ activities in the financial and calendar year 2013 and provides an account of actions and performance data relating to a range of business, economic, environmental and social issues which make up our sustainability performance.

The report, which is our fifth annual sustainability report, has been prepared in accordance with reporting guidelines issued by Qatar Petroleum (QP). As such, it takes account of sustainability reporting guidance specific to the oil and gas industry prepared by the International Petroleum Industry Environmental Conservation Association (IPIECA) and the Global Reporting Initiative (GRI). It includes a focus on the theme of governance, as requested by QP this year.

RasGas was proud to be the first Qatari energy company to issue a sustainability report, in 2009. In 2013, we were delighted to receive first prize for the second year running in the large company category for sustainability reporting under the QP Sustainable Development Industry Reporting initiative.

We have taken new initiatives to develop our reporting processes and improve the report content. We have extended our reporting online, including a new Arabic version in addition to the Arabic printed report. We have carried out a more formal materiality assessment to determine the content and depth of reporting, and have had the report independently assured for the first time. We have adopted the Global Reporting Initiative G3.1 reporting guidelines.

This report contains safety and environmental benchmark data up to 2012 from the International Association of Oil and Gas Producers (OGP) and Phillip Townsend Associates (PTAI). However, the benchmark data for 2013 was not published in time for this report but will be incorporated in our future reporting when available.

We welcome your feedback. If you would like to contact us, please do so at: sustainability@rasgas.com.qa

April 2014
Embracing our responsibilities
Sustainability Report 2013

About this report
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April 2014
## 2013 performance against commitments: at a glance

### Fatalities (contractors)
- 2009: 1
- 2010: 0
- 2011: 0
- 2012: 1
- 2013: 0

### Lost-time injuries (contractors)
- 2009: 7
- 2010: 2
- 2011: 2
- 2012: 3
- 2013: 1

### Lost-time injury rate indicators

<table>
<thead>
<tr>
<th>Year</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>Performance</td>
<td>0.09</td>
<td>0.1</td>
<td>0.03</td>
<td>0.03</td>
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</tr>
<tr>
<td>StRate</td>
<td>0.01</td>
<td>0.02</td>
<td>0.02</td>
<td>0.02</td>
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</table>

### Total recordable injury rate

<table>
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<tr>
<th>Year</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
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</thead>
<tbody>
<tr>
<td>Performance</td>
<td>0.13</td>
<td>0.16</td>
<td>0.09</td>
<td>0.08</td>
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<tr>
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<td>0.00</td>
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<td>0.00</td>
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### Number of process safety observations per person

<table>
<thead>
<tr>
<th>Year</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
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<tbody>
<tr>
<td>Performance</td>
<td>65</td>
<td>43</td>
<td>27</td>
<td>28</td>
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<tr>
<td>StRate</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

### Nitrogen oxides emissions (CO2 equivalent emissions in tonnes)

<table>
<thead>
<tr>
<th>Year</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>Performance</td>
<td>9.6</td>
<td>8.9</td>
<td>8.7</td>
<td>8.2</td>
<td>6.3</td>
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<tr>
<td>StRate</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

### Total greenhouse gas emissions (kilo tonnes)

<table>
<thead>
<tr>
<th>Year</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>Performance</td>
<td>31.2</td>
<td>30.5</td>
<td>33</td>
<td>33</td>
<td>34.6</td>
</tr>
<tr>
<td>StRate</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

### Cautionary statement

This sustainability report by RasGas Company Limited contains statements relating to the manner in which RasGas intends to conduct its activities in the future, based on management’s current plans and expectations. These statements are not promises or guarantees of future conduct or policy and are subject to a variety of uncertainties and future circumstances, many of which are beyond our control. Therefore, the actual conduct of our activities, including the development, implementation or continuation of any programme, policy or initiative discussed in this report, may differ materially in the future. The statements of intention in this report speak only as of the date of this report. RasGas undertakes no obligation to publicly update any statements in this report. References in this report to other reports or materials, such as a website address, have been provided to direct the reader to other sources of information which may be of interest, but such information does not form part of this report.
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Embracing our responsibilities
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3 Our people
   Community engagement
4 Our approach to reporting
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Foreword

The theme RasGas has chosen for this year’s sustainability report is ‘embracing our responsibilities’. It lies in well with the State of Qatar’s Ministry of Energy and Industry’s focus on the topic of governance for all company sustainability reports this year. It also enables us to discuss and illustrate how RasGas approaches its business and is continuing to make a valuable contribution to the goals of the Qatar National Vision 2030.

RasGas’ firm foundation of management systems and processes, coupled with the professionalism and experience of its people, helps to make sure the organisation operates effectively and with integrity. A clear vision and a robust framework of values, policies, procedures, controls, and training underpin the company’s success – giving clarity and rigour to all aspects of day-to-day business.

The core strength has enabled RasGas in 2013 to continue building on its strong performance of previous years to maximise value from Qatar’s oil and gas resources and generate revenue for the state while developing people for the future, protecting the environment and supporting local communities.

The company demonstrates responsibility in all its operations and projects, operating safely, improving environmental performance, and creating opportunities for Qatari nationals who are still studying, embarking on their careers or progressing beyond mid-career. RasGas offers many opportunities to a diverse range of talented and experienced professionals who are becoming part of the growing body of people with the qualifications and character to make a positive contribution to Qatar’s future growth.

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Responsibility includes actively planning for the future. As described in this report, business success and sustainability are inextricably linked for RasGas. This includes recognising people as the most important asset of RasGas, including all employees, contractors and subcontracts, whose safety, health and welfare comes first, whether they are working in operations or projects. By protecting and developing people, by safeguarding the environment, and by operating reliably and cost-effectively, the RasGas strategy provides the pillars for a truly successful and sustainable business. The company looks forward to continuing to contribute in the years ahead.

His Excellency Dr Ibrahim B Ibrahim
Vice Chairman of RasGas Board of Directors

Introduction

RasGas can trace its origins to the establishment of Ras Laffan Liquefied Natural Gas Company Limited in October 1993 and in just two decades we have become a global energy company with a solid reputation for reliability, deliverability and safety. It has been a journey of excellence, the result of remarkable vision, sound governance and talented people.

We continued our track record of success in 2013. A good example was the inauguration of the Helium 2 project in December, making Qatar a key exporter of helium to the world. I’m extremely proud that this project was completed on time, safely and within budget. It is testimony to the rigour of our management approach, the professionalism of our people and all the contractors who worked on it.

We also made excellent progress on the Barzan Gas Project. All drilling activity was completed, and with the arrival of our three wellhead topsides and additional living quarters, the safe installation of the offshore facilities was completed on schedule. In December 2013, the project passed the milestone of 100 million man hours without a lost time injury – a remarkable achievement. We believe this performance is founded on cutting-edge safety management programmes executed in a systematic and disciplined manner.

We are, and will continue to be, a reliable supplier of LNG to our customers around the world. We had four lost-time injuries in more than 116 million man-hours of work and continued to address climate change and other environmental impacts by making further reductions in our flaring and other emissions. We are working to achieve even better levels of performance in these areas.

We have always paid careful attention to the wellbeing of our workforce. In our activities, we have defined controls, regulatory standards and processes that set out core requirements and we work closely with our contractors to see that these measures are applied in principle and in practice, whether people are on site, in the office or away from work.

Care for people – employees, contractors, or members of the community – is one of our core values. We have made further progress on Qatarization, with Qataris making up more than one-third of our workforce. We also continue to enhance the leadership skills of all those in management positions, with an executive leadership programme, which will be launched in 2014.

In the community, we continue to support a wide range of projects that address education, health, the environment and social need.

Our aim is to improve the RasGas Sustainability Report every year. We were pleased that our last report received the first prize for large companies in the 2013 sustainable development industry reporting awards, for the second consecutive year. This year’s report has been independently assured for the first time, giving increased confidence in our information and data for management and stakeholders. Our readers will also welcome the new online Arabic version of the report, which supplements our existing print and online versions.

As always, we welcome your feedback.

Hamad Rashid Al Mohannadi
Chief Executive Officer
We highlight some of our most significant achievements in 2013 and important challenges we face in the future.

Achievements

Safety performance
Our excellent record on personal and process safety continued in 2013, with no employee or contractor fatalities and a lost-time incident rate consistent with our industry-leading performance of previous years. The Barzan Gas Project passed the milestone of 100 million man-hours worked without a lost-time incident. We reduced the number of tier 1 and tier 2 process safety incidents to a record low. While proud of these results, we recognise the need to continue to drive down the number of incidents to zero.

Effective operations
We continued our strong track record of production, with output of 37 million tonnes of LNG for 2013. We achieved our highest ever operational reliability, at more than 99 per cent, and had an excellent record of reliability in delivering products to customers.

Barzan Gas Project
We made good progress with the Barzan Gas Project, completing the delivery of the offshore facilities on schedule. The first train is planned to come on stream as planned in 2014.

Helium 2 inauguration
We successfully inaugurated the Helium 2 plant in December 2013, making RasGas one of the world’s key helium producers and exporters. This project, undertaken with our commercial partners, was delivered safely and in a timely manner.

Reduced flaring
We continued to reduce our flaring emissions, within our second five-year flare minimisation plan. The reduction contributed to a decline in our total greenhouse gas emissions in 2013. We were delighted to receive the Qatar Oil and Gas Industry HSE Excellence Gold Award for our waste-management technology in 2013.

Community engagement
We supported a wide range of projects to address needs in the community, with a particular focus in 2013 on education.

Challenges

Worker welfare
We are aware of the issues raised by non-governmental organisations and the media over worker welfare in Qatar, particularly among immigrant labour working on large-scale infrastructure projects. We have well-established programmes in place that provide for worker health and safety, but it remains a challenge to see that all contractual provisions and initiatives already in place are successfully implemented in the years ahead.

Maintaining excellence in a growing business
We recognise that continuing to meet demanding goals for our existing operations, while developing and inaugurating new projects of the scale of Barzan, will put increasing demands on our people and systems. We believe we have the experience and skills to achieve the goals we have set.

Contractor management
While we have robust contractual terms and programmes in place for managing our contractors (and their contractors in turn), we are aware of the need to be vigilant in our oversight and to ensure that safety, health and environmental programmes are effectively implemented.

Recruitment
It remains challenging to attract and recruit Qatari professionals and graduates because of the intense competition for talent within the local labour market and the lack of skilled engineers in the disciplines we need. These factors make the goal of achieving high levels of Qatarization a significant challenge in the years ahead.

IT security
We continue to implement measures to protect the business from cyber-attacks, including IT risk-management practices that build on our IT resilience project. The need for additional security has an impact on the way we work and the way we use technology in day-to-day business activities.
RasGas Company Limited (RasGas) is one of the world’s premier integrated LNG enterprises and has an enviable reputation for being a safe and reliable supplier of LNG that has transformed a regional resource into a key component of the global energy mix.

RasGas is a Qatari joint stock company with more than 3,700 employees, owned by Qatar Petroleum (70 per cent) and an affiliate of ExxonMobil (30 per cent). Located in Qatar, with headquarters in Doha, RasGas has production facilities in Ras Laffan to extract, treat, liquefy and export LNG around the world. RasGas has seven LNG trains in operation, with a total production capacity of 37.1 million tonnes per annum (Mta). RasGas also produces liquefied petroleum gas (LPG), gas condensate, liquefied helium, sulphur and natural gas liquids (NGLs).

Our approach to sustainability
RasGas believes that sustainable practices and business success are indissoluble, with a strong commitment to accountability and transparency in its business practices. By applying this sustainability framework to its strategic planning, business and operational activities, RasGas seeks to position itself as a transformative organisation and a driver of change in Qatar.

Our approach to sustainability is linked to the four pillars that underpin the Qatar National Vision (QNV) 2030. At the core of our approach is a commitment to:

• **Improving performance** – becoming a more profitable and competitive organisation by increasing the social and economic benefits of our activities and reducing their environmental impact
• **Strengthening relationships** – working with stakeholders and shareholders to address mutual needs and, by sound corporate advocacy with regulators, ensuring regulations supporting sustainable development are practical and capable of implementation
• **Integrity** – maintaining the highest standards in all our operations and in the conduct of our business
• **Integrating sustainable practices** – by accounting for performance using quantitative measures in an informed and transparent manner, we seek to demonstrate success in implementing environmental, social and economic programmes

Stakeholder engagement
RasGas recognises that it is accountable to stakeholders for its performance and acknowledges that its success depends upon understanding stakeholder interests and needs, and finding the most effective responses in collaboration with them. We have identified our stakeholders, assessed their priority issues and developed appropriate approaches for engaging with them – see table on page 11.

Sustainability as part of our strategy
RasGas’ planning process derives from the company vision, mission, values and winning proposition and is focused on four ‘strategic choices’: safety, health and environment; people; reliability and deliverability; and cost optimisation.

In each of these areas, goals are defined and incorporated within specific objectives. The company’s executives oversee the indicators that show whether progress is being made, carrying out quarterly business performance reviews. A key performance indicator scorecard balances financial and non-financial measures to show the relationship between the strategic choices, and is used to demonstrate to employees how they contribute to the company’s performance.

Our strategy is flexible in that business and market developments or regulatory measures can require changes to objectives and key performance measures.
The RasGas strategic choices

- First and foremost, we will continue to maintain our high level of achievement in the fields of safety, health, and the environment.
- The importance of our people is clearly reflected in our strategy and values – we operate in a competitive industry and we want to continue to be successful far into the future; people will always be at the heart of that success.
- We will continue to focus on improving our outstanding record of operational reliability. We will maintain superior project execution skills to complete the Barzan Gas Project and other projects according to plan.
- We will pursue cost optimisation opportunities while not compromising personal and process safety, environmental performance or plant reliability.

The four strategic choices relate to our sustainability approach on environmental stewardship and social progress, including:
- Protection of the workforce
- Capacity development of individuals and communities
- Meeting financial goals with eco-efficiency and environmental conservation

Table 1. RasGas' sustainability plan

<table>
<thead>
<tr>
<th>Sustainability elements</th>
<th>Relevant RasGas strategic choices</th>
<th>Selected objectives and initiatives</th>
<th>Progress against selected key indicators</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safety, health, and environment</td>
<td>Achieve world-class SHE results.</td>
<td>- Institutionalise RasGas golden rules of Safety.</td>
<td>- Lost-time injury rate of 0.01 in 2013, in line with previous year’s performance and third position in OGP benchmark for 2013.</td>
</tr>
<tr>
<td>Workforce</td>
<td>Attract, retain and develop a responsible and diverse workforce</td>
<td>- Improve value chain reliability to be best in class (from reservoir to customer).</td>
<td>- Zero reportable spills in 2013.</td>
</tr>
<tr>
<td>Society</td>
<td>Achieve world-class SHE results.</td>
<td>- Total production levels successfully maintained at 27 Mta per year.</td>
<td>- QHSE performance or plant reliability.</td>
</tr>
<tr>
<td>Governance and management systems</td>
<td>Achieve world-class SHE results.</td>
<td>- Total production levels successfully maintained at 27 Mta per year.</td>
<td>- Zero reportable spills in 2013.</td>
</tr>
</tbody>
</table>

Economic

- Reliability and deliverability - Cost optimisation and price competitiveness. | - Reliability and deliverability from reservoir to consumer. | - Total production levels successfully maintained at 27 Mta per year. |

Workforce

- Attract, retain and develop a responsible and diverse workforce | - Reliability and deliverability. | - Total production levels successfully maintained at 27 Mta per year. |

Society

- Effective execution of the Qatarisation strategy | - Effective execution of the Qatarisation strategy. | - Total production levels successfully maintained at 27 Mta per year. |

Goverance and management systems

- Cost optimisation | - Cost optimisation | - Total production levels successfully maintained at 27 Mta per year. |

RasGas has not previously documented a separate sustainability strategy, as the issues that would fall within it are already captured in the corporate plan. This is illustrated in the close correlation between the four strategic choices and the RasGas approach to sustainability.

