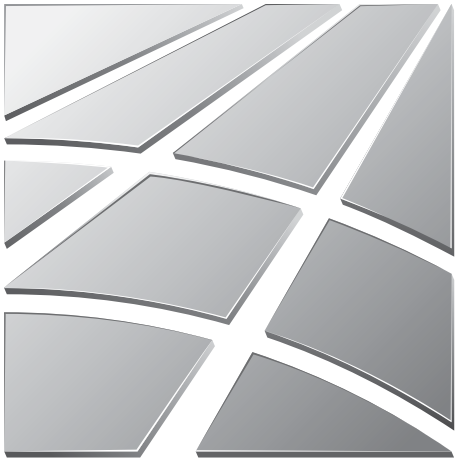
2009



Sustainability Report

Terna

Terna manages electricity transmission in Italy and guarantees its safety, quality and affordability over time. It develops market activities and new business opportunities with experience and competence. It creates value for shareholders with a strong commitment towards professional excellence and with a responsible attitude towards the community while fully respecting the environment it works in.

Translation from the Italian original which remains the definitive version.

2009

Sustainability Report

Terna

Contents

A letter to our stakeholders

As in the past, and even more so, 2009 was a year of significant returns for Terna in both its economic results, which were the best ever, and in terms of sustainability. Going against the unfavourable macroeconomic trend, our economic results indicate an ability to do good work and, especially, to anticipate the effects of the recession and its related risks. This is the background of the disposal of Terna's equity interests in Brazil, which generated a capital gain of over €400 million to the benefit of our dividends and future investment in development.

The concentration of our business in Italy and the projects regarding nearby areas – the Balkans and the Southern Mediterranean first of all – highlight the particular role played by Terna, whose activities at the same time generate value for its shareholders, provide an indispensable service for society, and create opportunities for economic development. The lines interconnecting Italy with other countries will enable the Company to ensure Italy a more secure and cost-effective service, as well as to diversify supply. They will also allow the countries connected to increase their production of electricity by using, among other things, their endowments of renewable energy sources.

Last year was also an important one for upgrading the transmission service in Italy, Terna's specific responsibility. The Company respected and exceeded the targets set by the industry Authority, with positive effects also in terms of reducing the cost of the service. Continuing the acceleration of the previous years, investment amounted to more than €900 million. The SA.PE.I. – the undersea cable connecting Sardinia and the mainland which is the deepest in the world, increases the security of the system, and makes it possible to use more wind energy – went into operation. Many important works included in the Grid Development Plan have completed or will soon complete the authorisation process, so 2010 will be a year of worksites for Terna even more than previous ones.

In keeping with these developments, we have paid even more attention to local communities and the environment. Relations with local institutions are crucial for Terna. That is where solutions embodying concrete respect for local communities can be found, which are necessary in order to construct infrastructure and ensure an efficient and secure service for society. As this report describes in a number of places, the activity of consulting local institutions was very intense. The issue of discussing with local communities will remain a crucial point of Terna's activities and its relations with its stakeholders in the future, too, when there will be great social sensitivity to the construction of large infrastructure.

The consideration of environmental aspects continued to characterise Terna's activities in 2009. The Company continued its initiatives in cooperation with the WWF and the LIPU, which are aimed on the one hand at increasing integration of nature preservation in work carried out to develop the grid and on the other at careful assessment of the interaction

between electric lines and biodiversity. The nesting boxes installed on Terna's pylons have enabled numerous protected species to reproduce. Even in the absence of obligations, there were voluntary actions regarding energy conservation, which led, among other things, to a reduction of the emissions per kilometre of the Company's vehicles and the use of energy-efficient technologies in the Company's new head office.

An appropriate provision of the electricity transmission service also entails constant attention to our people. In 2009, 91% of our employees were involved in training activities, and the transmission of knowledge and experiences was enhanced by the increased use of internal instructors. There were also numerous initiatives for the prevention of occupational injuries, which further improved an already consolidated approach by, among other things, intensifying checks on contract work. And in relation to contracts, Terna signed an agreement with the *Guardia di Finanza*, the Financial Police, to prevent potential risks of criminal infiltration through the companies that construct the infrastructure of the transmission grid.

Again in 2009, Terna contributed to cultural, artistic, and charitable initiatives as a way to return value to local communities and to Italy as a whole. The Terna Prize 02 is the main example: a competition that promotes contemporary Italian artists and in particular young ones by creating a network of exchanges, including with other countries. Nor should we forget – even though the circumstances were tragic – the Company's active contribution on the spot, alongside the public institutions, in the days following the earthquake in Abruzzo.

Two initiatives carried out in 2009 were particularly indicative of our conviction that business management has to go hand in hand with responsibility towards stakeholders. The first was a campaign to disseminate once again the Code of Ethics among all employees to emphasise how everyone's conduct is essential for the construction of relations based on trust with all of the Company's stakeholders. The second was participation in the UN's Global Compact to signal also to the outside world our will to make a positive contribution in terms of social responsibility and sustainability.

Last year acknowledgments of our commitment also abounded. Among the many examples, we wish to mention in particular the inclusion of Terna in the Dow Jones Sustainability World Index, which ranks us among the companies with the largest market capitalisation that distinguish themselves by excellent sustainability performances, a credential that characterises us positively in the eyes of investors who also look at non-financial performances when choosing where to invest. This is not only an important achievement, but also a spur to attain increasingly significant economic, environmental, and social results in the future.

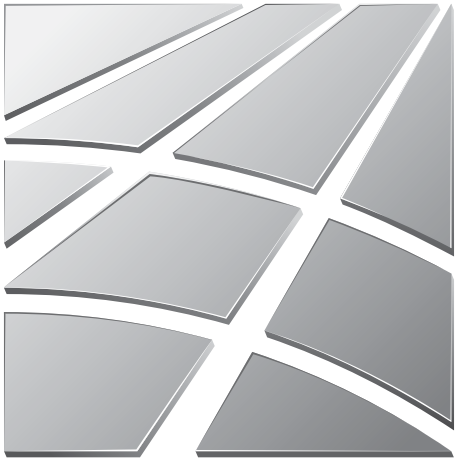
Chairman
LUIGI ROTH

Chief Executive Officer
FLAVIO CATTANEO

“WE CHOSE TO TALK WITH LOCAL COMMUNITIES IN ORDER TO STRIKE A BALANCE BETWEEN LOCAL DEMANDS AND GRID DEVELOPMENT.”

Giuseppe Persia
Environment and Authorisations

2009



A summary of the report

Terna

A summary of the report

Terna

Terna is the main owner of the high-voltage National Transmission Grid, with more than 56,000 kilometres of lines throughout Italy and, in terms of kilometres of lines managed, is the largest independent transmission operator in Europe and the seventh largest in the world. The Company is also responsible for the transmission and dispatching of electricity throughout the country, i.e. the management in safety 365 days a year, 24 hours a day, of the balance between the demand and supply of electricity in Italy, as well as the planning, development, and maintenance of the Grid. After the sale of its equity interests in Brazil in November 2009, the Company's activities abroad – which at present are economically accessory to those in Italy – regard projects, in particular interconnection lines, with the Balkans and the Mediterranean area (pages 30-34). Headed by Luigi Roth, the Chairman, and Flavio Cattaneo, the Chief Executive Officer, Terna has been listed on Borsa Italiana (the Italian stock exchange) since 2004. Its largest shareholder is Cassa Depositi e Prestiti, with 29.99%. About 15% of the share capital is held by Socially Responsible Investors (SRI), an increase with respect to the 10% as of December 2008 and the 13% as of July 2009.

The most significant events of 2009

During 2009, Terna entered into several strategic agreements, created innovative grid infrastructure, and obtained important recognition from sustainability rating agencies. In particular:

- on April 1, 2009, Terna finalised its **acquisition of the assets of ELAT - Enel Alta Tensione** (18,583 km);
- on September 3, 2009, Terna was included in the **Dow Jones Sustainability World Index**, which selects approximately the 300 companies – of which only 12 are Italian – with the best sustainability performances out of the 2,500 companies with the largest market capitalisation in the world;
- on November 3, 2009, Terna finalised the **sale of Terna Participações** to Cemig Geração e Transmissão S.A. The transaction generated a total value amounting to €797 million for Terna, with an impact on net consolidated income for the year exceeding €400 million;
- in November 2009, the first cable of the **SA.PE.I.**, the undersea connection between Sardinia and the mainland – a strategic work that entailed an investment of €700 million – went into operation. With its 435-km undersea segment at a maximum depth of 1,600 metres, the SA.PE.I. is the deepest submarine cable in the world;
- on December 30, 2009, by climbing to €3, **Terna's shares reached their highest value ever**.

The numbers of 2009

Bucking the downward trend of the world economy and many companies, Terna had positive results in 2009. These results regarded revenues, margins, and dividends, but especially investment, which rose again after the significant increases recorded in the preceding years. Terna's investment is extremely important for the entire country. In the short run, it constitutes a contribution with anti-cyclical effects, supporting the economy and employment, while in the medium and long run it ensures Italy essential infrastructure that is more advanced, efficient, and secure.
As of December 31, 2009, the Terna Group's most significant figures were:

- €1,360.7 million of sales revenue;
- more than €900 million of investment;
- €771 million of profit;
- €5,989.10 million of total capitalisation.

New features of the 2009 sustainability report

The 2009 sustainability report was prepared in accordance with the "Sustainability Reporting Guidelines & Electric Utilities Sector Supplement (EUSS)" issued in 2009 by the GRI - Global Reporting Initiative. In line with the transparency that characterises a sustainability approach, the 2009 report contains more information than the previous editions. It includes a total of 79 GRI indicators, 13 more with respect to the 2008 report. **The application level of the GRI guidelines has risen from B+ to A+**: the highest level in terms of the completeness of the information. The present report also contains a table linking the GRI indicators with the 10 Principles of the UN's Global Compact.

The photographs

At the beginning of every chapter there is a portrait of a person who works at Terna. Like many others, each one participated in carrying out projects involving social responsibility. This is a way of highlighting the importance of the contribution of individuals in achieving sustainability objectives.

The main sustainability results

During 2009, Terna made progress in all the areas of Corporate Social Responsibility. In many cases, these results correspond to objectives stated in the 2008 sustainability report. For a precise comparison of objectives and results, see the table on page 39. The following are the most important results and acknowledgments obtained.

General aspects

Code of Ethics: a campaign took off in November 2009 to disseminate the content of the Code of Ethics among all the Company's employees. This activity, which was accompanied by the "Vote your value" initiative (page 36) aimed at getting the personnel involved, ended at the beginning of 2010.
Global Compact: confirming Terna's constant commitment to Corporate Social Responsibility, and in connection with the preceding initiative, in December 2009 the Board of Directors resolved to join the UN's Global Compact, on which see page 36.
Certifications: Terna's integrated quality-environment-security management system obtained the renewal of its ISO 9001, ISO 14001 and OHSAS 18001 certifications. The Company's sustainability governance was enhanced by the institution of an Environmental and Sustainability Steering Committee entrusted with establishing the annual objectives of the corporate sustainability projects, as well as coordinating and monitoring them (page 37).
Sustainability culture: Terna's support of sustainability culture, which it was already pursuing through its participation in the Sodalitas Foundation, was given a further boost when it joined the "Anima per il Sociale nei valori dell'impresa" association (pages 41-42).
Accountability rating: in addition to its inclusion in the Dow Jones Sustainability World Index and other ethical indices, Terna was ranked third – in 2008 it was eighth – in the Accountability Rating Italy 2009, which assesses the sustainability strategies and commitments of the 40 largest Italian companies in terms of market capitalisation, with particular attention to the quality and transparency of the information made available.
Website: the "Sustainability" section of the Company's website was enhanced, among other things by the improvement of the interactive version of the 2008 sustainability report. The communication consultancy Lundquist's CSR Online Awards 2009 study ranked Terna 4th – in 2008 it was 13th – among the listed companies in the S&PMib index.
2008 sustainability report: publishing the 2008 sustainability report earlier allowed it to be widely distributed among the stakeholders concerned. About 1,200 copies were distributed, with a good level of feedback.

Responsibility for the electricity service

Security of the electricity service system: this issue was the focus of numerous initiatives in 2009. The Security Plan included the investment of more than €74 million to improve the systems that protect the transmission service. The protocol of understanding signed in July 2009 by Terna and the Ministry of Home Affairs marked the beginning of a plan for cooperation to safeguard some of the country's most strategic infrastructure (page 57).
AEEG targets: Terna exceeded the performance targets regarding the continuity and quality of the electricity service, which are monitored by the Company and the AEEG (pages 58-60).
"Pylons of the Future": Terna's dedication to new technological solutions entailing positive effects with regard to their impact on the environment and the landscape led to the "Pylons of the Future" international competition. The competition ended in December 2009, with the first prize going to the architect Hugh Dutton, from the Rosental Studio (page 69).

Other significant aspects

- Critical situations in the electric system (page 61)
- The Development Plan and the Strategic Environmental Assessment (page 65)
- ENTSO-E: coordination among European grid operators (page 67)

Economic Responsibility

Economic impact: in addition to the effects implicit in the service provided to users of the electric system, Terna's economic impact is also measured by the sum of the Company's investing activities (more than €900 million in 2009), its creation of employment (the work performed by the employees of contractors and subcontractors amounted to the equivalent of 1,500 full-time employees), and procurement expense, which amounted to €925 million in 2009 and was concentrated on local suppliers (pages 82-83).

Dispatching service: Terna recorded a considerable reduction in the resources it procured in 2009 to provide the dispatching service. This reduction entailed a saving of about €800 million for the system, while the Company obtained the largest sum provided for – €40 million – by the AEEG's special incentive scheme (page 77).
Agreement with the *Guardia di Finanza*: with regard to relations with suppliers, an agreement was signed in November 2009 by Terna and the *Guardia di Finanza* (Financial Police) with the objective of preventing – through transparency in the management of contracts and monitoring suppliers – the risk of criminal infiltration through companies that do contract work to construct the infrastructure of the transmission grid (page 88).

Other significant aspects

- EEI International Utility Award: Terna the best in Europe (page 85)
- The new Dispatching Service Market (page 91)

Environmental Responsibility

Consultations: in 2009 Terna continued its intense activity of holding consultations with local governments regarding the authorisation of works included in the Grid Development Plan (page 50).
WWF and LIPU: the Company also continued its cooperation with the WWF and the LIPU to reduce the impacts and maximise the positive effects of the interaction between electric transmission lines and biodiversity (pages 104-107).
Ornis Italica: as part of its cooperation with Ornis Italica, Terna increased the number of nesting boxes installed on its pylons. In addition to a consolidated population of kestrels, new species – such as rollers and scops owls – found refuge in the artificial nests (pages 108-109).
PCB: the reduction in the quantity of oil containing PCBs was in line with the objectives of the disposal plan, while even more challenging targets were established for 2010 (page 123). As usual, treatment of the waste focused on recycling (83% of the total).
Emissions of CO_2: although Terna has no obligations under the Kyoto Protocol or emission trading schemes, the Company implemented numerous initiatives aimed at containing CO_2 emissions, which in 2009 recorded a reduction with respect to the previous year (-9.7% direct emissions in Italy). In particular, the emissions per kilometre driven by the corporate vehicle fleet decreased by 11.1% (page 118). The renovation of Terna's new head office was also characterised by energy-efficient solutions (page 117).
Grid Development Plan: Terna's largest contribution, albeit indirect, to the fight against climate change came from its Grid Development Plan. Considering the Plan as a whole – with its effects in terms of grid efficiency, the change in the production mix, and the connection of plants using renewable energy sources – the reduction of system emissions by the end of the Plan is estimated at about 8 million tons of CO_2-equivalent (page 119).
Environmental costs: Terna's commitment to the environment is shown by the costs incurred for environmental reasons, which in 2009 were calculated separately for the first time. Capital expenditure amounted to more than €42 million, while operating costs totalled €9 million (pages 124-125). This item does not include SunTergrid's investment in its photovoltaic project (page 26).

Other important aspects

- The integrated planning process (page 97)
- Sustainable development of the grid in Bussolengo and Verona (page 98)
- The reorganisation of the electric network in Rome (page 99)
- Electric and magnetic fields: the limits provided for by law (page 100)
- Pylons with low environmental impact (page 101)
- The Trino-Lacchiarella line (page 102)
- The Molentargius-Saline Park (page 107)
- The SA.PE.I. (page 107)
- Peregrine is flying again in Rome (page 109)
- Consumption by floodlight towers (page 116)
- A pact for the environment (page 120)
- Priority to wind energy (page 120)
- Terna shifts to ecological paper (page 121)

Social Responsibility

Generational turnover: in 2009, personnel dynamics were again characterised by a low outflow rate from spontaneous resignations (0.7%). Most of the employees who left the Company had satisfied the requirements for retirement. Terna has developed specific instruments to cope with the generational turnover that these outflows will determine in the next few years (page 131). Particularly important among these is the transmission of knowledge and experiences organised by using the in-house instructors of the Campus faculty (page 133).

Training: training confirmed that it is a strong point in enhancing human resources. In 2009, 47 hours of training per employee were provided, with 91% of them covered, which testifies to Terna's attention to continual training.
Occupational safety: numerous initiatives were carried out in 2009 regarding the prevention of accidents in the workplace, which further improved an already consolidated approach. Particularly worthy of note were "Safety Day", which involved all the Company's employees, and the increased centralised monitoring of worksite activities and contract work (pages 141-142). In 2009, the number of occupational injuries decreased, as well as both the frequency rate and the lost-day rate of injuries (page 143).
Prevention of corruption: in February 2010, the sustainability rating agency Vigeo published a study on the instruments and strategies of the largest European and North American companies (772 from 18 countries) regarding the prevention of corruption. Terna was ranked among the top 20 companies, as well as the number one company in both Italy and the electricty industry (pages 147-148).
Corporate giving: the Terna Prize 02 is the most important example of the Company's corporate giving, which in 2009 earmarked more than €1.7 million for donations and sponsorships, mainly in the field of art and culture (pages 149-150), as a way of returning value to local communities and the entire country.

Other significant aspects

- The FiGi project – engineering schools and large enterprises (page 132)
- Terna Prize 02: the pursuit of a new aesthetics between topicality and sustainability (page 151)

Sustainability objectives

The objectives for 2010 – see page 39 for the details – constitute further steps in the same direction. Particularly worthy of note are the following:

- the presentation of the 2009 sustainability report inside the Company, with dedicated meetings, and intensified presentations to external stakeholders;
- enhancement of the sustainability section of the Company's website;
- completion of the projects with the WWF and the LIPU;
- acceleration of the programme for reducing oils with PCBs;
- improvement of the recording of injuries of contractor employees.

Selective reading for stakeholders

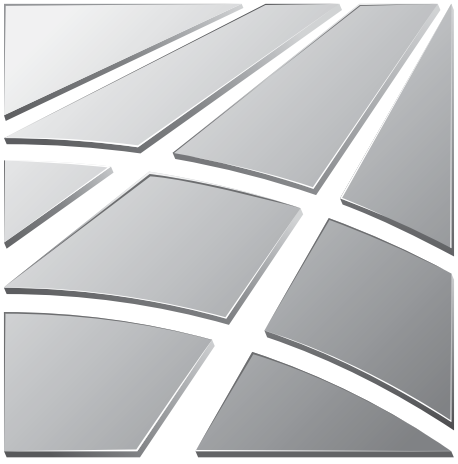
The 2009 sustainability report adopts several suggestions made by groups of stakeholders to whom the Company sent a copy of the preceding edition and then involved in panel discussions. In particular, we have taken into account the fact that Terna's stakeholders are normally more interested in the parts of the report that concern them most directly.
With the current organisation of the report in four areas of responsibility – economic, social, and environmental plus the electricity service – the information that is significant for the single stakeholder categories is scattered throughout the text. In order to facilitate a selective reading, the following scheme is provided.
An entire section of the Profile of Terna is dedicated to "stakeholder engagement". It contains a table with the mapping of the categories (page 47), the commitments to them undertaken by the Company, and the monitoring instruments activated to check their actual progress. These categories are then used in other parts of the report.
The reading of paragraphs or, in some cases entire dedicated sections with in-depth boxes, allows readers to create selective paths connecting the discussion of the categories that specifically interest them.

- Shareholders, financial analysts, and providers of capital: pages 27, 42, 46, 74, 75, 76, 77, 80, 84, 85
- Employees: pages 36, 44, 48, 78, 80, 81, 117, 118, 121, 128-145
- Suppliers: pages 51, 80, 81, 82, 87, 88, 89, 141, 142, 143, 147, 148
- Grid users, customers, and business partners: pages 40, 49, 56-71, 89, 90, 91, 116
- Regulatory authorities and institutions, AEEG: pages 40, 41, 56-71, 76-78, 95, 96, 97, 148, 149
- Institutions and associations: pages 41, 42, 49, 50, 57, 65, 67, 80, 81, 95-99, 105
- *Media*, opinion groups, and the scientific community: page 51
- Society and local communities: pages 40, 41, 44, 49, 50, 64-66, 69, 94-102, 104-123, 146-151

“THE GLOBAL PERFORMANCE SYSTEM ENABLES OUR PEOPLE TO FIND THE GROWTH PATH THAT’S BEST FOR THEM.”

Rosanna Berretta
Organisation and Resource Development

2009



Methodological note

Terna

Methodological note

The Terna Group's sustainability report for the year ended December 31, 2009 (hereinafter the "2009 sustainability report") was prepared in accordance with the "Sustainability Reporting Guidelines & Electric Utilities Sector Supplement (EUSS)" established in 2009 by the GRI - Global Reporting Initiative and is based on Terna's objectives in relationship to its sustainability performance and its reporting of the results achieved.
The process of writing the document included identifying the significant aspects to report, as well as the improvement of the processes of management and internal control of the data and information presented in the report.
As in previous years, the report was subjected to specific auditing procedures by KPMG – whose assurance report is attached – and was approved by Terna's Board of Directors.
The period concerned is 2009 and all the data regard the year ended December 31, 2009. However, significant events that occurred up to March 31, 2010 have also been included.
Last year's report, which was approved by Terna's Board of Directors in June 2009, reports the most important information up to April 30, 2009.
The main innovations in the 2009 report, which are described in detail in this note, are:

- the increase in the number of indicators, with the step up from the B+ application level to the GRI's highest level, A+;
- the change in the Group's boundary following the sale of the Brazilian subsidiary Terna Participações in November;
- a different way of inserting the indicators in the text of the report, as explained below;
- the inclusion of references and links to the ten principles of the Global Compact, so that the report can also constitute the source of information for the preparation of the annual communication on progress.

The G3 indicators to include were chosen on the basis of a careful assessment of the purpose of each one and its relevance to Terna's activities and the interests of the latter's stakeholders. In effect, the report is addressed ideally to all the stakeholders specified in the Company's Code of Ethics.
To facilitate readers who wish to find the information provided for by the GRI's Reporting Guidelines, the present methodological note includes the GRI's Content Index table, which also explains any limitations regarding an indicator (for example, partial coverage or data available for less than a quarter).
The data were calculated precisely on the basis of the entries in Terna's general accounting and other information systems. In cases where indicators are based on estimates, the procedure followed is specified.

The structure of the report

The division of the report into chapters is the same as in the previous editions. After the profile of Terna, there are four central sections: three that correspond to the triple bottom line – economic, environmental and social – which is typical of sustainability reports, preceded by the section on the responsibility for the electricity service, which is peculiar to Terna.
In each of the chapters dedicated to the four areas of responsibility, the treatment of the subjects has been organised differently than in the previous editions in order to make the explanation of Terna's performance more effective and the document easier to read. As always, each chapter begins with an explanation of the managerial approach to the specific area of responsibility. After that come several thematic sections providing – in a single, integrated text – both the precise information required by the G3 Guidelines and the in-depth information that Terna thinks it important to provide. Again in order to make the report easier to read, information regarding specific G3 indicators is marked in the margin by the initials and number of the indicator in question, which are placed next to the title of the section if the entire text is considered relevant.
The report is completed by several tables with additional numerical indicators and a glossary of technical terms that are specific to the electricity industry. In the beginning of the "Tables of indicators" section there is a table showing all the changes with respect to the additional indicators provided by the 2008 sustainability report, with the related explanation.

Boundary and indicators

Unless specified otherwise, the data and other information contained in the 2009 sustainability report regard the boundary that includes Terna S.p.A. and the companies that were consolidated by the direct method in the annual report as at and for the year ended December 31, 2009. In accordance with the GRI Boundary Protocol, the sustainability report includes all the companies on which Terna, directly or indirectly, exercises control. No relations exist with joint ventures, subsidiaries, and leased businesses that could significantly influence the comparability of the data or the boundary.
With respect to the 2008 sustainability report, the most important change with regard to the boundary stems from the sale of the equity interest – amounting to 66% of the share capital – in Terna Participações and Terna's consequent definitive exit from Brazil in November 2009.
Therefore, **with regard to all indicators, Italy is the boundary for Group data as of December 31, 2009**. Unlike in previous years, there is no longer any distinction between indicators regarding the Group and others, regarding activities in Italy: all 2009 indicators are Group indicators. Problems concerning the correct **comparison with previous years** were handled in the following ways.

- Indicators for which only the aggregate Group figure was published in 2008: the 2009 report contains a 2007-2009 table with aggregate Group data and a 2007-2009 table with only Italy as the boundary. In the case of the value added – the EC1 indicator – special reconciliations presented in the table regarding the 2009 Group data enable the comparison to be made.
- Indicators for which Group data presented separately for Italy and Brazil were published in 2008: the 2009 report includes a 2007-2009 table with Italy as the boundary, while the relevant 2007-2008 information regarding Brazil is referred to in notes or in the text.
- Indicators for which data regarding only the Italy boundary were published in 2008: the 2009 report contains a 2007-2009 table with Italy as the boundary, while the absence of Group data for the preceding years is pointed out in the notes to the Index of the GRI contents.