The sustainability plan below, requested by Qatar Petroleum as part of reporting for 2013, includes objectives and initiatives that form part of the 2014–18 corporate plan. The elements included are those we consider most relevant to our approach to sustainability and external stakeholder concerns.

The opportunity to build Helium 2 came from the six new LNG mega-trains built at Ras Laffan since Helium 1 came on stream in 2005, four of which are operated by Qatargas. The sheer volumes of natural gas being processed and the fact that Helium 2 would have multiple upstream sources of crude helium made it possible for Qatar to be a uniquely reliable, high-volume and high-quality producer. This vision had driven the creation of Helium 1 and was instrumental in the decision to build Helium 2.

Helium 2 produced its first liquid helium in June 2013 and reached production at full design capacity in October. The project was completed with an exceptional safety record, and the plant incorporates technology that enables the recovery of 98 per cent of the helium in the raw feed supply. The project team included a substantial number of Qatari nationals, who worked on Helium 2 from the design phase onwards to be fully ready for start-up and to ensure a smooth transition to full production.

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Through a combination of pioneering spirit, technological excellence and sheer commitment, Qatar is now the largest helium exporter in the world.
We are also following developments in new LNG markets, including its increased use as a transportation fuel, notably in the long-haul trucking sector, where LNG can be cheaper than diesel and produces lower greenhouse gas emissions. In the US, for example, a number of companies are beginning to use natural gas vehicles. This move is being further stimulated by the development of a coast-to-coast network of filling stations and by favourable tax and regulatory structures adopted by policy makers. We also support the prospective use of LNG in other important growth markets, including as a fuel for shipping, where tightening legislation on emissions and increased oil prices make LNG an attractive alternative to traditional liquid bunkers.

It is clear that the LNG market is evolving rapidly. This is opening growth opportunities in new markets, as new entrants develop and lead new commercial concepts. As the industry matures, existing suppliers must remain focused on providing secure deliveries. With our established and world-class supply chain, RasGas remains focused on doing exactly that.

Our economic contribution
RasGas’ economic contribution to the State of Qatar is extensive, and brings benefit to many stakeholders and supports the ‘economic development’ pillar of the QNV 2030. In addition to the portfolio of energy products that RasGas supplies, this positive impact is made through the revenues the company generates for its shareholders, the payments it makes to government, the capital investments it makes in the State of Qatar, the jobs and financial compensation it provides for employees, and the support the company provides to the local economy by engaging local suppliers and contractors.

Direct economic contribution
The company’s economic contribution has grown as it has expanded capacity and production. RasGas works closely with the three major international ratings agencies and has maintained strong investment grade ratings with each of them on its issued bonds (Standard & Poor’s, A; Fitch, A+; Moody’s, AA3). RasGas has raised substantial funds in the bank and capital markets to fund the construction of its facilities over the years. This investment in production, and in particular the introduction of the two LNG mega-trains which became operational in 2010, has resulted in a commensurate increase in revenues, which have grown from US$11 billion in 2009 to nearly US$35 billion in 2013.

In addition to providing direct financial benefits for the state, RasGas provides financial support for a wide range of community investments in projects and initiatives that develop human and institutional capacity. For example, RasGas invests in long-term research at universities, supports specific initiatives such as road traffic police training, and provides first-class medical facilities for the Al Khor Housing Community. In addition, the RasGas corporate social responsibility (CSR) programme provides the time, expertise and commitment of its employees in support of diverse community projects.

Support for local suppliers
As well as delivering energy to RasGas’ customers, the RasGas value chain relies on a wide range of national and international suppliers. RasGas takes a number of steps to support local suppliers by, for example, giving preference to local goods and services in all RasGas contracts, providing the tender process complies with our strict commercial and ethical processes. In the past, we have run a supplier forum to provide local suppliers with the opportunity to learn more about RasGas and the opportunities open to them. We intend to run similar supplier events in the future.

In 2013, we placed more than 1,000 contracts for locally sourced services with more than 400 vendors, with a combined value of approximately US$4.495 million. We also spent over US$110 million on more than 4,700 orders for locally sourced goods.
Embracing our responsibilities

Our approach to sustainability involves embracing the wide-ranging responsibilities we face. The interests of our stakeholders are many and various, and we take a balanced approach to responding to and supporting their needs. We understand the importance of our role as a steward of resources made available to us by our country, our shareholders, and the community at large. We have embraced the responsibility to develop the country’s hydrocarbon resources, and have steadily grown the company’s capacity. By doing so, we have made a significant contribution to Qatar’s economic growth and prosperity.

Responsible operations

Our responsibilities are wider than economic. Ensuring the health and safety of our workforce is of prime importance, as is safeguarding the health and wellbeing of the community. Our management’s leadership, the efforts we make to raise awareness of risk, the encouragement we give to report unsafe acts and conditions without fear of consequence, and our ability to learn and adapt have all helped create a positive safety culture in the company. Coupled with the rigor of our management systems and processes, this supportive environment has helped us to achieve and sustain industry-leading safety performance over a number of years. We remain vigilant, however, and want to see our performance improve further.

RasGas’ operations are founded on minimising the environmental impact of our operations while producing and delivering the energy the world needs. We take a disciplined and systematic approach to protecting natural resources, as demonstrated in our ISO-certified management systems, which include a commitment to continuous improvement in environmental performance.

A vital part of responsible operations involves caring for people, including our employees and any others affected by our activities. RasGas adheres to the basic human values of dignity and respect for all individuals. The company does not tolerate harassment or intimidation in the workplace and its employee relations policy advocates the provision of a mutually supportive, respectful and productive work environment. A non-retribution and grievance system is in place to enable employees to raise instances of alleged mistreatment.

RasGas’ compliance with the laws of the State of Qatar includes adhering to laws prohibiting child and forced labour. While RasGas does not have a separate human rights policy, it is committed to conducting its business in compliance with all governmental laws, rules, regulations and applicable international conventions to which the State of Qatar is signatory.

In cases of alleged breaches of RasGas business conduct policies, the RasGas Ethics Committee has the power to conduct investigations and take disciplinary action up to and including contract termination, if required. The committee initiated and completed a number of investigations in 2013 and appropriate actions were taken, including, in some instances, disciplinary actions. RasGas Legal department is not aware of any claim that has been filed in Qatar against RasGas in 2013 alleging either a breach of any of the six RasGas policies – on ethics, conflicts of interest, gifts and entertainment, financial controls, tendering and contracting, and harassment or intimidation in the workplace – or a failure to meet any mandatory requirements under Qatari laws protecting the basic human values of dignity and respect for all individuals.

Fourteen business conduct policies lie at the heart of our business controls framework, covering topics such as ethics, gifts and entertainment, conflicts of interest, and tendering and contracting. We believe that our success in addressing stakeholder demands responsibly has been underpinned by a strong system of governance, founded on clear values and robust management systems and business processes. These are reinforced by positive leadership and effective training so that our values are integrated in day-to-day behaviour.

Our approach is reinforced by a commitment to transparency and integrity, which governs how we conduct our activities as a business and as individuals. For example, employees must declare instances of actual, potential or perceived conflicts of interest, and must report all offers and acceptances of gifts and entertainment to or from contractors, suppliers or customers where the actual or estimated value exceeds the amount stated in the policy guidelines. Political contributions using company funds, resources or premises are not permitted and cannot be made directly or indirectly to any political candidate or party in Qatar or elsewhere, except where such contributions are permitted by law and have been approved by the Board of Directors.

RasGas advocates responsible conduct and controls, and contributes to public policy development in areas where its expertise is valuable, such as climate change. For example, the company’s experience of acid gas reinjection has informed the Ministry of Environment on the potential for future emissions capture and storage. RasGas has also supported the Ministry of Interior in 2013 in establishing a trained road accident investigation branch to improve road safety in Qatar.

RasGas recognises the need to identify and manage the risk of bribery and corruption in all its business dealings. RasGas does not specifically analyse its business for corruption risk, but its internal control framework and business conduct policies address corruption-related risk. Any allegation of corruption is investigated in accordance with existing policies and procedures.
We accept responsibility to manage and execute our projects in a responsible manner, whatever their scale. The RasGas Elements for Excellence Management system (RGEMS) helps to guide project delivery within clear project timelines and ensures execution integrity.

For example, in the Barzan onshore project, our teams’ activities are guided by controls, regulatory standards and processes that set out core requirements. The project team works within clear project objectives and strategies that include sustaining a safe and incident-free culture, stewarding environmental management and action plans, and managing programmes for worker welfare.

A central part of the effort involves managing contractors, particularly the prime engineering, procurement and construction (EPC) contractor and the various subcontractors involved in construction. Requirements are defined in the EPC contract, and RasGas has the right to audit contractor performance at any time.

Scrubity is also carried out on issues such as worker’s rights and labour conditions. While the multinational and multicultural nature of the workforce – typically involving 40–50 nationalities – can make this complex, our contracts include detailed specifications to protect the safety, health, environment and security of every individual.

These EPC contracts provide instructions on how we expect work to be undertaken and define elements such as the nature and size of camp accommodation, site landscaping, required living space, laundry provision, the quality and quantity of recreational and sporting facilities, housekeeping and janitorial services, food standards and handling, pest control, and the provision of medical facilities. Complicant mechanisms for workers are in place. A worker wellness framework enables health screening to be carried out in our own medical facility. All buses for transporting workers to and from the site are air-conditioned, and all vehicles are equipped with in-vehicle driver-monitoring systems.

To put these provisions into action, we have developed, with our prime contractor, a wide range of camp-related procedures for safety, health, the environment and security. These include a camp health and welfare programme, an occupational hygiene programme which includes measures on hazard monitoring and control, a heat stress prevention programme and other initiatives in areas including camp operations and maintenance, security, risk assessment, and emergency preparedness and response.

We recognise that it is not sufficient to have provisions in contracts and programmes if these requirements are not observed in practice. We therefore carry out regular audits and inspections to ensure compliance. For example, a food safety and hygiene audit examines how far project-specific requirements are being met, as well as whether international standards are being properly applied. Audits can lead to findings that require corrective action, observations on weaknesses that require improvement, or recommendations for further improvement.

Sustainability Report 2013

Embracing our responsibilities

Responsible projects

14 Embracing our responsibilities

RasGas ethics policy

RasGas’ approach is one of strict observance of laws applicable to its business. Even where the law is permissive, RasGas chooses the course of highest integrity, recognising that a well-founded reputation for honest dealing is itself a valuable company asset.

RasGas seeks to ensure that employees understand that the company cares how results are obtained, not just that they are achieved through the policy. Employees are encouraged to act in an honest and ethical manner, to record all business transactions accurately and to be honest and open with RasGas’ internal and external auditors.

RasGas expects its employees to behave with integrity. This includes open and honest communications from employees at all levels, and compliance with RasGas policies, accounting rules and controls. RasGas supports, and expects everyone to support, any employee who declares an opportunity or advantage for RasGas that would compromise ethical standards.

RasGas expects its employees to report suspected violations of law or RasGas policies to management. When an employee has reason to believe that his supervisor is not complying with company policies, or he or she can contact the company’s Ethics Committee or the Chief Executive Officer in confidence. The role of the Ethics Committee is to provide guidance and make recommendations when issues of concern arise. Violations of the policies and defined security incidents are formally reported to the committee, which determines whether an investigation is required. The committee also manages any investigations. In accordance with the committee’s approach to grievance reporting and non-retaliation, a belief or concern expressed by an employee in good faith will not be held against them when reporting a possible ethical problem.
Governance structure
The Chief Executive Officer of RasGas has ultimate responsibility for the day-to-day management, direction and operation of the company, and oversees operational decisions affecting the business, such as the selection of personnel using direct hires, secondees or contractors.

Shareholders appoint the board members. His Excellency Dr Mohammed Bin Saleh Al Sada, the Chairman, and His Excellency Dr Ibrahim B Ibrahim, the Vice Chairman, are non-executive members of the Board, and provide leadership for the highest governance body of the company. Joint Venture Agreements and the Articles of Association ensure that the Board of Directors avoid any potential conflict of interest.

At Board meetings, which are held quarterly, senior management have the opportunity to communicate with the Board. Major financial decisions, such as new RasGas projects, are reviewed and approved by the Board. Board members are provided with regular reports from management to enable evaluation of the company’s performance and compliance with the business’s code of conduct. Committees created by the Board focus on specific areas of corporate governance. For example, the Audit Committee assists the Board in its oversight responsibilities by reviewing the company’s risks and risk management processes. In addition, it reviews the integrity of internal controls, corporate governance, accounting policies, financial statements, and financial reporting practices. The Audit Committee is backed by a formal audit charter, approved by the Board of Directors, which sets out its role and responsibilities.

As a partner with Qatar Petroleum and a significant shareholder in RasGas, ExxonMobil has made available its processes and management standards to help ensure operations integrity and support decision-making. These processes, which contribute to sound governance within RasGas, include management systems designed to promote operations integrity, proper business and financial control, and integrity in business conduct. A team of ExxonMobil employees based in Qatar actively engages with RasGas, monitoring business developments and providing support when necessary. ExxonMobil also offers technical and management expertise to RasGas through the secondment of ExxonMobil employees.

Through its management systems, RasGas strives continuously to improve in all its activities. The company has developed and implemented a number of programmes to drive performance improvement, from enhanced business controls to refining its safety, health and environment processes and procedures.

The internal controls framework
The RasGas internal controls framework exists to make sure that business is conducted in a disciplined way in accordance with laws, regulations, and RasGas’ policies and procedures. A sound framework and system of internal control assists compliant and reliable reporting, and enables risks to be managed, company assets to be safeguarded, and shareholders’ investments to be protected.

There are six principal components in the controls framework, which work together to ensure an effective controls environment.
RasGas’ business conduct policies

The 14 business conduct policies lie at the heart of the controls framework and apply to all employees (direct hires, secondees and individual contractors). Employees must declare each year, in a formal self-certification process, that they understand their responsibility to comply with the policies.

RasGas’ basic standards of control

These set out management principles, concepts and standards for an effective system of business control. Their emphasis is on financial and accounting matters, but the standards are all-embracing and prescribe the minimum control standards that should be embedded in policies and procedures.

Authorisation

A system of authorisation defines delegations of authority and the conditions. This involved a review of how RasGas staff are assessed their compliance with RasGas contractual terms and conditions. This involved a review of the IT resilience project in the light of the 2012 cyber-attack and a number of contractor and vendor audits.

Policies and procedures

A series of policies and procedures describes what should be done and how to perform business processes. They form an integral part of each employee’s day-to-day activities.

Compliance checks

Checks include audits and self-assessments, which evaluate the effectiveness of the controls framework and drive continuous improvement. Audits are performed by the RasGas Internal Audit department based on an approved audit plan. The department reports directly to the Audit Committee to ensure independence and objectivity. It is tasked with bringing a systematic, disciplined approach to evaluating and improving the effectiveness of risk management, control and governance processes. A yearly statutory audit is also conducted by independent external auditors to provide an opinion on the annual financial statements that are approved by the shareholders of the respective companies. Self-assessments are conducted by management made up of a group of individuals who are independent of the process being assessed but have knowledge of the work and required controls.

In 2013, the Internal Audit department carried out a wide range of work as set out in its approved annual audit plan. This included review of the IT resilience project in the light of the 2012 cyber-attack and a number of contractor and vendor audits to assess their compliance with RasGas contractual terms and conditions. This involved a review of how RasGas staff are managing contracts and contractors, as well as how the contractors themselves are managing people on site.