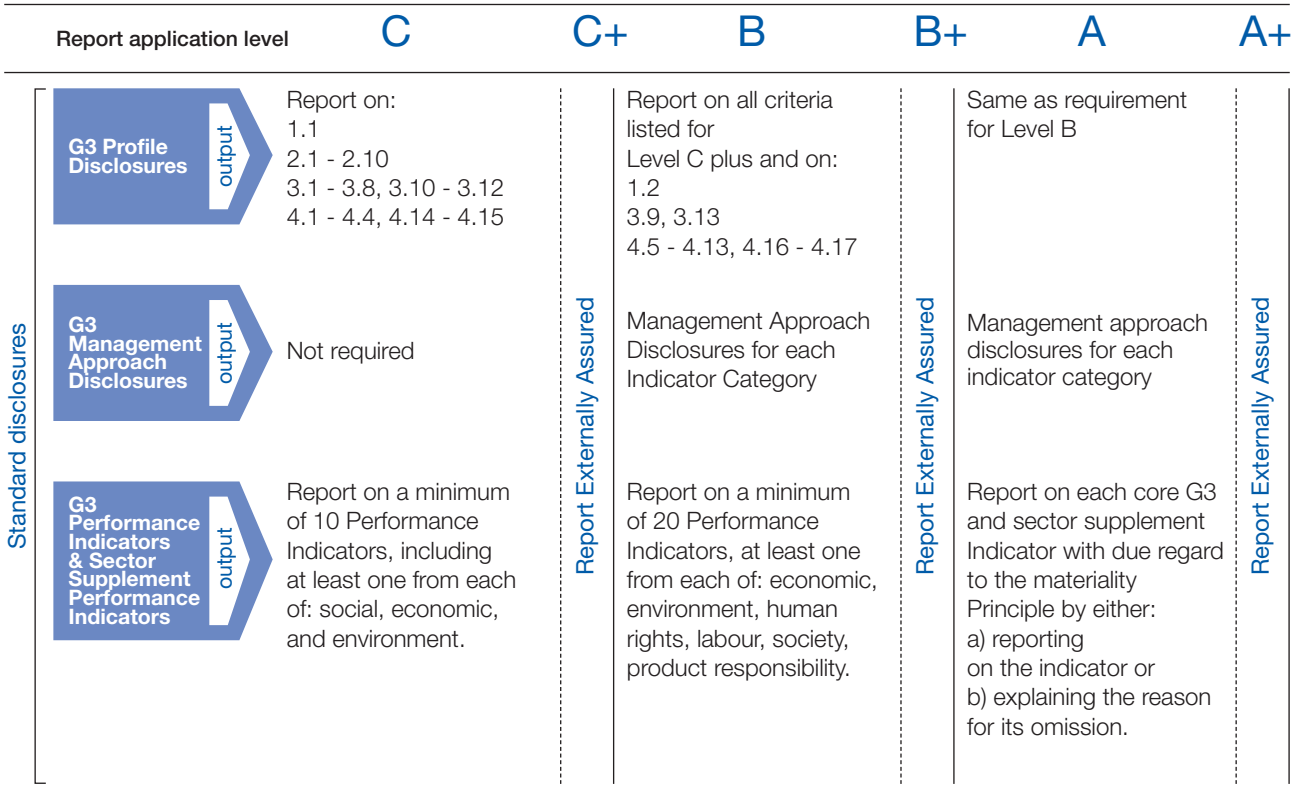
As far as the last point is concerned, it should be noted that the reasons for including only the Italian boundary were connected either with the impossibility of collecting data efficiently or that met satisfactory qualitative standards or with the scarce significance of the phenomenon. It should also be observed that the information regarding Italy was in any case considered representative of the Group situation even in the years prior to 2009, given the reduced relative weight of the Brazilian activities. In effect, in 2008, Terna's business in Italy accounted for:

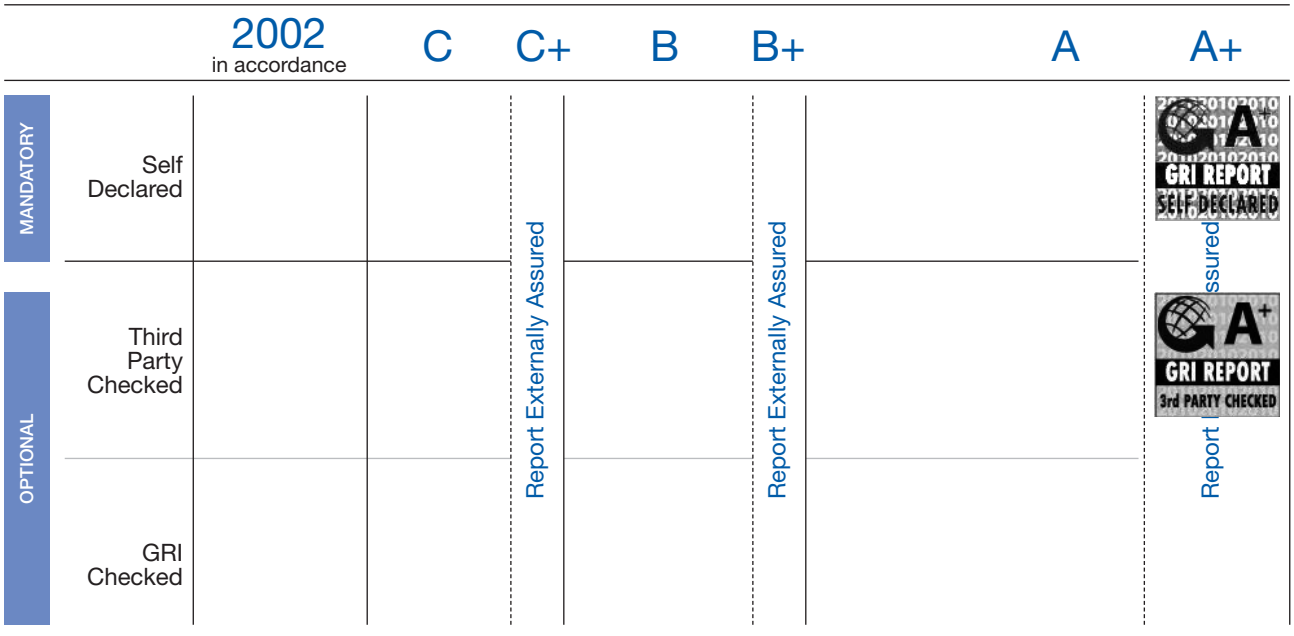
- about 86% of Group's revenue;
- about 94% of the Group's employees;
- about 92% of the length of the electric grid owned by the Group.

All the G3 indicators published are listed below in the Index of the GRI contents, which also accounts for any limitations regarding the requirements of the Reporting Guidelines. The 2009 report also notes if the indicator appears here for the first time. The list also includes the core indicators necessary for the application of the Guidelines at the A level that do not apply to Terna.

For comments, requests, or observations on Terna's performance and on how the latter is accounted for in this sustainability report, please write to csr@terna.it, phone Terna at (Italy – 06.8313.111) and ask for the unit in charge of the report, or write a letter to:

DEPARTMENT OF EXTERNAL RELATIONS AND COMMUNICATION
CORPORATE SOCIAL RESPONSIBILITY
Terna S.p.A.
Viale Egidio Galbani, 70
00156 - Rome, Italy


Report application level
C
C+
B
B+
A
A+
Standard disclosures
G3 Profile Disclosures
output
Report on:
1.1
2.1 - 2.10
3.1 - 3.8, 3.10 - 3.12
4.1 - 4.4, 4.14 - 4.15
G3 Management Approach Disclosures
output
Not required
G3 Performance Indicators & Sector Supplement Performance Indicators
output
Report on a minimum of 10 Performance Indicators, including at least one from each of: social, economic, and environment.
Report Externally Assured
Report on all criteria listed for Level C plus and on:
1.2
3.9, 3.13
4.5 - 4.13, 4.16 - 4.17
Management Approach Disclosures for each Indicator Category
Report on a minimum of 20 Performance Indicators, at least one from each of: economic, environment, human rights, labour, society, product responsibility.
Report Externally Assured
Same as requirement for Level B
Management approach disclosures for each indicator category
Report on each core G3 and sector supplement Indicator with due regard to the materiality Principle by either:
a) reporting on the indicator or
b) explaining the reason for its omission.
Report Externally Assured


2002
in accordance
C
C+
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B+
A
A+
MANDATORY
Self Declared
OPTIONAL
Third Party Checked
GRI Checked
Report Externally Assured
Report Externally Assured
Report Externally Assured
GRI REPORT
SELF DECLARED
GRI REPORT
3rd PARTY CHECKED

Index of the GRI Contents

The Index of the GRI Contents is a table of the contents of this sustainability report, which enables readers to find indicators quickly and use them to check the Company's performance and compare it with those of other companies that use the same reporting standard.
Each performance indicator has a code regarding the area concerned and the pages of the document where it is found.

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	3.09	Methodological note
	3.10	Methodological note
	3.11	Methodological note
	GRI Content Index	
	3.12	17
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	Governance	
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5. Management approach and performance indicators		
	Economic	74
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	Labour practices and decent work	128
	Human rights	146
	Society	146
	Product responsibility	56

(1) These are page references of the annual Corporate Governance report that is part of Terna's 2009 annual report, available at www.terna.it.

List of G3 performance indicators published

Code	Indicator	Notes	Page
EC1	Direct economic value generated and distributed, including revenues, operating costs, employee compensation, donations and other community investments, retained earnings and payments to capital providers and to governments.		80; 83
EC2	Financial implications and other risks and opportunities for the organisation's activities due to climate change.		79
EC3	Coverage of the organisation's defined benefit plan obligations.		78
EC4	Significant financial assistance received from government.	Available since 2009.	27; 80
EC6	Policy, practices, and proportion of spending on locally-based suppliers at significant locations of operation.		82-83
EC7	Procedures for local hiring at significant locations of operation and proportion of senior management hired from the local community.		136; 287[2]
EC8	Development and impact of infrastructure investments and services provided primarily for public benefit through commercial, in-kind, or pro bono engagement.	Available since 2009.	83; 95
EC9	Understanding and describing significant indirect economic impacts, including the extent of impacts.	Available since 2009.	82-83
EN1	Materials used by weight or volume.	Available since 2009.	121-123
EN2	Percentage of materials used that are recycled input materials.	Available since 2009 (qualitative).	121
EN3	Direct energy consumption by primary energy source.	Group data available since 2008.	109-110
EN4	Indirect energy consumption by primary energy source.	Group data available since 2008.	109-110
EN5	Energy saved due to conservation and efficiency improvements.	Available since 2009.	117
EN7	Initiatives to reduce indirect energy consumption and reductions achieved.	Available since 2009.	116-118
EN8	Total water withdrawal by source.	Data available since 2008.	122
EN11	Location and size of land owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas.		104-105
EN12	Description of significant impacts of activities, products, and services on biodiversity in protected areas and areas of high biodiversity value outside protected areas.		68; 104
EN13	Habitats protected or restored.		105; 106; 107
EN14	Strategies, current actions, and future plans for managing impacts on biodiversity.		105-106; 108; 117
EN16	Total direct and indirect greenhouse gas emissions by weight.	Group data available since 2008.	110-111
EN17	Other relevant indirect greenhouse-gas emissions by weight.	Data available since 2008 (2008 Italian perimeter).	111-114
EN18	Initiatives to reduce greenhouse gas emissions and reductions achieved.		115-118
EN19	Emissions of ozone-depleting substances by weight.	Available since 2009.	114
EN20	NOx, SOx, and other significant air emissions by type and weight.	Not applicable.	
EN21	Total water discharge by quality and destination.	Not applicable.	
EN22	Total weight of waste by type and disposal method.		122-123
EN23	Total number and volume of significant spills.		95
EN26	Initiatives to mitigate environmental impacts of products and services, and extent of impact mitigation.		95-97; 98-102
EN27	Percentage of products sold and their packaging materials that are reclaimed by category.	Not applicable.	
EN28	Monetary value of significant fines and total number of non-monetary sanctions for noncompliance with environmental laws and regulations.		41; 95
EN29	Significant environmental impacts of transporting products and other goods and materials used for the organisation's operations, and transporting members of the workforce.		110; 111; 118
EN30	Total environmental protection expenditures and investments by type.	Available since 2009.	95; 124-125

(2) This are page references of the annual Corporate Governance report that is part of Terna's annual report 2009 available at www.terna.it.

Code	Indicator	Notes	Page
LA1	Total workforce by employment type, employment contract, and region.		82; 128-131
LA2	Total number and rate of employee turnover by age group, gender, and region.		128-130
LA3	Benefits provided to full-time employees that are not provided to temporary or part-time employees, by major operations.		135
LA4	Percentage of employees covered by collective bargaining agreements.		89; 144
LA5	Minimum notice period(s) regarding significant operational changes, including whether it is specified in collective agreements.		145
LA6	Percentage of total workforce represented in formal joint management-worker health and safety committees that help monitor and advise on occupational health and safety programs.		144
LA7	Rates of injury, occupational diseases, lost days, and absenteeism, and total number of work-related fatalities by region.		143
LA8	Education, training, counselling, prevention, and risk-control programs in place to assist workforce members, their families, or community members regarding serious diseases.		135
LA9	Health and safety topics covered in formal agreements with trade unions.	Available since 2009.	144
LA10	Average hours of training per year per employee by employee category.		134
LA12	Percentage of employees receiving regular performance and career development reviews.	Available since 2009.	135
LA13	Composition of governance bodies and breakdown of employees per category according to gender, age group, minority group membership, and other indicators of diversity.		128-130; 136-140
LA14	Ratio of basic salary of men to women by employee category.		136-140
HR1	Percentage and total number of significant investment agreements that include human rights clauses or that have undergone human rights screening.		146-147
HR2	Percentage of significant suppliers and contractors that have undergone screening on human rights and actions taken.		87
HR4	Total number of incidents of discrimination and actions taken.		146-147
HR5	Operations identified in which the right to exercise freedom of association and collective bargaining may be at significant risk, and actions taken to support these rights.		36; 144; 146-147
HR6	Operations identified as having significant risk for incidents of child labour, and measures taken to contribute to the elimination of child labour.		36; 146-147
HR7	Operations identified as having significant risk for incidents of forced or compulsory labour, and measures taken to contribute to the elimination of forced or compulsory labour.		36; 146-147
HR9	Total number of incidents of violations involving rights of indigenous people and actions taken.		146-147
SO1	Nature, scope, and effectiveness of any programmes and practices that assess and manage the impacts of operations on communities, including entering, operating, and exiting.	Available since 2009.	49-50; 82; 95-102; 146
SO2	Percentage and total number of business units analysed for risks related to corruption.		147
SO3	Percentage of employees trained in organisation's anti-corruption policies and procedures.		147
SO4	Actions taken in response to incidents of corruption.		41; 147
SO5	Public policy positions and participation in public policy development and lobbying.		148-149
SO6	Total value of financial and in-kind contributions to political parties, politicians, and related institutions by country.		149
SO7	Total number of legal actions for anticompetitive behaviour, anti-trust, and monopoly practices and their outcomes.		41
SO8	Monetary value of significant fines and total number of non-monetary sanctions for noncompliance with laws and regulations.		41

Code	Indicator	Notes	Page
PR1	Life cycle stages in which health and safety impacts of products and services are assessed for improvement, and percentage of significant products and services categories subject to such procedures.	Not applicable.	
PR3	Type of product and service information required by procedures, and percentage of significant products and services subject to such information requirements.	Not applicable.	
PR6	Programmes for adherence to laws, standards, and voluntary codes related to marketing communications, including advertising, promotion, and sponsorship.	Not applicable.	
PR8	Total number of substantiated complaints regarding breaches of customer privacy and losses of customer data.		58
PR9	Monetary value of significant fines for non-compliance with laws and regulations concerning the provision and use of products and services.		41

List of G3 performance indicators published in the supplement for the electric utility sector (EUSS)

Code	Indicator	Notes	Page
EU1	Installed capacity, broken down by primary energy source and by regulatory regime.		26
EU2	Net energy output broken down by primary energy source and by regulatory regime.		26
EU3	Number of residential, industrial, institutional, and commercial customer accounts.		90
EU4	Length of above and underground transmission and distribution lines by regulatory regime.		27
EU5	Allocation of CO_2 emissions allowances or equivalent, broken down by carbon trading framework.	Not applicable.	
EU6	Management approach to ensure short- and long-term electricity availability and reliability.		30-31; 57; 64-67; 68
EU7	Demand-side management programmes including residential, commercial, institutional and industrial programmes.	Not applicable.	
EU8	Research and development activity and expenditure aimed at providing reliable electricity and promoting sustainable development.		68-71; 120
EU9	Provisions for decommissioning of nuclear power sites.	Not applicable.	
EU10	Planned capacity against projected electricity demand over the long term, broken down by energy source and regulatory regime.	Not applicable.	
EU11	Average generation efficiency of thermal plants by energy source and by regulatory regime.	Not applicable.	
EU12	Transmission and distribution losses as a percentage of total energy.		114
EU13	Biodiversity of offset habitats compared to the biodiversity of the affected areas.		101; 106
EU14	Programmes and processes to ensure the availability of a skilled workforce.		131; 132-134
EU15	Percentage of employees eligible to retire in the next 5 and 10 years broken down by job category and by region.	Available since 2009.	131
EU16	Policies and requirements regarding health and safety of employees and employees of contractors and subcontractors.		88; 141-143
EU17	Days worked by contractor and subcontractor employees involved in construction, operation & maintenance activities.	Available since 2008.	131
EU18	Percentage of contractor and subcontractor employees that have undergone relevant health and safety training.		88
EU19	Stakeholder participation in the decision making process related to energy planning and infrastructure development.		49; 95
EU20	Approach to managing the impacts of displacement.		146
EU21	Contingency planning measures, disaster/emergency management plan and training programs, and recovery/restoration plans.		56-57; 61; 131

Code	Indicator	Notes	Page
EU22	Number of people physically or economically displaced and compensation, broken down by type of project.		146
EU23	Programs, including those in partnership with government, to improve or maintain access to electricity and customer support services.		30-33; 67
EU24	Practices to address language, cultural, low literacy and disability related barriers to accessing and safely using electricity and customer support services.	Not applicable.	
EU25	Number of injuries and fatalities to the public involving company assets, including legal judgments, settlements and pending legal cases of diseases.		41
EU26	Percentage of population unserved in licensed distribution or service areas.	Not applicable.	
EU27	Number of residential disconnections for non-payment, broken down by duration of disconnection and by regulatory regime.	Not applicable.	
EU28	Power outage frequency (SAIFI).		59
EU29	Average power outage duration (SAIDI).	Not applicable.	
EU30	Average plant availability factor by energy source and by regulatory regime.	Not applicable.	

Explanation of the non-applicability of some GRI core indicators

Code	Indicator	Explanation of the non-applicability
EN20	NOx, SOx, and other significant air emissions by type and weight.	Terna's activities do not include combustion processes, and thus do not generate significant NOx, and SOx emissions.
EN21	Total water discharge by quality and destination.	Water is not part of the production cycle of Terna's service.
EN27	Percentage of products sold and their packaging materials that are reclaimed by category.	The service provided by Terna does not include the activities mentioned in this indicator.
PR1	Life cycle stages in which health and safety impacts of products and services are assessed for improvement, and percentage of significant products and services categories subject to such procedures.	Given the nature of the service, Terna is not affected by problems of safety and security of product toward business partners (customers). Safety and security impacts of the service are considered in the relation with society (see box "Electric and magnetic fields: the limits provided for by the law").
PR3	Type of product and service information required by procedures, and percentage of significant products and services subject to such information requirements.	The service provided by Terna does not include the activities mentioned in this indicator.
PR6	Programmes for adherence to laws, standards, and voluntary codes related to marketing communications, including advertising, promotion, and sponsorship.	The service provided by Terna does not include the activities mentioned in this indicator.
EU5	Allocation of CO_2 emissions allowances or equivalent, broken down by carbon trading framework.	Terna is not subject to emissions reduction obligations or emissions trading schemes.
EU7	Demand-side management programmes including residential, commercial, institutional and industrial programs.	Demand-side management programmes are not part of Terna's regulatory framework.
EU9	Provisions for decommissioning of nuclear power sites.	Terna neither possesses nor manages nuclear power plants and does not operate in the decommissioning field.
EU10	Planned capacity against projected electricity demand over the long term, broken down by energy source and regulatory regime.	Terna's responsibility in terms of demand over the long term is limited to the management of the electrical system, with no implications for energy generation. See "Profile of Terna", especially "Processes and organisation", and "Responsibility for the Electricity Service", especially "Our approach" and "The security of the electrical system".
EU11	Average generation efficiency of thermal plants by energy source and by regulatory regime.	Terna neither possesses nor manages thermoelectric power plants.
EU24	Practices to address language, cultural, low literacy and disability related barriers to accessing and safely using electricity and customer support services.	The service provided by Terna does not include the activities mentioned in this indicator.
EU26	Percentage of population unserved in licensed distribution or service areas.	Terna does not have relations with final customers of the electrical service.
EU27	Number of residential disconnections for non-payment, broken down by duration of disconnection and by regulatory regime.	Terna does not have relations with final customers of the electrical service.
EU29	Average power outage duration (SAIDI).	Performance indicator not linked with the business of energy transmission.
EU30	Average plant availability factor by energy source and by regulatory regime.	Terna neither possesses nor manages electrical power plants with significant installed power (see Profile – The Terna Group on pages 26; 115).

Connection with the Global Compact's 10 Principles

The following table shows the GRI G3 indicators that apply to Terna and their relationship to each of the 10 Principles of the Global Compact. It aims to facilitate finding information relevant to stakeholders who wish to assess Terna's implementation of the Principles. To find the pages on which the GRI indicators are discussed, see the tables of the Index of the GRI contents.

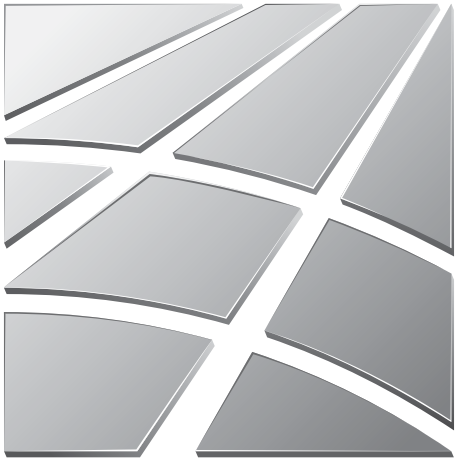
Area	Global Compact Principle	GRI Indicator
Human rights	**Principle 1** Businesses should support and respect the protection of internationally proclaimed human rights.	LA4, LA6, LA7, LA8, LA9, LA13 LA14, HR1, HR2, HR4, HR5, HR6, HR7, HR9, SO5, PR8.
	Principle 2 Businesses should make sure that they are not complicit in human rights abuses.	HR1, HR2, HR4, HR5, HR6 HR7, HR9, SO5.
Labour	**Principle 3** Businesses should uphold the freedom of association and the effective recognition of the right to collective bargaining.	LA4, LA5, HR1, HR2, HR3, HR5, SO5.
	Principle 4 Businesses should uphold the elimination of all forms of forced and compulsory labour.	HR1, HR2, HR7, SO5.
	Principle 5 Businesses should uphold the effective abolition of child labour.	HR1, HR2, HR6, SO5.
	Principle 6 Businesses should uphold the elimination of discrimination in respect of employment and occupation.	EC7, LA2, LA13, LA14, HR1, HR2, HR4, SO5.
Environment	**Principle 7** Businesses should support a precautionary approach to environmental challenges.	EC2, EN18, EN26, EN30, SO5.
	Principle 8 Businesses should undertake initiatives to promote greater environmental responsibility.	EN1, EN2, EN3, EN4, EN5, EN7, EN8, EN11, EN12, EN13, EN14, EN16, EN17, EN18, EN19, EN22, EN23, EN26, EN28, EN29, EN30, SO5.
	Principle 9 Businesses should encourage the development and diffusion of environmentally friendly technologies.	EN2, EN5, EN7, EN18, EN 26, EN30, SO5.
Corruption	**Principle 10** Businesses should work against corruption in all its forms, including extortion and bribery.	SO2, SO3, SO4, SO5, SO6.

References: GRI-Global Compact, "Making the connection", May 2007.

“THE SA.PE.I. IS OUR TECHNOLOGICAL FLAGSHIP: THE DEEPEST AND LONGEST UNDERSEA CABLE IN THE MEDITERRANEAN.”

Luigi Ranauro
Latina Station Operating Group

2009



Terna profile

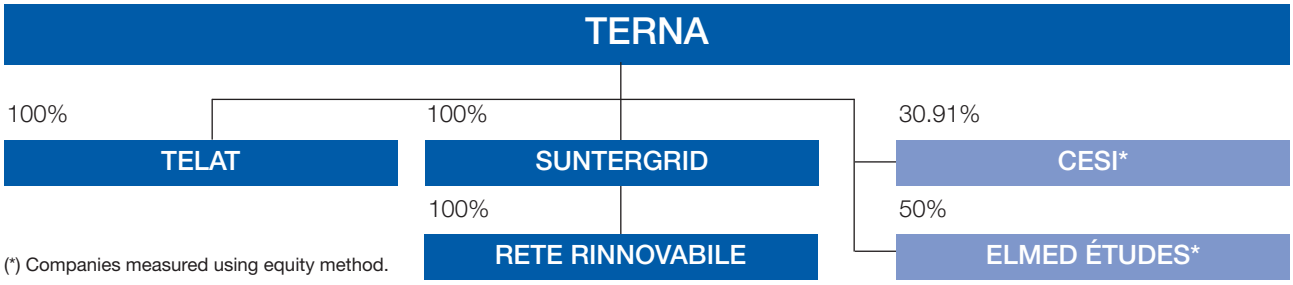
Terna

Presentation of the Company

Terna is the largest independent transmission system operator (TSO) in Europe and the seventh largest in the world in terms of kilometres of lines managed.
The Company's registered office is in Rome and it is the main owner (99%) of the Italian national transmission grid (NTG), with more than 56,000 kilometres of high-voltage lines (more than 62,000 kilometres of three-phase conductors), 383 transformation substations, and 18 lines interconnecting with foreign grids as of December 31, 2009.
It owes its name to the set of the three conductors or groups of conductors – in Italian, a terna – used to transport each of the three phases of the three-phase electrical field in alternating-current grids.
In Italy, Terna is the government-licensed transmission system operator, responsible for transmitting and dispatching electricity on the high- and ultra-high-voltage grid throughout the country.
Terna is also responsible for the planning, construction, and maintenance of the grid.

The Terna Group

After the sale of its shareholding in Brazil in November 2009, the structure of its equity interests is as follows:



(*) Companies measured using equity method.

As of December 31, 2009, the Terna Group comprised:
- SunTergrid S.p.A. (formerly InTernational S.p.A.) and TELAT S.r.l., directly controlled, 100%-owned Italian companies;
- RTR S.r.l., an Italian company indirectly controlled through SunTergrid S.p.A., which owns 100% of it;
- two companies, measured using the equity method, in which Terna S.p.A. has an equity interest: CESI S.p.A., an associate company (30.91% equity stake), and ELMED ÉTUDES Sàrl, a jointly-controlled company (50% equity stake).

CESI is the leading company in the market of testing and certifying electro-mechanical equipment and consultancy on electric systems. It covers all the stages of the life cycle of the electric system and offers companies therein (generation, transmission, and distribution), manufacturers of electrical and electronic equipment, large consumers of electricity, and local and national governments a complete range of services aimed at solving problems connected with the production processes of the entire electricity industry.
ELMED ÉTUDES is the company entrusted by Terna and the Tunisian electricity company STEG with the feasibility study on the Italy-Tunisia undersea interconnection.

EU1
EU2

In order to make the best use of its resources and maximise the profitability of its assets, in 2009 Terna instructed its subsidiary **SunTergrid** to undertake the construction and management of photovoltaic plants with about 100 MWp of total power on plant-free land next to transformation stations, leased from the Parent Company. At the end of the year, the new business was only minimally operative, with only a single plant in operation, in Ragusa. The production of electricity was absolutely negligible in 2009 and will be significant only beginning in 2010. The energy produced will be withdrawn and exploited by GSE S.p.A., according to the dedicated-withdrawal mechanism provided for by the energy account, thus ensuring Terna's complete neutrality with respect to the sale of the energy on the electricity market.
In December 2009, SunTergrid set up a new company, **Rete Rinnovabile S.r.l.** (RTR S.r.l.), which will handle all the projects for photovoltaic production that will become operative by the end of 2010.
The corporate structure selected, which will be subsequently alienable, satisfies both the requirements of functional and accounting separation from the Parent Company and compatibility with Terna S.p.A.'s bylaws and license, as well as with the provisions of Legislative Decree no. 79/99 (the so-called "Bersani Decree").
Today's Terna is the result of the liberalisation of the electricity industry, which was begun in 1999, when the role of TSO was assigned to GRTN – Gestore della Rete di Trasmissione Nazionale, a government-controlled company. In November

2005, Terna – which already owned almost the entire National Transmission Grid – acquired the aforesaid role from the latter, together with the related human and material resources, as established by the Prime Minister's Decree of May 11, 2004. The reunification of grid ownership (except for residual portions) and management also coincided with Terna's independence from the Enel Group, to which it had previously belonged.
Terna now competes in the market with total strategic and managerial autonomy. It can rely on the technical expertise acquired in the past, when it was part of the largest group in Italy's electricity industry, and thus represents at the same time innovation and tradition, two values that accompany it today in its prospects of development. For further information on the recent changes in the regulatory framework that concerns Terna, see the 2009 annual report, pages 90-95.