SEVENTH SENSE

SEVENTH SENSE is the ‘umbrella’ controls management system that ensures controls are proportionate to the risk and allows managers to evaluate the effectiveness of the entire controls framework.

RasGas uses SEVENTH SENSE as its primary tool for identifying and managing business, financial, regulatory, information sensitivity and commercial risks. It provides a structured, consistent approach to controls leadership, assessing business process risk, analysing controls steps required to mitigate specific exposures, ensuring appropriate controls training, managing changes in personnel and processes, checking compliance with policies and control procedures, and reporting control issues to management for effective and timely resolution. It contains seven elements:

- management leadership, commitment and accountability
- risk assessment
- business process analysis and improvement
- training and development
- management of change
- reporting and resolution of control weaknesses
- self-assessment

The Controls Committee, chaired by the Chief Financial Officer with representatives from each of the major business and support groups, meets each month to review SEVENTH SENSE activities and the status of control issues. The outcome is presented to the Chief Executive Officer and his Executive Leadership Team.

The primary feedback and verification mechanism for SEVENTH SENSE is the ‘element assessment’, which is conducted every two years to test and measure compliance with system requirements across the organisation. The assessment team for the latest assessment included representatives from all groups and a report was provided to each Chief Officer with their Group’s score, together with a summary of any non-compliance issues and recommended process improvements.

The overall company score showed an improvement over the prior assessment. All group scores were higher and a number of significant improvements were noted in individual element scores. In addition, to the regular tasks of monitoring compliance with the system, the Controls Committee sponsored a number of SEVENTH SENSE focus teams to facilitate controls improvement initiatives. These should ensure group scores continue to improve in the coming years as the system matures further and a high level of controls performance is maintained as part of the base business.

2013 SEVENTH SENSE focus areas included:

- The identification of key high-end business processes for audit and self-assessment, which cut across departmental boundaries and ensure interface issues are identified and assessed.
- The introduction of a refreshers controls training requirement to ensure controls awareness is sustained. A key component of this initiative was the roll-out of computer-based training modules to deliver training on the business conduct policies, business controls and information security. These significantly improved the efficiency and effectiveness of training delivery, and included completion of competency assessments to ensure that the content was adequately understood.
- Promotion of SEVENTH SENSE with a ‘controls minute’ competition to stimulate employee engagement across the company. Controls minutes are short presentation materials that can be used by managers in staff meetings to prompt discussion and enhance employee controls awareness.

Controls improvement initiatives are rolled out uniformly across the organisation via a network of group-control co-ordinators, who meet monthly and support the management within their group with SEVENTH SENSE-related activities.

Enterprise Risk Management

We extended our current risk management practices in 2013 by introducing an Enterprise Risk Management (ERM) framework.

The framework is a structured and co-ordinated risk management system, with emphasis on co-operation among groups. Its aim is to make sure that broad risks which cut across the business or which have business-wide impact are properly identified and addressed.

The approach will enable consistent assessment of operational, technical and business risks, and for the effect of aggregated risk to be considered from a comparative view across the organisation. ERM will allow us to see different levels and departments in the organisation working together, to integrate risk management within business decisions.

IT system resilience

As a result of the cyber-attack which affected operations in 2012, an information technology (IT) resilience programme was created to reinforce the governance structure for IT and direct a number of projects to prevent, detect, contain and respond to cyber threats.

In 2013, several IT services were successfully deployed with high standards of security while adding value to the business. Processes were implemented or upgraded to sustain the level of controls and manage risks, such as risk assessments and reporting the overall IT security position.
RGEE operations integrity

In its corporate safety, health, environment and security policy, RasGas commits to safeguarding human safety and health, conserving the environment and ensuring the security of its assets. This policy is put into practice through the 11 RasGas Elements for Excellence (RGEE), which form a proven management system framework of processes and procedures to address the inherent operational risks that could cause harm to people, the plant or the environment. The RGEE system complements the SEVEN™ SENSE management system, which controls business and financial risks.

The thinking behind RGEE is that risks can be minimized by a systematic risk assessment approach and management techniques. Effective leadership is vital, as are commitment and accountability. Accordingly, RasGas managers from the highest level down are charged with visibly supporting and leading RGEE.

RGEE addresses all operational activities within RasGas’ business with underlying principles and a set of expectations. Key focus areas include managing interfaces, process safety, regulatory compliance, stewardship of actions to closure, and embedding lessons learned from incidents.

All RGEE systems have a defined scope and objectives, roles and responsibilities, procedures, measurement indicators and a feedback loop to drive continuous improvement in operations integrity performance.

RGEE has provided the organisation with a means to operate its businesses safely, efficiently and cost-effectively, to enhance technical integrity, and to share best practices. To demonstrate businesses safely, efficiently and cost-effectively, to enhance technical integrity, and to share best practices. To demonstrate businesses safely, efficiently and cost-effectively, to enhance technical integrity, and to share best practices.

RGEE developments in 2013

RasGas conducts regular audits of RGEE, called RGEE Assessments. Their purpose is to determine the extent to which RasGas is meeting the expectations of the RGEE framework and guidelines as well as the requirements of each individual RGEE management system. Assessments are comprehensive exercises. In 2013, a 20-member team, with a cumulative 400 years of experience, spent two and a half weeks interviewing approximately 400 people, including individual system owners, administrators and users. They also conducted several verification interviews at operating sites in the field. The assessment identified seven successful work practices, such as work management, quality assurance, and emergency preparedness and response. A number of improvement areas were identified and have been prioritized. These form the basis of 2014 action plans for all RGEE systems, with a view to driving continuous improvement in the systems’ effectiveness.

Special focus was put in 2013 to upgrade the process for ensuring regulatory compliance. This was to make sure that compliance with applicable laws, regulations, permits, licenses, other legally binding requirements or agreements, codes, standards and practices is maintained. In addition to RGEE assessments, RasGas also conducts internal regulatory compliance audits to check how the compliance process is applied at field level. This comprehensive process is designed to ensure that RasGas receives no citations, fines or penalties for regulatory non-compliance. In 2013, RasGas received no fines or penalties for non-compliance.

The RGEE Academy

RasGas continues to provide training within the RGEE Academy to ingrain awareness among the whole workforce that RGEE is the way people work at RasGas. Academy courses cover four levels, addressing the needs of participants with different levels of experience and responsibility, from awareness-raising to mastery.

Level 4 training applies to personnel who require deep expertise in the system, such as those responsible for internal system assessments. Course content covers technical items such as the organisational context and purpose of RGEE assessments, and personal skills such as questioning techniques, listening and body language. The training also helps participants learn how to document and report an assessment observation, pristine and present assessment findings, and evaluate system performance based on status and effectiveness. Around 20 people undertook this programme in 2014.

Level 3 is conducted as an all-day discussion forum for leadership team members on topics such as risk management and operational integrity. In 2013, presentations focused on the results of an internal assessment of RasGas’ safety culture and developments related to process safety, covering key performance measures and regulatory plans for safety cases put forward by the appointed HSE regulator for our industry in Qatar.

"The RGEE Academy has provided me with a great understanding of how important RGEE is in conducting my daily work activities and as well managing the risks to ensure the plant is operated safely and reliably."

Khalid Al Dosari, Operations Panel Operator

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Applying RGEE to Barzan

A focus area in 2013 has been preparing the organisation for operating the new Barzan Gas Project Train 1 in 2014 and Train 2 in 2015. All RGEE systems teams prepared and started to implement readiness plans. RGEE will be the management system during operations, building on the RasGas project management system, which currently governs construction activities. RGEE will be in place before operations begin. There has therefore been a strong initial emphasis on areas such as emergency preparedness.

The current level 1 course is designed to give foundation knowledge of RGEE, enabling those involved to understand the system’s role and value, its basic framework, and how it can be implemented in their jobs. Training was provided to 130 operations personnel in sessions at RasGas and Barzan in 2013.
The health and safety challenge in our industry is significant, but RasGas’ steady focus on accident prevention, improving operating practices and health promotion has made the company an industry leader in health and safety performance.

Safety performance
We track our performance against personal and process safety indicators. These include lagging indicators which monitor past, unintended incidents such as lost-time injuries, and leading indicators which test the strength of our controls to prevent such events and encourage good safety behaviour.

We analyse each incident so that we can take action to prevent its recurrence.

Personal safety
In 2013, we sustained four lost-time incidents in our activities: two involved injuries from falls from ladders (one during boat work, one when a worker fractured his arm when it was caught between two sections of pipe). Our target of zero lost-time injuries remains.

The number of recordable injuries in 2013 increased to 88 from 30 in 2012, reflecting a significant increase in man-hours worked, which rose from 69.9 million in 2012 to more than 114 million in 2013. The majority of these hours were recorded on the Barzan construction project. Of these injuries, four resulted were more severe and resulted in lost-time (more than 1 day away from work), resulting in a lost-time injury rate (LTIR) of 0.01 for 2013. Our goal remains to have a workplace where no injuries occur.

Process safety culture
We continue to work to build a strong process safety culture in RasGas, learning from our own and other oil and gas industry process safety events.

The discipline of process safety deals with the prevention and control of incidents that have the potential to release hazardous materials and energy. It is a framework for managing the integrity of operating systems and processes handling hazardous substances by applying good design principles, engineering, and operating and maintenance practices.
Process safety

The presence of flammable hydrocarbons in the oil and gas industry is an intrinsic hazard with the potential to create major accidents that can have significant environmental, social and economic consequences. The discipline of process safety deals with the prevention and control of incidents that have the potential to release hazardous materials and energy. It is a framework for managing the integrity of operating systems and processes handling hazardous substances by applying good design principles, engineering, and operating and maintenance practices.

We continue to work to build a strong process safety culture in RasGas, learning from our own and other oil and gas industry process safety events.

The four-tier framework for monitoring, reporting and learning from process safety indicators that we introduced in 2010, based on industry guidance, is now firmly established. The most serious categories of process safety events — tier 1 and tier 2 — are reported and investigated formally, with root cause findings shared among line management and incorporated in work processes. In 2013, we had no tier 1 events and one tier 2 incident, an improved performance on industry guidance, is now firmly established. The most serious categories of process safety events — tier 1 and tier 2 — are reported and investigated formally, with root cause findings shared among line management and incorporated in work processes. In 2013, we had no tier 1 events and one tier 2 incident, an improved performance on safety risks to a level as low as reasonably practicable. In 2013, we undertook a series of risk mitigation initiatives following a quantitative risk assessment completed in 2012 for onshore facilities, which considered plant integrity and reliability programmes, historical process safety incidents data, quantification and modelling of risks to people, assets and the public against defined criteria. It also developed risk-reduction measures for a wide range of incident scenarios. Quantitative risk assessments and formal safety assessment studies are planned for the offshore facilities in 2014.

We continue to build our process safety expertise by capturing data on a monthly basis on tier 1 and tier 4 performance indicators. We are using this information to analyse trends and learn lessons. We have improved how we collect and analyse data and how we present this information using at-a-glance performance dashboards. Monitoring and evaluating tier 3 and 4 process safety indicators is key in improving performance measured by tier 1 and tier 2 incidents.

We shared our experience of developing process safety monitoring in the Forum on Operational Safety Challenges in Oil and Gas, hosted by the Best Practices Technical Committee of Qatar Petroleum’s Dukhan operations in January 2013, generating significant interest among other QP affiliates.

Facilities Integrity Management System (FIMS)

The FIMS team within our maintenance department is responsible for preventive maintenance at the Ras Laffan site. The team tackles problems such as failing equipment, and looks at the probability of future equipment failure, based on equipment design and history, and lessons from past experience. They close operations down to prevent issues, and find solutions when problems arise. While this can lead to short-term reductions in production, it helps to protect safety and reduce the number of tier 1 and 2 process safety incidents.

FIMS works under the RGEE system. In an internal RGEE assessment in 2012, FIMS achieved a very positive effectiveness rating.
Preventing major accidents

Major accidents typically lead to the review and revision of current practices and regulations. Following the Macondo incident in the Gulf of Mexico in 2010, the regulatory environment in Qatar includes requirements for more analysis and better documentation of facilities that could pose a major hazard, and that associated risks are managed.

We monitor developments in national regulation about the development of a major accident hazard (MAH) approach for onshore and offshore facilities, and engage with the HSE Regulations and Enforcement Directorate in developing the HSE technical framework and regimes. RasGas onshore and offshore facilities are all high-value assets and risks should be managed with the same high degree of rigor at all facilities to control major accident hazards effectively.

Experience shows that major accidents typically occur due to a combination of failures in processes, plant integrity and human activity. These factors can be seen as ‘barriers’ between a hazard and an incident: the right barriers can prevent a hazard from becoming an incident. To address the issue of failure of multiple barriers, we are piloting the development of ‘bow-tie’ diagrams for Bow-ties provide greater visibility to management that MAH risks are occurring, and measures in place to limit consequences.

Training is delivered through JGC and qualified trainers, who must meet a standard comparable to NEBOSH, the internationally recognised certificate in occupational safety and health. Fifty-seven SHE&S training courses are provided for more than 40 nationalities in five languages.

Approximately 28 per cent of the mostly minor injuries on the project have involved workers in the 25–30 age range, so new and inexperienced workers wear a white armband for two months, and younger workers are paired with more experienced colleagues.

Weekly management walkthroughs drive worksite hazard awareness and promote engagement between workers and supervisors, and JGC and subcontractors meet weekly to review any open actions. JGC hosts monthly SHE&S management meetings to review the status of the programme and to look ahead. Similar meetings are held quarterly with senior management.

Subcontractor management on the Barzan Gas Project

RasGas Venture oversees the safety, health, environment and security (SHE&S) management of JGC, the prime contractor on the Barzan project. With JGC, it also monitors the performance of subcontractors.

The safety provisions in place include adhering to set supervisors-to-worker ratios, which are increased for late and night shifts. Each subcontractor’s performance is evaluated against key indicators, and before a subcontractor can begin work on site, it must pass a SHE&S readiness review and demonstrate that its management system meets the requirements of the JGC safety management system.

Sharing lessons learned is very important. To date, JGC and its subcontractors have issued more than 500 SHE&S-related communications, including incident alerts, awareness bulletins, promotional posters, and examples of good and bad practice.

Figure 9. Preventing major accidents: the bow-tie approach

Road safety

We transport hundreds of employees and contractors by road every day, and recognise, as does the Qatar National Vision 2030, that road-travel risks in the country are significant. We have increased our efforts to raise safety awareness on the roads.

In 2013, we created a road safety management committee to oversee a pragmatic new approach to road safety and to contribute to better road safety throughout Ras Laffan Industrial City. We continued to install technology in our fleet to monitor how vehicles are being driven and to promote good driving habits. We also set up a new journey management centre to encourage drivers to gain more detailed insights into individual driver behaviour, and we completed a pre-certification audit for ISO 39001, the international standard for Road Traffic Safety Management Systems.

RasGas has also been working with the Ministry of Interior to create and train Qatar’s first Highway Patrol Police Force. Fifty officers have been trained to monitor highway traffic and investigate accidents. RasGas has contributed financially and has volunteered the expertise of its staff, who have more than 30 years’ experience in accident investigation and training.

Our commitment to safety training

We recognise the value of visible and strong safety leadership, particularly in setting the right example for employees and contractors. The importance the company attaches to safety leadership is evident in the RasGas Value of Safety.

Our safety leadership programme builds on these principles. Foundation training is given at the RasGas safety training centre, as are work management and other technical and developmental courses, which support our drive towards national capacity development and Qatization. Accrediting organisations include the British Safety Council, the Institute of Occupational Safety and Health and the National Examination Board in Occupational Safety and Health.

Leadership training includes modules linked to elements of ROSEE and to behavioural competences outlined in the company’s job families. The programme targets chief officers, managers, section heads and supervisors, aiming to develop the skills and knowledge of our leadership teams. To date, we have run four courses, including a pilot.

Figure 10. Road safety — the bow-tie approach

Responding to the road fatality in 2012

We have taken extensive action in response to a road traffic accident at Ras Laffan in 2012 in which a contractor was killed immediately after the accident. We carried out a detailed investigation, followed by more detailed study where necessary. Our goal is to make sure that such an incident never happens again.

Education We are seeking to improve driver training by introducing a 'driving for excellence' programme in addition to the existing defensive driving course. While defensive driver training focuses on driving skills, driving for excellence targets attitudes and behaviours, and addresses general road-safety hazards. It will be divided into three units: environmental, mechanical and human factors associated with driving.

We have extended the use of in-vehicle monitoring systems (IVMS) in company and contractor vehicles. IVMS can be likened to a behaviour-based safety system for drivers. If the driver exceeds predetermined parameters relating to speed, harsh braking and acceleration, an alarm sounds, allowing the driver to modify his driving. Over time, the changes become good driving habits. Each driver has a unique IVMS car key, enabling a monthly report that recognises good and bad driving behaviour.

Enforcement We have increased enforcement of site speed limits by internal officers using radar-speed guns.

Engineering A site-wide traffic engineering study has identified improvement opportunities. The segregation of pedestrians and vehicles, and the minimisation of the number of vehicles in process-facility areas, will benefit process and personnel safety.

Figure 11. Responding to the road fatality in 2012

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Safety Ambassadors

RasGas launched its Safety Ambassadors programme for students in 2010, part of its contribution to the goals of the Qatar National Vision 2030.

The programme recognises the risks faced by young people entering work for the first time, often with little experience, knowledge or skills. It also highlights the role of training and supervision in developing basic incident-detection and prevention skills, for the workplace and elsewhere. After the entry level programme, students can progress to the Level-1 award in Health and Safety at Work, a potential gateway to a career in occupational safety and health. In 2013, across 15 schools (including Qatari national schools), more than 200 entry-level awards were achieved and 71 students completed the Level-1 award. Many teachers and contract staff have also sought to gain the Level-1 award.

One school has added the programme to its curriculum: 16 students and some staff have progressed to the Level–2 award in fire-risk assessment.

Safety offshore

The offshore working environment presents risks that need to be managed to prevent incidents involving gas and oil releases, especially as gas releases in the confined spaces of a rig or platform could result in fire, explosion and potential impacts to the marine environment.

We emphasise that every task should be carried out safely. Our work management system provides tools and processes, such as job safety analysis, to help identify and manage workplace risks.

New developments offshore, such as new facilities for the Barzan Gas Project, create additional complexity, increasing activity levels and bringing new contractors offshore to carry out construction work and operations. We consider all aspects of their safety, from travel to daily work, and seek to ensure that new contractors participate in safety meetings, management walks and toolbox talks. We emphasise the need to adhere to 10 basic golden rules, monitoring performance and classifying incidents against them so that we learn and share safety lessons.

Pre-employment assessments

The primary aim is to recruit healthy individuals, in the interests of both potential employees and the company. We carry out the assessments – which help identify physical, sensory and perceptual medical disabilities which may influence work performance – in Doha and Ras Laffan. Of 175 people assessed at Ras Laffan in 2013, 10 were deemed unfit for work. Of 270 assessed at RasGas Headquarters, 20 were deemed unfit for work, due to conditions such as hypertension and colour blindness.

We also conduct periodic health assessments for existing employees and contractors.

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Medical screening programme

Our periodic medical screening programme uses age as a risk factor. The assessments evaluate health status and screen for risk factors, enabling timely preventative counselling and education on the benefits of a healthy lifestyle.

Safety-critical task assessments

Safety-critical task assessments ensure that employees who perform safety-critical tasks undergo health assessments before they take up their assigned duties.

Health-risk assessments

RasGas carries out health-risk assessments in line with IPIECA (International Petroleum Industry Environmental Conservation Association) and OGIP industry guidance and recognised professional practice. The assessments inform the development of an annual health action plan.

The goal is to identify and evaluate health hazards in the workplace, taking into account existing and proposed control measures and, where appropriate, identifying the need for further measures to control exposure to health risks. The process identifies hazards associated with process units and plant areas (such as exposure to noise or toxic substances such as benzene), characterising the hazards and assessing potential exposure. The analysis is captured in a health risk rating. Controls, including training, are then reviewed. For example, noise can be a hazard, so we monitor exposure to noise or toxic substances such as benzene, taking into account the levels of potential exposure to the hazards. We also carry out annual screening, on-site health and safety professionals among workers with higher than average levels of exposure. We also track the ‘sickness absence rate’ in our Operations group.

Table 6. Sickness absence rate 2010-13

<table>
<thead>
<tr>
<th>Days per person per year</th>
<th>2010</th>
<th>2011</th>
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<td>3.7</td>
<td>3.43</td>
<td>3.27</td>
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Heat stress

The environmental conditions we work in create serious health challenges. Ambient air temperatures average 35°C between May and September, with daily maximums often above 40°C and relative humidity between 25 and 100 per cent. August, generally the hottest and most humid month, creates potentially dangerous conditions for those exposed to the heat, especially when Ramadan falls within the summer months.

We have applied a work programme designed to reduce the risk of heat-related illnesses such as heat exhaustion, cramp and heat stroke. The programme posts information on appropriate intervals for work and rest, and required amounts of water to drink. Guidance based on real-time 24-hour heat index monitoring (including indicators such as relative humidity and ambient temperature) is available in several languages. Monitoring information is communicated over the plant’s public address system, by text messaging and on electronic boards. The heat stress incident rate has not changed significantly, even with the Barzan workforce growing to around 30,000. Though with a larger workforce, there has been an increased number of incidents this year. In total, there were 40 cases, 15 requiring medical treatment and 25 first aid.

Our heat stress prevention programme defines roles and responsibilities, mechanisms for monitoring, training, support, and awareness-raising materials used on site. We monitor performance, and prepare a weekly report and case analysis, highlighting problem areas and reasons for the cases.

Ergonomics

We raise awareness of the importance of good ergonomics in our work environments, whether office-based or on the field. An ergonomic plan for the whole company will be implemented over the next two to three years, incorporating human factors, safety in design, and training. It will support the Ergonomic Guidelines, part of the RGEE management system guidance.

Food safety and hygiene

Within our procedure governing food and water safety, audits and inspections are conducted onshore and offshore to ensure the integrity of the food chain. Our catering contractors use approaches that incorporate hazard analysis critical control point concepts common in the food industry. Our corporate training section is accredited to run internationally recognised food safety hygiene training that offers formal qualifications.

Community health

RasGas fully supports the Qatar National Vision 2030 goal of improving the health and wellbeing of Qatar’s citizens, seeing its role as ensuring the health and wellbeing of its workforce, and making a positive contribution to community health.

One such initiative was the hearing-loss prevention awareness programme. RasGas industrial hygiene specialists visited the Al Khor Community Medical Centre, which looks after more than 11,500 people, including employees and their dependants.

Al Khor Housing Community Medical Centre

Primary healthcare is essential healthcare made universally accessible to individuals and families in the community by means acceptable to them through their full participation and at a cost that the community and country can afford. It forms an integral part of the country’s health care system and of the overall social and economic development of the community.

The centre is used by people of many different nationalities and ethnic backgrounds. Our multicultural staff provide in-house translation services to those who cannot communicate in English or Arabic.
We continue to take action to deliver the energy the world needs in a way that is as efficient as possible, and which minimises impact on the environment. Our greenhouse gas strategy, launched in 2012, sets the context for the action we will take over the next five years and beyond. To achieve the strategy’s goals, we need to address the key drivers of emissions, and use the human and technical resources at our disposal. Our approach is underpinned by a philosophy of continuous improvement.

We recognise the importance of managing contractor environmental performance as well as the performance of operations that we directly control.

The Barzan Gas Project is being built in compliance with the Qatar Ministry of the Environment construction permit, which covers construction and commissioning of the Barzan onshore plant and associated offshore facilities. Periodic reports are submitted in support of the permit and the project’s environmental action plan and programmes.

RasGas understands that meeting the growing demand for reliable, affordable and clean energy presents many complex challenges, not least the global concern of climate change, and that environmental risks associated with producing and using energy need to be addressed so that sustainable pathways are found for future generations to follow.

We annually benchmark energy use, atmospheric emissions and waste management data with other international LNG production companies. Text and several graphs in the Environment section of this report refer to this data, including LNG average data and RasGas performance relative to the other participating companies. The most recent benchmark data available at the date of publication of this report is for 2012, when 12 companies participated in the benchmark. The benchmark programme for 2012 was organised by Philip Townsend Associates Inc. (PTAI), on behalf of the participating companies. The data is drawn from the 2012 PTAI benchmark report for RasGas and from previous annual reports from this programme issued by PTAI and Shell Global Solutions.

For more information on our Environmental Management System, visit our online report at www.rasgas.com/sustainability
Energy use

The Qatar National Vision 2030 and the National Development Strategy 2011–16 set out frameworks for the responsible and strategic use of hydrocarbon resources for the benefit of the current generation and those that follow. To support energy efficiency and conservation, Qatar is seeking to strengthen technical and institutional capacity and raise public awareness of climate change and the need for energy efficiency.

The oil and gas industry is energy-intensive. Qatar’s oil and gas sector generates approximately half of the country’s total greenhouse gas (GHG) emissions from energy and industry, and so has a central role to play in using energy efficiently and minimising energy losses. Within this, Qatar Petroleum plays a leading role in translating national strategy into action for the industry.

RasGas fully supports these initiatives and is taking action in its own operations – as a consumer of energy – to use energy efficiently. It is in RasGas’ commercial interest as an LNG producer to minimise any losses of gas through inefficiency and to keep processes such as flaring to a minimum. Avoiding losses contributes to the achievement of one of our fundamental corporate goals: to optimise our efficiency by saving costs and maximising the amount of product available for sale. Doing so also generates environmental benefit.

RasGas recognises that customer use of its energy products results in emissions. Demand for LNG is projected to grow in the decades ahead, representing more than half the growth in traded gas. This projected increase in demand relates to LNG’s practical benefits and environmental advantages. While all fossil fuels have a carbon footprint, LNG is cleaner burning, with lower carbon emissions per unit of heat generated than coal or oil. It also produces significantly lower levels of localised pollutants such as sulphur dioxide and other airborne particulates.

Striving for energy efficient operations RasGas environmental management system incorporates measures to promote energy efficiency, underpinned by the goal of continuous performance improvement. RasGas has taken steps to increase operational efficiency through its five-year flare minimisation programme, which was the first of its kind when launched in 2005. We are now well into our second five-year plan, which began in 2012, and which will drive efficiencies through to 2016.

RasGas generates its own power using fuel gas–driven turbine generators located at the Ras Laffan plant and sources a small proportion (less than one per cent) of its energy as imported electricity from the national grid. Most of the energy used on the plant is for compression and cooling of gases and for transportation, as well as separation of the intake gas received from offshore operations to produce the RasGas range of products. On renewable energy, RasGas completed one project in 2009 involving installation of 22 solar–powered street lights in the waste management area and a second project in 2012 in which 25 mobile solar towers were purchased for shutdown activities.

We track energy use against a range of performance measures, and compare our performance against industry peers, using an industry benchmark based on the intake of gas. If RasGas uses less of this intake gas as fuel, then more gas is available as product. In 2013, RasGas operations used the equivalent of 8.7 per cent of the available primary energy in its intake of reservoir gas as fuel for its operations. Comparison with other LNG producers shows that RasGas was in line with the industry average performance in 2012 and ranked seventh out of 12 LNG companies on energy use.

We are continuing to work with Qatar Petroleum to develop an energy-efficiency model which facilitates comparisons between base case design and actual operations. The model provides a useful inventory of significant energy-consuming activities and examines production as well as consumption of steam, electricity and fuel gas. We plan to use this model increasingly in future to identify opportunities for saving energy.

Increasing the energy efficiency of shipping operations RasGas has supported the use of larger ships, vessels fitted with reliquefaction facilities to reduce the number of voyages and to cut emissions per nautical mile. Older vessels have been retrofitted to use clean LNG as a fuel, thus reducing both harmful direct emissions from the vessels themselves and indirect emissions from the refinery production of residual fuels. New hull coatings have been used to reduce fuel consumption.

In terminal operations, the jetty boil-off gas recovery project with Qatar Petroleum and Qatargas is designed to reduce flaring at the Ras Laffan loading terminal to the minimum practicable level.

Supporting the transition to cleaner marine fuel In an initiative with shipping company Nakilat and Qatargas, we have agreed with engine manufacturer MAN Diesel and Turbo to convert a Q-Max vessel to use LNG as an alternative to heavy fuel oil in the main engines, which will lead to a reduction in exhaust gas emissions. In step with emissions regulations, the engine manufacturer has made technical advances to give the low-speed diesel engine the flexibility to use LNG, a cleaner fuel than heavy fuel oil. Evaluation of the design has resulted in high confidence in the new system’s safety and reliability.

Shipyard operator Nakilat-Keppel Offshore and Marine will complete the ship’s conversion, using MAN Diesel and Turbo’s ME-GI (M-Type Electronically Controlled – Gas Injection) systems, at its Ras Laffan port facilities. The Q-Max will be the world’s first low-speed marine diesel engine to be converted to use LNG, meeting current and known future global emissions regulations.

To date, the use of LNG for LNG shipping has been in conventional steam–driven LNG carriers and, more recently, in dual or tri-fuel diesel electric LNG ships with low-pressure–injected, medium-speed four-stroke diesels. The new technology will enable lower emissions, potentially longer intervals between maintenance, reduced bunkering activities, and faster reaction to market changes.

Table 7. Energy use broken down into direct consumption of intake gas, indirect electricity (purchased and consumed) and renewable energy (solar) generated for operational use.

<table>
<thead>
<tr>
<th>Energy use broken down into direct consumption, imported and renewable</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total energy use (GJ)</td>
<td>261,136,188</td>
<td>276,310,986</td>
<td>279,933,877</td>
<td>271,444,770</td>
</tr>
<tr>
<td>Direct energy use (GJ)</td>
<td>258,118,021</td>
<td>273,105,332</td>
<td>276,217,759</td>
<td>269,385,153</td>
</tr>
<tr>
<td>Indirect energy use (GJ)</td>
<td>3,008,137</td>
<td>3,205,654</td>
<td>3,746,118</td>
<td>2,059,617</td>
</tr>
<tr>
<td>Renewable energy generated (GJ)</td>
<td>12</td>
<td>12</td>
<td>30</td>
<td>30</td>
</tr>
</tbody>
</table>

For more information visit our online report at www.rasgas.com/sustainability

For more information visit our online report at www.rasgas.com/sustainability
Greenhouse gas emissions

Implementing our greenhouse gas strategy

We continue to act to minimise carbon emissions from our operations in line with the corporate greenhouse gas (GHG) management strategy and policy approved in 2012. The strategy and policy provide a platform to consider mitigation opportunities along the supply chain and for tackling current and future GHG challenges. They enable us to build on the steps we are already taking to minimise our own GHG emissions, defining roles, responsibilities and timeframes.

In 2013, we took actions within our GHG management plan. We benchmarked our programme to identify best practices and areas for improvement, and completed a desk review of mitigation opportunities. We had our GHG emissions data audited by an independent party for the third consecutive year, in accordance with international practice and the World Resources Institute GHG Protocol.

Greenhouse gas emissions

RasGas GHG emissions totalled 17.9 million tonnes of carbon dioxide (CO₂) equivalent in 2013, compared with 18.7 million tonnes in 2012.