SIZE OF THE ORGANISATION AS OF DECEMBER 31, 2009	Italy
Number of employees	3,447
Turnover in millions of euros	1,360.7
Total capitalisation - (in millions of euros)	5,989.10
km of lines	56,691
underground cable	*1,043*
underwater cable	*914*

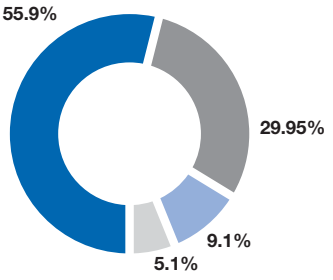
EU4

Ownership structure

Terna S.p.A. has been listed on the Italian Stock Exchange (Borsa Italiana) since June 2004. As of March 2010, the share capital amounted to €440,731,648.06 and consisted of 2,003,325,673 ordinary shares with a par value of €0.22 each.
As of the same date, Terna's relative-majority shareholder was Cassa Depositi e Prestiti – a joint-stock company in which the Ministry of the Economy and Finance has a 70% equity interest – which owns 29.95% of the share capital.
Ownership of the share capital is 65% Italian and 35% foreign.
After Cassa Depositi e Prestiti, the largest shareholders are:
- Enel S.p.A., which holds 5.1% of the share capital;
- Pictet Funds Europe S.A., with 4.9% of the share capital;
- BlackRock Inc., which holds 2.0% of the share capital following its absorption of Barclays Global Investors at the end of 2009;
- Assicurazioni Generali, which owns 2.1% of the share capital;
- Romano Minozzi, who owns 2.0% of the share capital.

SHAREHOLDING STRUCTURE

- Other Institutional Investors + Retail (1)
- CDP
- Major Institutional Investors (Pictet Funds Europe S.A., BlackRock Inc. and Assicurazioni Generali)
- Enel



Total 100%

EC4

(1) On March 24, 2010, Romano Minozzi, in his capacity as a natural person, declared a significant 2.0% equity interest in Terna S.p.A.

No other shareholder owns as much as 2% of Terna's share capital, nor does the Company know of any shareholder agreements regarding its shares. On April 19, 2007, Cassa Depositi e Prestiti S.p.A. established that it was in a position of de facto control of Terna S.p.A.
About 15% of the share capital is held by socially responsible investors (SRI), a percentage that has increased with respect to the 10% of December 2008 and the 13% of July 2009.
Following specific regulations regarding government shareholding in companies involved in the liberalisation process, Terna's bylaws establish several restrictions on shareholding and voting rights. As with other companies involved in the liberalisation process, the Ministry of the Economy and Finance, in agreement with the Ministry for Economic Development, has the power to oppose the acquisition by persons not under public control of more than 5% of the share capital. Furthermore, in order to safeguard Terna's independence and impartiality, when the Board of Directors is elected, no company in the electricity industry may exercise voting rights representing more than 5% of the share capital.

Corporate Governance

Terna's governance structure is based on the traditional model of accounting and control and conforms to the provisions of Italian law regarding listed companies.
Terna also observes the Self-regulation Code of listed companies, which Borsa Italiana published in March 2006. In 2007, the Company carried out the adjustments in its Corporate Governance system necessary to comply with the commitments provided for by the Code.
Therefore, the Company's Corporate Governance system is in line with the principles contained in the Self-regulation Code (which can be consulted online at www.borsaitaliana.it), the relevant recommendations put forward by the CONSOB, and, in general, the best practices found at the international level. This Corporate Governance model aims to create value for our shareholders, while reflecting awareness of the social significance of the Group's activities and the necessity of appropriately considering all the interests involved when carrying them out.
The task of managing the Company is entrusted to the Board of Directors, which is elected by the shareholders at their meeting. The Board of Directors is responsible for establishing the strategic and organisational guidelines of the Company and the Group, as well as for ensuring that the controls necessary for monitoring the performance of the Company and its subsidiaries are in place.
The incumbent Board was elected on April 28, 2008 and consists of nine members.

BOARD OF DIRECTORS (IN OFFICE SINCE APRIL 28, 2008)

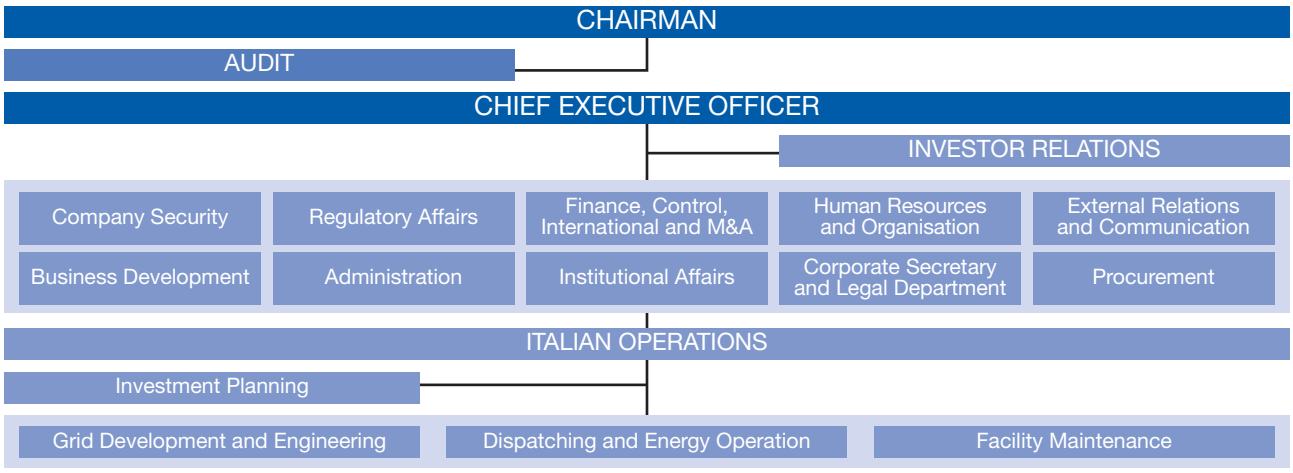
Office	Members	Executive	Non-executive	Independent	Internal Control Committee	Compensation Committee
Chairman	Luigi Roth		●			●
CEO	Flavio Cattaneo	●				
Director	Cristiano Cannarsa		●			
Director	Paolo Dal Pino		●	●	●	●
Director	Matteo Del Fante		●		●	
Director	Claudio Machetti		●			
Director	Salvatore Machì		●	●	●	●
Director	Michele Polo		●	●	●	
Director	Vittorio Rispoli		●	●		●

Further information on Terna's governance is available in the "Governance Report", which was approved by the Board of Directors on March 11, 2009 and can be consulted in the "Investor Relations" section, accessible from the homepage, on the Company's institutional website at www.terna.it.

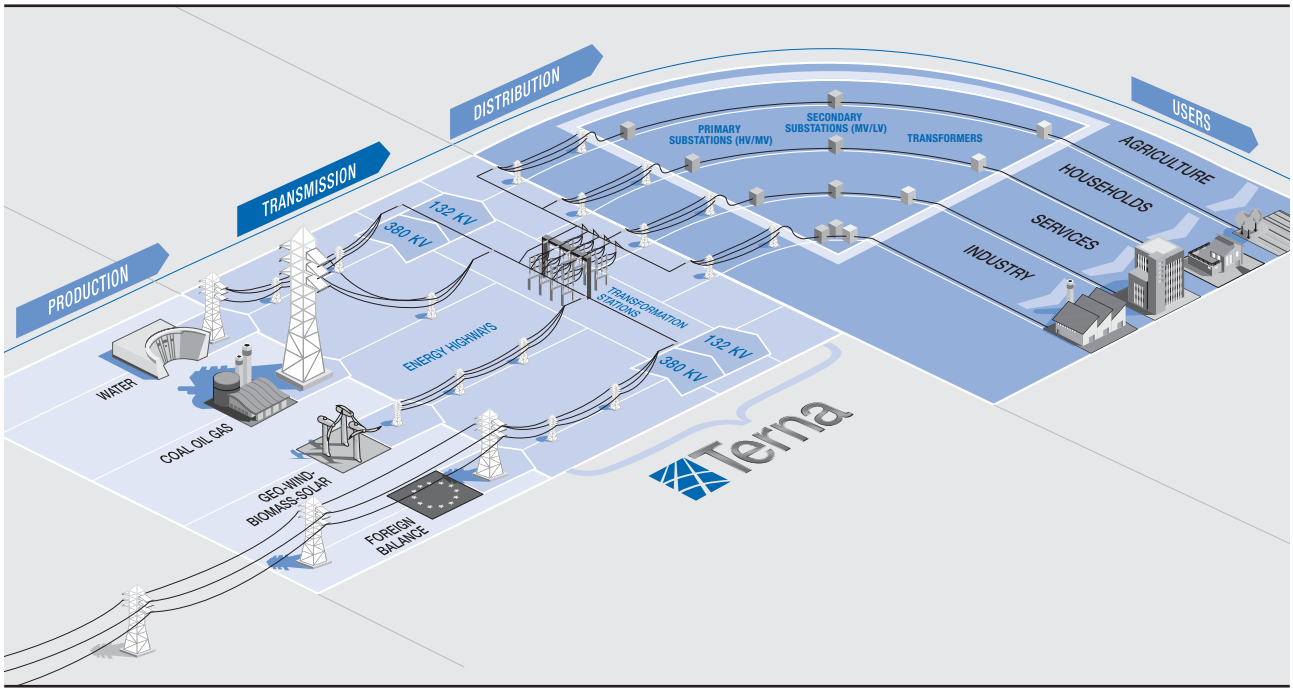
Processes and organisation

At the top of Terna's organisational structure as of December 31, 2009 are the Chief Executive Officer, to whom 11 Departments and Investor Relations report, and the Chairman, to whom the Audit Department reports.
Terna's organisation chart as of December 31, 2009 is as follows:

TERNA'S ORGANISATION CHART AS OF DECEMBER 31, 2009



The Italian electricity system consists of four components: the production, transmission, distribution, and sale of electric power. Terna's activities regard the transmission of electricity on the high-voltage grid. Specifically, the Company is responsible for the management of the electricity system through operation of the grid, as well as the utmost efficiency of the infrastructure and the excellence of its maintenance through engineering, management of the plants, and development of the grid.
These core activities are carried out by the Operations Italy Department, with the contribution of the non-operating departments. The main stages of the production process of the transmission service are as follows.



Operation

Operation of the grid requires a constant balance between injections and withdrawals, i.e. between the supply of domestically produced energy and imported energy and the demand of end users.

Preparation for real-time operation includes planning unavailability (of the grid and production plants) with different time horizons, a forecast of the national electricity requirements, a comparison to see if it is consistent with the production program determined as the outcome of the free energy market (Electricity Exchange and off-Exchange contracts), the acquisition of resources for dispatching, and a check of the power transitions for all the lines of the transmission grid.

In the real-time control stage, the National Control Centre coordinates other centres throughout Italy, monitors the electricity system, and performs the task of dispatching, intervening if there are deviations from the estimated balance – because of the malfunctioning of production plants or grid segments or requirements that diverge from those forecast – by instructing producers and the Remote Control Centres so as to modulate the supply and the situation on the grid. It may also act to reduce demand in order to avoid the risk of the grid degenerating, with extensive disconnections.

Grid development planning

The analysis of electricity flows on the grid and projections of demand enable Terna to identify the critical aspects of the grid and the work that has to be done in order to ensure the system's ability to satisfy requirements, operating safety, congestion reduction, and the improvement of service quality and continuity.

The new works to be carried out are included in the National Transmission Grid Development Plan, which is presented every year for approval to the Ministry for Economic Development. Terna then follows its authorisation process, from prior consultation with local governments all the way to the authorisation to carry out the work.
Finally, by analysing the situation of the grid, Terna identifies the best ways to satisfy all the companies that request the connection of their plants to the transmission grid.

Construction

Terna establishes the engineering standards of the plants connected to the grid, in particular the construction standards and the performance required of equipment, machinery, and the components of stations and lines.
As far as plant construction is concerned, Terna prepares plans for the works authorised. Specifically, it establishes the requirements of external resources and the budget for the projects, as well as the work methods and technical specifications of the components and materials to be used in constructing the new lines and stations, including the adoption of innovative methods.
The construction of new plants is normally outsourced.

Maintenance

Terna's carries out the maintenance of its power lines and stations through eight Transmission Operating Areas, in which most of the Company's human resources – only slightly less than 70% – are employed. These employees are also involved in work for unregulated customers.

Other activities

Terna's business relations with other parties in the industry – regarding both energy transport from producers to distributors and trading on the Electricity Exchange – entail economic transactions whose settlement is handled by Terna.
The Corporate Security Department is entrusted with establishing policies regarding the analysis, management, and control of corporate risks, the protection of the Company's material, human, and asset resources, and the occupational safety and health of its employees. The Department also handles relations with the judiciary and the police and assists the other corporate departments that may have critical problems.

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EU6

Activities abroad

In 2009, a year of recession in Western economies, Terna made the most of its equity interest in the Brazilian company Terna Participações S.A. by selling it. Consequently, it focused its international activities on the Mediterranean area, in particular in the Balkan countries with which the Italian government has signed and is working on agreements for cooperation and development in the energy sector.
Terna's expansion of its foreign activities ensue from its objective of increasing investment in the construction of interconnections with neighbouring countries and thus increasing its importation potential, the security of the Italian electric system, and the diversification of the sources of energy procurement.

The Balkans

South Eastern Europe is strategically important for the Italian energy system. The region currently has the most attractive nearby energy market because of its forecast medium- and long-term energy surplus and competitive production costs, as well as the diversification of supply sources, thanks to the unutilised potential of renewable sources and lignite.
If supported by specific intergovernmental agreements with these countries, the opportunities for developing production from renewable sources can contribute to achieving Italy's EU targets for the reduction of CO_2 emissions.
The most interesting Balkan country for Terna's activities is currently Montenegro. On February 6, 2010, an intergovernmental agreement was signed, according to which Terna will construct an electric cable between Italy and Montenegro. The cable will be 450 kilometres long, including 375 kilometres undersea, with the electric conversion stations located in Villanova and Tivat. Terna will form an industrial partnership with the Montenegrin transmission grid operator for the purpose of capital expenditure on the grid.

Terna has been operating in the Balkans since 2008, when it began work on the construction of the 400-kV Tirana-Elbasan line. The line is scheduled to be completed by the end of 2010, while other work, regarding the country's 110- and 220-kV infrastructure, will be completed in 2011. The total value of the contract amounts to about €13 million, including Terna's share of €2.5 million, financed by the Italian Foreign Office through Italy's Fund for Development.
In Croatia, Terna completed – in cooperation with the Croatian TSO, HEP-OPS – a feasibility study regarding the new undersea electric interconnection with Italy.
Finally, Terna is present in the Balkan area with four job orders for technical assistance:

- in **Serbia**, for the regulatory authority AERS, with an 18-month contract in partnership with the Spanish company Mercados and the Dutch company Kema;
- in **Kosovo**, with a 24-month contract in partnership with the Scottish company IPA for assistance to the TSO, KOSTT, regarding the operation of the electric system and aspects of the international regulation of the electricity market;
- in **Turkey**, with a contract of about 7 months in partnership with Mercados, for technical assistance to the TSO, TEIAS, regarding the installation of an automated grid-management system and the integration of renewable energy;
- in **Ukraine**, with a 27-month contract – whose terms are currently being established – in partnership with eight other European TSOs, to facilitate the integration of Ukraine and Moldavia with the European electric system, focusing on analyses of grid safety and assistance with operation, dispatching, and regulation.

North Africa

The second priority of Terna's activities abroad is the link with North Africa, in particular Tunisia. This interconnection project (EIMed) – the first one between a European and a North African TSO – is the subject matter of a joint venture between Terna and STEG (Société Tunisienne de l'Électricité et du Gaz), followed by an intergovernmental one between the Minister for Economic Development and his Tunisian counterpart. The project provides for a 200-kilometre connection between Italy and Tunisia and the construction of a production plant at the same time.

The northern border

Terna's development of interconnections also regards the northern border, where the most important project is with France. The planned 1,000-MW interconnection with France will link Piossasco, in Turin province, with Grand'ile, in France, through a direct-current cable, which will be completely underground or integrated with the infrastructure of highway A32, which passes through the Frejus tunnel. This technological project is unrivalled in the entire world because of the presence of long tunnels and viaducts, with a very limited environmental impact. The line will be 190 kilometres long, about half of which will be in Italy, and will utilise the roadway and the new service gallery of the Frejus tunnel.
The benefits for the Italian electric system regard the increase in its capacity for importing lost-cost energy and the security and diversification of the supply sources.
The investment is estimated at about €1 billion, about half of which is for the Italian side. The project is currently in the design stage and the authorisation process was initiated in October 2009 in Italy and December 2009 in France. The connection is scheduled to be in operation by the end of 2016.
At the same time, work to upgrade the existing lines is continuing and will increase their transmission capacity without altering their environmental impact.

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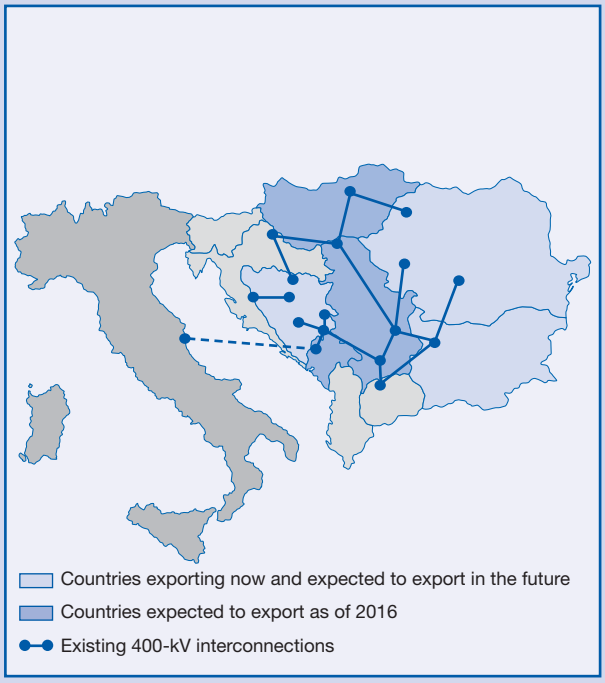
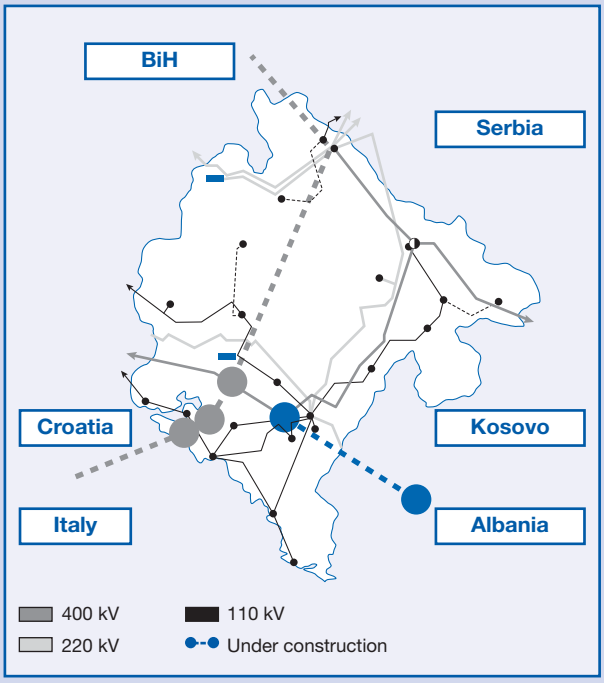
Italy-Montenegro: an interconnection that is strategic for Italy's electric system

Enhanced supply security for the Italian and European electric system, new opportunities for trade with advantageous effects on the bills of end consumers, and increased integration among European markets: these are the objectives of Terna's 2010-2014 Strategic Plan for developing electric interconnections between Italy and other countries.
Of all the Balkans – which are a top priority for business growth – Montenegro is the most important for Terna because of its optimal location for the requirements of the Italian market and the availability of a transmission grid that is in good shape and well connected with the future production hubs of the region (Bosnia-Herzegovina, Serbia, Kosovo, and – via Serbia – Bulgaria and Romania). These features make it the top candidate for performing the role of electric platform for trade between Italy and South Eastern Europe.

MAP OF THE TRANSMISSION GRID





Montenegro in numbers

Area:	13,812 km^2 (the size of the Trentino-Alto Adige region)
Population:	660,000 (= Palermo, slightly more than 1% of the population of Italy)
GDP 2008:	€2.4 billion (as of December 31, 2008)
GDP *per capita* 2008:	€8,947.00
Indices:	
Doing Business 2009[1]:	90th out of 181 countries (Italy: 156th)
Transparency International:	85th out of 180 countries (Italy: 55th)

(1) Index on a country's economic attractiveness developed by the World Bank.

Supported by an intergovernmental agreement, the project includes a series of works, broken down as follows.

1. 1,000-MW Italy-Montenegro undersea interconnection between Villanova and Tivat, constructed entirely by Terna. In Italy, the authorisation process was initiated on December 3, 2009, while in Montenegro an inter-ministry committee was set up and is working to include the project in the detailed national plan. The cable is currently scheduled to be available for commercial use in 2014.

THE NUMBERS OF THE INFRASTRUCTURE

375	KM OF UNDERSEA CABLE
ABOUT 15	KM OF UNDERGROUND CABLE IN ITALY
ABOUT 60	KM OF UNDERGROUND CABLE AND NEW CONNECTION LINES IN MONTENEGRO
2	DIRECT CURRENT/ALTERNATING CURRENT CONVERSION STATIONS
1,000-MW	TRANSPORT CAPACITY, WITH AN OPTION FOR DEVELOPING 1,000 MW MORE
€758	MILLION OF INVESTMENT

2. Infrastructure for enhancing and renovating Montenegro's grid. An investment plan for enhancing Montenegro's transmission grid will be carried out by the local TSO, Prenos, with the goal of ensuring the functioning and optimal use of the new interconnection, among other things with a view to the opportunities for importing energy into Italy from all the Balkan countries.

3. Interconnections with Serbia and Bosnia-Herzegovina. The agreements with Terna provide for Montenegro to construct at least one of the new interconnections with Bosnia-Herzegovina or Serbia. The investment will be made by a private consortium or, if it is not feasible economically, by the two transmission companies involved.

4. Equity interest in Prenos. To protect its investment in the undersea electric interconnection, in the first half of 2010 Terna plans to acquire a minority equity interest in Prenos.

The project also presents significant benefits for Montenegro's electric system, which can be summarised as follows:
- creation of the best conditions possible for attracting investment in the field of electricity generation and developing the country's considerable energy resources, especially hydro and other renewable sources;
- activation of a direct connection between the country and the European energy market;
- increased capacity for importing energy through the new interconnection lines planned;
- improvement of service quality and that of operating safety standards thanks to the enhancement and renovation of the domestic grid;
- an additional boost to Montenegro's trustworthiness with regard to foreign investment in the country.

Sustainability

Terna's concerns

Terna performs a crucial and invaluable role in the Italian electric system. The greatest economic and social impact of its business activity is determined by its ability to ensure society a reliable and efficient electricity service. Its dedication to the service is therefore also the main reference of its approach to the issues of sustainability, among which respect for the environment and local communities, occupational safety, and personnel training are particularly significant. As decreed in its Code of Ethics, Terna's general aim is to construct and develop relations with stakeholders that are based on trust and contribute to the creation of value for the Company, society, and the environment.

Terna's main business is to provide a service that is indispensable for the entire electric system and to ensure electricity to everyone in Italy. Although the end users of the electricity service are not direct customers of Terna but of companies that distribute and sell electricity, the essential role it performs in the electric system makes the Company **ethically responsible for the service to the entire country**. Terna therefore is very conscious of the responsibility entrusted to it by the government licence and makes the latter's objectives its own:
- to provide a secure, reliable, continuous, and cost-effective service;
- to keep the transmission system efficient and develop it;
- to observe the principles of impartiality and neutrality in order to ensure equal treatment for all grid users.

Terna's activities intrinsically produce a heavy impact on the **environment**: electric infrastructure has a tangible, visible presence, embodied in the large pylons of lines. Therefore, the **reduction of the impact of lines** is another major objective. The Company considers **respect for the environment and local communities** a behavioural rule that can trigger a virtuous circle. It preserves natural and cultural heritages, while facilitating the acceptance and construction of new infrastructure, thus generating economic benefits for shareholders and society as a whole, which benefits from a more efficient and less costly service.
The role of **human resources** in Terna's activities is crucial. The **renewal of technical capabilities** that are distinctive, and often rare or unique in the electricity industry, constitutes an essential element of Terna's approach to sustainability. Another element, which is equally important, is concern for **occupational safety**, a concern that is made even more acute by the fact that many operating activities are characterised by particular risks, such as working at many metres off the ground and maintenance work on live wires.
Greater detail on the most significant aspects of sustainability for Terna can be found in the introductions to the chapters on service, economic, social, and environmental responsibility in this report.

Governance of sustainability

Code of Ethics

The Code of Ethics was approved by the Board of Directors on December 21, 2006. The result of internal reflection that involved the top and first-line management, it is the highest reference for identifying the sustainability issues that are significant for Terna and defining internal policies and guidelines. It is a concrete guide in making everyday decisions and aligning them with the objective of constituting and consolidating a relationship with stakeholders based on trust. The Code is divided into five sections, which describe:
- general ethical principles (legality, honesty, and responsibility) and those most significant for Terna's business (good management, respect, fairness, and transparency);
- the conduct required, in particular from employees, on the issues of loyalty to the Company, conflicts of interest, and the security of the Company's assets;
- the main instructions on how to behave in relations with stakeholders;
- Terna's commitments to ensuring observance of the Code;
- the rules for implementing the Code and the persons responsible.

One of the commitments expressed in the Code is to provide evidence in the sustainability report of the implementation of the Company's environmental and social policy, as well as a comparison of the objectives with the results achieved.
At the end of 2009, in concurrence with the installation of the Ethical Committee – a body available to anyone, inside Terna or not, who wishes to obtain explanations or make a report on the subjects discussed in the Code of Ethics – Terna promoted a campaign throughout the Company to disseminate the Code and its contents.
For further details on this activity, see the following box. The Code of Ethics is available on Terna's institutional website: http://www.terna.it/default/Home/INVESTOR_RELATIONS/corporate_governance/codice_etico.aspx

The internal campaign on the Code of Ethics and "Vote your value"

The installation of the Ethical Committee created an opportunity to bring the Code of Ethics to the attention of all the Company's employees again. Thus the Code was the subject of a dissemination campaign, which began at the end of November and ended in early 2010.
The procedure adopted was that of cascaded presentations to facilitate the dissemination of shared contents. To support the campaign, the dedicated section of the corporate intranet and the institutional website were expanded and the house organ, Terna News, gave the Code considerable space. The dissemination of the Code of Ethics provided an opportunity to promote an initiative connected with the employees' adoption of Terna's values and general principles. In effect, at the end of every presentation, all the participants received a form containing the values stated in the Code and were requested to express their preference.
The result of the survey will guide the allocation of a sum that the Company has made available for projects, initiatives, and non-profit associations supporting causes that are consistent with the values that received the most votes.
The projects that benefit from this contribution must be supported by non-profit associations or organisations that provide guarantees of transparency and fairness in their management of the funds received. This is an additional sign of the extent to which Terna identifies with the values of its Code of Ethics.
The "Vote your value" initiative will be developed throughout 2010 and includes an investigation of the progress made by the projects, to be carried out by the end of the year by several Terna employees as witnesses for the entire Company.

The Global Compact

On December 16, 2009, the Board of Directors resolved that the Company should subscribe to the UN's Global Compact. This adhesion marks Terna's renewed and consolidated commitment to observe the 10 Global Compact's principles on human rights, labour, the environment, and the prevention of corruption, which are already explicitly referred to in the Code of Ethics as a general benchmark for Terna's initiatives regarding sustainability and Corporate Social Responsibility.

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Terna's participation in the UN's Global Compact

The Global Compact is a multi-stakeholder network promoted by the United Nations which brings together governments, businesses, UN agencies, trade unions and civil society for the purpose of promoting throughout the world 10 universal principles regarding human rights, labour, protection of the environment, and the fight against corruption. Based on an idea expressed by Kofi Annan at the Davos World Economic Forum in 1999, the Global Compact commits participants to promote and support the aforesaid 10 principles, as well as to report to the UN every year the activities carried out to do so.
About 175 Italian organisations, including businesses, non-profit associations, and universities, have joined the Global Compact Network Italia, one of the 130 networks all over the world that support the Global Compact and actively promote the observance of its principles.

Human Rights

Principle I: Businesses should support and respect the protection of internationally proclaimed human rights within their respective spheres of influence; and to
Principle II: make sure that they are not, even indirectly, complicit in human rights abuses.

Labour

Principle III: Businesses should uphold the freedom of association and the effective recognition of the right to collective bargaining;
Principle IV: the elimination of all forms of forced and compulsory labour;
Principle V: the effective abolition of child labour;
Principle VI: the elimination of discrimination in respect of employment and occupation.

Environment

Principle VII: Businesses should support a precautionary approach to environmental challenges;
Principle VIII: undertake initiatives to promote greater environmental responsibility; and
Principle IX: encourage the development and diffusion of environment- friendly technologies.

Anti-Corruption

Principle X: Businesses should work against corruption in all its forms, including extortion and bribery.

Management policies and systems

The principles and standards of conduct stated in the Code of Ethics have been translated into consistent corporate policies and management systems, in particular the following.

The integrated Quality-Environment-Occupational Safety management system

Activities in the sensitive areas of the environment and occupational safety, which are crucial in Terna's view of sustainability, are coordinated and guided by its **ISO 9001**, **ISO 14001**, and **OHSAS 18001** certified integrated Quality-Environment-Occupational Safety management system. Its satisfaction of the certification requirements testifies the continual pursuit of improvement, which ensures consistency with the commitments expressed in the Code of Ethics and in the Company's policies. The integrated system covers 100% of Terna's activities, both those carried out on existing infrastructure and those regarding the planning, design, and construction of new infrastructure. The certifications were most recently confirmed in October 2009.

231 Organisational Model (pursuant to Legislative Decree no. 231/2001)

In 2002, Terna's Board of Directors resolved to adopt an Organisational and Management Model to satisfy the requirements of Legislative Decree no. 231 of June 8, 2001, which introduced into Italian law a regime of administrative – but de facto criminal – liability of companies for several kinds of crimes committed by directors, executives, or employees in the interest or to the benefit of the company. In particular, the law aimed to fight corruption. The possibility for a company to be exempted from liability depends on specific actions, including:

- having adopted and implemented, before the deed was committed, an organisational and management model consistent with Legislative Decree no. 231 and appropriate for preventing crimes of the kind that was committed;
- having entrusted the functioning, observance, and updating of the Model to an internal Supervisory Body with autonomous powers of initiative and control on the application of the Model.

Terna's adoption of 231 Organisational and Management Model is thus aimed at ensuring "conditions of fairness and transparency in the conduct of the Company's business" and activities so as to safeguard its position and image, as well as the expectations of its stakeholders, in line with the provisions of Legislative Decree no. 231 of June 8, 2001.

Over time, the Model has undergone a number of changes to adapt it to the provisions of the law and the subsequent inclusion of new crimes in Decree no. 231. As it is currently, the Model consists of 9 parts, a general one and 8 special ones (A, B, C, D, E, F, G, and H), the last of which regards IT crimes and was included on June 17, 2009.

Further information on Terna's Organisational Model is available in the Corporate Governance area of the Investor Relations section of the Company's institutional website at www.terna.it.

The Balanced Scorecard and incentive schemes

In monitoring and auditing corporate activities, the Company avails itself of a Balanced Scorecard system, a panel of indicators that enable it to follow quarterly the progress made with respect to the operating objectives into which – according to the classic quadrants: economic/financial, organisational/processes, strategic/customers, and innovation/development – the annual objectives of the Strategic Plan break down. Among the activities monitored are also objectives that are important from the sustainability point of view: for example, in 2009, the occupational safety index – a composite index based on injuries – and the observance of the training plan. Thanks to the link between the Balanced Scorecard and the variable-pay schemes for executives (MBO), the sustainability objectives are also supported by the incentive schemes based on pay.

Internal organisation

Particularly important from the sustainability point of view are:

- the presence of a Corporate Security and Safety Department, which is entrusted with, among other things, risk management and the safeguard of the Company's physical, human, and financial resources, as well as occupational safety. The Department comprises the Fraud Management unit, whose task is to prevent and, if need be, manage illegal actions performed by employees or by third parties to the detriment of the Company, as well as to assist the Internal Supervisory Body with the investigations and reporting system regarding the crimes provided for by Legislative Decree no. 231/2001;
- the presence of a Corporate Social Responsibility unit in the External Relations and Communication Department;
- the institution in 2009 of a Sustainability and Environmental Steering Committee, which consists of the heads of the departments that share responsibility of implementing sustainability projects and monitoring their impacts. In addition to coordinating initiatives, the steering committee is entrusted with the tasks of establishing the sustainability objectives and providing a link with the top management;
- the presentation of the sustainability objectives and results when the sustainability report is approved.

Sustainability results and objectives

In 2009, Terna made important progress in all areas of responsibility. Special mention should be made of the following **results**, which correspond to the objectives established for 2009 that were reported in the preceding sustainability report.

- The importance of a responsible approach to stakeholders was highlighted when the Code of Ethics was distributed to all employees. Accompanied by cascaded presentations, the distribution allowed the Company to also explain the internal channels available for requests for clarification regarding ethics and for reporting violations. This campaign was supported by a participatory initiative on the subject of values (see "Vote your value" on page 36), which will continue during 2010.
- External communication regarding Terna's sustainability issues was given a boost by a reduction in the time required to produce the 2008 sustainability report, which continued with the present 2009 report. In addition to providing information more promptly, this has allowed the report (about 1,200 copies) to be distributed to various categories of stakeholders, including the institutional and academic worlds.
- The updating of the sustainability section of the corporate website, with a revision of the online version of the report, was also important in terms of transparency, completeness, and accessibility. In 2009, Lundquist, a specialised company that analyses the sustainability sections of the websites of the companies included in the S&PMib, ranked Terna 4th in its classification (13th in 2008).
- The presentation of the sustainability report was addressed to selected groups of journalists and university students, who suggested improvements that have partly already been incorporated in the present edition (see page 51).
- The essential importance of responsibility for the electricity service was confirmed by the good result obtained with respect to the targets established by the AEEG for 2009, which also led to an increase of €45 million according to the current incentive schemes. Of particular importance was the reduction in the volume of resources for dispatching procured on the electricity exchange, with positive effects on system costs and the bills of end users, on which see the "Revenue structure and regulatory framework" section.
- As far as the environment is concerned, progress was made as scheduled on the projects in cooperation with the LIPU and the WWF, which will produce the main results expected in 2010. The renewal of the Company's vehicle fleet enabled it to reduce its CO_2 emissions per kilometre by 11%. Finally, the Company completed a project regarding environmental accounting, which has enabled it to publish its operating and capital expenditure for the environment for the first time in this report (see pages 124-125).
- Terna's commitment to occupational safety was shown in numerous initiatives, which are described in detail in the related section (pages 142-143). Particular mention should be made of Safety Day and the beginning of organisational changes aimed at enhancing the supervision of worksites and the prevention of risks.
- With regard to human resources, in 2009 the Global Performance System was put into place. This is an instrument for assessing performance and identifying ways to enhance capabilities (pages 134-135). Training involved more than 90% of all employees, with an accentuation of the transmission of knowledge thanks to the internal Campus faculty (pages 133-134).
- Through donations and sponsorships, Terna continued to support community initiatives in accordance with the corporate giving policy adopted in 2009.

In 2009 and early 2010, Terna's sustainability approach and performance also obtained numerous awards, among which the following stand out: inclusion in several sustainability indices – including the Dow Jones Sustainability World Index – third place in Accountability Rating Italy's ranking of Italian listed companies, and first place among Italian companies in the ranking elaborated by Vigeo on the prevention of corruption. For further details, see the sections on sustainability indices and awards.

The objectives for 2010 constitute further steps in the policies already adopted. Among the objectives summarised in the following table, the following should be noted in particular:

- the presentation of the 2009 sustainability report inside the Company with dedicated meetings and the intensification of presentations to external stakeholders;
- the enhancement of the sustainability section on the corporate website;
- the completion of the initiatives with the LIPU and the WWF;
- the acceleration of the program for reducing oils with PCBs;
- the improvement in the recording of injuries to employees of contractors.

Area of responsibility	Objectives 2009	Results 2009		Objectives 2010
Governance and general aspects	Campaign to disseminate the Code of Ethics.	Cascaded presentations made to all employees (page 36).	•••	Presentation of sustainability report to all Departments.
	Meetings on 2008 sustainability report with additional stakeholder categories (with respect to 2008).	2 meetings on 2008 sustainability report with *media* stakeholders and 1 with university stakeholders (page 51).	••	More meetings with stakeholders to present and discuss the report.
	Improvement of sustainability section of Terna website.	Sustainability section expanded with new content (pages 38; 43).	•••	Increase content of sustainability section of website, in particular on electro-magnetic fields.
	Sustainability report published earlier.	Sustainability report published 3 months earlier.	•••	Sustainability report 2009 available on website by mid-June.
Responsibility for the electricity service	Continuity indicator targets achieved.	Achievement of targets (pages 59-61).	•••	Achievement of continuity indicator targets.
	Security Plan progress on schedule.	Progress on Security Plan (pages 56-57).	•••	Progress on Security Plan as scheduled.
	Positive results with regard to AEEG incentives.	Positive result with regard to AEEG incentives (pages 77 and 90-91).	•••	Positive result with regard to AEEG incentives.
Economic responsibility	Company profitability.	Company profitability (1).	•••	Company profitability.
	Investment in grid development.	Investment in grid development (1).	•••	Investment in grid development.
	Transmission cost containment.	Transmission cost containment (1).	•••	Transmission cost containment.
Environmental responsibility	Progress on project to contain CO_2 (vehicle fleet) and SF_6 emissions.	Vehicle-fleet emissions of CO_2 per km reduced by 11.1% (page 118).	•••	Progress on project to contain incidence of SF_6 emissions.
	New environmental expense accounting.	Environmental expense published for first time in this report (page 124).	•••	New survey of line presence in protected areas, including TELAT lines. Acceleration of reduction of oils with PCBs between 50 and 500 ppm.
	Progress on action plans of agreements with LIPU and WWF.	Progress on action plans as scheduled.	•••	Completion of initiatives in the oases included in the project with WWF.
Social responsibility	Initiatives on safety awareness.	First Safety Day held (pages 142-143).	•••	Improvement in recording injuries of employees of contractors and subcontractors.
	Performance assessment with Global Performance System.	GPS in place in 2009.	•••	Definition of guidelines and rules for employee volunteer work.
	Adoption of policy and procedures on corporate giving.	Corporate giving policy approved and implemented in system of internal procedures.	•••	Charitable initiatives/donations in accordance with employee preferences ("Vote your value" project).

Legend

••• Objective achieved
•• Partly achieved
• Deferred or suspended

(1) The result achieved corresponds to a performance in line with the objectives approved by the Board of Directors for the Strategic Plan presented annually to financial analysts (see pages 74-75).

Disputes and litigation

Opposition to the construction of new lines

Terna considers respect for the environment and local communities an integral part of planning the grid and makes every effort to proceed in agreement with local institutions. However, projects for constructing new infrastructure often entail adverse reactions that are part of the Nimby (Not in my backyard) syndrome. In these cases, Terna's position is based on willingness to examine alternative solutions, provided they are compatible with the requirements of the security, efficiency, and cost-effectiveness of the electricity service.

The pursuit of solutions based on mutual consent involves difficult negotiations and takes a long time. The results are normally positive, but during the process there may be persistent local opposition, which receives a lot of *media* attention. Among these, during 2009 and the first months of 2010, the following should be noted:

- "Santa Barbara-Casellina" case. The line has been hotly disputed by several owners whose houses are near the route of the line, which has been under construction since 2008. A change in the route has been requested.
- "Dolo-Camin" case. The procedure of authorisation by the Ministry for Economic Development, in agreement with the Ministry of the Environment, is in progress. The Ministry of the Environment recently issued its decree of environmental compatibility. Two municipalities in Padua province plus others on the Riviera oppose the project of the work and are asking that the segment of the line that concerns their respective territories be put underground.
- "Cross-Veneto line" case. The authorisation process has been started, which caused problems with local communities, in particular, with an environmental association in the municipality of Paese, to surface again. The local governments involved – Treviso and Venice provinces – are favourable to the work. The committees request that the entire 380-kV line (about 33 km) be put underground.
- "Redipuglia-Udine Ovest" case. The authorisation procedure was started in 2008. During 2009, heated opposition to the project erupted, led by the Committee for the defence of rural Friuli. The project includes the construction of the work as an overhead line. The municipalities concerned – which, with 4 exceptions, signed an agreement on the feasibility strip – are now also asking for the entire line to be put underground.
- "San Giuseppe-Portoferraio" (Elba) case. Work to upgrade the already existing line was authorised by the Ministry of Economic Growth on December 2, 2008, after the 3 municipalities concerned, Livorno province, and the Park Administration had signed the protocol of understanding with Terna. The work began in September 2009. In May 2009, a committee was formed which is stirring up heated opposition to the construction of the overhead part of the line and requesting that it be put entirely underground.

Malfunctions

On July 22, 2009, service in the Naples area, including the city centre, was interrupted for several hours. The outage was due to damage to an underground cable caused by construction work carried out by a third party not on Terna's behalf. The press reported the inconvenience caused by the outage, which was aggravated by the hot weather, but also Terna's prompt reactivation of the service.

Preliminary investigations by the Authority for Electricity and Gas

There are two preliminary investigations in progress that could concern Terna.

Outages in Sicily in June 2007

On June 26, 2007, Terna took anti-black-out measures in Sicily to avoid the loss of control of the system and prevent more critical situations (see the "The crisis of the electricity system in Sicily" box on page 82 of the 2007 sustainability report). Thus the electricity distributors implemented rotating planned disconnections of ordinary users. The measures were made necessary by a series of concomitant factors: very high consumption, widespread fires that entailed shutting down several lines to allow firemen to put them out, and failures and malfunctions. Individuals protested and enterprises reported damage to their business because of the service interruption.

With its Resolution no. 155/2007, the AEEG started a fact-finding investigation on the outages that took place in Sicily on June 25 and 26, 2007.

Fact-finding investigation on unattributed electricity

With its Resolution VIS no. 171/09, the AEEG initiated formal investigations of Terna and several electricity distribution companies to ascertain if they violated the Authority's provisions regarding the services of transmission, dispatching, and metering of electricity and impose the related monetary administrative penalties.

This step was preceded by Resolution VIS no. 168/09, with which the Authority closed the fact-finding investigation begun in 2007 regarding the abnormal situations noted in the determination of lots of electricity withdrawn from the NTG and not correctly attributed to the dispatching users. The results of the investigation are included in a special concluding report attached to Resolution VIS no. 168/09, in which the responsibilities of Terna and the distribution companies are definitively outlined. As far as Terna's conduct is concerned, the main censure regards its lack of efficiency and diligence in carrying out several activities of the transmission and dispatching services for which it is responsible.

Environmental litigation

Environmental litigation regards the installation and operation of electric infrastructure and in particular the effects of electric and magnetic fields. In effect, the Parent Company and its subsidiary TELAT are defendants in a number of civil and administrative proceedings, in which the plaintiffs' request that electric lines be moved or operated in a different way because of the alleged harmfulness of the same, even though they were installed in full conformance with the regulations in force. Requests for compensation for damage to health caused by electro-magnetic fields have been made in only a very limited number of cases.

From the point of view of the decisions handed down on this issue, only in sporadic cases have they been unfavourable to the Company, which in any case has appealed. These proceedings are still pending and negative outcomes are considered unlikely.

Litigation regarding licensed activities

As the licensee of the transmission and dispatching service since November 1, 2005, the Parent Company is the defendant in several proceedings, mostly appeals regarding provisions of the AEEG and/or the Ministry of Productive Activities and/or Terna itself and concerning such activity. Only in cases in which the plaintiffs complain of, in addition to errors in the provisions appealed, also alleged violations by Terna of the rules established by the aforesaid authorities, has the Company appeared in court. As far as such litigation is concerned, even a few proceedings of first and second instance have concluded with the annulment of the AEEG's resolutions, negative outcomes for the Company can be considered unlikely, because, according to the information furnished by the external lawyers who are assisting the Company in the proceeding, these are pass-through items for Terna.

Other litigation

Several lawsuits regarding city-planning and the environment are also pending. They are connected with the construction and operation of a few transmission lines, and unfavourable outcomes could generate effects which are not predictable at present and therefore are not considered in the determination of the "Provision for litigation and sundry risks". For a small number of proceedings, we cannot absolutely exclude unfavourable outcomes, whose consequences could consist in expenses connected with changes in the lines and the temporary unavailability of the same, as well as the possible payment of damages. In any case, an examination of the aforesaid litigation, considering also the opinion of the Company's external lawyers, leads to the conclusion that unfavourable outcomes are unlikely.

Sanctions

S04 S07 S08 PR9 EN28 EU25

In the period 2007-2009:

- there was no definitive penal conviction or plea bargaining for injuries caused to third parties by Terna's assets. The same is true of the former subsidiary Terna Participações during the period when Terna still exercised control;
- no legal proceedings ended regarding corruption, unfair competition, or antitrust and monopolistic practices. There were no definitive administrative or judicial sanctions, monetary or not, regarding the aforesaid matters for non-observance of laws or regulations, including environmental ones, that imposed an obligation to "do/not do" (for example, prohibitions) on Terna or convicted its employees of crimes. The same is true of the former subsidiary Terna Participações in the period in which Terna exercised control. As of December 31, 2009, there was no pending litigation regarding corruption, unfair competition, or antitrust and monopolistic practices.

In 2007, Terna availed itself of the right to pay a reduced penalty – in the amount of €55,645.00 – to close the AEEG's proceeding regarding the black-out in 2003, whose purpose was to impose penalties, if need be. In 2008 and 2009, there were no penalties regarding the provision of the service.

Promotion of Corporate Social Responsibility

Sodalitas

Terna was one of the companies that set up the Foundation for the Development of Entrepreneurship in January 2008. The Foundation continues the commitment shown for some time by Sodalitas to the dissemination of social responsibility and the promotion of discussion between businesses and the non-profit world. The importance of the Foundation and its dedication to the development of social responsibility in Italy are acknowledged by the most important reference figures of the country's entrepreneurial, institutional, social, and cultural world. It is supported by 61 businesses, which represent 50% of the capitalisation of Borsa Italiana, the Italian stock market, and has 81 volunteer managers. Terna's presence in this important network shows the Company's recognised dedication regarding sustainability and represents a commitment to do even more in this field.

The Anima per il sociale nei valori d'impresa Association

At the beginning of 2020, Terna joined Anima per il sociale nei valori d'impresa ("Soul for society in business values"), a non-profit association founded in 2001 and promoted by the Unione degli Industriali e delle Imprese of Rome – a business association – which brings together managers and businesses that want to disseminate in their area a new entrepreneurial culture that is able to combine profit with the creation of well-being for the community.
Anima facilitates the encounter between businesses and social commitment through initiatives and actions addressed to local communities, focusing on creating a network among institutions, businesses, and the service industry and on its role as a cultural mediator, helping businesses to understand and enhance Corporate Social Responsibility through projects and initiatives with high value added.

CSR Manager Network Italia

Terna supports the activities of the CSR Manager Network Italia, the reference point for professionals, consultants, and university researchers who are involved in sustainability and Corporate Social Responsibility through the professional contribution of its managers. The Network offers its members the opportunity to compare their experiences, identify elements of innovation, and learn about the best practices in Italy and abroad, as well as to have at their disposal an organisation that can represent them to institutions and the world of non-profit and other associations, as well as participate in the Italian and international discussion.

Fifth Show of social responsibility "From saying to doing" (Milan, September 29-30, 2009)

Terna participated in the Show by promoting a seminar on sustainable finance, during which an unpublished study by the Vigeo sustainability rating agency on the performance of the retail ethical fund market was presented and discussed. Representatives of Vigeo, Bocconi University, Assonime, and asset managers (Anima, HSBC) participated in the forum coordinated by Terna.

Other activities

The dissemination of sustainability culture was the objective of the lectures given by Terna as part of the Laura Conti course for environmental journalists in Savona in November 2009 and the course on social responsibility held at the University of Rome in January 2010. In December 2009, Terna participated in a panel that presented Professor Antonio Cocozza's book *Persone, organizzazione, valori* ("People, organisation, and values"), which has a chapter on "The challenge of social responsibility: the Terna case".

Sustainability indices

Inclusion in new indices in 2009

Dow Jones Sustainability World Index

On September 3, 2009, Terna was included in the Dow Jones Sustainability World Index. The index selects the best performing companies (about 300) in terms of sustainability out of the 2,500 companies with the largest market capitalisation in the world. The assessment of the sustainability performance was carried out by the Sam-Sustainability Asset Management rating agency.

ASPI Eurozone

Since September 4, 2009 Terna has been included in the ASPI Eurozone index. The index selects the 120 sustainability leaders out of the 600 European companies with the largest market capitalisation. The assessment is made by the Vigeo rating agency.

Ethibel Sustainability Index Excellence

On September 18, 2009, Terna was included in the Ethibel Sustainability Index Excellence. The index contains 200 businesses that record above-average sustainability performances according to the analyses of the Vigeo sustainability rating agency and that have been screened by the Ethibel Forum, a panel of independent figures who are experts in different aspects of sustainability. Terna was also included in the Ethibel register.

Confirmations

FTSE4Good

In their semi-annual revisions of 2009 and of March 2010, Terna was confirmed in the FTSE4Good Global and FTSE4Good Europe indices, in which it has been present uninterruptedly since 2005. The FTSE4Good indices admit the companies already included in the basic indices FTSE All-World and Europe Developed that meet sustainability criteria developed by the EIRIS rating agency.

FTSE KLD Global Sustainability and Europe Sustainability

On October 1, 2007, Terna was included in the FTSE KLD Global Sustainability and Europe Sustainability indices. The KLD were the first indices to assess the non-financial performance of companies and still constitute one of the most widespread and reliable standards in the United States. The KLD rating agency's assessment system is used for inclusion.

ECPI

Since 2007, Terna has been included in the ECPI sustainability indices. The criteria of admission were developed by the E-Capital Partners rating agency.

Axia Ethical Index and Axia CSR Index

Terna is included in the Axia Ethical Index and the Axia CSR Index, which were created by the Axia Financial Research Merchant Bank. The admission assessment is carried out by Axia, which selects the companies included in the different basic indices that have a sustainability rating higher than pre-established thresholds.

Awards

Accountability Rating Italy 2009

Terna won the third place – in 2008 it was eighth – in the Accountability Rating Italy 2009, which assesses the governance, sustainability, and social responsibility of the 40 largest Italian companies in the S&PMib stock index. Based on public information, in particular sustainability reports, the assessment considers what the company has done in terms of integrating responsible strategies into their business, the existence of systems for managing sustainability issues, dedication to stakeholder engagement, and reporting quality.

European Business Awards

On April 7, 2009, Terna received the "Ruban d'honneur" for being one of the ten finalists of the European Business Awards 2009 in the corporate sustainability category.
The European Business Awards identify and reward the most successful companies in the 27 countries of the European Union that distinguish themselves in various areas, including innovation and commitment to sustainable development. They are supported by organisations deeply engaged in the promotion of corporate goals at all levels for European economic, industrial, and environmental development.

CSR Online Awards

In 2009, Terna was ranked fourth in the second edition of the CSR Online Awards study of the online communication of Corporate Social Responsibility, climbing nine positions higher with respect to the previous year. The study is conducted every year by the communication consultancy Lundquist in cooperation with the daily Il Sole 24 Ore and – using a scheme with numerous parameters – analyses how the 40 Italian listed companies included in the S&PMib stock index use their web site to communicate Corporate Social Responsibility.

Vigeo - *Que font les entreprises pour prévenir la corruption?*

In February 2010, the sustainability rating agency Vigeo published a study on the instruments and strategies adopted by the largest European and North American companies – 772 from 18 countries – to prevent corruption.
Terna placed twentieth in the global ranking and first among both Italian and electricity companies.

Medium-term prospects

Projected on a medium- and long-term horizon, sustainability issues cross paths with Terna's growth strategies especially on the aspects of relations with local communities, environmental impact, and social responsibility in foreign countries. In the next few years, a generational change of significant size will highlight the question of core competence, which will join service quality and security as a priority.
Overall, there do not seem to be any challenges that are not already met by our current approach to social responsibility activities. To keep pace with medium-to-long-term developments, however, Terna will have to gradually improve its instruments and processes.

Local communities

In the medium and long term, the creation of value for shareholders and the quality of the electricity service are connected with the development of the grid and interconnection relations with other countries.

As far as the grid is concerned, the following aspects are crucial.

- Acceleration of authorisation processes. In Italy, the authorisation procedure for the construction of new electric lines can take four times as long as the actual construction of the work, with obvious financial consequences, as well as in terms of the efficiency of the NTG. Terna chose its policy of dialogue and discussion with local institutions in the conviction that the identification of solutions that are consensual and respectful of local communities will facilitate the granting of authorisations, as will the trust created over time by the consistency of the Company's conduct. Therefore, in the next few years it will be important to:
  - complete the extension of the consultative to all the regions;
  - make the application of technical aspects – such as the criteria for territorial characterisation – more uniform in the different regions;
  - optimise the process to make it more effective in terms of relations with local institutions and more efficient in terms of the time it takes to go through internal procedures.
- Obtain the approval of local communities. Apart from relations with institutions, increasing the degree of approval of electrical infrastructure by the communities concerned is an essential objective, as can be inferred from the litigation described in the present report. Terna has begun to reflect on the most effective ways to present its development projects. Communication and the involvement – in addition to local institutions – of associations representing the communities concerned play an important role in achieving these objectives.

The environment and climate

Among the topical subjects to which Terna is increasingly attentive are electro-magnetic fields and climate change.

As far as the first question is concerned, Terna's commitment is expressed first of all in its scrupulous compliance with the provisions of Italian law, which are among the strictest in the world. Considering the sensitivity of public opinion on this subject, the Company will dedicate constant attention to the evolving scientific research on electro-magnetic fields in order to assess possible risks connected with its activities. It will also contribute to informing public opinion accurately and fairly on the matter.
Climate change and the emission of greenhouse gases constitute one of the most significant problems at a global level. Terna is not subject to any obligations to reduce emissions or to participate in emission trading schemes, nor does it see any particular risks connected with climate change for its income statement (see in this regard the EC2 indicator). Nevertheless, both as a sign of its sensitivity to environmental issues and in response to the increasing concern that involves all electricity businesses, Terna has already developed programmes for controlling and containing its emissions, direct and indirect, and will maintain its commitment to achieving greater energy efficiency. Terna's most important contribution to the abatement of CO_2 emissions is constituted by the development of the grid, which enables the electric system to be more efficient overall and makes it possible to handle the growing production from renewable energy sources. The connection of such sources and the development of smart grids that maximise their contribution will be extremely important issues in the next few years.