We benchmark our emissions against other LNG producers by normalising emissions in tonnes as a percentage of the total weight of gas intake from the production reservoir. Among the 12 international companies benchmarked on this measure in 2012, RasGas ranked third.

Acid gas capture and injection

RasGas continues to operate an acid gas injection (AGI) scheme that stores CO₂ and hydrogen sulphide (H₂S) and thereby reduces emissions of CO₂ and sulphur dioxide (SO₂) from production processes. These gases, present in the gas feed from the North Field, must be separated from the main gas stream during LNG production to meet product specifications.

Approximately 1 million tonnes per year of CO₂ are reinjected into a saline aquifer in an onshore reservoir formation. The reservoir formation is monitored using microgravity surveying techniques, which were determined to be the best monitoring strategy.

With Qatar Petroleum, RasGas is studying the possibility of enlarging the current scope of this activity. Front-end engineering design work is under way for a project to divert the AGI feed to RQX2 sulphur recovery units to recover the H₂S and to convert the AGI facility to a CO₂ capture and storage facility only. Consideration is also being given to exporting the CO₂ to Mesaed Industrial City for use in an industrial process there. As part of this proposal, future work would be carried out to reduce SO₂ emissions, which would temporarily increase as a result of the change.

RasGas participates in the International Petroleum Industry Environmental Conservation Association Climate Change Working Group, and in national research and engineering forums.

For more information on our greenhouse gas policy, visit our online report at www.rasgas.com/sustainability

Figure 14. RasGas GHG management strategy

Policy

Components

Identification of goals defined by the GHG policy

Adoption of GHG policy or position statement by critical stakeholders

5-year plan

Management tool that defines roles, responsibilities and timeframes to achieve GHG initiatives

Identification of GHG initiatives and programmes to achieve goals in GHG policy

Implementation of action items, tasks and projects to manage, measure and reduce GHG emissions

Activities

Implementation of action items, tasks and projects to manage, measure and reduce GHG emissions

RasGas GHG management strategy

<table>
<thead>
<tr>
<th>Year</th>
<th>2007</th>
<th>2008</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>CO₂ from combustion</td>
<td>6.6</td>
<td>6.5</td>
<td>6.2</td>
<td>6.4</td>
<td>6.5</td>
<td>6.5</td>
<td>6.5</td>
</tr>
<tr>
<td>CO₂ from flare</td>
<td>0.05</td>
<td>0.05</td>
<td>0.05</td>
<td>0.05</td>
<td>0.05</td>
<td>0.05</td>
<td>0.05</td>
</tr>
<tr>
<td>Total CO₂</td>
<td>6.6</td>
<td>6.5</td>
<td>6.2</td>
<td>6.4</td>
<td>6.5</td>
<td>6.5</td>
<td>6.5</td>
</tr>
<tr>
<td>Methane (CH₄)</td>
<td>0.010</td>
<td>0.010</td>
<td>0.009</td>
<td>0.010</td>
<td>0.010</td>
<td>0.010</td>
<td>0.009</td>
</tr>
<tr>
<td>Nitrous oxide (N₂O)</td>
<td>4.3</td>
<td>4.4</td>
<td>4.2</td>
<td>4.3</td>
<td>4.4</td>
<td>4.5</td>
<td>4.5</td>
</tr>
<tr>
<td>Total GHG</td>
<td>10.9</td>
<td>10.9</td>
<td>10.7</td>
<td>10.7</td>
<td>10.8</td>
<td>10.8</td>
<td>10.9</td>
</tr>
<tr>
<td>Tonnage CO₂ per tonne hydrocarbon</td>
<td>0.281</td>
<td>0.269</td>
<td>0.248</td>
<td>0.238</td>
<td>0.258</td>
<td>0.258</td>
<td>0.271</td>
</tr>
</tbody>
</table>

Table 8. RasGas emissions 2007–2013

Table 9. Annual CO₂ injected. Source: RasGas Environmental Affairs

*The data for 2010, 2011 and 2012 has been restated versus the 2012 report

Annual CO₂ injected

<table>
<thead>
<tr>
<th>Year</th>
<th>2007</th>
<th>2008</th>
<th>2009</th>
<th>2010</th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>CO₂ injected (mtn tonnes per year)</td>
<td>1.07</td>
<td>1.08</td>
<td>1.09</td>
<td>1.03</td>
<td>1.04</td>
<td>1.06</td>
<td>1.05</td>
</tr>
</tbody>
</table>

Figure 15. RasGas direct GHG emissions 2006–2013 by source

Figure 16. GHG emissions 2006–2013 versus worldwide LNG industry average

Reduction in GHG emissions 2013

Amount by which emissions in 2013 were lower than those in 2012

775,455 tonnes

Environment

Sustainability Report 2013
Reducing flaring

Flaring excess gas is one of the most significant contributors to national GHG emissions, accounting for 12 per cent of Qatar’s energy-related GHG emissions.

In 2012, RasGas launched a fresh five-year flare minimisation plan covering its Ras Laffan facilities (both on-site and off-plot), a continuation of the inaugural five-year plan. The new plan, expected to be completed by 2016, aims to reduce flaring emissions from a baseline of 1.26 per cent (volume of flared gas per unit of gas intake) in 2011 to 0.43 per cent in 2016. RasGas’ approach is to continue employing industry best practices and innovative efforts which include, but are not limited to, improving facility designs, enhancing operating procedures, and using waste gas for power generation.

RasGas continued to reduce the amount of gas flared in 2013, achieving a rate that was roughly 18 per cent below our target for the year. The most significant contribution came from a passing-valves monitoring programme, which generated about three-quarters of the reduction in 2013. We have also made improvements to flare gas control systems, and have sought improvements in plant reliability, which leads to reduced flaring. Other projects have also progressed, including action to eliminate flared sour gas by sending sour gas from the sour water degasser to the sulphur recovery unit incinerators.

Further reductions are planned, in conjunction with Qatargas, from the jetty boil-off gas recovery project. Scheduled for completion in 2014, the project will enable previously flared boil-off gas from LNG ship-loading operations to be recompressed at a central facility. The project is expected to reduce flaring from these operations by more than 90 per cent. The compressed gas will be sent to LNG producers to be consumed as fuel or converted back into LNG.

Other air emissions

Air emissions from oil and gas industry operations may contribute to local or regional environmental impacts such as haze, and can affect human health, flora and fauna. These emissions include nitrogen oxides (NOx) and sulphur dioxide (SO2) emitted during combustion, which contribute to the formation of smog and acid rain. Volatile organic compounds (VOCs) – organic compounds (excluding methane) that vaporise in the atmosphere and may participate in the formation of ground-level ozone – are also emitted.

Emissions monitoring

The RasGas environment team monitors applicable emission sources at least twice every quarter. Over the years, RasGas has consistently met regulatory requirements for NOx and SO2 emissions. We have introduced continuous emissions monitoring for the new emission sources in Trains 6 and 7, and AKG-2, and have developed plans to retrofit equivalent technology to the older Trains 1 – 5 and AKG-1. This project, which will continue until the end of 2015, will ensure we continue to comply with the Ministry of Environment’s standards and regulations on stack emission limits. It will also ensure we meet relevant US Environmental Protection Agency standards.

RasGas has other programmes in place to minimise the release of non-GHG emissions to the atmosphere. These include:

- retrofitting existing installations with systems to control the release of NOx from compressors and gas turbines
- optimising flue gas recirculation systems installed in all steam-generating units
- a plant-wide leak detection and repair (LDAR) programme to control VOC emissions

Figure 17. RasGas flaring performance and 2016 target

<table>
<thead>
<tr>
<th>Year</th>
<th>Flaring target</th>
<th>Flaring actual</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>4.29%</td>
<td>1.26%</td>
</tr>
<tr>
<td>2006</td>
<td>3.83%</td>
<td>1.64%</td>
</tr>
<tr>
<td>2007</td>
<td>2.48%</td>
<td>1.26%</td>
</tr>
<tr>
<td>2008</td>
<td>2.16%</td>
<td>1.08%</td>
</tr>
<tr>
<td>2009</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2010</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2011</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2012</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2013</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Year</th>
<th>Flaring target</th>
<th>Flaring actual</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>4.29%</td>
<td>1.75%</td>
</tr>
<tr>
<td>2006</td>
<td>3.82%</td>
<td>1.26%</td>
</tr>
<tr>
<td>2007</td>
<td>2.48%</td>
<td>1.08%</td>
</tr>
<tr>
<td>2008</td>
<td>2.16%</td>
<td>0.87%</td>
</tr>
<tr>
<td>2009</td>
<td></td>
<td>0.45%</td>
</tr>
<tr>
<td>2010</td>
<td></td>
<td>0.48%</td>
</tr>
</tbody>
</table>

Table 10. Flaring percentage per unit of gas intake

<table>
<thead>
<tr>
<th>Year</th>
<th>NOx</th>
<th>SOx</th>
<th>VOCs</th>
</tr>
</thead>
<tbody>
<tr>
<td>2007</td>
<td>17,796</td>
<td>14,342</td>
<td>5,549</td>
</tr>
<tr>
<td>2008</td>
<td>12,085</td>
<td>9,424</td>
<td>5,670</td>
</tr>
<tr>
<td>2009</td>
<td>9,514</td>
<td>12,181</td>
<td>5,923</td>
</tr>
<tr>
<td>2010</td>
<td>11,810</td>
<td>44,633</td>
<td>11,041</td>
</tr>
<tr>
<td>2011</td>
<td>11,779</td>
<td>18,243</td>
<td>1,201</td>
</tr>
<tr>
<td>2012</td>
<td>11,351</td>
<td>11,270</td>
<td>1,048</td>
</tr>
<tr>
<td>2013</td>
<td>0.45%</td>
<td>0.48%</td>
<td>915</td>
</tr>
</tbody>
</table>

* In 2009, reporting included C2 which was previously excluded.

Table II. Non-greenhouse gas air emissions
Reducing NOx emissions
In response to air-quality concerns, RasGas collaborated with the Ministry of the Environment to develop a US$275 million programme to retrofit low-NOx technology to turbines and boilers built before 2005. Implementation began in 2007, and the programme will ensure that all existing and applicable combustion units will meet regulatory limits by 2016. We believe the retrofit programme was the first of its kind in the region. Our NOx emissions have decreased substantially and we continue to retrofit remaining equipment.

Our NOx emissions intensity improved by about 15 per cent in 2013. Emission reductions of about 14 per cent were made in compressor turbines, 17 per cent in boilers and furnaces, and other reductions resulted from reduced flaring. In the 2012 PTAI benchmark, RasGas’ NOx emissions, expressed in weight percentage of total intake, remained better than the LNG industry average, with RasGas third among the 12 benchmarked companies.

Sulphur oxides emissions
Emissions of sulphur oxides (known as SOx, but primarily sulphur dioxide, SO2) result primarily from the combustion of sulphur in hydrocarbons. In 2013, overall SOx emissions from RasGas operations continued to decline, by almost 45 per cent compared with 2012. Our SOx emissions intensity, which measures emissions against units of production, improved by about 44 per cent compared with 2012. This improvement was driven by fewer unplanned acid/sour gas flaring events, mainly due to better plant process safety performance.

RasGas has implemented a plant-wide leak-detection and repair programme since 2007 that uses hand-held infrared cameras for VOC leak identification. The technology delivers real-time thermal images of gas leaks, otherwise invisible but seen through the camera as black or white 'smoke' images. RasGas’ environmental monitoring team has identified, tagged and monitored more than 22,000 LEAK components covering Trains 1–6 and AKG-1 and 2. The programme enables effective monitoring, reduces product loss and improves process safety performance.

RasGas’ VOC emissions decreased by 12 per cent in 2013. More than half of the emissions resulted from combustion sources, with the remainder from flaring and fugitive emissions. Emission levels continue to reflect the handover of condensate and liquefied petroleum gas (LPG) product storage and loading facilities to Ras Laffan Terminal Operations, which accounted for the significant reduction in reported emissions after 2010. VOC recovery and destruction units at condensate loading berths contribute to a reduction in indirect emissions associated with RasGas products.

Preventing emissions of volatile organic compounds
Volatile organic compounds (VOCs) contribute to low-level ozone formation, which can damage the health of humans, animals, trees and plants. In a petrochemical plant, every valve and every connection between components, no matter how precisely engineered, is a potential source of what are known as fugitive emissions, or leaks, of VOCs. While single minor leaks might not seem material, a facility such as the RasGas site will have thousands, even hundreds of thousands, of potential leak sources. With the plant operating 24 hours a day, seven days a week, the size of the risk is clear.

RasGas has implemented a plant-wide leak-detection and repair programme since 2007 that uses hand-held infrared cameras for VOC leak identification. The technology delivers real-time thermal images of gas leaks, otherwise invisible but seen through the camera as black or white 'smoke' images. RasGas’ environmental monitoring team has identified, tagged and monitored more than 22,000 LEAK components covering Trains 1–6 and AKG-1 and 2. The programme enables effective monitoring, reduces product loss and improves process safety performance.

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Water
Water management is an increasingly important issue in the oil and gas industry, and in particular the use of freshwater in operations. This is especially sensitive in countries such as Qatar where fresh water resources are scarce, and the cost of producing fresh water and the impact on the environment are significant.

Water use
RasGas uses desalinated water in a number of processes at Ras Laffan, particularly steam generation, and for domestic potable use. Less than 20 per cent of this water is purchased via RLIC and the remainder is generated by RasGas’ own desalination units.

RasGas’ primary process water source is seawater, which is used for cooling process equipment by means of a once-through cooling water system. RasGas uses two systems: the RLIC common seawater cooling system for Trains 4 to 7 and the RasGas seawater cooling system for Trains 1 to 3. The two systems operate independently and the streams are returned to the sea via separate seawater discharge channels. Having modelled the seawater return and its impact on the port area, we are carrying out a pilot study to examine alternative dosing of chlorine to manage algal growth. Early indications suggest this is reducing the impact of the discharge. Some process water is also discharged underground via injection wells, while other treated process water is reused for irrigation.

Water management initiatives
We believe it is possible to minimise onshore waste water. Currently RasGas uses a combination of systems to treat the chemical water, oily water and sewage water streams. These streams, treated to injection water quality standards, are used to irrigate a green area within the RasGas site, which makes up more than 3 per cent of the plant footprint. We also irrigate a green belt outside the plant area of approximately 500,000m², which contains only native vegetation and is encouraging wildlife back to the area.

We are looking at how we could put waste water to better use within the plant, with a view to achieving zero onshore discharge. During 2013, we identified additional treatment packages featuring membrane bioreactor and reverse osmosis units to further improve the quality of the treated waste water, and have identified a suitable location for the unit. This will enable RasGas to reuse treated waste-water streams as an alternative to desalinated water for plant operations, further reducing demands on the environment and natural reserves.

For Trains 3, 4, 5, 6 and 7, our current approach is to treat and reinject the produced water onshore as an alternative to returning it to the sea. We are currently studying how we can reduce the amount of water reinjection taking place as well as looking for alternative uses for this specific water stream within the plant. This is dependent on identifying technologies to treat the water to a quality suitable for reuse within the plant. For Trains 1 and 2, we separate produced water from the gas at the platform and discharge it into the sea.

Water discharge
<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>Purchased</th>
<th>Company generated</th>
<th>To injection wells</th>
<th>Recycled / reused</th>
</tr>
</thead>
<tbody>
<tr>
<td>2009</td>
<td>3.01</td>
<td>0.71</td>
<td>2.30</td>
<td>0.60</td>
<td>0.09</td>
</tr>
<tr>
<td>2010</td>
<td>3.00</td>
<td>0.70</td>
<td>2.30</td>
<td>0.60</td>
<td>0.09</td>
</tr>
<tr>
<td>2011</td>
<td>2.89</td>
<td>0.63</td>
<td>2.26</td>
<td>0.57</td>
<td>0.09</td>
</tr>
<tr>
<td>2012</td>
<td>2.80</td>
<td>0.62</td>
<td>2.18</td>
<td>0.57</td>
<td>0.09</td>
</tr>
<tr>
<td>2013</td>
<td>2.75</td>
<td>0.61</td>
<td>2.14</td>
<td>0.57</td>
<td>0.09</td>
</tr>
</tbody>
</table>

Table 12: Water discharge (Mm³/yr)

Water use
RasGas uses desalinated water in a number of processes at Ras Laffan, particularly steam generation, and for domestic potable use. Less than 20 per cent of this water is purchased via RLIC and the remainder is generated by RasGas’ own desalination units.

RasGas’ primary process water source is seawater, which is used for cooling process equipment by means of a once-through cooling water system. RasGas uses two systems: the RLIC common seawater cooling system for Trains 4 to 7 and the RasGas seawater cooling system for Trains 1 to 3. The two systems operate independently and the streams are returned to the sea via separate seawater discharge channels. Having modelled the seawater return and its impact on the port area, we are carrying out a pilot study to examine alternative dosing of chlorine to manage algal growth. Early indications suggest this is reducing the impact of the discharge. Some process water is also discharged underground via injection wells, while other treated process water is reused for irrigation.

Water management initiatives
We believe it is possible to minimise onshore waste water. Currently RasGas uses a combination of systems to treat the chemical water, oily water and sewage water streams. These streams, treated to injection water quality standards, are used to irrigate a green area within the RasGas site, which makes up more than 3 per cent of the plant footprint. We also irrigate a green belt outside the plant area of approximately 500,000m², which contains only native vegetation and is encouraging wildlife back to the area.

We are looking at how we could put waste water to better use within the plant, with a view to achieving zero onshore discharge. During 2013, we identified additional treatment packages featuring membrane bioreactor and reverse osmosis units to further improve the quality of the treated waste water, and have identified a suitable location for the unit. This will enable RasGas to reuse treated waste-water streams as an alternative to desalinated water for plant operations, further reducing demands on the environment and natural reserves.

For Trains 3, 4, 5, 6 and 7, our current approach is to treat and reinject the produced water onshore as an alternative to returning it to the sea. We are currently studying how we can reduce the amount of water reinjection taking place as well as looking for alternative uses for this specific water stream within the plant. This is dependent on identifying technologies to treat the water to a quality suitable for reuse within the plant. For Trains 1 and 2, we separate produced water from the gas at the platform and discharge it into the sea.

Water discharge
<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>Purchased</th>
<th>Company generated</th>
<th>To injection wells</th>
<th>Recycled / reused</th>
</tr>
</thead>
<tbody>
<tr>
<td>2009</td>
<td>3.01</td>
<td>0.71</td>
<td>2.30</td>
<td>0.60</td>
<td>0.09</td>
</tr>
<tr>
<td>2010</td>
<td>3.00</td>
<td>0.70</td>
<td>2.30</td>
<td>0.60</td>
<td>0.09</td>
</tr>
<tr>
<td>2011</td>
<td>2.89</td>
<td>0.63</td>
<td>2.26</td>
<td>0.57</td>
<td>0.09</td>
</tr>
<tr>
<td>2012</td>
<td>2.80</td>
<td>0.62</td>
<td>2.18</td>
<td>0.57</td>
<td>0.09</td>
</tr>
<tr>
<td>2013</td>
<td>2.75</td>
<td>0.61</td>
<td>2.14</td>
<td>0.57</td>
<td>0.09</td>
</tr>
</tbody>
</table>

Table 12: Water discharge (Mm³/yr)
Waste management

The total volume of waste from RasGas’ operations increased in 2013 due to the five major shutdowns and additional tank-cleaning activities.

We launched a corporate waste management programme in 2009 which provides a cradle-to-grave framework for waste minimisation, collection, treatment, storage, reuse, recycling and final disposal. RasGas strives to minimise the amount of waste generated. Our volume of total waste disposed per million tonnes of total intake is lower than industry averages.

Large volumes of waste – including catalytic waste, spent molecular sieves and process sludges, which represent the most significant waste streams – must be dealt with on a continuous basis and at peak times (for example, during shutdowns). Waste is separated into 22 waste streams.

In 2013, we upgraded the 54 waste collection points on the plant site to improve waste identification, segregation, collection and containment. Our waste information system enables operators to log quantities of waste at each collection point in real time and alert management if action is necessary.

Our quantities of pyrophoric waste – one of the more hazardous wastes because of the fire risk it poses – doubled in 2013, due principally to shutdowns. We have introduced better designed skips and pyrophoric bags to handle these materials. These are frequently used in shutdowns. We have introduced better designed skips and pyrophoric bags to handle these materials. These are frequently used in shutdowns.

We also introduced new sludge management equipment in 2013, enabling us to reduce waste storage and increase the percentage of recycling by more than 150 per cent. The amount of sludge waste stored has been reduced by 98 per cent, with the remaining two per cent of solid waste to be treated by a new thermal desorption unit.

RasGas was awarded the Qatar Oil and Gas Industry Health, Safety and Environment Excellence Gold Award (Qatar Petroleum joint-venture company category) in April 2013. The award was given, amongst others, to the waste information system, a project to manage waste from molecular sieves, and our approach to pyrophoric materials management. RasGas was selected as the winner from 53 submissions from 26 organisations.

Minimising the Barzan Gas Project’s environmental impact

Waste management on the Barzan Gas Project is controlled by adopting a centralised approach which ensures tracking of waste and alignment with the waste management principles of reduce, reuse and recycle. All waste passes through an interim waste management facility, where it is segregated and the relevant principle applied. The recycling rate on the project is 80 per cent of waste generated. A full-time carpentry team is assigned to the facility: its duties include re-purposing or recycling wood to make useful items such as rest shelters, fencing panels, bookshelves and benches.

RasGas recycling rates are based on collection of waste data for monthly and quarterly reports submitted to Ras Laftan City (RLC) and Ministry of Environment.

Chemical and hazardous materials are strictly controlled, with the design of storage facilities reviewed and approved by the Ras Laftan Industrial City fire department to ensure it meets safety requirements. Facilities are regularly inspected and chemical and hazardous material permits are issued. Requirements monitored include ventilation, air temperature, spill containment, spill response, fire detection and protection facilities, and eye-wash facilities.

Management and site personnel have participated in two successful beach clean-up drives to contribute to environmental awareness and protection.

Spills

The production and transport of oil and gas poses a risk of accidental spills or losses that could harm the environment. Spills of chemicals or discharged water can also occur.

There were no externally reportable spills (of more than five barrels) in 2013, but there were four minor chemical spills, which resulted in the release of approximately 534 litres of oils and chemicals.

Biodiversity

The Qatar National Vision 2030 recognises the need to preserve and protect biodiversity as part of balancing development with environmental protection.

Many of Qatar’s energy deposits lie in the shallow waters near the coastline. The RasGas Environmental Management System lists biodiversity aspects and impacts, along with mitigation and monitoring measures. This includes protecting biodiversity when developing new facilities such as the Barzan Gas Project. Among the initiatives RasGas has taken to protect marine life during pipeline construction for the project is the relocation of 1,600 coral colonies from the offshore-to-onshore pipeline corridor.

Coral colonies are common in the Arabian Gulf, where reefs protect Qatar’s shoreline from powerful waves. They are also a fish habitat, and a sheltered environment where marine life can breed and feed. The relocation project embodies a five-year monitoring programme, which includes assessment of how successfully the coral has attached to limestone boulders introduced as a reattachment site, and a health assessment of the coral colony. A survey work in 2013 found that overall coral-bonding status had improved, and that 74 per cent of reattached coral showed minimal stress. Continuing monitoring will inform the viability of this approach for future programmes.

Protecting marine mammals and sea turtles

We have carried out a marine mammal and sea turtle observation programme during the Barzan Gas Project, with two aims:

- to fulfil the Ministry of Environment’s requirement for recording sightings of marine mammals and sea turtles during offshore operations, specifically during the installation of mobile offshore drilling units, drilling offshore wells, and marine pipeline-laying operations
- to provide protocols to be implemented during offshore activities to mitigate potential impacts to these species from vessel, noise, collisions, and marine waste and debris.

During offshore operations, trained protected species observers have completed daily surveys and logged information on watches undertaken, even if no marine mammals have been seen. Visual monitoring has been accompanied by measures to reduce the risk of striking marine mammals and actions to control marine debris during offshore operations.

For more information on our work to protect coral in Qatar’s waters, visit our online report at www.rasgas.com/sustainability
Our goal is to establish a high-performance culture by providing clarity about what is required in a job and how it should be done.

We recognise that people thrive in a work environment that is inclusive and supportive, and we have put in place a set of integrated processes for managing people that contribute to achieving this.

RasGas’ performance management framework helps us plan, manage and review employee performance. Employees are given clarity about RasGas’ priorities, helping them to demonstrate the behaviours that lead to better business performance and equipping them to achieve their personal career goals.

We encourage clear, direct and regular communication between those giving and those receiving appraisals.

We support learning and development by identifying the skills and experience people need to develop, and by creating an open working environment that encourages feedback.

We plan for the future. We have a clear view of what skills and people we will need in future, and we plan people’s careers so that individuals who progress to managerial and technical expert roles have the experience they need.

Our planning includes a high-quality Qatarization programme. We seek to recruit Qatari nationals and provide them with the opportunity to learn, grow and develop in our work environment.
The RasGas workforce

Our workforce continued to grow in 2013, reaching more than 3,400, including full-time employees and contractors. The growth of our workforce mirrors the growth of our business, despite operating in a competitive labour market where the skills and experience we require are in short supply and where there is strong competition for recruits within and outside the energy and industry sector.

To complement the recruitment of experienced staff, RasGas recruits students and offers scholarships that help people pursue diploma and bachelor degree qualifications from local and international universities. It is notable that the market for scholarship students is increasingly competitive. We aim to give our people challenging and rewarding careers, with opportunities to develop. We are committed to creating a work environment where everyone has the freedom to learn and contribute. We offer a range of development opportunities and training courses.

We recognise that retaining staff, especially Qatari nationals who have completed high-quality training, will be increasingly challenging as the economy diversifies and opportunities emerge in other sectors. Our employee attrition rate, which includes individuals who left the organisation voluntarily and involuntarily, was 5.8 per cent in 2013, compared with 5.9 per cent in 2012.

Workforce diversity

In 2013, our workforce was drawn from 68 different nationalities. RasGas places high value on the benefits of diversity, differing perspectives on problem-solving, opportunities for team-building, and an exciting work environment. At the same time, RasGas recognises the importance of the company’s core organisational values: People, Integrity, Safety, Excellence, and General Interest – being partners in the common interest we share: the success of the company. These values unite the company and help to drive its success.

RasGas aims to be an employer of choice, empowering employees through professional development programmes, and offering equal career opportunities for men and women. The number of female employees at RasGas has increased year-on-year since 2007, but there are challenges in encouraging women to work in engineering and at Ras Laffan.

Meeting our resourcing needs

In 2013, RasGas recruited and mobilised 233 direct hire employees. We fill vacant positions by promoting or transferring existing staff whenever possible, and giving priority to Qatari nationals. Through the company’s Qatarization programme, we create job and development opportunities for Qatari nationals.

Qatarization

Qatarization is the process of identifying, attracting, and developing Qatari candidates to assume permanent positions. RasGas is committed to Qatarization and will continue to work towards the goal of 50 per cent Qatarization in permanent positions within a reasonable time period through creative and innovative recruitment, and career development strategies and plans. Success requires the support of experienced Qatari and expatriate staff at all levels, to attract, train, develop and retain young Qatars, and help them gain on-the-job experience.

Group managers meet quarterly to ensure progress towards meeting Qatarization targets and to address obstacles. Half-yearly meetings are also held with the senior leadership team to discuss overall progress and strategic plans. These sessions help improve our programme’s focus and procedures. They also enable us to monitor the development of Qatari nationals, and to discuss the progress of sponsored scholars and employees in further education programmes.

Qatarization rate

The Qatarization rate at RasGas in 2013 was 34.6 per cent, compared with 33 per cent in 2012. Of Qatari candidates in the workforce, 665 (58 per cent) hold permanent positions, 238 are on development programmes and 72 are engaged on academic studies. A further 251 Qatars are trainees on university or vocational sponsorships.

<table>
<thead>
<tr>
<th>Year</th>
<th>Total workforce</th>
<th>Male employees (and percentage of total employees)</th>
<th>Female employees (and percentage of total employees)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Male employees</td>
<td>Female employees</td>
</tr>
<tr>
<td>2007</td>
<td>2,077</td>
<td>2,044(99%)</td>
<td>218(10%)</td>
</tr>
<tr>
<td>2008</td>
<td>2,452</td>
<td>2,389(96%)</td>
<td>262(10%)</td>
</tr>
<tr>
<td>2009</td>
<td>2,726</td>
<td>2,612(96%)</td>
<td>313(11%)</td>
</tr>
<tr>
<td>2010</td>
<td>2,864</td>
<td>2,683(93%)</td>
<td>305(11%)</td>
</tr>
<tr>
<td>2011</td>
<td>3,008</td>
<td>2,719(90%)</td>
<td>347(12%)</td>
</tr>
<tr>
<td>2012</td>
<td>3,308</td>
<td>2,875(87%)</td>
<td>424(13%)</td>
</tr>
<tr>
<td>2013</td>
<td>3,364</td>
<td>3,061(90%)</td>
<td>411(12%)</td>
</tr>
</tbody>
</table>
Recruitment
During 2013 we recruited 48 new nationals into senior staff positions and a further 125 into non-senior positions (including scholarship holders). We participated in several career fairs in 2013, including diamond sponsorship of the Qatar Career Fair 2013 and gold sponsorship of the first Qatari career fair in the United States.

Links with the education sector
RasGas continues to develop relationships with the education sector. In 2013, we awarded 44 new scholarships to secondary school and university students to continue their education. The awards cover students in local and overseas universities, in programmes ranging from diploma studies to bachelor degrees. During 2013, RasGas managed 145 students under the scholarship programme.

We supported 62 university and high school students during 2013 in our summer internship programme, approximately 90 per cent of whom were Qatari nationals.

Future planning
RasGas is committed to Qatarization: we are working to five-year rolling plans, which include realistic annual targets and provide a framework for reaching 50 per cent Qatarization in permanent positions within a sensible time period. The revised plans are underpinned by four strategic themes:

- strengthening partnerships and relationships with the education sector
- enhancing the national career development framework
- sustaining an integrated planning process to meet Qatarization targets
- improving the quality and effectiveness of the national development programme, scholarship, and sponsorship processes

Table 18. Qatarization of RasGas

<table>
<thead>
<tr>
<th>Year</th>
<th>Number of Qatari Staff</th>
<th>Percentage of Total Workforce</th>
</tr>
</thead>
<tbody>
<tr>
<td>2007</td>
<td>563</td>
<td>31.2</td>
</tr>
<tr>
<td>2008</td>
<td>619</td>
<td>30.4</td>
</tr>
<tr>
<td>2009</td>
<td>735</td>
<td>31.7</td>
</tr>
<tr>
<td>2010</td>
<td>830</td>
<td>30.6</td>
</tr>
<tr>
<td>2011</td>
<td>948</td>
<td>28.6</td>
</tr>
<tr>
<td>2012</td>
<td>1,061</td>
<td>33</td>
</tr>
<tr>
<td>2013</td>
<td>1,144</td>
<td>33.1</td>
</tr>
</tbody>
</table>

Table 19. Average hours of training per employee

<table>
<thead>
<tr>
<th>Year</th>
<th>Qatari Staff</th>
<th>International Staff</th>
<th>Overall</th>
</tr>
</thead>
<tbody>
<tr>
<td>2010</td>
<td>28</td>
<td>15</td>
<td>21.5</td>
</tr>
<tr>
<td>2011</td>
<td>30.6</td>
<td>25</td>
<td>29.8</td>
</tr>
<tr>
<td>2012</td>
<td>28.8</td>
<td>176</td>
<td>31.5</td>
</tr>
<tr>
<td>2013</td>
<td>31.4</td>
<td>23.2</td>
<td>31.5</td>
</tr>
</tbody>
</table>

Employee learning and development
We encourage all our people to take personal responsibility for their training and development – an ethos captured in the message ‘your development, in your hands’. In support, we provide information on training through a web portal that links roles within job families to technical and behavioural competencies. This is connected to the annual performance development process.