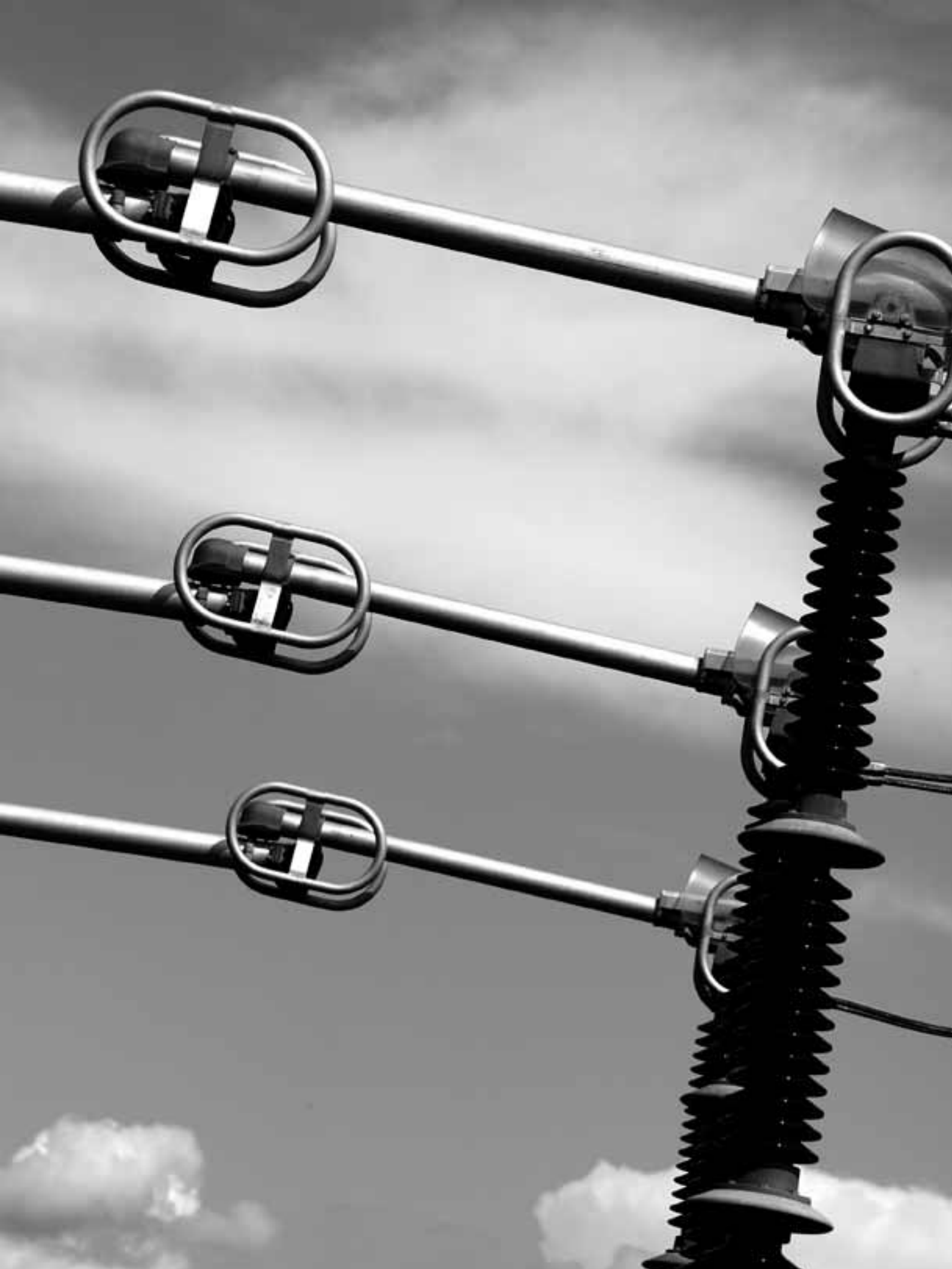
Business abroad

Terna's disposal of its equity interest in Brazil and its focus on the Mediterranean area, and in particular the Balkans, has circumscribed the potential critical situations that can emerge in doing business abroad. In any case, in the countries where Terna has advanced plans for cooperation, the Company will monitor conditions with respect to environmental and social issues, including the prevention of corruption.

Human resources

One of Terna's priorities will continue to be constant attention to human resources, first of all in terms of safety, but also of training to continually update the distinctive technical capabilities of its business.

The subject of keeping up to date professionally is becoming particularly important in view of a large generational change that will affect Terna's personnel in the next few years. Terna's strategy – one of whose distinctive elements is the passing down of knowledge through its internal faculty, "Campus" – is described in detail in "The management of generational change" box.



Stakeholder engagement

The construction of a relationship with stakeholders based on mutual trust begins with the consideration of their interests and the analysis of the compatibility of the latter with the Company's in order to adopt a consistent and transparent line of conduct.

When it was defining its Code of Ethics, the top management actively participated in establishing eight categories of Terna's most significant stakeholders in terms of the continuity of the relationship and the significance of the impact the Company had on them and vice versa.
For each stakeholder category, the table below shows the main commitments expressed in the Code of Ethics and the specific instruments for monitoring and checking their expectations and opinions. The different monitoring instruments are used with differing frequency.

Shareholders

The transparency and timeliness of information characterise the relationship between Terna and its institutional and individual investors. In particular, the Investor Relations unit handles relations with dealers and the Department of Corporate Affairs with retail shareholders.

Non-institutional investors can contact the Company via telephone by dialing: (+39) 06.8313.8136 and (+39) 06.8313.8359 and e-mail to: azionisti.retail@terna.it. Institutional investors can do so by dialing: (+39) 06.8313.8106 and (+39) 06.8313.8145 and e-mail to: investor.relations@terna.it.

To facilitate communication with investors, Terna set up an Investor Relations section on its institutional website www.terna.it, which enables whoever is interested to be promptly informed about economic results and strategic objectives. The section provides financial information (annual, half-year, and quarterly reports, sustainability reports, presentations to the financial community), up-to-date data and documents of interest to shareholders in general (press releases, composition of the Company's governing bodies, the Corporate bylaws, the shareholders' meeting Regulations, information and documents regarding Corporate Governance, the Code of Ethics, the organisational and management model pursuant to Legislative Decree no. 231/2001). In addition to the availability of all the documentation produced by the Company also in an interactive version, the site makes it possible to follow through web streaming the conference calls organised when the Company's quarterly, half-year, and annual results are made public and in the event of significant M&A transactions. Live participation via the two channels exceeds on average fifty people, in addition to the twenty analysts who follow Terna's share performance and publish studies.

During 2009, there were 29 requests for information via e-mail from retail shareholders (27 in 2008, 17 in 2007, and 62 in 2006) regarding share performance, dividends, and other information, for which the departments concerned were involved.

Stakeholder	Commitments	Monitoring and verification instruments
Shareholders, financial analysts, and providers of capital	• Balanced management of financial, security, and service-quality objectives. • Creation of short- and long-term value for shareholders. • Corporate Governance aligned with best practices. • Adoption of risk anticipation and control systems. • Attention to shareholders and prompt and symmetrical information to them. • Commitment to avoid insider trading.	• Road shows, dedicated meetings, website, and dedicated e-mail. • Sustainability rating.
Employees	• Safeguard of the physical safety and personal dignity of employees. • Non-discrimination and equal opportunity. • Investment in professional growth. • Recognition of individual ability and merit.	• Yearly survey of people- satisfaction and internal communication instruments.
Suppliers	• Appropriateness of competing on the basis of price and quality. • Transparency and the keeping of agreements and contractual commitments. • Transparent procurement processes. • Supplier qualification, including with quality, environmental, and social certifications. • Anti-mafia and anti-money-laundering measures with suppliers.	• Procurement portal, direct meetings.
Grid users, customers, and business partners	• Efficient and quality service constantly aiming to improve. • No arbitrary discrimination among players. • Confidentiality of information regarding grid users.	• Consultation Committee of the Grid Code, dedicated meetings.
Regulatory authorities and AEEG institutions	• Transparent, complete, and reliable information. • Meeting deadlines. • Fair and cooperative approach to facilitate the regulatory task.	• Periodical meetings.
Institutions and associations	• Represent Terna's interest and positions in a transparent, rigorous, and consistant manner, avoiding collusive conduct. • Ensure the utmost clarity in relations.	• Direct participation on technical committees.
***Media*, opinion groups, scientific community**	• Public and uniform dissemination of information. • Exclude exploiting and manipulating information for the benefit of the Company. • Seek areas of cooperation in reciprocal interest with groups representing stakeholders.	• Presentation and distribution of the sustainability report, organisation of seminars and workshops, targeted investigations.
Society and local communities	• Ensure the security, reliability, quality, and cost-effectiveness of the service over time. • Assessment of the long-term effects of the Company's decisions. • Reduction of the environmental impact of the Company's activities. • Prior discussion with local institutions to carry out investment in a way that respects the environment, the landscape and local interests. • Support for initiatives with social, humanitarian, and cultural value. • Produce evidence of the implementation of the environmental and social policy.	• Consultation process in planning the electric grid. Sample survey of the population.

Financial communication

The consolidation of relations with the financial community has always been one of Terna's priorities. The Company continues to expand and improve its communication channels by adapting them to the requirements of its stakeholders. To this end, it is continuing its **process of identifying the Socially Responsible Investors** (SRI) that are already present in Terna's share capital or potentially interested in acquiring an equity interest. During 2009, the Company also initiated the "**Retail Project**", whose purpose is to periodically identify Terna's retail shareholders in order to find out their main characteristics (age, geographical distribution, average number of shares) and improve communication with this category of shareholders.

The effectiveness of communication is also ensured by the following more traditional channels.

Analyst Presentation. On February 18, 2010, the customary meeting with the financial community and the *media* was held for the first time at Terna's new head office in Rome. Terna's management presented the Company's strategy, on which see the box on "The Strategic Plan".

Roadshow. The worldwide road-show programme organised periodically by the Company to present its strategies was expanded. The number of meetings increases every year and since 2007 the number of financial institutions contacted has more than doubled. In 2009, the top management was intensely engaged in communication activities with about 260 institutional investors, shareholders, or potential shareholders, and about fifty sell-side and sales analysts. The meetings took place in 20 financial centres in Europe (Milan, London, Edinburgh, Dublin, Amsterdam, Geneva, Zürich, Frankfurt, Paris, Madrid, Lisbon, Copenhagen, Helsinki), the United States (New York City, New Jersey, Philadelphia, Boston, Los Angeles, Seattle), and Japan (Tokyo).

The 2010 road-show programme has already started and has concerned so far mainly London, New York, Boston, Geneva, Zürich, Frankfurt, Paris, Madrid, and Vienna.

One-to-one and group meetings. The top management's communication activities also include one-to-one and group meetings at the Rome office and participation in utilities conferences.

Shareholders' meetings. An additional occasion for a meeting between the top management and shareholders is the Annual General Meeting. Participation in this event has been constant over the last few years.

	April 22, 2009	April 28, 2008	May 24, 2007
Representation of share capital at shareholders' meetings:	48.9%	50.2%	49.7%
- CDP, Enel, Generali, and Banca d'Italia	38.0%	38.2%	40.5%
- Other shareholders	10.9%	11.9%	9.2%

Employees

Climate surveys

At the beginning of 2009, the People Satisfaction climate survey, conducted for the first time in 2007 and addressed to all employees, was repeated. As usual, the questionnaire was filled out anonymously to encourage employees to participate freely in the survey. With regard to blue-collar workers, in addition to sending them hard copies of the questionnaire, the Company organised a series of local focus groups, which involved 185 workers selected at random. This kind of dialogue was highly regarded, with positive effects also on participation in the survey. The overall redemption rate was 70%, the same as in the preceding year. As in the previous editions, the survey enabled the Company to develop initiatives addressed to its human resources – on which see page 133 – in particular with regard to manager training and internal communication.

Relations with unions

The Protocol on the Industrial Relations Systems, which regulates relations with trade unions at the company level, defines a system of relations based on prior and/or periodical bargaining, discussion, consultation, and information, on which see the industrial relations section.

In the three-year period 2007-2009, bargaining with the unions led to the signing of 31 agreements.

With specific regard to 2009, particular mention should be made of the signing with the national union heads of the agreement on the funds to be earmarked for the institution of the result bonus for 2009 and 2010, with increases of, respectively, 4.5% and 14.5% with respect to 2008.

Finally, it should be noted that a prior discussion was held regarding the new organisational structure of the Operations Italy Department, as well as that specific meetings regarding training took place.

Grid users and electricity industry players

The Consultation Committee

During 2009, Terna continued to discuss with the electricity industry players through the User Consultation Committee.
The Committee is the technical consultation body set up in accordance with the Prime Minister's Decree of May 11, 2004, which regulates the unification of grid ownership and operation. It constitutes the stable seat for consultation among the players of the electricity industry. In effect, it represents different categories, namely distributors, producers (from both conventional and other sources), large industrial customers, wholesalers, and consumers, with the participation as observers of the Authority for Electricity and Gas and the Ministry for Economic Development.
The duties of the Committee consist in consultation, the proposal of changes in the regulations, and conciliation, because – upon request by the parties – it can facilitate the resolution of disputes that arise among grid users regarding the application of the rules of the Grid Code.
In order to satisfy the request made to Terna by the aforesaid Committee, in April 2009 a public seminar was held for the first time on the new Grid Development Plan and the state of its implementation. During the meeting, which was followed by open discussion, different issues were examined, such as the description of the main factors delaying completion of the authorisation procedures regarding the work planned.
The Committee was called on to express its opinion on the 2010 edition of the Development Plan for the National Transmission Grid – which was subsequently delivered to the Ministry for Economic Development on January 29, 2010 – with regard to both the new works planned and the definition of the Plan as a whole.
The Committee also took part in the consultations regarding changes and additions to the rules contained in Terna's Grid Code (dispatching, the division of the grid into zones, technical documents etc.).

Society and local communities

S01

Consultation with local governments

Terna's approach to local communities, which comes into play especially when it plans to construct new lines – on which see the chapter on environmental responsibility – consists in engaging the local institutions concerned, such as regional and municipal governments, park administrations etc. This process includes listening to the opinions of stakeholders and the pursuit of a consensual solution for the location of the new infrastructure and the reorganisation of already existing infrastructure. Discussion between Terna and local institutions involves about twenty employees from the Institutional Affairs Department, who dedicate their time to institutional meetings and joint inspections with all the bodies concerned. This activity is intense, because the process that precedes and accompanies the authorisation for the construction of new works is very complex.
The process before the authorisation procedure begins includes six stages, which entail the following activities:
- meetings to define and formalise the cooperation as part of the Strategic Environmental Assessment;
- meetings to define a system of criteria for analysing the area and choosing the alternatives with less impact;
- meetings to apply the criteria to the specific area and identify the corridor where the work will be constructed;
- meetings to establish the band of feasibility in the corridor and formalise the related protocols of understanding;
- meetings to define and formalise agreements on compensations;
- meetings with municipal councils to present the consensual location and the content of the agreements.

The authorisation process, which takes place through service conferences, lasts an average of two years.

EU19

The extent to which stakeholders concerned participate in the decisions regarding energy planning and infrastructure development, as well as the results of such involvement, are summarised in the table on the following page.

Finally, mention should be made of the public opinion survey conducted in October 2009 by the ISPO (Institute for Public Opinion Studies) on Elba in a period of growing opposition to the construction of a work already completely authorised: the "San Giuseppe-Portoferraio" line. Conducted on a representative sample of 1,000 people, the survey revealed that Terna needs to provide more information on its projects and works.

CONSULTATION

Work	Kind	Length	Initiation of consultation	Bodies involved	Number of meetings
Trino-Lacchiarella	380-kV electric line.	c. 100 km	2004	2 regions (Lombardy and Piedmont); 2 provinces (Pavia, Vercelli); 34 municipalities (26 in Lombardy and 8 in Piedmont); 2 Parks (Parco Agricolo Sud Milan, Parco Lombardo della Valle del Ticino).	About 200 including **about 40 in 2009**.
Colugna-Calenzano	380-kV electric line.	87 km	Jan. 2007	2 regions (Emilia Romagna and Tuscany); 12 municipalities (9 in Emilia Romagna and 3 in Tuscany).	36 including **none in 2009**.
Rationalisation HV grid in Umbria	132-kV lines (new work on, upgrading, and reclassifications of existing lines).	c. 160 km	Feb. 22, 2008	1 region, province, and municipality.	10 technical ones, including **1 in 2009**.
New station north of Bologna	380/132-kv station and links.	• 35 km of overhead links; • 20 km of demolitions; • 16 km of 132-kV cable.	Jan. 2007	1 region, 2 municipalities.	12 including **6 in 2009**.
Rationalisation Arezzo	380-kV line, demolition of existing 220-kV and 132-kV segments.	• 50 km (380-kV line); • 40 km of demolitions.	June 19, 2009	1 region, 5 municipalities.	15 including **12 in 2009**.
Fano-Teramo	380-kV line 2 380-kV stations.	c. 190 km	Jan. 26, 2006	2 regions, 6 provinces, and 61 municipalities.	29 tecnical ones, including **12 in 2009**.
Reorganisation of Rome (also includes work by ACEA)	380-kV line, new 380/150-kV station.	• 165 km of demolitions; • 100 km of new overhead construction; • 67 km of underground cable.	Sep. 2008 (to update the protocol signed in 2007).	Lazio Region, municipality of Rome, Administration of Veio Regional Park, Romanatura (regional body).	15, including **10 in 2009**.
Foggia-Villanova	380-kV line.	c. 180 km	June 3, 2008	3 regions, 3 provinces, and 11 municipalities.	18 technical ones, including **8 in 2009**.
Reorganisation of grid in Northern Calabria (Pollino)	• New 380/150-kV Aliano (MV) transformation station; • maintenance work on 380-kV Laino-Rossano link while in operation.	• Demolition of c. 90 km of 220-kV and 150-kV lines; • construction of new overhead lines (5.5 km) and new lines in underground cable (25 km); • declassification of about146 km of 220-kV lines	June 5, 2007	2 regions, 1 national park (to demolish about 66 km inside the Pollino National Park), 7 municipalities.	20 technical ones, including **none in 2009**.
Reorganisation of grid in Northern Calabria (Laino-Altomonte II)	380-kV simple-circuit line.	c. 8 km	July 26, 2007	1 region, 4 municipalities.	20 technical ones, including **12 in 2009**.
Cross-Calabria line	380-kV simple-circuit line.	c. 9 km	July 26, 2007	1 region, 3 municipalities.	10 technical ones, including **none in 2009**.
Montecorvino-Benevento	• 380-kV double-circuit line; • new 380/150- kV station.	65 km	Sep. 26, 2006	1 region, 3 provinces, 23 municipalities.	15 technical ones + about 100 single meetings at the EE.LL. involved, including **20 in 2009**.
Candela link	380-kV simple-circuit line.	c. 30 km	July 2008	2 regions, 2 provinces, 5 municipalities.	6 technical, including **4 in 2009**.
Chiaramonte Gulfi-Ciminna	380-kV electric line.	160-180 km	Nov. 30, 2006	1 region, 6 provinces, 11 municipalities.	21 technical, including **8 in 2009**.
Paternò-Priolo	380-kV electric line.	c. 60 km	Mar. 2007	1 region, 2 provinces, 8 municipalities.	10 technical, including **8 in 2009**.

Suppliers

The place where Terna and its suppliers usually meet is the "Procurement Portal", the section of the Company's institutional website through which suppliers can learn about calls for tenders, participate in tenders online, and go through the qualification procedure for being listed in the supplier register.

The Procurement and Tender Department also maintains direct contacts with suppliers to manage contractual relations and to learn more about specific issues regarding groups of suppliers. Thus, meetings with qualified companies or with trade associations to inform them about revised requirements or questions connected with ethical behaviour in the conduct of relations with Terna. In view of the work planned to develop and upgrade the grid, in December 2009 Terna presented and discussed with the electrical engineering companies in the energy industry – most of which belong to Confindustria ANIE – the new approach that will be required by the ambitious programme of works, which involves a significant increase in capital expenditure. Suppliers will have to make an even greater effort, transforming themselves from simple contractors into veritable technological partners. The new challenge is the global entrusting of works, in which the contractor will be involved right from the first stage of planning.

Media, opinion groups, and the scientific community

The Demoskopea "City Journalists 2009" survey

Terna measures the quality of its *media* relations activity through the annual "City Journalists" survey conducted by Demoskopea.
The 2009 results show that Terna is one of the four companies that shared first place in terms of having improved their relations with the press the most in 2009 and is the only one that recorded an increase in its contacts with journalists.
In terms of quality, Terna's press office ranks third in the energy industry, after the two largest Italian energy companies and climbed up 11 places with respect to 2008.
The survey was conducted in October 2009 through interviews based on a semi-structured questionnaire with 80 economic and financial journalists of the leading national dailies and periodicals, press agencies, and national television networks.

Sixteenth edition of the "Redattore Sociale" Seminar, Capodarco, November 27-29, 2009

A reference point for whoever is involved in information about social issues or the third sector, the Seminar was organised by the "Redattore Sociale" (Social Editor) press agency in the usual setting of the Capodarco Community, in the Marche. As a sponsor of the initiative, Terna was offered the possibility of organising a listening panel as part of the residential seminar. Six journalists participated, to whom the Company had sent a copy of its 2008 sustainability report. Numerous ideas were put forward, including the suggestion that Terna should find new languages to communicate its sustainability initiatives to a wider public.

Master in Corporate Social Responsibility, Catholic University of Milan

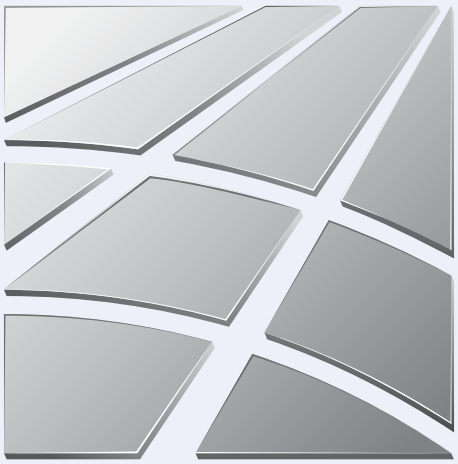
During 2009, Terna accepted the request of the Università Cattolica del Sacro Cuore in Milan to submit its 2008 sustainability report for analysis by students in the Master's programme in Corporate Social Responsibility organised by the ALTIS (School of Business and Society).
In December 2009, the students presented the results of their comparative analysis of the sustainability reports of Terna, SNAM, and REE (Red Electrica de España). Among the strong points noted by the students were the quantity of information discussed clearly in the 2008 report and the ease with which the interactive version could be used, while among the areas that needed improvement was the excessively rigorous graphics of the report intended as an instrument of communication.


Terna

“INNOVATION AND TECHNOLOGY WERE ALREADY OUR PROFESSIONAL HERITAGE. WITH THE PYLONS FOR THE FUTURE COMPETITION WE ADDED DESIGN AND CULTURE OF THE ENVIRONMENT.”

Alfonso Posati
Engineering

2009



Responsibility for the electricity service

Terna

Our approach

Terna's main business line is the transmission of electricity on high-voltage lines connecting power stations to distribution networks. This service is licensed by the government. In Italy, where Terna is the main owner of the high-voltage National Transmission Grid, with over 56,000 kilometres of lines, the Company also performs the role of operator of the electricity system. The service is indispensable for the functioning of the entire system and supplying electricity to all Italians.
Given the nature of the service, Terna is not affected by issues of product responsibility typical of companies that produce goods and have a relationship with end consumers, such as label content, marketing, and commercial communication.
Even though the end users of the electric service are not Terna's direct customers, the essential role the Company performs in the electricity system makes it ethically responsible for the service to all Italians. A sense of responsibility for a public utility service is part of the working culture of Terna's employees.
Therefore Terna strongly feels the responsibility entrusted to it by the government licence and makes the latter's objectives its own. In particular, with regard to Italy it undertakes to:
• provide a service that is secure, reliable, continuous, and cost-effective;
• maintain the transmission system efficient and develop it;
• observe the principles of impartiality and neutrality to ensure equal treatment for all grid users.
Terna's responsibility regards everyday operations, as well as the medium and long run. The transmission grid is owned by Terna, but it is also essential infrastructure for Italy, and its management, maintenance, and development must take into account the necessity of ensuring its efficiency not only today, but also for future generations.
The Company's objectives are, therefore, first of all connected with complying with the regulations and targets specified by the industry's regulatory authority, the Authority for Electricity and Gas (AEEG). Particularly important among the latter are various measures of service continuity. Terna's performance in the last few years has always been in line with or better than the targets set.
Terna's role in the Italian electric system entails specific objectives regarding the security and development of the grid. The security objectives are included in the Defence-System Improvement Plan, which specifies investment for work on various aspects that affect maintenance and, if need be, the restoration of the security conditions of the electric system.
The objectives of grid development translate into work that is included in the Development Plan, which must be approved every year by the Ministry for Economic Development. Among other things, Terna chooses the work to be done according to the criterion that the economic benefits must exceed the costs for the electric system as a whole.
The role of electricity system operator entails the possession of confidential data of the users of the transmission and dispatching services, in particular electricity producers. Furthermore, the National Statistics System assigns Terna the task of processing the statistics of the Italian electricity industry, for which information is collected from the companies concerned. For these data and those it processes to manage its economic relations with grid users, Terna employs the best practices for protecting confidential data in order to prevent information in its possession from being accessible or communicated to third parties that are not so entitled.

EU21 The security of the electric system

Ensuring the security of the national electric system and contributing to the security of the countries with which Italy is interconnected are sensitive tasks, which Terna performs through a series of actions governed by scrupulous risk assessment. The objectives are to reduce the probability of service interruption to a minimum and to contain the consequences as much as possible when it does happen.
Terna uses security criteria that are in line with the best European practices in the management of interconnected electricity systems.
These practices are the result of the cooperation that has existed for some time in the international organisations in which Terna participates in its capacity as a Transmission System Operator (TSO). In particular, it is a member of the ENTSO-E, the most significant organisation, which was founded in 2009 to replace the international associations ATSOI, BALTSO, NORDEL, UCTE, UKTSOA, and ETSO. The TSOs collaborate in writing reports on the security and adequacy of the European electricity system. They also collaborate in drawing up a ten-year Development Plan for the European electric grid, on which see the "ENTSO-E: coordination among European TSOs" box.
In order to maintain a high level of security, Terna's performance of its role has to be excellent in all phases of its activity,

from the development, construction, and maintenance of infrastructure to its operation in real time.
In particular, preventing and containing operational risk means that Terna must physically protect its infrastructure, prepare defence plans to limit interruptions, and carry out advance planning for real-time operation and control. To make all of that possible, Terna invests in the training of its workers, using modern means of simulation that reproduce the system's behaviour as it would be observed from the control rooms.
Terna's commitment to continual improvement is shown in the Electric System Security Plan drawn up by the Company and approved by the Ministry for Economic Development. Required by law after the black-out in 2003, the Plan is prepared every year and has a three-year horizon. Developed and coordinated entirely by Terna, the Plan is a reference point for corporate planning and constitutes an increasingly important commitment, as demonstrated by the growth of investment from €10 million in 2004 to €74.5 million in 2009.
Perusing the six Plans drawn up since 2003, one can observe the gradual evolution of the concept of electric system security developed by Terna. Initially, the main need was to enhance anti-black-out measures, but in the following years the approach became more systematic and included the strengthening of the Company's disaster-recovery capability and the physical protection of the infrastructure from intentional external attacks. EU6
Overall, these six editions of the Plan anticipate control concepts adopted by modern theories of smart grids. In particular, the Company constructed the widest area monitoring system, called WAMS, in Europe and system protection models that react to malfunctions by adapting to the particular network conditions. In 2009, numerous accidental failures occurred on the grid, but the effectiveness of the systems adopted enabled the system to avoid critical consequences.
In 2009, Terna continued to make improvements in:

- the reduction of the risk of interruptions, thanks to integrated maintenance planning;
- the real-time control of congestion, thanks to the introduction of techniques of optimal power flow;
- the automatic control of congestion between the Northeast and Northwest zones of the electric system;
- the reduction of vulnerabilities, with the going into operation of the Security Operation Centre, which constantly monitors the physical security of assets, as well as IT security;
- the gradual extension of the anti-intrusion network and the video surveillance of electric stations;
- the integration of the defence system with the system of remote control of distributors, which makes the continuous control of the load available for disconnection in emergencies flexible.