Our internal guideline is that development should be 80 per cent on-the-job learning, 10 per cent mentoring and 10 per cent classroom training. For national graduate entrants, we offer an individual mentoring programme and have a pool of experienced and qualified mentors as part of the national development programme.

Process operators receive on-the-job training at the RasGas Vocational Training Centre at Ras Laffan Industrial City and may be selected to study for qualifications such as higher national diplomas and engineering degrees. Vocational training schemes include the maintenance training programme in conjunction with the College of the North Atlantic – Qatar.

Our training course catalogue includes orientation courses on topics such as the LNG business, safety, business controls, performance management, and managers’ essentials. It covers behavioural competency courses, such as working in a multicultural environment, communication skills, interpersonal skills, assertiveness, problem solving and leadership. Supplementary courses include writing skills, personal development management, cultural diversity, and stress and time management.

We introduced a new leadership and management development programme in 2013 that operates across all levels, from supervisor to executive. The courses, run by Thunderbird Executive Education, examine concepts such as personal leadership development (for supervisors), engaging and influencing peers (for departmental heads), and understanding the dynamics of transformational change (for managers). At year end, nearly 90 people had received the training, approximately one-third of whom were Qatari nationals.

As part of its support for Qatarization, RasGas provides a range of courses focused on the needs of Qatari nationals. These include orientation, skills development and English language courses. The average hours of training per RasGas employee increased in 2013 for Qatari and international staff.

Employee engagement
Our ‘people’ core value embodies a commitment to care for, listen to and develop our employees. We use a range of tools to engage with our employees, such as regular briefings, departmental and team meetings, newsletters, electronic circulars and DVDs. At the end of 2013, we changed our internal communications arrangements to enhance the quality and quantity of peer-to-peer and company-to-employee communications. Suggestion schemes and employee forums enable employees to raise issues with supervisors and managers.

Through an organisational climate survey, we seek to understand employees’ views of our strengths and to identify opportunities for improvement. The survey, run by an independent company, includes 69 diagnostic questions and two free-form questions. The survey was in English, with Arabic translations available. Participation increased from 78 per cent in 2011 to 81 per cent in 2013.

RasGas performed better than the industry norm in most survey areas. Scores for RasGas’ core values remained high, an indication of people living the core values in the organisation. The survey provides an overall indication, across six facets of opinion, of employee engagement. In 2013, the engagement score of 72 per cent was lower than the previous year’s but remains high.

We make a concerted effort to act on feedback and address areas where action is desired. To fully understand the situation and allow employees to contribute to potential solutions, we conduct focus groups and discussions at various levels. Specific areas where we can make improvements include education on RasGas’ total rewards programmes, opportunities for managing employee’s career development, and more effective communication channels on company’s future.

Findings from the survey also inform the annual strategic planning process for developing RasGas’ corporate and five-year group business plans. Department managers share their survey results with their teams and address opportunities for improvement by developing detailed plans. The next survey will be conducted in 2015.
Social responsibility is integral to our business. The RasGas Corporate Social Responsibility (CSR) programme seeks to make a positive and lasting impact in the key areas of community, education, environment and health.

The RasGas CSR programme is aligned with the Qatar National Vision (QNV) 2030 and the Qatar National Development Strategy (NDS) 2011–16. These guidelines provide a clear direction for the use of the country’s energy resources to support sustainable development.

RasGas believes in its responsibility to support the communities where it operates. The company engages the community through interaction, financial contributions, practical assistance such as the donation of equipment and furniture, and employee volunteer and skills-transfer programmes. Furthermore, the company’s Sunduk Al Kheir charity fund helps to develop a more prosperous society.

RasGas’ proactive CSR programme provides a structured framework for creating long-term impact. Throughout our operations, caring for and valuing our stakeholders is integral to RasGas’ business philosophy. CSR governance cascades from the Chief Executive Officer and is administered according to specific policy and procedures through an extended committee involving all RasGas key functions. The CSR team coordinates the daily actions implemented as part of the CSR programme, maintains records, and ensures strategic coordination and alignment.

The company’s CSR policy and procedures set out clear criteria to support the creation, identification and implementation of proactive and solicited projects. These consider whether the initiative aligns with the company’s strategic focus areas and government guidelines, is associated with local cultural values, traditions and laws, and provides the opportunity for employee involvement. The programme is dynamic, entailing research to identify projects that meet the evolving needs of the community, in addition to ongoing monitoring and evaluation to assess internal and external stakeholders’ satisfaction.

The programme adopts a four-cornerstone approach:

**Community** We support and develop initiatives that advance the social wellbeing of the communities in which we live and work.

**Education** We believe that education is an essential element for economic and social development and that every child is entitled to an education and the opportunity to develop his or her potential.

**Environment** We are fully committed to preserving and developing the natural environment for generations to come.

**Health** We advocate healthy living and are particularly active in the support of wellbeing and sports initiatives.

“We do not only believe in our responsibility towards the environment, society and the economy; we consider ourselves an active corporate citizen and ideal partner for Qatar’s striving for sustainability.”

Hamad Rashid Al Mohannadi
Chief Executive Officer
An overview of our 2013 CSR activities

Figure 24 shows our CSR programme activity categorised by cornerstone in 2013, illustrating action in each area, but with most activity focused on educational projects in line with the 2013 Year of Education.

Another indicator of CSR performance is the proportion of proactive initiatives, which increased to 52 per cent in 2013. Proactivity represents RasGas’ ability to promote partnerships and projects resulting from research, regular interaction with key community stakeholders, and needs-assessment surveys.

“Education is one of the basic pillars of social progress. The State shall ensure, foster and endeavour to spread it.”
Qatar’s permanent constitution

Sustainability Report 2013

2013 the Year of Education

Each year RasGas focuses on one of the CSR programme’s four cornerstones. 2013 was the Year of Education.

Education is essential to Qatar’s socio-economic development. RasGas believes in its responsibility to create, build, and encourage the design of educational programmes for all ages in line with the QNV 2030 and NDS. The Year of Education involved three key themes:

- creation of a school fund to support educational establishments by contributing equipment, in-kind donations, and services that foster youth development
- business-education partnerships, developed through mentoring and skills-transfer programmes
- reading and literacy: ensuring that children and adults have diverse opportunities for life-long learning

Bring a Book

At the annual Employee Forum, RasGas employee donors collected 700 children’s books to the Al Shamal Preparatory and Secondary School for Girls.

The Bring a Book campaign is a proactive corporate initiative since 2009, marking the company’s dedication to support young Qataris to the industry through opportunities to learn about engineering in practice, sparking interest in scientific, experimental and research skills. The six-month training and skills-transfer scheme culminates in building and test-driving racing cars at the Lusail International Circuit.

UCMAS Qatar National Mathematic Competition

RasGas supported Qatar’s first national children’s abacus and mental maths competition, an initiative run by Universal Concept of Mental Arithmetic System (UCMAS Qatar) to stimulate the minds of Qatar’s young people. The competition challenged more than 160 school students aged five to 13 – the 40 male and female students representing Qatar competed with some 3,000 students from 40 countries in Malaysia.

Maktaba website and mobile app launch

Reading lies at the heart of life-long, cross-generational education and provides infinite and diverse opportunities for learning. In today’s world, societal transformation and technology has led to less time reading books and more time spent in front of televisions and computers.

In June 2013 RasGas, with Maktaba Children’s Library, launched Maktaba Mobile, an interactive virtual library for young readers worldwide. Designed to promote Arabic literacy and foster intercultural dialogue, the web portal and mobile app provide learning resources that include e-books, videos and games. Users can also upload their own material.

By January 2014 the first free online Arabic library had registered, across 42 countries on four continents:

- 5,500 downloads
- 2,486 mobile device installations
- 991 desktop installations

Al Bairaq

The Al Bairaq programme, carried out by Qatar University’s Materials Technology Unit, is designed to instil interest in scientific, experimental and research skills among almost 1,000 high school students in Qatar. Students work in teams guided by university professors and industry professionals to learn about scientific problems in practical contexts.

RasGas has created an ‘I am discovering science’ prize, encouraging school students to learn about mechanical, petroleum and chemical engineering with the support of employee volunteers.

Life is Engineering

Inspiring Qatar’s youth to open up new frontiers in science, engineering and technology will make the future of Qatar even brighter and more promising. RasGas has proudly supported the Life is Engineering programme at Qatar University’s College of Engineering since 2009.

The goal is to attract young Qataris to the industry through opportunities to learn about engineering in practice, sparking interest in scientific, experimental and research skills. The six-month training and skills-transfer scheme culminates in building and test-driving racing cars at the Lusail International Circuit.

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www.maktabaqatar.org

Figure 24. Corporate social responsibility activity by cornerstone, 2013

Figure 25. Overall proactivity rate 2010–2013

4% 27.6% 38.6% 52% 2010 2011 2012 2013

 Highlights from a year of CSR activity

January
- Northern Community Skills Development Programme graduation days
- National Sport Day
- 8th Annual Charity Gala Dinner

February
- March
- Employee Forum ‘Bring a Book’ campaign
- Productive Family exhibition at the Ministry of Social Affairs

April
- Annual blood donation drive
- Employee Volunteer Programme visit to Al Noor Institute for the Blind

May
- Ministry of Interior signing ceremony for Highway Patrol Police Force project
- Life is Engineering programme closing ceremony at Qatar University
- UCMAS Qatar National Mathematics Competition

June
- Maktaba website and mobile app launch
- iEARN Conference Sponsorship for ROTA

July
- Carbon and Energy Forum
- Ministry of Interior Highway Patrol graduation ceremony
- Healthy Food Week
- Philippines Aid funds collection

August
- India Independence Day participation at Indian Cultural Centre
- RLIC-COP Garangao evening

September
- Highway Patrol Police Force training launch
- Indian Women Association’s inter-school quiz

October
- Carbon and Energy Forum
- Ministry of Interior Highway Patrol graduation ceremony
- Healthy Food Week
- Philippines Aid funds collection

November
- Carbon and Energy Forum
- Ministry of Interior Highway Patrol graduation ceremony
- Healthy Food Week
- Philippines Aid funds collection

December
- Helium 2 CSR element
- Donation to Sung Eun School, Korea
- Donation to Qatar Red Crescent for Somalia and the Philippines
**Community**

**Highway Patrol Police Force**
The RasGas and Ministry of Interior Highway Patrol Police Force project aims to reduce the ratio of deaths caused by traffic accidents from 14 to 10 for every 100,000 people. As part of the project, a new highway patrol police was specially trained by experts from the Chicago-based Northwestern University. The new force will promote safe driving, improved road safety behaviour and responsible driving.

In November 2013 the new team completed training to improve enforcement of traffic laws (such as tailgating, mobile-phone use, speeding and seat-belts) advanced accident investigation, driver-interview techniques, evidence preservation, specialised accident reports and vehicle inspection. Trainers also attended Traffic Department lectures on Qatari traffic law, seizure of vehicles, accident reports and vehicle inspection. Trainees also attended driver-interview techniques, evidence preservation, specialised enforcement of traffic laws (such as tailgating, mobile-phone use, speeding and seat-belts) advanced accident investigation, driver-interview techniques, evidence preservation, specialised accident reports and vehicle inspection. In previous years, activities included beach clean-ups, equipment donations, visits to the Qatar Foundation for Elderly People Care, lectures, and makeovers for sports facilities and schools.

**Philanthropic contributions**
RasGas actively supports local and international initiatives that help individuals and families in need. Through its Sunduk Al Kheer Charity Fund, the company in 2013 contributed to various causes. For example, the eighth Charity Gala dinner raised QR1.4 million for two beneficiaries: the Qatar Paralympic Committee and the Qatar Cultural and Social Centre for the Deaf.

RasGas also donated QR1 million to the Qatar Red Crescent for aid to the Philippines and Somalia, and launched an employee fundraising campaign that collected QR100,000.

**Friends of the Environment Centre**
RasGas is a long-term partner and supporter of the Friends of the Environment Centre, which raises awareness among younger people of the importance of preserving and protecting the environment. The centre is a not-for-profit organisation that boosts environmental awareness, involving children in educational programmes and field trips aimed at unveiling Qatar’s biodiversity.

**Doha English Speaking School**
For the second year, RasGas sponsored the Doha English Speaking School’s (DESS) recycling initiative. In 2013, DESS collected and recycled 150kg of cans, 800kg of plastic, and 2,500kg of paper and cardboard. Children are the best ambassadors for positive habits such as recycling, and initiatives such as this help to create environmental awareness among the younger generation.

**Doha Carbon and Energy Forum**
In November 2013, RasGas sponsored and participated in the second Doha Carbon and Energy Forum. Our contribution focused on energy efficiency, an issue of vital importance with far-reaching implications for the future. The project supports Qatar’s NDS 2011–16, which aims to build the knowledge and skills of the local populations so as to foster social development, and is aligned with the QNV 2030. In February 2013, 9% of graduates completed the first phase of English language courses.

**Road safety in Qatar**
8,000km of roads 1 million registered vehicles 200+ deaths each year

“We are committed to supporting the communities where we live and work, in Qatar and around the world. We especially feel that it is our responsibility to connect with students and their educators, who have the important role of guiding them on their path to becoming adults through the best possible gift: education. It gives us great pleasure to see the happy faces of these children – this is the best reward for us.”

Khalid Al Kuwari
Chef Marketing and Shipping Officer

Qatar Photographic Society portrays Helium 2
Art is a means of education, human development and cross-cultural connection. RasGas supports the arts through exhibitions, commissioning new works, and the development of a collection of more than 300 pieces.

For the inauguration of the Helium 2 facility, four talented Qatar photographers documented this milestone in Qatar’s history. Led by a renowned architectural photographer, the four were given unprecedented access to the new plant at Ras Laffan. Finding their way through pipes and valves, meters and control panels, the photographers set out to capture rare glimpses of the plant. Some of the final photographs were displayed at the inauguration.

Sung Eun Disabled School
As part of the Year of Education, RasGas made a contribution to Sung Eun Disabled School. The school in Seoul, South Korea’s capital city, takes care of 200 students affected by physical and mental disabilities. The funds will be used to remodel and upgrade the centre’s sports facilities, including playground refurbishment and restoration of an indoor water therapy unit, and to buy a new school minibus.

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How we report

In producing this report, RasGas has taken account of the 2010 Guidelines on Sustainability Reporting issued by HSE Regulations and Enforcement Directorate (Qatar Petroleum), which:

• adopts the International Petroleum Industry Environmental Conservation Association/American Petroleum Institute/International Association of Oil and Gas Producers (IPIECA/API/OGP) ‘Oil and Gas Industry Guidance on Voluntary Sustainability Reporting (2010)’ as a basis for report content and industry-specific indicators
• references the broader principles and indicators of the Global Reporting Initiative (GRI) G3 Sustainability Reporting Guidelines

We have taken into account guidance from HSE Regulations and Enforcement Directorate in the area of governance and management systems, a focus area for 2013 reports. We have also provided extensive information about our approach to worker welfare, as requested by the directorate.