The sixth edition of the Security Plan for 2009-2012 includes €190 million of capital expenditure.

An agreement on security with the Ministry of Home Affairs

From left to right: Giuseppe Lasco, Head of Corporate Security at Terna; Giovanni Buttitta, Head of External Relations and Communication; Generale C.A. Leonardo Gallitelli, Commander in Chief of the Carabinieri Corps; Prefect Giuseppe Procaccini, Head of the Ministerial Staff; Flavio Cattaneo, Terna's Chief Executive Officer; Roberto Maroni, Homeland Minister; Prefect Antonio Manganelli, Chief and Director General of the Police Force.

In July 2009, the Minister of Home Affairs, Roberto Maroni, and Terna's Chief Executive Officer, Flavio Cattaneo, signed a protocol of understanding on the security of the National Transmission Grid. The protocol marks the beginning of a plan for cooperation between the Ministry of Home Affairs and Terna to protect one of Italy's most important strategic infrastructures. This is the first agreement that the Ministry has entered into with a private company. It anticipates the future EU regulations and puts Italy in the forefront with regard to the protection of nationally strategic industries. The objective of the protocol is to prevent and combat illegal attempts to access IT and telecommunications systems and to ensure the physical protection of sensitive grid infrastructure. The Ministry and Terna undertook to develop a plan of cooperation aimed at preventing and combating attacks against and damage to critical IT infrastructure and to raise the level of the physical protection of electric stations. To do this, the innovative IT instruments of Terna's Security Operation Centre will be constantly connected with the police. The initiatives adopted will be monitored every year to check their effectiveness and, if needed, establish measures to improve them.

Information security

In its capacity as the TSO, Terna possesses confidential data of the users of the transmission and dispatching services – in particular electricity producers and traders – in its database. Some of these data, for example, specifically regard their plants, with the related production capacity and injection plans presented to the Power Exchange.
Considering the significant commercial value of this information, Terna uses the best practices for protecting confidential data to prevent the information in its possession from being accessed by or communicated to third parties that are not entitled to them. The same is true of the data collected from the companies concerned to produce the industry statistics, a task performed by Terna as part of the National Statistics System. The responsibilities regarding data processing are described in the Planning Document on Security, which is constantly updated.
To further improve the reliability of its database, in 2008 the Company implemented the Disaster Recovery project, which provides it with a clone infrastructure that is activated in the event the IT infrastructure containing critical information fails.
The level of protection of information and the IT systems was raised in 2009, thanks to the first results of the programme for improving information security governance initiated by Terna in 2008. The programme adopted a structured framework based on the main international standards. In the IT environments in which it has been applied, the new framework has enabled the Company to choose and implement the most appropriate protection measures to increase information security, with indirect benefits also for the protection of personal data.
The same programme ensures that the Company will conform even more precisely to regulations that constantly and quickly change.
In particular, with respect to the regulations on privacy, in 2009 the Company created an e-mail address (privacy@terna.it) to which people who wish to exercise the "Right to access personal data and other rights" can turn.
As far as companies and others in the industry authorised to access certain specific corporate applications are concerned, in 2009 Terna began the distribution of new authentication instruments, i.e. digital certificates issued by the Company's public key infrastructure (PKI). As a Certifier, Terna is authorised to issue digital certificates, which enable it to improve the protection of the data entrusted to it by the issuers of the transmission and dispatching services and with it trust in Company-customer relations.
The 231 Organisational Model adopted by Terna, on which see page 37, was supplemented to introduce measures against new kinds of crimes, such as IT crimes and the illegal processing of data in an electronic format.

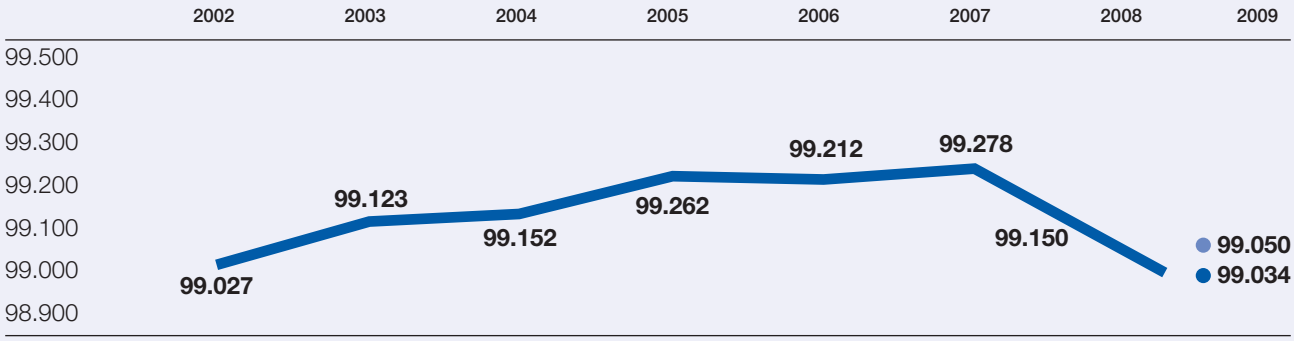
PR8

Neither in 2009 nor previously were there any complaints regarding the violation of privacy or imprudent use of data of network users.

Service continuity and quality

Continuity is the most important parameter for measuring the quality of the electric service. All the segments of the electric system – generation, transmission, and distribution – contribute to the final result: to ensure the availability of electricity to society with interruptions below pre-established thresholds and appropriate standards of technical quality.
The tables on the following pages show Terna's performance regarding the transmission service, for which it is directly responsible. In particular, the results of the last few years are shown, including with regard to the targets established, and the objectives for 2010.
Service continuity is an objective that is also recognised by the Authority for Electricity and Gas (AEEG). For the period 2008-2011, the AEEG has provided an incentive scheme, in which Terna's performance with respect to the set targets activates a mechanism based on economic rewards and penalties, on which see the section on revenue structure and regulatory framework.
The indicators considered are the electricity not supplied and the number of outages per user, a composite indicator measured at the level of the single Regional Operating Areas. The economic effects of the incentive scheme will begin in 2010.
In 2009, Terna continued its campaign to measure the voltage data in its infrastructure through the monitoring network that has been in operation since 2006 and in cooperation with end customers and distributors. The equipment installed in the network provides important information on the quality of the electricity supply.

AVAILABILITY INDICATOR (REAL AVERAGE SYSTEM AVAILABILITY - ASA)

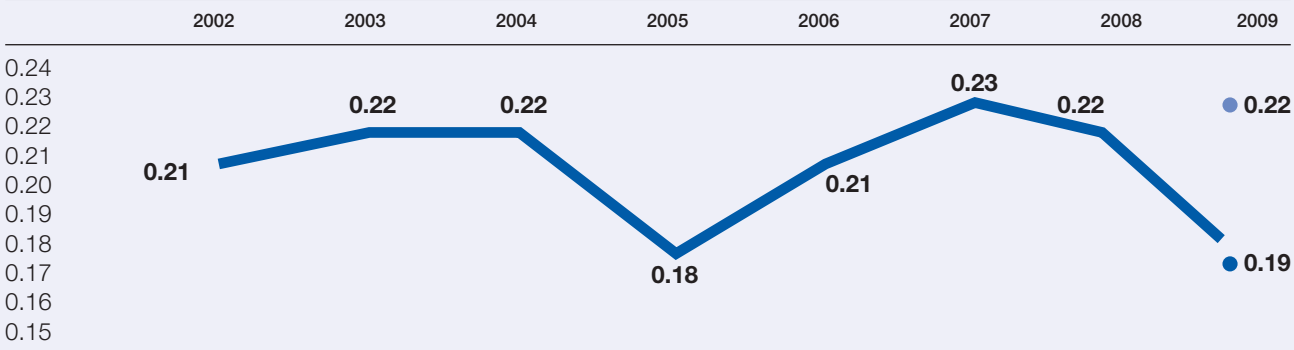


Target 2008 **99.050%** → Target 2009 **99.050%** → Target 2010 **99.050%**

ASA (Average System Availability)
This defines the average availability for use of the components of the electric grid in a certain period. This index can be expressed with regard to specific classes (for example, by voltage level), grid areas, or – as in this case – the entire NTG.
The performance achieved in 2009 is in line with the target concerned.

CONTINUITY INDICATOR (SAIFI+MAIFI)

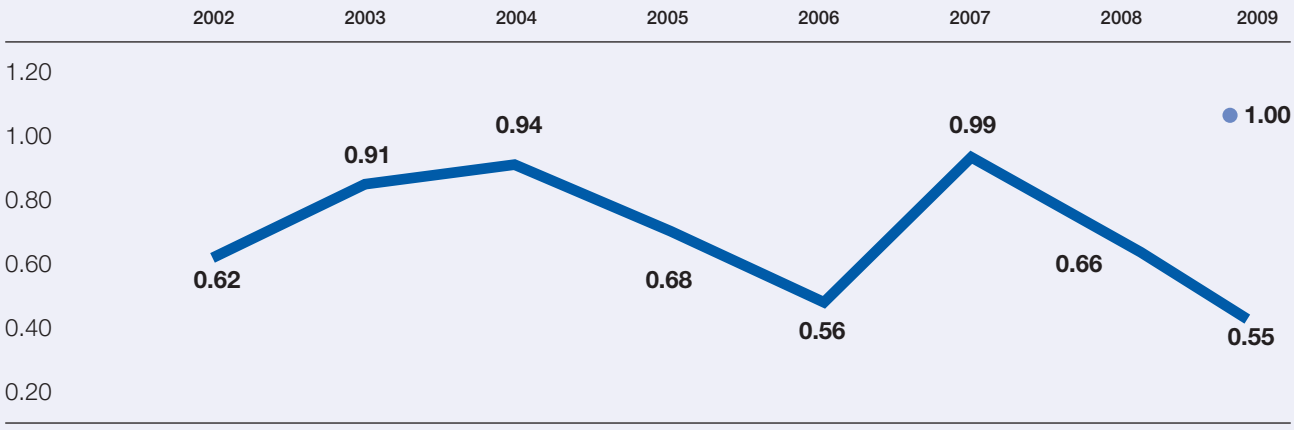
EU28



Target 2008 **0.23** → Target 2009 **0.22** → Target 2010 **0.22**

SAIFI+MAIFI (Short Average Interruption Frequency Index + Medium Average Interruption Frequency Index)
This is an index of the interruption frequency, calculated as the ratio between the number of customers affected by brief outages (less than 3 minutes) and the number of users of the National Transmission Grid. The figure is rounded to the second decimal.
Terna's performance in 2009 exceeded the target.

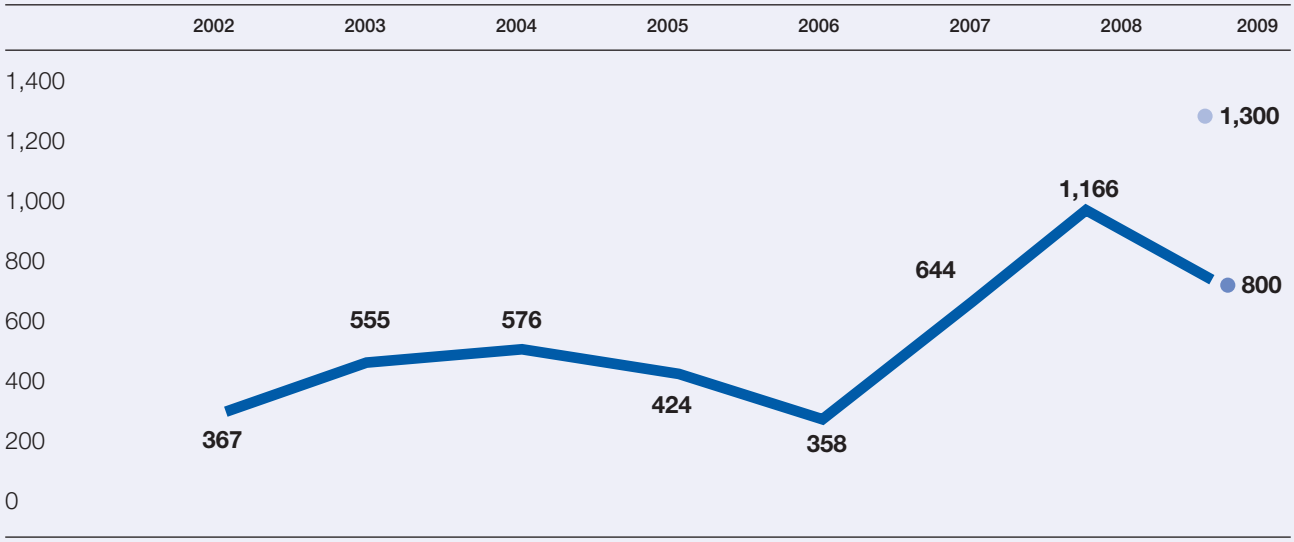
SYSTEM CONTINUITY INDICATOR (AVERAGE INTERRUPTION TIME - AIT)



Target 2008 **1.00** → Target 2009 **1.00** → Target 2010 **1.00**

AIT (Average Interruption Time)
This is the average time of interruption of the electric system (NTG) in one year. It is calculated as the ratio of the energy not supplied (ENS) and the average power absorbed by the electric system in the same period. The figure is rounded to the second decimal.
Terna's performance in 2009 exceeded the target.

SERVICE CONTINUITY INDICATOR (ENERGY NOT SUPPLIED - ENS)



Target 2008 → **1,300 MWh** Target 2009 → **1,300 MWh** Target 2010 → **1,274 MWh**

The 2008 value differs from the one that was published in the 2008 sustainability report, because it was recalculated in 2010 to include significant incidents caused by *force majeure*.

ENS (Energy Not Supplied)
Until 2007, the "Energy Not Supplied" indicator was used as an internal process indicator in order to continually improve the Company's performance. This indicator regarded the energy not supplied to the users directly connected to the NTG because of events that concerned the NGT itself and did not consider the share that was due to significant incidents.
Since January 1, 2008, AEEG Resolution no. 341/07 has regulated the service quality provided by Terna through an incentive mechanism based on rewards/penalties, which redefined the ENS indicator. The new index also includes the energy not supplied to directly connected users because of events on other connection grids that are not part of the NTG, as well as a share of the energy not supplied because of significant incidents[1]. The performance achieved in 2009 based on the new index exceeded the benchmark level.

(1) "Significant incident" is any interruption with more than 250 MWh of energy not supplied. The share that affects the ENS index is a percentage of the energy not supplied that decreases as the energy not supplied in a single significant incident increases.

Critical situations for the electric system

To ensure the continuity and quality of the electric service, Terna assesses in advance the existence in the short and medium run of threats to the management of the system while observing security criteria and within acceptable margins of risk.
This means foreseeing – using constantly improving methods – if it will be possible to satisfy electricity requirements with sufficient margins of reserve in order to manage malfunctions or unexpected increases in energy consumption.
Terna participates in the Control Room for monitoring the water system of the Po basin, the technical committee for emergencies and monitoring of the gas system, the Pentalateral Working Table with the TSOs of bordering countries to manage problems of operation connected with electricity trading on the interconnection.
The results of its assessment are shared by Terna with all the institutions concerned, such as the Ministry for Economic Development and the AEEG, and allow any critical situations in the system to be identified in advance.
The assessments carried out for 2010 do not highlight any particular critical situations for continental Italy, among other things because of the reduction of consumption and the increase of generation capacity.
As in 2009, the situation forecast for Sicily is still difficult, because of the increase in unavailability due to maintenance of generating plants (+30%) and the high rate of incidents. The Sicilian electric system is exposed to potential critical situations regarding the coverage of requirements with sufficient reserve margins and/or the management of grid security. On the other hand, the margins of sufficiency expected for Sardinia have improved with respect to the preceding years, even though the concentration of generating capacity in a few units makes the system extremely vulnerable to failures. By 2011, when the second SA.PE.I. cable goes into operation, the expected margins look decidedly more reassuring, even though the generating system will remain exposed to malfunctions. In this situation, Terna is adopting all the measures available to reduce risks in the operation of the electric systems of the islands.

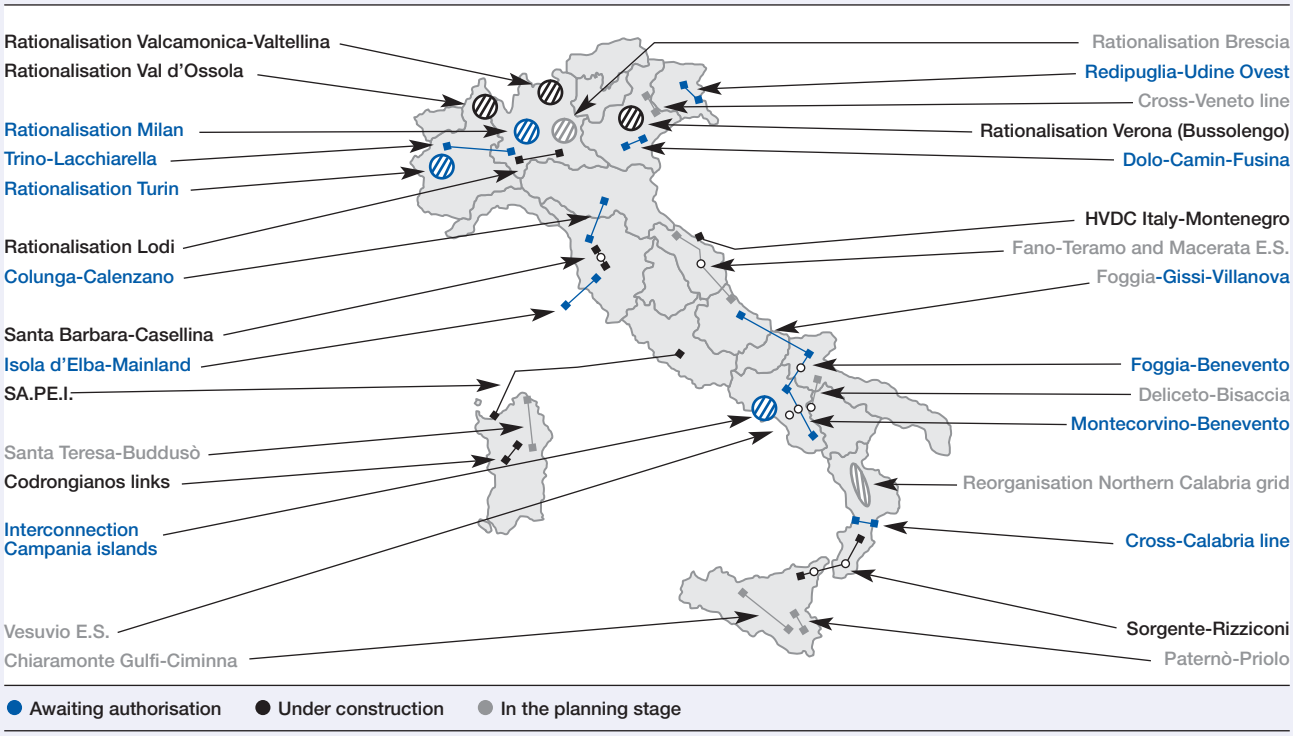
EU21

The SA.PE.I. cable at the Latina end.

EU6 Grid development

The transmission grid has to be gradually modified and extended in accordance with the developments of electricity production and consumption.
Demand and supply are growing at different rates in different areas of Italy and the combination of these elements modifies the flows of electricity, causing bottlenecks (congestions, in technical terms) on the existing grid.
Terna thus prepares plans for investment in grid development in order to keep it in step with changes in production and consumption and increase its efficiency.
The work that Terna plans and carries out has positive effects for society. In effect, the condition for carrying it out is that the economic benefit that it generates must be greater than its cost.
Every year Terna has a Development Plan with the work scheduled for the next 10 years and the progress made on the work planned in past years.
Since 2008, Terna has subjected the Development Plan to the Strategic Environmental Assessment procedure, in accordance with the provisions of EU Directive no. 42/2001.
Approved by the Board of Directors in December 2009, the 2010-2019 Plan was sent to the Ministry for Economic Development and is currently (March 2010) in the consultation stage of the SEA procedure, on which see the "Development Plan and Strategic Environmental Assessment" box. In order to find out what the main stakeholder expectations are, the Plan had previously been submitted – in accordance with the instructions of the Antitrust Authority, for examination by the Grid User Consultation Committee, which expressed a favourable opinion.
The Plan analyses the main trends of 2009, such as the slowdown in the forecast growth of consumption and the critical situations of the grid due to overloads, especially in the Northeast and in the South, which provided the information needed to identify and plan the necessary work.

MAIN WORKS CONTAINED IN THE 2010 DEVELOPMENT PLAN



Development Plan and Strategic Environmental Assessment

By issuing its Directive no. 42/2001/EC, the European Union required that plans and programmes with potential significant effects on the environment undergo a Strategic Environmental Assessment (SEA). The Directive was adopted in Italy by Legislative Decree no. 152/2006 (the Environmental Code), went into effect on July 31, 2007, and was significantly amended by Legislative Decree no. 4/2008. For the National Transmission Grid Development Plan (DP), the SEA is performed at the level of the national government. The competent authority is the Ministry of the Environment, which avails itself of the Technical Committee (SEA section) for the preliminary investigation and expresses its opinion and the grounds for it in agreement with the Ministry of Cultural Assets and Activities.
The SEA procedure of the DP is divided into six stages:
1. Preliminary stage (scoping);
2. Writing and presentation of the environmental report (ER) and the non-technical summary;
3. Consultation;
4. Assessment;
5. Decision;
6. Monitoring.

The preparation of the environmental report is entrusted to Terna. It constitutes an integral part of the DP and accompanies it throughout the entire process of elaboration and approval.
The report must identify, describe, and assess the significant impacts that implementation of the DP could have on the environment and the cultural heritage, as well as the reasonable alternatives that could be adopted considering the objectives and territorial area of the DP.
The environmental report, non-technical summary, and proposed DP are presented to the Ministry of the Environment, as well as the regions and provinces concerned. After the presentation, the consultation stage begins, which lasts sixty days. Anyone may examine the proposed DP and the environmental report and present observations, including new or additional factual or evaluative elements. The Ministry of the Environment, in cooperation with the Ministry for Economic Development, carries out a preliminary technical investigation, acquires and assesses all the documentation presented – as well as the observations, objections, and suggestions it has received – and within ninety days, in agreement with the Ministry of Cultural Assets and Activities, expresses its opinion.
On the basis of this opinion, the Ministry for Economic Development, in cooperation with the Ministry of the Environment, modifies the DP if necessary and approves it, attaching a statement explaining how environmental considerations have been included in the DP and how the results of the consultations were taken into account, as well as the reasons for which the DP adopted was chosen instead of the possible alternatives that had been identified.
The monitoring stage ensures that the significant environmental impacts caused by the implementation of the DP will be checked and the achievement of the sustainability objectives set will be ascertained, so as to promptly identify unforeseen negative impacts and adopt the appropriate remedial measures.
In December 2009, the Ministry for Economic Development approved the 2009-2018 DP. The approval was announced by the same Ministry in January 2010, with a notice published in the January 20, 2010 issue, no. 15, of the *Gazzetta Ufficiale*.

Grid development in 2009

Main works constructed

In 2009, the first cable of the SA.PE.I. – an undersea direct-current connection between Fiume Santo in Sardinia and Latina – was put into operation. Work on the second cable will continue throughout 2010. This is one of the most important strategic works planned by Terna to upgrade the national electric system. The undersea connection is about 420 kilometres long and lies up to 1,600 metres below sea level, the deepest in the world. The total investment involved amounts to more than €700 million.
The following were also constructed:
- the 220-kV Tirano electric station, as part of the connection of the Tirano-Campocologno merchant line;
- the 220-kV Napoli Levante electric station, as part of the reorganisation of the Neapolitan electricity network;
- the 220-kV Ponti sul Mincio electric station;
- the 150-kV Faeto electric station.

In 2009, Terna also increased its transformation capacity by about 700 MVA and 300 MVAR and put more than 150 kilometres of new high-voltage lines into operation.

Main works awaiting authorisation

During 2009, Terna initiated the authorisation process for a number of important works, including:

- the new Italy-France and Italy-Montenegro interconnection projects;
- the new 380-kV electric line between the Colunga and Calenzano electric stations;
- the 380-kV Gissi-Villanova line;
- the 380-kV Laino-Altomonte line;
- the new 380-kV line between the Maida electric station (under construction) and the 380/220/150-kV Feroleto station;
- lower-voltage works, many of which concern plants producing from renewable energy sources.

In addition to the new lines that have started the authorisation process, there are those whose authorisation by the competent Authorities is in progress. Among the latter, the main ones are:

- the overhead segment of the new 380-kV Sorgente (Sicily)-Rizziconi (Calabria) line with double three-wire circuits;
- the 380-kV rationalisation between Venice and Padua;
- the upgrading of the 380-kV Foggia-Benevento line;
- the new 380-kV Udine Ovest-Redipuglia E.S. line with double three-wire circuits;
- the new 380-kV Trino-Lacchiarella line with double three-wire circuits.

Main worksites

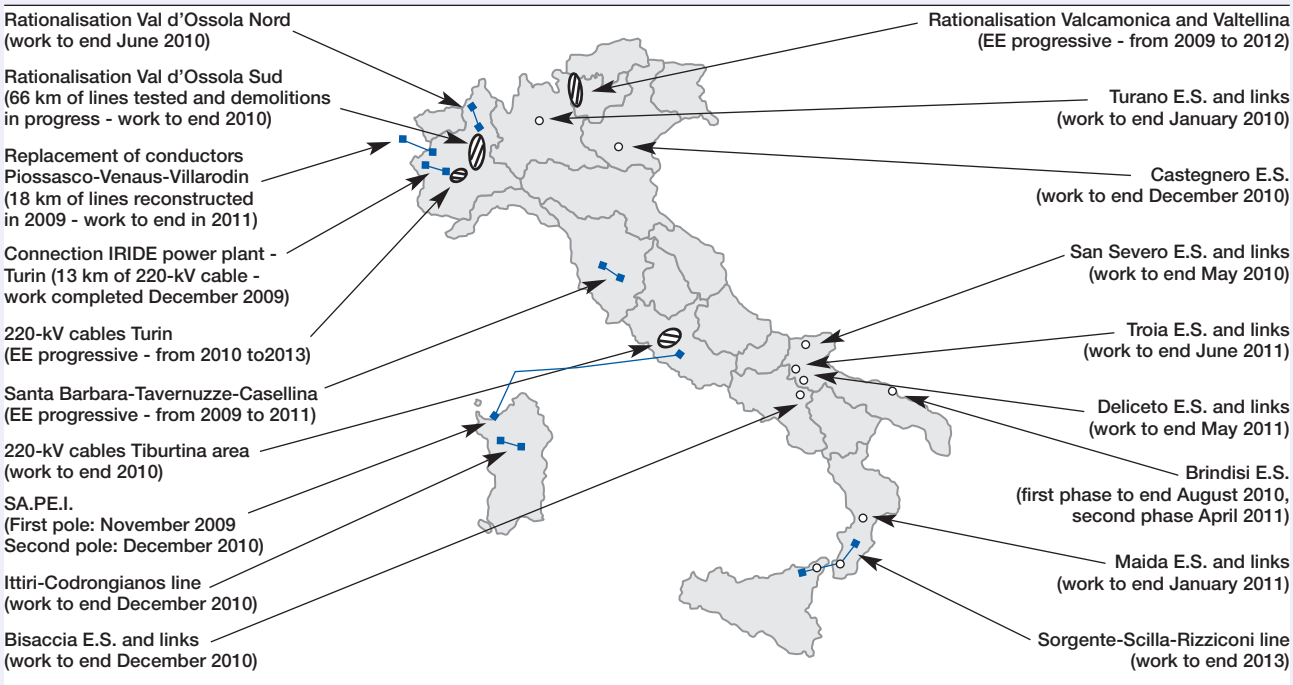
During 2009, Terna started work on the construction of the undersea-cable part of one the main development works: the 380-kV "Sorgente-Rizziconi" connection, which will upgrade the 380-kV interconnection across the Strait of Messina between Sicily and Calabria.