To make its reporting as valuable as possible, RasGas reports in line with good practice in the oil and gas industry, using domestic and international guidelines. For RasGas, sustainability reporting represents a valuable tool in building relationships with stakeholders and in helping to drive better business performance.

RasGas was the first Qatari energy company to issue a sustainability report (in 2009) and since then we have sought to improve the quality of our reporting year on year.

Materiality

We have undertaken a more formal approach to determining the content of this year’s report, in order to identify ‘material’ issues and to assess the relative prominence each issue should be given in our reporting.

Our assessment process has a number of inputs to determine the issues that we need to cover in our reporting. These are:

• IPIECA guidance on issue categories which have been agreed to be most relevant to the oil and gas industry
• GRI guidance to assess issues and indicators
• issues raised by Qatar Petroleum, and by the HSE Directorate under the auspices of its Sustainable Development Industry Reporting programme, which has requested more detailed coverage of selected focal areas each year
• high-profile issues raised in broader contexts, such as national development plans and strategies, or topics highlighted by the media or by non-governmental organisations – in 2013, for example, this has included the topic of worker welfare across Qatar
• issues raised in internal discussions among management and employees about the most important developments in the course of the reporting period – these include internal business developments and priorities, as well as issues arising from RasGas’ regular interaction with external stakeholders

We develop a consolidated list of issues from the inputs and then use a materiality matrix, in line with IPIECA guidance, to assess how each issue features in our reporting. The matrix on page 59 illustrates the issues we have considered and is a tool used to establish the depth and prominence we give to each issue in our report, or whether it is best captured in print or online.
Highest materiality issues for 2013

Safety
• Personal safety, including contractor safety
• Process safety
• Road safety

Economic contribution
• Maintaining levels of production and reliability
• Generating revenues for the state, and our shareholders
• Supporting local suppliers and developing relationships with our supply chain

Governance
• Living the RasGas values
• Maintaining effective management systems for financial and operational control
• Risk management, including enterprise-wide risk

Worker welfare
• Ensuring appropriate living standards for all workers
• Policies and procedures for protecting worker wellbeing
• Managing contractors, and overseeing contractor performance

Qatarization
• Policies and procedures for protecting worker wellbeing
• Risk management, including enterprise-wide risk

GHG emissions and flaring
• GHG strategy implementation
• Progress on five-year flare-minimisation plan

Reliability
RasGas has sought to ensure that the report appropriately reflects the sustainability issues facing the company as well as the views of external stakeholders. RasGas believes that the material issues have been covered and prioritised – that is, the topics and associated indicators that reflect significant economic, environmental and social impact, or would substantively influence the assessments and decisions of stakeholders concerning the company’s sustainability performance.

Transparency
Throughout the report, RasGas has sought to disclose on its activities in the reporting period in a balanced manner. In 2013, we have introduced a specific summary section outlining major achievements and challenges, with a view to providing a balanced picture of the reporting period and the years ahead. The report aims to show all information in a clear, understandable, factual and coherent manner.

We continue to make our report available in English and Arabic. We have also continued to make improvements to our web-based reporting, by extending the amount of information on it, and promoting links to other available information on the RasGas corporate web pages.

Consistency
The qualitative and quantitative information provided in this report builds on that provided in previous annual sustainability reports and covers the indicators required by QP in its sustainable development industry reporting initiative. Where possible, the data provided enables comparison to be made between years. In many cases, it is provided over a five-year period or longer to help identify trends. The use of analysis from benchmarking surveys also facilitates comparison with industry competitors.

By following the IPIECA and GRI indicator protocols, the report seeks to enable ready comparison against other organisations inside and outside the oil and gas industry.

Completeness
The report focuses on RasGas’ activities during the period 1 January to 31 December 2013 and provides information on RasGas’ performance in this period. Where helpful for context, information on activities in 2014 is also provided.

The boundary of this report covers offices, onshore and offshore operations, and projects such as the Barzan Gas Project. Information on the Barzan Gas Project has been significantly expanded in 2013, to include its importance as a business venture, and as a part of our safety, health and environmental management programmes.

RasGas has developed its report with reference to key sustainability reporting principles as set out within internationally accepted reporting frameworks like GRI and good practice among established reporters worldwide.

For 2013, all RasGas LNG and sales gas production trains have been included. In 2010, information relevant to Train 7 was included from June 2010 onwards. In 2011, common condensate and LPG facilities were excluded as these facilities were handed over to Ras Laffan Terminal Operations (RLTO) in March 2011. Other common facilities used by RasGas but operated by RLTO or other operators – such as common sulphur, common VOC thermal oxidiser, LNG storage Lot N facilities and the Laffan Refinery – are not included.

Other than developments in the normal course of business and described in this report, there were no significant changes to the size, structure or ownership of RasGas in the reporting period. We believe the information within the report is consistent with this reporting boundary, and there were no major organisational changes which would affect the data in 2013 compared with 2012. The ‘About RasGas’ section provides an overview of RasGas’ operations.

Accuracy
Quantitative metrics and qualitative descriptions are provided to demonstrate the effectiveness of programmes and practices. Performance data is drawn from RasGas internal management information systems. Where indicated, performance data is shown by reference to benchmarking surveys which compare performance to that of others in the industry.

The sources of environment data are as follows:
• greenhouse gases (GHG) emissions: the methodology used is from the QP GHG Accounting & Reporting Guidelines, which are based on the European Union measurement and reporting guidelines for CO2 and the IPCC Guidelines for CH4 and N2O
• direct measurement (eg water and energy consumption, flaring or waste-water discharge from meter readings)
• calculations based on emission factors and standards (for NOx and other non-GHG air emissions)

Most environment data is reported in metric units. Financial information is reported in US dollars unless otherwise stated. RasGas has IT systems in place to collect all the data in this report. In producing the report, the aim has been to achieve maximum accuracy. Where estimates or other limitations to the data are involved, these are identified. The report has been subject to processes of internal and external review.
Independent report assurance

This report has been subject to an independent external assurance process for the first time. The work was carried out by sustainability professionals from the Doha office of Ernst & Young. The scope of their work and their conclusions are provided in the independent assurance statement.

Independent Assurance Statement to RasGas Management

The RasGas Sustainability Report 2013 (the Report) has been prepared by the management of RasGas (the Company), which is responsible for the collection and presentation of the information within it and reviewed by the Executive Leadership Team. Our responsibility, in accordance with management’s instructions, is to carry out a ‘limited level’ assurance engagement on specific aspects of the Report (as defined under the Scope of Work below). We do not accept or assume any responsibility for any other purpose or to any other person or organisation. Any reliance any such third party may place on the Report is entirely at its own risk.

Our Scope of Work

The scope of our assurance covers indicators and certain principles of reporting (as defined by IPIECA Oil and gas industry guidance on voluntary sustainability reporting1) considered relevant to the Company and includes:

1. Data and information relating to the Company’s sustainability performance identified within the Report’s Global Reporting Initiative (GRI) 3.1 Index as having being assured, for the period 1 January 2013 to 31 December 2013, specifically:
   - ECONOMIC CONTRIBUTION – PRODUCTION
   - CLIMATE CHANGE AND ENERGY – TOTAL GHG EMISSIONS
   - CLIMATE CHANGE AND ENERGY – TOTAL FLARING
   - ENVIRONMENT – NOx PRODUCED
   - ENVIRONMENT – WASTE RECYCLED
   - HEALTH & SAFETY – EMPLOYEE TOTAL RECORDABLE INCIDENT RATE (TRIR)
   - HEALTH & SAFETY – CONTRACTOR TRIR
   - HEALTH & SAFETY – LOSS OF CONTAINMENT/PROCESS SAFETY INCIDENTS
   - HEALTH & SAFETY – INCIDENT INVESTIGATION COMPLETION
   - WORKFORCE – FEMALE EMPLOYMENT
   - WORKFORCE – EMPLOYEE SATISFACTION
   - SOCIETY – QATARIZATION
   - SOCIETY – GOODS AND SERVICES SOURCED LOCALLY

2. The Company’s internal processes and controls relating to the collection and collation of the above sustainability performance data; and

3. Principles contained within IPIECA Oil and gas industry guidance on voluntary sustainability reporting, specifically: Accuracy, Completeness and Relevance.

What we did to form our conclusions

Our assurance engagement has been planned and performed in accordance with ISAE30002. The IPIECA guidance on principles of Relevance, Accuracy and Completeness have been used as criteria against which to evaluate the Report.

In order to form our conclusions we undertook the steps outlined below:

1. Interviewed a selection of executives and senior managers at RasGas’ headquarters in Doha to understand the current status of social, ethical, environmental and health and safety activities and progress made during the reporting period.
2. Reviewed selected headquarters documents relating to social, ethical, environmental and health and safety aspects of RasGas’ performance, to understand progress made across the organisation and to test the coverage of topics within the Report.
3. Reviewed RasGas’ approach to materiality through interviews with employees at headquarters and at Ras Laffan, and reviewed selected associated documentation.
4. Reviewed RasGas’ processes for determining material issues to be included in the Report.
5. Reviewed the coverage of material issues within the report against the key issues raised in the interviews, material issues and areas of performance covered in external media reports and the environmental and social reports of RasGas’ peers, and the topics discussed by the Sustainability Steering Committee and Executive Leadership Team.
6. Reviewed data samples and processes relating to the indicators identified under the Scope of Work to test whether they had been collected, consolidated and reported appropriately at headquarters level.
7. Reviewed and challenged supporting evidence from RasGas Headquarters for a selection of data points, covering the indicators listed under Scope of Work.
8. Reviewed information or explanations about the Report’s data, statements and assertions regarding RasGas’ sustainability performance relating to indicators listed under Scope of Work.

Level of assurance

The extent of evidence gathering procedures for a ‘limited level’ of assurance is less than that of a ‘reasonable’ assurance engagement (such as a financial audit) and therefore a lower level of assurance is provided for the aspects described under the Scope of Work.

The limitations of our review

With the exception of a site visit to RasGas’ refinery at Ras Laffan, our work was limited to headquarters activities. Our assurance activities relating to environmental emissions, including GHG and NOx, assessed the collation and accuracy of conversion of data. We did not verify the accuracy of source data, such as flow monitoring.

Our conclusions

Based on the scope of our review our conclusions are outlined below:

Relevance

Has RasGas provided a balanced representation of material aspects concerning its sustainability performance?

• We are aware of any material aspects concerning RasGas’ sustainability performance which have been excluded from the Report.

• Nothing has come to our attention that causes us to believe that RasGas management has not applied its processes for determining material aspects to be included in the Report, as described on page 57 of the Report.

Has RasGas responded to stakeholder concerns?

• We are not aware of any additional material aspects of stakeholder interest that are not currently included in the Report’s scope and content.

Completeness and accuracy of Performance Information

How plausible are the statements and claims supporting indicators identified under Scope of Work?

• We have reviewed information or explanations on the statements on RasGas’ sustainability activities presented in the Report and we are not aware of any misstatements in the assertions made.

Observations and areas for improvement

Our observations and areas for improvement will be raised in a management report to RasGas management. Selected observations and areas of improvement are provided below. Additional specific observations regarding progress made and areas for improvement can be found in the appropriate sections of the management report. These observations do not affect our conclusions on the RasGas 2013 Sustainability Report set out earlier in this statement.

Observations

• We have seen a structured process at Group level in retaining key sustainability decisions. Plans have been jointly developed with key stakeholders to address common sustainability challenges, for example in relation to process safety, supply chain compliance and community investment activities.

Areas for improvement

• The Report includes limited coverage on RasGas’s economic impacts in Qatar and countries it exports liquefied natural gas (LNG) to. RasGas could consider linking indirect economic impacts with broader socio-economic trends and national agendas to highlight the tangible and intangible return on investment activities in these areas.

• RasGas utilises benchmarking from International Association of Oil and Gas Producers (OGP) and Phillip Townsend Associates (PTA) in understanding its performance relative to its global peers. This year, the Report does not contain benchmark data for 2013 due to the timeliness of the reporting process.

Our independence

This is the first year that Ernst & Young (Qatar) has provided independent assurance services in relation to RasGas’ Sustainability Report. We have provided no other services relating to RasGas’ approach to sustainability reporting.

Our assurance team

Our assurance team has been drawn from our global environment and sustainability network, which undertakes engagements similar to this with a number of significant Middle East and international businesses.

Ernst & Young (Qatar)
Doha
April 2014

Building a better working world

Notes

1. IPIECA Oil and gas industry guidance on voluntary sustainability reporting (2010 revision)
2. ISAE3000 – International Federation of the Accountants’ International Standard for Assurance Engagements Other Than Audits or Reviews of Historical Financial Information
2013 performance against commitments: at a glance

Fatalities (contractors) 1 0 0 1
Fatalities (employees) 0 0 0 0
Lost-time injuries 7 2 2 3

Key performance indicators

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Total recordable injury rate

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Total recordable incidents

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Number of process safety observations per person

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Number of reported safety incidents

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Nitrogen oxides emissions (CO2 equivalent emissions in tonnes)

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Total greenhouse gas emissions

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Total waste recycled (%)

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Sulphur oxides (kilo tonnes)

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Liquefied natural gas (LNG) capacity in million tonnes per year

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Employee engagement

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Average number of CSR activities/proposed (events/sponsorships)

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Percentage of CSR activities that were pro-

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Number of patients seen at the Al Kohr Community Medical Centre

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Total workforce (number)

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Qatarization (% Qatari workforce)

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Cautionary statement

This sustainability report by RasGas Company Limited contains statements relating to the manner in which RasGas intends to conduct its activities in the future, based on management’s current plans and expectations. These statements are not promises or guarantees of future conduct or policy and are subject to a variety of uncertainties and future circumstances, many of which are beyond our control. Therefore, the actual conduct of our activities, including the development, implementation or continuation of any programme, policy or initiative discussed in this report, may differ materially in the future. The statements of intention in this report speak only as of the date of this report. RasGas undertakes no obligation to publicly update any statements in this report. References in the report to other reports or materials, such as a website address, have been provided to direct the reader to other sources of information which may be of interest, but such information does not form part of this report.

Feedback

We welcome your feedback on this report. If you have comments, please contact us at:

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RasGas Company Limited
Sustainability Report 2013
Embracing our responsibilities
Sustainability Report 2013

About this report
This report describes RasGas’ activities in the financial and calendar year 2013 and provides an account of actions and performance data relating to a range of business, economic, environmental and social issues which make up our sustainability performance.

The report, which is our fifth annual sustainability report, has been prepared in accordance with reporting guidelines issued by Qatar Petroleum (QP). As such, it takes account of sustainability reporting guidance specific to the oil and gas industry prepared by the International Petroleum Industry Environmental Conservation Association (IPIECA) and the Global Reporting Initiative (GRI). It includes a focus on the theme of governance, as requested by QP this year.

RasGas was proud to be the first Qatari energy company to issue a sustainability report, in 2009. In 2013, we were delighted to receive first prize for the second year running in the large company category for sustainability reporting under the QP Sustainable Development Industry Reporting initiative.

We have taken new initiatives to develop our reporting processes and improve the report content. We have extended our reporting online, including a new Arabic version in addition to the Arabic printed report. We have carried out a more formal materiality assessment to determine the content and depth of reporting, and have had the report independently assured for the first time. We have adopted the Global Reporting Initiative G3.1 reporting guidelines.

This report contains safety and environmental benchmark data up to 2012 from the International Association of Oil and Gas Producers (OGP) and Phillip Townsend Associates (PTAI). However, the benchmark data for 2013 was not published in time for this report but will be incorporated in our future reporting when available.

We welcome your feedback. If you would like to contact us, please do so at:
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April 2014

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