The work includes the construction of the connection in alternating current with double three-wire circuits, partly overhead, partly in underground cable, and partly in undersea cable. The new 380-kV line will connect the existing 380-kV stations at Sorgente (Sicily) and Villafranca (Calabria).

The new line comprises an overhead segment with double three-wire circuits about 20 kilometres long between the 380-kV Sorgente station and the future 380-kV Villafranca station, a cable segment about 43 kilometres long between the Villafranca and Scilla stations, and a final overhead segment with double three-wire circuits about 40 kilometres long between the Scilla and Rizziconi stations.

The following map shows all the worksites opened and the dates when the works are scheduled to be completed.

MAIN WORKSITES OPEN AS OF DECEMBER 2009



Connection of new infrastructure

Access to the grid infrastructure is regulated by the Authority for Electricity and Gas (AEEG). The description of typical connection solutions is an essential part of the Grid Code. However, Terna may examine alternative solutions, which must be approved by the AEEG in order to reduce as much as possible the possibility of behaviour that could appear discriminatory with respect to the applicants.
The regulations govern many stages of the process of accessing the grid infrastructure and establish Terna's margins of discretion, such as how long it takes to carry out requests, the determination of the elements of the technical connection solutions, and the benchmark average time and costs of connections. Terna satisfies these necessities with an IT system for managing connection requests, which ensures their unequivocal codification, their traceability, and the transparency of the process.
During 2009, work was completed on the construction of grid infrastructure to connect:
- 12 primary distribution substations;
- 9 plants generating from conventional energy sources;
- 35 plants generating from renewable sources, including 30 from wind.

EU23

ENTSO-E: coordination among European TSOs

The ENTSO-E, a voluntary organisation set up by 42 European Transmission System Operators, has been in operation since July 1, 2009. Previously, its tasks had been performed by separate associations: ATSOI, BALTSO, NORDEL, UCTE, and UKTSOA. The new organisation was founded to implement the provisions of the Third Energy Package, which was published on August 14, 2009 in the Official Gazette of the European Union and contains prescriptions that modify the current EU regulatory framework of the European energy market, with the objective of strengthening its integration.
In 2011, membership in the Association, as well as the latter's mandate, will become obligatory for all TSOs.
The tasks of the ENTSO-E include the elaboration of market grid codes on trans- border questions and market integration, with particular regard to:

- grid security and reliability;
- the connection of third parties, and their access, to the transmission grid;
- data exchange;
- grid interoperability;
- operating procedures in emergencies;
- the assignment of transport capacity and congestion management;
- balancing rules;
- transparency rules;
- the harmonisation of transmission rate structures and inter-TSO compensation;
- grid energy efficiency.

In addition to the grid and market codes, the ENTSO-E will prepare on the adequacy and security of the European electric system for the summer and winter periods, as well as a ten-year plan for developing the European transmission system. The objective is to promote coordinated planning of the latter in order to schedule investment and keep the developments of grid capacities under control. This will make it possible to promptly discover gaps, especially with regard to trans-border capacities.
The ENTSO-E is also entrusted with research and innovation activities of common interest among TSOs.

Infrastructure maintenance

EU6 Infrastructure maintenance is essential to ensure service quality and continuity.
To ensure that the Company is able to identify infrastructure immediately, especially if there is a malfunction, as well as to get to the one in question, Terna uses a georeferencing system integrated with a navigation system that shows all plants superimposed on the road network.

The main tasks performed in 2009 on electric stations and lines were the following.

Monitoring and checking infrastructure: in addition to the checks required by law, Terna:
- carried out about 11,400 periodical surveillance/technical checks on stations at various voltage levels;
- visually inspected about 95,000 km of three-wire circuits, including about 3,400 km by helicopter: about 2 inspections during the year of the entire grid;
- performed 13,976 instrumental checks on the electric lines, using, among other things, thermal cameras to detect hot points and Daycor UV cameras to detect corona discharge from insulators and conductors.

Ordinary maintenance: Terna decides the work to do on the basis of signals of degradation from the integrated remote-control system, online sensors, and the results of infrastructure monitoring. For this purpose, since 2005 the Company has used an expert system to assist the maintenance of lines and stations: the MBI (Maintenance and Business Intelligence) system, which allows maintenance activities to be optimised.

EN12 **Vegetation cutting:** the proper operation of lines requires continual monitoring aimed at assessing the growth of vegetation in order to prevent contact between plants and conductors, with the consequent risk of short circuits, line interruption, and fires.
Work on vegetation normally consists in cutting it down to the ground or, if there are environmental restrictions, branch trimming aimed at maintaining safety distances. Herbicides are never used.
In 2009, vegetation was cut along 11,416 km.

Work on live wires: maintenance work was carried out on live wires about 2,300 times.
Carried out with the line in operation, this work increases line availability and consequently contributes to the improvement of service quality and continuity.

Extraordinary maintenance: during 2009, 6 km of 380-kV lines, 2 km of 220-kV lines, and 39 km of 132/150-kV lines were reconstructed.

EU8 Engineering and innovation

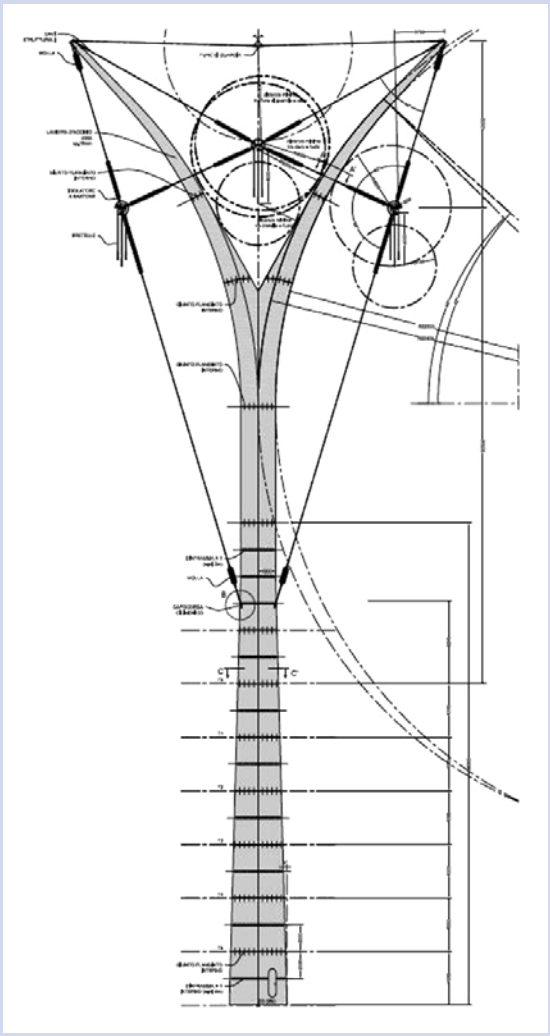
To introduce new technological and plant-engineering solutions – new instruments and methods aimed at improving the reliability of infrastructure and thus service quality – Terna uses mainly in-house engineers, who base their work on attentive monitoring and analyses of the behaviour of equipment and infrastructure. The Company also avails itself of the specialised assistance of constructors, cooperation with universities, ERSE (a new organisation engaged in research on electricity), and CESI S.p.A., a specialised service company in which Terna has an equity interest of more than 30%.
Innovation and the development of new engineering solutions break down into four areas of research (see table on pages 70-71).

Pylons of the future

With the architect Hugh Dutton's design, the Rosental Studio won the first prize in the international competition "Pylons of the future" sponsored by Terna for the conception and design of new supports, with a low visual impact, for Italy's transmission grid. The Frigerio group came in second, and the Giugiaro studio third. The jury of the competition, which was chaired by Chief Executive Officer Flavio Cattaneo, considered that Hugh Dutton's design best corresponded to the requisites requested:

- **technical and functional suitability:** the pylon proposed was judged to be suitable to perform its function while complying with the technical specifications and the regulations in force;
- **flexibility of use:** understood as the possibility of utilising the support in different places and situations, considering the frequent necessity of using routes that are not rectilinear and the transformation of the environment to meet human needs;
- **minimal environmental impact:** such as the reduced visibility of the pylon with respect to current standards;
- **production technology:** the technological process of producing the pylon, the choice of materials, installation, and the stretching of the conductors must be logical from the point of view of industrial feasibility;
- **operation and maintenance:** the support must ensure that maintenance work, both conventional and live-wire, is easy to carry out.

The idea behind the international competition "Pylons of the future" was to combine innovation, technology, design, and culture with the sustainable development of the National Transmission Grid.



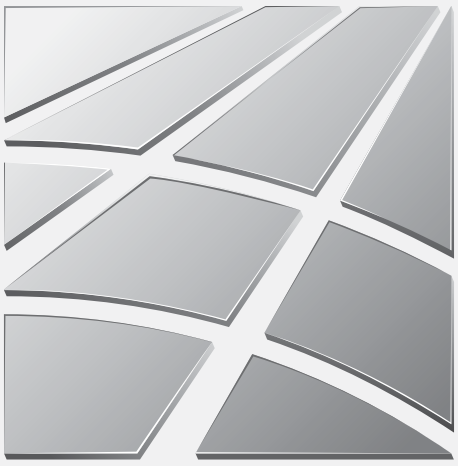
Purpose	Projects and progress 2009
	Structure and material optimisation
Designing supports with less visual encumbrance and/or better environmental integration	**Single-stem tubular supports** Continuation of the design, begun in 2008, of a second series of supports for 150-kV lines with a better mechanical performance. Completion of the design and execution of the load trials, begun in 2008, of a single-stem, tubular 380-kV support. **Foster pylons** The segment of the "Tavarnuzze-Casellina" line with 9 pylons designed by Norman Foster was completed and put into operation. **"Pylons of the future" international competition** The competition ended with the award ceremony for the top three entrants. The first prize was awarded to the architect Hugh Dutton, from the Rosental Studio. The beginning of the stage of engineering the series of pylons is scheduled for 2010.
Enhancing the transmission capacity of existing lines	**Innovative high-performance conductors** A new kind of conductor is being installed. They are characterised by a high thermal limit and reduced elongation, which is useful for resolving critical situations connected with distances from sensitive places such as schools, kindergartens, inhabited houses, and workplaces. Additional solutions are being developed that use ceramic materials and ones with carbon, which are characterised by high electric and mechanical performances and are particularly suited for reconstructing electric lines without replacing the pylons.
Fast replacement of fallen pylons	**Light structures to use as replacements** Completed the design and acquisition of a kit of six quickly installable emergency temporary supports. The trials are scheduled to be completed and kits made available to maintenance teams by early 2010.
Improvement of surface insulation in highly polluted environments	**Polymeric insulators** Because of their surface characteristics and their lightness, polymeric insulators (silicon resins and fibreglass) are particularly suitable for areas with heavy saline or industrial pollution. The technology for diagnosing insulators was consolidated and experimentation of methods for replacing them with the line in operation will continue. Equipment with silicon insulators are also installed in stations to replace the most dangerous ceramic ones. Specifically, all new current transformers are insulated with silicon, as are switches and power transformers.

Purpose	Projects and progress 2009
	Equipment diagnostics
Early detection of abnormal situations	**New sensors on equipment and machinery** The installation was completed in the Lacchiarella station of a new kind of sensor positioned on the equipment and machinery. They will undergo a trial period, with a view to installing them widely.
	New equipment
Reduction of the construction time and size of electric stations	**Integrated compact station equipment (MCI)** Terna introduced new equipment containing more than one function (switching, sectioning, and measuring) in a single case, thus reducing the amount of space occupied for the construction of stations. In 2009, the Arco and Ardenno stations were put into operation and the installations were completed in the Lago Boracifero station in Tuscany.
Quickly installed compact station	As part of its pursuit of solutions to ensure a fast reactivation of the service after a case of disaster recovery, the Company designed a mobile 150-kV station entirely mounted on three trolleys that can be moved to the site of use without the necessity of special kinds of transport. The mobile station was conceived in such a way that its insertion in a 150-kV line can be quickly carried out through connections with connector cable, all of which is assembled and tested at the factory.
	Infrastructure security
Increased automation	**New earthing devices for works** Terna designed and constructed devices that can replace operators and make manoeuvres on infrastructure faster. Once testing was completed, in 2009, 80 prototype devices designed in collaboration with the Company's main suppliers were installed.
Transformer security	**New power transformer project** After serious failures recently occurred on large power transformers, Terna introduced a series of improvements aimed at increasing the intrinsic security of the same. In particular, polymeric insulators will be installed to replace ceramic ones. The former have the advantage of tolerating stress better and do not project fragments in case of malfunctions. A series of reinforcements will be made on the winding and casing, which will be tested by a "short-circuit trial" carried out for each kind of transformer.

“WITH THE NEW DISPATCHING SERVICE MARKET WE HAVE CONTRIBUTED TO REDUCING SERVICE COSTS TO THE BENEFIT OF FINAL CONSUMERS.”

Maria Antonietta Sidoni
Grid Services and Production Plans

2009



Economic responsibility

Terna

Our approach

Terna integrates its service goals with those of economic performance. The two aspects come together in our pursuit of operating efficiency and opportunities for growth, while fulfilling our service obligations, in particular the reliability of the electric system.
In Italy, Terna has a monopoly in the transmission of electricity, and therefore cannot expand its business and increase its revenue by achieving a larger market share. The Company pursues these goals mainly in the following ways:
- prompt carrying out of the investment scheduled in the Grid Development Plan;
- pursuit of operating efficiency and optimisation of its capital structure;
- unregulated lines of business, which consist mainly of services performed for other companies that own electricity networks, as well as telecommunications and consultancy services in the transmission field;
- acquisition of new assets, in particular the remaining segments of the National Transmission Grid that Terna does not own. This process concerned the three-year period 2006-2008 and was given a significant boost in 2009 by the acquisition of Enel's high-voltage lines, which are now owned by TELAT;
- business opportunities in fields other than transmission, such as the project for exploiting assets by constructing photovoltaic plants on land adjacent to electric stations (see the part regarding SunTergrid in the section "Presentation of Terna").

Other growth opportunities lie in the expansion of our activities abroad. After the sale of our Brazilian subsidiary, Terna Participações, the search for new opportunities for investing in the transmission field has focused on the southern Mediterranean area and the Balkans, where a number of projects – regarding in particular the construction of interconnection lines – are being developed. For a detailed examination of the financial results achieved by the Group, readers are referred to the annual reports available at www.terna.it in the Investor Relations section, particularly the 2009 annual financial report. In any case, the main results of 2009 and the last three years are discussed in this chapter in connection with the subject examined. For example, share performance and dividends are reported in the section on "Relations with shareholders", while investment is reported in the section on "Terna's economic impact".
The first section presents a summary of the Strategic Plan, with the management guidelines and working instruments that will be put into effect to ensure continuity and improvement in the Group's financial results within a five-year time horizon. The section below on "Revenue and risk management" provides information on Terna's different sources of revenue, with particular regard to the effects of the regulatory framework, and their respective weights, as well as the measures put into effect by the Company to prevent and cope with the risks connected with its business.
The economic effects of Terna's activities do not end with the financial results. The section on "Terna's economic impact" reports the most important qualitative and quantitative information connected with relations with specific stakeholders. The most significant of these relations are explained in the final sections of the chapter, which also relates Terna's commitment to developing projects and instruments that are consistent with the guidelines of the Code of Ethics. The following should be noted in particular:
- pursuing transparency and clarity in communication with shareholders;
- choosing suppliers according to criteria based on their meeting qualification requirements, including the observance of environmental and workplace-safety regulations;
- concern for companies in the electricity industry, both in applying the principle of non-discrimination and beyond the obligations established by the regulatory authorities.

The Strategic Plan

In February 2010, Terna presented its Strategic Plan for 2010-2014, which had been approved by the Company's Board of Directors. The following points provide a summary of it.

Investment increased from €3.4 billion to €4.3 billion (+26%)
In the next five years Terna will invest €4.3 billion, mainly to develop the grid, an increase of 26%, amounting to €900 million, with respect to the figure stated in the preceding Plan (€3.4 billion). Investment for development, for which an incentive-based remuneration is provided, constitutes 77% of the total and increased from €2.6 billion to €3.3 billion, with more than 70% concentrated in central and southern Italy. Investment for interconnections with other countries rose

from the less than €100 million of the previous Plan to the approximately €650 million of the current one. The total of €4.3 billion does not include SunTergrid's investment of more than €300 million for the photovoltaic project.
The increase in investment is reflected in the Regulatory Asset Base (RAB), which will grow from €8.6 billion to €11.1 billion at the end of the Plan, with an average annual increase of more than 5%.
The investment provided for by the Plan on the regulated part amounts to an annual average of about €860 million. This is a big, but manageable challenge, as shown by the significant results achieved in the last two years.
The most important strategic works in Italy provided for in the Plan are:
- the Dolo-Camin Fusina line in Veneto;
- the Chignolo Po-Maleo line in Lombardy;
- the second SA.PE.I. cable connecting Sardinia to the Italian mainland;
- the Santa Barbara-Casellina line in Tuscany;
- the Sorgente-Rizziconi connection between Sicily and Calabria;
- the Foggia–Benevento line, which crosses Apulia and Campania.

As far as interconnections are concerned, the following are planned:
- the Italy-Montenegro interconnection. In effect, the governments have signed an agreement, according to which Terna will build a 450-km cable – 375 km of which will be undersea – between Villanova and Tivat and two electric stations. The investment amounts to a total of €760 million, of which €590 million are part of the 2010-2014 Strategic Plan. The agreement also provides for a strategic partnership between Terna and the local transmission company, Prenos, through the acquisition, among other things, of a minority interest in the share capital of the latter's share capital;
- the Italy-France interconnection, whose authorisation process was started in October 2009.

Investment diversification
Terna plans to invest more than €300 million in the photovoltaic project, with an EBITDA margin of more than 80% when it is operating regularly. The project aims to exploit some of the currently unused land adjacent to stations and provides for the construction of small-scale photovoltaic generating plants, with a target of 100 MW of power by the end of 2010.

Increased margins: from 74% to 77%
Increased revenue and cost containment will enable the Group to raise its profitability from the current 74% to 77% at the end of the period covered by the Plan. Thanks to the increased investment, from 2009 to 2014, the average annual increase of Group revenue will be about 6%. The increase in profitability also stems from the complete consolidation of TELAT, which was acquired on April 1, 2009, and the maximisation of incentives, which Terna foresees will lead to €90 million of additional revenue, concentrated in the three-year period 2010-2012.
The Plan provides for an average annual increase in total costs of about 3%. On the other hand, in spite of the sharp increase in investment, costs regarding regulated business lines will remain stable, thanks to the rationalisation of external costs and containment of the growth of internal ones.

Capital structure: net debt less than 60% of the Regulatory Asset Base
The cash absorption entailed by the investment plan and the dividend policy will lead to an increase in net debt of €3.1 billion by the end of the Plan.
The capital structure will remain sound during the period of the Plan. Terna is committed to maintaining the ratio between debt and the RAB below 60% at all times. Because of the Group's excellent rating, among other things, the conditions of the debt remain very competitive.

Dividend policy: 4% annual increase, with 2008 as the base year
Terna has confirmed its dividend policy, which provides for a 4% annual increase, with 2008 as the base year and half-yearly coupons split into an interim dividend and the balance. Furthermore, part of the proceeds from the sale of Terna Participações – amounting to about €150 million – will be used until 2012 to supplement the aforesaid policy.

Revenue and risk management

Revenue structure and regulatory framework

In 2009, the Terna Group's revenue amounted to €1,361 million. About 94% of this comes from lines of business whose remuneration is established by the AEEG, the Authority for Electricity and Gas, and only the remaining 6% or so regards other ones, mainly the provision of services such as maintenance work on the lines of other owners, telecommunications, and consultancy in the field of transmission.
The regulated revenue is generated by different rates, the most important of which is consideration for transmission, paid to Terna by various categories of operators in the electricity industry (such as producers and distributors) in proportion to the quantity of electric power transported – withdrawn, injected, or dispatched – on the grid owned by Terna.

The per-unit price of the rates is determined annually by the AEEG in accordance with rules established at the beginning of every four-year regulatory period. Both the costs, including margins, set for Terna and the quantity of electric power transported are contributing factors. The costs taken into account in determining transmission rates are based in particular on the following three considerations:

- **remuneration of the Regulatory Asset Base (RAB).** The value of the RAB is adjusted every year according to the change in the gross investment deflator calculated by the Italian National Institute of Statistics (Istat) and updated in accordance with Terna's net investment. Such investment comprises both the construction of electricity infrastructure (lines and substations) to renovate or expand the grid included in the Grid Development Plan and improvements in management instruments, such as, for example, IT systems and technologies to enhance the security of the electricity system.
  The AEEG remunerates the RAB at a rate of return linked to market ones, setting it at 6.9% for the third regulatory period (2008-2011). This return is increased by 2 or 3 percentage points for categories of development investment to which particular strategic importance is attributed. In 2009, RAB remuneration constituted about 44% of the costs paid to Terna;
- **depreciation/amortisation.** Annual adjustment is provided for the depreciation/amortisation acknowledged because of the effect of new investment carried out, divestments, and the exhaustion of the useful life of assets. Terna estimates that remuneration of depreciation/amortisation constitutes about 27% of the total costs paid;
- **operating costs.** These are the current costs of transmission, dispatching, and metering and, in general, the costs of labour and the procurement of goods and services that do not constitute investment. The component covering these costs, which in 2009 amounted to about one third of the total costs acknowledged by the AEEG, is subject to a price-cap mechanism; that is, it is adjusted according to inflation and reduced by an efficiency factor amounting to 2.3% for transmission and to 1.1% for dispatching. At the end of the previous regulatory periods, the efficiency gain exceeding the pre-established efficiency factor was split equally between Terna and end users in terms of rate reduction.

Once the per-unit sums of the different rate components have been established, Terna's revenue depends on the actual consumption of electricity. In effect, because of the quantity effect, it can exceed or fall short of the estimated figure.

The sharp decrease in production that began in the second half of 2008, made the trend of energy demand more uncertain and led to AEEG to adopt ARG/elt Resolution no. 188/08, which introduced an optional mechanism to partially offset the quantity effect for the remaining part of the regulatory period, i.e. 2009-2011. This mechanism, which Terna decided to adopt, provides that the AEEG:

- supplements Terna's remuneration for all but 0.5% of the actual volume if the latter falls short of the one used to establish the rates for 2009;
- requires Terna to refund its higher earnings for all but 0.5% of the actual volume if the latter exceeds the one used to establish the rates for 2009.

The introduction of the mechanism guaranteeing the level of revenue for the three-year period 2009-2011 marked the electricity transmission industry's transition from a price-cap system, in which revenue depends, among other things, on the volume of electric power transported on the national grid, to a revenue-cap system, in which revenue is practically pre-established, because it can only vary by +/-0.5% with respect to that used to set the annual rates.

In 2009, the adoption of this mechanism enabled Terna to recover about €60 million in spite of an estimated approximately 6.4% reduction in the demand for electricity.

Revenue for pass-through items

In order to keep the electricity system in balance, Terna must perform adjustment transactions entailing the purchase and sale of electricity, carried out in particular on the Dispatching Service Market (DSM). The regulations provide that the financial value of these transactions for Terna have a final balance of zero. They are, therefore, pass-through items that do not affect the marginal revenue in Terna's income statement. The remuneration that Terna collects from distributors and producers and passes on to the other owners of portions of the National Transmission Grid is also part of these items.

In 2009, pass-through revenue and costs totalled €5,218 million (€6,545 in 2008). Measured by applying specific rates, pass-through items are settled by Terna with the other parties in the industry. A significant pass-through item is constituted by uplift, the payment to cover the net charges incurred in procuring resources on the MSD, which in 2009 amounted to about €981 million (about €2 billion in 2008). The uplift is passed through to the bill of the end user. Although it does not affect Terna's profitability, pass-through revenue constitutes a considerable figure and has important effects on relations with the other industry players with regard to invoices and their settlement, as well as the commercial and administrative management of contracts.

Incentive schemes

The AEEG has introduced specific bonus/penalty schemes aimed at providing incentives for improving the service, both in economic terms and with regard to technical reliability. These schemes provide that, when the objectives are achieved, the value of the benefit for the users of the service must be a multiple of the incentive provided to Terna and that the burden of the uplift for the end user must be reduced. In particular, for 2009 incentive schemes were created for:

- reducing the resources procured on the DSM. Specifically, this scheme was introduced by ARG/elt Resolution no. 213/09 for the three-year period 2010-2012 as well, with several differences with respect to the scheme for 2009;
- improving the forecast of electricity requirements and the production of wind power (for the period 2008-2011).

The bonuses for achieving the objectives for 2009 established as part of the incentive schemes, amounting to €45 million, are included in the overall figure of regulated revenue.

INCENTIVE SCHEMES IN EFFECT IN 2009

Objective	Year introduced	Period in effect	Penalty/bonus range	2009 result
Improved forecasting of wind power production	2007 (Resolution no. 351/07)	2008-2011	Penalty: max €1.5 million Bonus: max €3 million	Bonus: max €3 million
Improved forecasting of electricity requirements	2007 (Resolution no. 351/07)	2008-2011	Penalty: max €5 million Bonus: max €5 million	Bonus: max €2 million
Reduced volume of resources procured on DSM	2008 (Resolution no. 206/08)	2009 (1)	Penalty: max €5 million Bonus: max €40 million	Bonus: max €40 million

(1) With a few changes, the 2009 scheme was extended by ARG/elt Resolution no. 213/09 to the three-year period 2010-2012

Other incentive measures

- With regard to the regulation of transmission service quality, AEEG Resolution no. 341/07 established for the period 2008-2011 a scheme of bonuses and penalties linked to two indicators: the ENSR (benchmark energy not supplied) and the NDU (number of outages per user), measured respectively at the national level and at the level of each transmission operating area (AOT). The bonus/penalty is calculated by multiplying a pre-established sum (€15,000 per MWh in the case of the ENSR) by the difference between the actual value and the target value of the indicator, net of a franchise (+/-10% of the target value in the case of the ENSR and +/-5% in the case of the NDU). The benchmark levels were determined in 2008 and the first financial effects of this mechanism for regulating the quality of the transmission service will be seen as from 2010;
- with its Resolution no. 188/08, the AEEG also provided for the possibility of applying the extra-remuneration-of-investment mechanism to work in progress regarding only a category of investment proposed by Terna with particular strategic importance for the system, provided that the deadline for the investment to become operational set by the Authority itself, on the basis of the information furnished by the Company, is met. The procedures for implementing this mechanism are currently being discussed with the AEEG.

Transmission costs in end users' bills

In accordance with current regulations, many of Terna's acknowledged costs are billed to the end customers of the electricity service by the distribution companies through the TRAS component. According to AEEG data, the cost of transmission (regulated margin revenue) constitutes about 2% of the average user's electricity bill.

Risk management

The analysis, prevention, and management of risks regard the different aspects of the Company's business activities. In going about its business, Terna is exposed to market and financial risks (concerning exchange rates, interest rates, inflation, liquidity, and credit), operating risks connected with the malfunctioning of the electricity grid, regulatory risks, and litigation risks. See pages 63-64 of the 2009 annual report for a description of the procedures for preventing and managing such risks. The quantitative and approach aspects are described below, and regard respectively:

- coverage of the Company's pension plans;
- risks and opportunities connected with climate change;
- other risks.

EC3

Coverage of the Company's pension plans

The Terna Group does not have any corporate pension plans with defined benefits. Pension coverage provided in Italy by the public system, which originally was among the highest in the OECD countries, has been reduced by a series of reforms that began in the mid-1990s. Terna offers its employees voluntary supplementary pension coverage with a defined contribution. Specifically, senior managers may join the Fondenel pension fund (http://fondenel.previnet.it), which provides for contributions from both the manager and the Company. In both cases, the contribution varies according to the date of hiring and the date the manager first joined a supplementary pension fund. The other employees (blue-collar workers, white-collar workers, and junior managers) may join the Fopen pension fund (http://www.fondopensionefopen.it). In addition to the pension plans, the employees of the Italian companies receive other payments that have the characteristics of defined benefits.

In particular:

- while they are employed, contracts provide for all employees to receive a "loyalty bonus" upon completing their 25th and 35th years of service at the Company;
- when their employment is terminated, all employees are entitled to receive a termination bonus (TFR). Senior managers hired or appointed before February 28, 1999 receive an allowance in lieu of notice (ISP) and production workers, office staff, and junior managers already employed as of July 24, 2001 receive an additional month's pay (IMA);
- when their employment is terminated, senior managers are entitled to supplementary health care (ASEM);
- employees hired by June 30, 1996 are granted a discount on the electricity consumed for domestic use (electricity discount).

The composition of and changes during the period in the TFR and other employee-related provisions of the Parent Company, Terna, to which all employees refer, as of December 31, 2009 are shown in the following table:

In millions of euros	Dec. 31, 2008	Provision	Interest cost	Utilisations and other movements	Dec. 31, 2009
Benefits during employment					
Loyalty bonus	5.1	0.2	0.2	-0.6	4.9
Total	**5.1**	**0.2**	**0.2**	**-0.6**	**4.9**
Benefits due at termination of employment					
Termination bonus (TFR)	74.4	11.2	3.2	-17.3	71.5
Additional month's pay (IMA)	7.4	0.4	0.4	-0.9	7.3
Allowances in lieu and similar benefits	3.5	0.0	0.1	-0.3	3.3
Total	**85.3**	**11.6**	**3.7**	**-18.5**	**82.1**
Benefits subsequent to employment					
Electricity discount	51.9	1.2	1.5	-27.9	26.7
ASEM (health care)	11.6	0.0	0.3	-0.5	11.4
Total	**63.5**	**1.2**	**1.8**	**-28.4**	**38.1**
Total	**153.9**	**13.0**	**5.7**	**-47.5**	**125.1**

Amounting to €125.1 million as of December 31, 2009 (€153.9 million as of December 31, 2008), this item recorded a decrease of €28.8 million with respect to the previous year, which was essentially due to the reversal from the electricity discount provision (€26.8 million, €19.4 million net of the tax effect) following the agreement with Enel Distribuzione, which re-determined the correct number of retirees entitled to the benefit.
The costs regarding liabilities for employee benefits recorded in the income statement break down as follows:

In millions of euros	TFR	Indemnities in lieu and similar benefits	IMA	Loyalty bonus	ASEM	Electricity discount	Total
Dec. 31, 2008	**74.4**	**3.5**	**7.4**	**5.1**	**11.6**	**51.9**	**153.9**
Current cost	0.0	0.1	0.3	0.2	0.2	0.9	1.7
Amortisation of actuarial gains and losses	0.0	-0.3	0.1	0.0	-0.5	0.4	-0.3
Financial expense	3.2	0.1	0.4	0.2	0.3	1.5	5.7
Disbursements and transfers	-6.1	-0.1	-0.9	-0.6	-0.2	-1.2	-9.1
Reversal following agreement with Enel Distribuzione	0.0	0.0	0.0	0.0	0.0	-26.8	-26.8
Dec. 31, 2009	**71.5**	**3.3**	**7.3**	**4.9**	**11.4**	**26.7**	**125.1**

The main assumptions made in the actuarial estimate of the employee benefit liabilities are the following:

Percentage figures	2009	2008
Discount rate	4.1%	4.8%
Rate of increase of personnel costs	2.0%-4.0%	2.0%-5.0%
Rate of increase of healthcare expense	3.0%	3.0%-4.0%

Risks and opportunities connected with climate change

EC2

Terna is a utility whose business is electricity transmission, that is, the transport of electric power from producers to distributors, to whose networks end users are connected. With the exception of the recent photovoltaic project entrusted to SunTergrid (see the section "Presentation of the Company"), Terna is not involved in any way in the generation of electricity. For this reason, the Company is not subject to any obligations regarding emission reduction or emission trading schemes.
Therefore, the Company does not foresee any fiscal measures (such as a carbon tax) or regulatory ones (such as emission-reduction targets and inclusion in emission-trading schemes) with direct consequences on its business and its financial performance. As far as its foreseeable business prospects are concerned, climate change does not constitute a threat for Terna. On the contrary, the previously mentioned development of the photovoltaic project represents a concrete business opportunity that arose because of the Company's interest in renewable energy sources, which climate change had stimulated, as well as the availability of assets whose value could be increased.
Nevertheless, Terna's management acknowledges the increasing importance of climate change and has identified potential, albeit remote, risks and opportunities connected with the warming of the planet and the reactions that this could cause in governments and in consumer attitudes. The potential repercussions on Terna's business regard the following aspects:

- Terna's task, as the Italian transmission system operator, of keeping the injections and withdrawals on the transmission grid in balance becomes more difficult when the weather is extreme: for example, as has happened in the last few years, in conditions of drought or very high temperatures. Such conditions increase the probability of temporary outages, which consequently entail the intense scrutiny of public authorities and the mass *media*. Critical situations do not threaten the Company's accounts, but rather its reputation. On the other hand, good handling of such situations can consolidate its image as a reliable company;
- the widespread favour encountered by the development of renewable energy sources creates both risks and opportunities for Terna's image, given that public opinion expects the Company's conduct of its business to reflect concern for repercussions on the environment. The owners of new power plants with a capacity of more than 10 MW of power from renewable sources have to ask Terna to connect them to the transmission grid. The authorisation process in these cases can be very long, causing Terna to have trouble connecting the new plants by the deadlines requested by producers. On the other hand, as explained in greater detail in the chapter on environmental responsibility, capital expenditure to develop the grid also entails significant consequences in terms of reducing emissions in the entire electricity system (reduction of losses, improvement of the production mix, connection of new plants that run on renewable energy). Terna's image can be enhanced by this positive role;
- the increase in the production of electricity from renewable sources, for which incentives are often provided by specific legislation, requires Terna to prepare technical instruments appropriate for the new scenario. Wind production, in

particular, poses problems of system regulation given that it varies so much and can change quite suddenly because of shifting atmospheric conditions. Since 2008, an incentive scheme for the period 2008-2011 has been in effect which assigns Terna bonuses or penalties according to the Company's ability to correctly forecast the quantity of electric power produced from wind, with a maximum bonus of €3 million and a maximum penalty of €1.5 million. In 2008 and 2009, the scheme generated €3 million of bonuses, the maximum obtainable, thanks to the Company's improved forecasts;

- concern about climate change or an increase in the price of energy could lead to a reduction in the income elasticity of the demand for electricity. The trend of energy conservation and the pursuit of greater energy efficiency could result, all things equal, in a decrease of the demand for electricity and thus for the transmission service. The rules so far adopted by the AEEG, however, exclude the possibility that a reduction in the quantity transmitted could result in a significant reduction of revenue for Terna, even though the rate mechanism produces such revenue as the sum of per-unit rates times the quantity of electricity transported. In effect, recent resolutions of the AEEG have introduced a mechanism for partially neutralising the quantity effect for the remaining part of the 2009-2011 regulatory period. The implementation of this mechanism to ensure the revenue for the three-year period means that, in effect, the electricity transmission industry has shifted from a price-cap system, in which the revenue level also depends on the quantity of electric power transported on the National Transmission Grid, to a revenue-cap one, in which the revenue level is virtually pre-established and can vary by only +/-0.5% with respect to the one used to establish the annual rates (see the "Revenue structure and regulatory framework" section of this chapter).

EC4 **Other risks**

Terna does not receive any capital grants from the government. In 2009, grants for plants, which are not recorded as financial assets because they are deducted from the net value of the related assets, amounted to €5,843,139.83.
Environmental, social, and governance matters that can become issues in relations with stakeholders, with potentially negative repercussions on the Company's reputation, are constantly monitored through analysis of the ratings of the most important agencies (such as SAM – Sustainable Asset Management, Vigeo, and Eiris), which produce sustainability assessments.
With regard to the periodical auditing of its economic performance, in addition to the quarterly accounts reported to the financial markets, Terna uses an internal Balanced-Scorecard system for measuring its progress in achieving the goals established by the corporate Business Plan. This management system enables the Company to specify a coherent set of financial, organisational, and capability-development goals and to periodically measure their progress. The goals monitored with the Balanced Scorecard are also used in the incentive scheme as factors regarding the payment of variable components of pay (see the "Human-resource development and management" section).

Terna's economic impact

EC1 Value added

In the three-year period 2007-2009, the value added generated and distributed by the Group showed a decrease of 5.9%, which was essentially due to the fact that the 2009 figure is net of the value added generated by the sale of the operating businesses in Brazil. When the latter is included, the 2007-2009 change in Group value added shows an increase of 35.4%.
During the three-year period in question, with regard to the net global value added, the portions distributed on average to employees (27%), the government (20%), and lenders (15%) remained essentially stable with respect to the net global value added.
As far as total net global value added is concerned, the remuneration of shareholders decreased by about 4% in the same period. In considering this fact, it should be noted that part of the proceeds from the sale of Terna Participações (amounting to about €150 million) will be allocated to supplementing the Company's dividend policy in the coming years, until 2012. On the other hand, allocations to reserves recorded a more significant increase (from about 11% to about 29%).

TERNA GROUP VALUE-ADDED STATEMENT [1]

In euros	2009	2008	2007
A. Turnover			
1. Revenue from sales and services	1,317,331,291	1,151,965,436	1,296,174,946
4. Other revenue and proceeds	43,379,376	43,855,562	51,991,730
Revenue from standard production	**1,360,710,667**	**1,195,820,998**	**1,348,166,676**
5. Revenue from non-standard production (low-cost work)	81,347,977	66,341,085	51,191,913
Total turnover	**1,442,058,644**	**1,262,162,083**	**1,399,358,589**
B. Production costs			
6. Raw materials	29,077,344	25,247,177	16,703,095
7. Services	114,130,834	96,813,167	121,549,334
8. Use of third-party assets	13,893,976	13,919,106	13,681,375
9. Provisions for risks	3,620,822	2,884,532	5,688,218
11. Other expenses	24,740,682	13,987,619	8,938,057
Total intermediate production costs	**185,463,658**	**152,851,601**	**166,560,079**
Gross standard value added	**1,256,594,986**	**1,109,310,482**	**1,232,798,510**
- Accessory revenue	91,961,322	205,896,415	117,682,973
- Accessory costs	86,900,793	181,802,080	84,789,606
12. Accessory balance	5,060,529	24,094,335	32,893,367
Gross global value added	**1,261,655,515**	**1,133,404,817**	**1,222,393,004**
Amortisation of intangible assets	32,092,552	24,624,733	23,380,193
Depreciation of tangible assets	280,451,676	228,845,898	233,281,293
Net global value added	**949,111,287**	**879,934,186**	**1,009,030,391**
Value added of discontinued operations	**416,976,119**	**40,874,917**	
Total net global value added	**1,366,087,406**	**920,809,103**	
Non-subordinate personnel	2,063,354	1,582,934	3,937,131
Subordinate personnel: direct remuneration	182,908,901	202,907,779	189,120,465
Subordinate personnel: indirect remuneration	64,796,883	56,395,874	51,036,274
A. Remuneration of personnel	**249,769,138**	**260,886,587**	**244,093,870**
Direct taxes	192,150,648	174,623,989	173,580,625
Indirect taxes	5,579,516	4,814,421	14,905,302
B. Remuneration of the government	**197,730,164**	**179,438,410**	**188,485,927**
Charges for short-term capital	14,975	445,217	3,483,147
Charges on bank loans	89,763,459	36,059,258	71,312,756
Charges on bonds	57,855,170	102,567,782	67,446,159
C. Remuneration of borrowed capital	**147,633,604**	**139,072,257**	**142,242,062**
Dividends [2]	380,172,672	328,155,134	322,709,374
D. Remuneration of risk capital	**380,172,672**	**328,155,134**	**322,709,374**
Earmarked for reserves	390,781,828	13,256,715	111,499,158
E. Remuneration of the Company	**390,781,828**	**13,256,715**	**111,499,158**
Net global value added	**1,366,087,406**	**920,809,103**	**1,009,030,391**

(1) The sums regarding the creation and distribution of value added are taken from the consolidated financial statements, which were drawn up according to the International Accounting Standards Board's International Financial Reporting Standards (IFRS/IAS). The Terna Group has used the IFRS/IAS since 2005.
It should be noted that – with regard to the preparation of the Income Statement of the Consolidated Financial Statements for the year ended December 31, 2009 – following the sale of the equity interest in the Brazilian subsidiary Terna Participações, which was finalised in that year, the 2009 balances concerning the sale of the Brazilian companies were reclassified as "Profit for the year from discontinued operations and assets held for sale" in accordance with "IFRS 5 – Non-current assets held for sale and discontinued operations". See page 198 of the consolidated financial statements for the year ended December 31, 2009 for further details.
Consequently, in drawing up the 2009 consolidated value added statement, the value added from sale of the Brazilian operations is recorded in "Net global value added of discontinued operations". Therefore, total net global value added represents the value added of the continuing operations, that is, of the Parent Company and its Italian subsidiaries (Net global value added) and the value added of the discontinued operations.
In order to make the comparison more accurate, several comparative balances of the 2008 annual report, and consequently in the 2008 value-added statement, have been reclassified, without, however, changing the values of the shareholders' equity as of December 2008 or the 2008 income statement.

(2) Of the 2008 dividends, €316.1 million regard those distributed by Terna S.p.A. and €12.0 million those distributed by Terna Participações to third parties. Of the 2007 dividends, €302.1 million regard those distributed by Terna S.p.A. and €11.8 million those distributed by Terna Participações to third parties.

EC9 Other economic effects

Terna's economic impact does not end with the production and distribution of value added. **The economic repercussions of the electricity system** must also be taken into account. Terna's business ensures over time a service of general interest, which contributes to Italy's economic growth.

Of particular significance is the development of the electricity grid. The interconnection of the grids of two neighbouring countries makes it possible to import electricity at prices that are more competitive than those of domestic production and to have an additional reserve of power, as well as ensuring more competition in energy markets. The reduction of grid congestion improves the exploitation of generation resources to satisfy requirements and makes it possible to use more competitive plants, with positive impacts on competition in the generation segment and final prices. In accordance with the regulatory framework, all of Terna's capital expenditure on grid development can be assessed from the technical and economic point of view by comparing the estimated costs with the related benefits in terms of the reduction of the total system costs in order to maximise the benefit/cost ratio. Consequently, every euro of investment made by Terna generates on average a multiple of significant savings for grid users, which in the last analysis are reflected on the end consumer. Therefore, it is significant that Terna's capital expenditure – most of which is dedicated to grid development – has recorded a constant increase in the last few years.

INVESTMENT - ITALY	2009	2008	2007	2006	2005
In millions of euros	900.4	764.9	606.0	345.5	263.5

As decreed by the Ministry for Economic Development's Directive of January 21, 2000, in its determination of possible capital expenditure the Company also gives the utmost consideration to the need to improve its service in southern Italy and the other areas where the electricity transport system is less efficient with regard to its continuity and reliability and thus an enhancement of the transmission grid there could be decisive for economic and social development.

SO1 Another aspect to consider is **the creation of jobs and procurement expense**. As of December 31, 2009, Terna had **3,447 employees**, of whom 800 worked in Rome, at the main office, the National Control Centre (NCC), and the Rome Territorial Centre (AOT). The rest of the employees (approximately 2,700) were distributed uniformly throughout Italy in the seven other AOTs of Turin, Milan, Padua, Florence, Naples, Palermo, and Cagliari – under which 32 line operating groups (GOL) and 32 station operating groups (GOS) work – 8 Distribution Centres (CR), and 3 Remote Control Centres (CT), which have their own offices throughout Italy.

LA1 For the construction and maintenance of its power lines, in 2009 Terna led indirectly to its **contractor and sub-contractor firms employing a total of 1,530 full-time workers** for a year.

In 2009, the **economic value of the procurement** of services, supplies, and contract work amounted to €925 million. Much of this procurement was from Italian suppliers. This is not in conflict with the policies of the Group, which forbid the selection of suppliers on the basis of their location, but rather reflects the requirements of local procurement for maintenance work.

EC6 Terna S.p.A. makes most of its purchases from qualified firms pursuant to EU directives or through specific calls for tenders, which are also addressed to EU countries. The companies that qualify and bid are predominantly Italian. It should be noted, however, that a significant share of the sum for local purchases actually regards companies with offices in Italy, but belonging to internationally important industrial groups, such as ABB, Siemens, Prysmian, and Areva, which are dominant at the world level in the specific markets concerned.

The percentages of total procurement expense in the period 2007-2009 are shown in the following table:

PERCENTAGES OF TOTAL PROCUREMENT FROM LOCAL AND FOREIGN SUPPLIERS [1]

	2009	2008	2007
Local suppliers	82.0%	80.0%	96.0%
Foreign suppliers	1.0%	1.0%	1.0%
Other suppliers [1]	17.0%	19.0%	3.0%

(1) Temporary associations of companies consisting of Italian and foreign suppliers.

Purchasing mainly from local suppliers was also a common practice at the subsidiary Terna Participações (89% in 2008 and 98% in 2007).

Donations

EC1
EC8

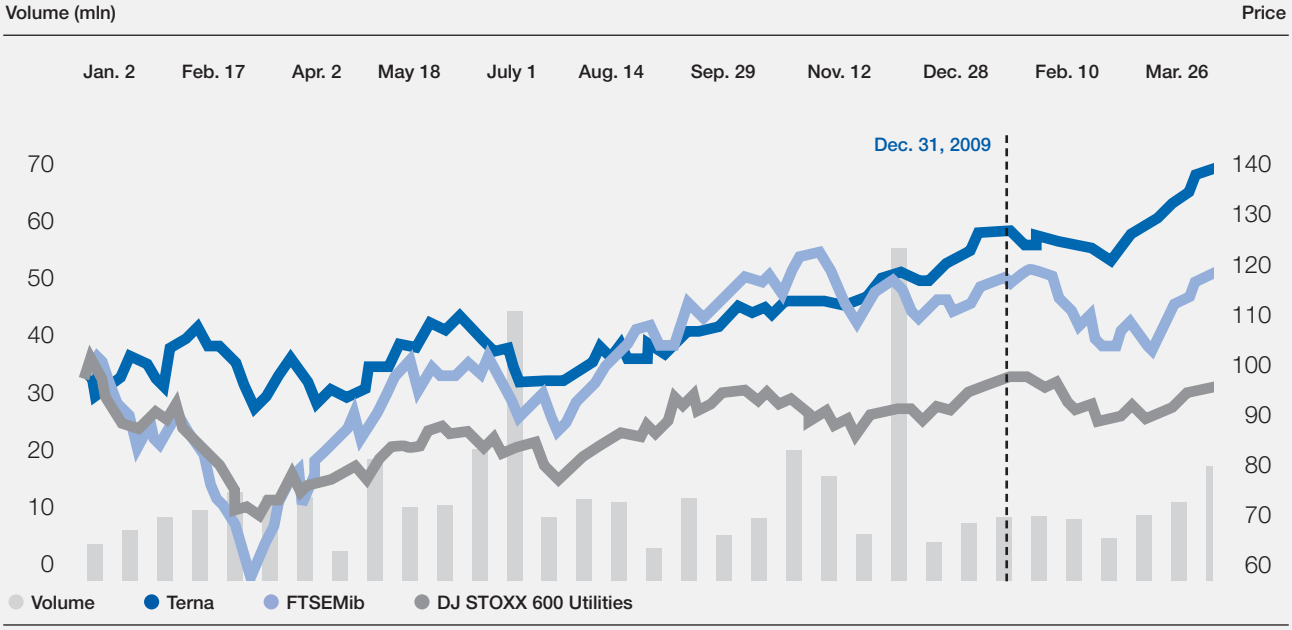
The donation expense incurred in 2009 by the Terna Group, which entirely regard the Parent Company, amounted to €659,425.23.
Some of this expense contributed to the construction of infrastructure with a public benefit, in particular the **MAXXI Museum** in Rome, which is dedicated to the art of the 21st century. As provided for by the regulations of the second annual Terna Prize (Premio Terna 02), the winning artist donated 70% of the prize (€70,000) to the construction of the *media* library that documents contemporary Italian and international artistic production in relation to the scientific activities of the museum (also see the box on the Premio Terna 02).
Terna also contributed personnel and equipment to support the rescue and other emergency operations after the **earthquake in Abruzzo in April 2009** – a team of 20 men with 2 heavy motor vehicles equipped with cranes that can move weights of more than 17,000 kilograms, 2 transport lorries, 2 vehicles equipped with cherry pickers that can be raised over 18 meters, and 4 all-terrain vehicles –, as well as supporting the city of L'Aquila's Experimental Museum of Contemporary Art (**MU.SPA.C.**), which was badly damaged by the earthquake of April 6.
Also in 2009, during renovation work on three of its offices, Terna donated tables, chairs, and cafeteria kitchen components to non-profit associations. Specifically, these donations were made to the center for the elderly in Fiano Romano, and Agape for the kitchen of a center in Romania.
The disposal of obsolete assets also regarded about 200 computers and computer-related items (PCs, printers), which were given to schools, parishes, voluntary associations, and other non-profit organisations all over Italy.
In February 2009, with Mayor Gianni Alemanno present, Terna signed an agreement with the Fourth Municipio (district council) of Rome regarding the environmental rehabilitation of part of the Montesacro area. The zone around via della Marcigliana – where the city's most important electric transformation plant, owned by Terna, is located – has been showing signs of serious decay for quite a while. With this agreement, Terna undertook to reclaim the adjoining zones, both government-owned and private, and to make the entire street safe. Terna plans to install barriers, fences, and a video-surveillance system, as well as to do up the entrance to the Roma Nord Electric Station. In addition, the police will patrol the area to discourage and repress illegal activities.

Relations with shareholders

Share performance

In 2009, a year of highly volatile stock markets, the defensive nature of Terna's shares enabled them to record a performance that was decidedly better than that of the average of both Italian blue chips and European shares in the industry.
In effect, the Company's shares gained 28.5%, compared to the 19.5% gain of the FTSEMib and the 0.98% of the DJ STOXX 600 Utilities. On the very last trading day of 2009 Terna's shares reached their maximum value since the IPO, €3, the only blue chip to end the year at an all-time high.

PERFORMANCE OF TERNA SHARES AND THE FTSEMib AND DJ STOXX 600 UTILITIES INDICES



Source: Bloomberg.

The beginning of 2009 continued to be characterised by the fear of a prolonged global recession, which caused the world's stock markets to lose about 35% of their value in less than three months. In the same period, however, Terna managed to hold its ground, recording only a fractional fall of 1.6%. Beginning in the middle of March, measures to shore up banks and provide liquidity led to a bullish trend that enabled share prices to recover.
Terna shares also continued their upward trend, boosted by a positive news flow connected mainly with a favourable regulatory framework – attested by the introduction, among other things, of measures aimed at mitigating the cyclical effect on the Company's revenue of the drop in the volume of electric power transmitted – a significant increase in investment, and, especially, the Company's intense M&A activity (the acquisition of Enel Distribuzione's high-voltage network and the sale of the Brazilian subsidiary Terna Participações), which led to important strategic developments, such as the announcement of a photovoltaic project and a new dividend policy.
During the first few months of 2010, the economic situation remained uncertain. While the FTSEMib lost 0.8% and the European utility industry 3.8%, Terna's shares once again confirmed their defensive nature, recording an increase of 7.3%. After the presentation of the strategic plan and the approval of the 2009 results, moreover, they reached the new all-time high of €3.23 (closing of March 26, 2010).
In effect, since the IPO in June 2004, Terna has recorded an appreciation of 89.3%, against the fall of 17.3% recorded by the FTSEMib index.

Total Shareholder Return

The most complete measure of the value created by a company for its shareholders is the TSR (Total Shareholder Return), which is calculated by adding together the increase in the price of the shares in a given period of time and the effect of the dividend per share paid in the same period.

The calculation of the TSR thus shows the annual rate of return for an investor who buys Terna shares on day X and sells them on day Y. This calculation takes into account all the dividends paid by the Company that have been reinvested in Terna shares as of the *ex* dividend date of the related coupon.

For a shareholder holding Terna shares on December 30, 2009, the last day on which the market was open in 2009, the total return was thus:

- since the IPO: 142.3% – (FTSEMib: 3.1%)
- since December 30, 2008: 37.2% – (FTSEMib: 23.9%). With this TSR, Terna ranked first among European utilities, as well as among Italian blue-chip utilities.

EEI International Utility Award: Terna the best in Europe

In London, Terna's Chief Executive Officer, Flavio Cattaneo, received the prestigious EEI International Utility Award, which recognised Terna as the best European utility of the last three years in terms of Total Shareholder Return. From December 29, 2006 to December 31, 2009, Terna shares had a total return of +40%, clearly over-performing (about 55 percentage points) with respect to the European utility industry, which recorded a -15%. According to the EEI International Utility Award citation, Terna "was able to combine its regulated business with an entrepreneurial approach in other fields. Thus the company succeeded in enhancing the value of its Brazilian businesses, which were sold at a premium in 2009".

Flavio Cattaneo, Terna's Chief Executive Officer, in London.

DIVIDENDS DISTRIBUTED BY TERNA S.P.A. IN THE LAST SIX YEARS [1]

	Year	*Ex* dividend date	Payment	Dividend (euros)
Interim dividend 2004	2004	October 18	October 21	0.045
Dividend balance 2004	2005	May 23	May 26	0.070
Interim dividend 2005	2005	November 21	November 24	0.050
Dividend balance 2005	2006	June 19	June 22	0.080
Interim dividend 2006	2006	November 20	November 23	0.053
Dividend balance 2006	2007	June 18	June 21	0.087
Interim dividend 2007	2007	November 19	November 22	0.056
Dividend balance 2007	2008	June 23	June 26	0.095
Interim dividend 2008	2008	November 24	November 27	0.0592
Dividend balance 2008	2009	June 22	June 25	0.0988
Interim dividend 2009	2009	November 23	November 26	0.07
Dividend balance 2009	2010	June 21	June 24	0.12

(1) Terna has adopted a policy that provides for the payment of dividends twice a year.

Relations with suppliers

As stated in its Code of Ethics, Terna puts transparency and fairness first in its relations with suppliers. Suppliers that satisfy conditions concerning non-involvement in illegal activities, compliance with safety standards, human rights, and organisational and professional soundness are allowed to compete on equal terms on the basis of quality and price. Procurement is normally based on **tender procedures** that ensure equal opportunity and the utmost transparency for the participating suppliers. The objective of purchasing at the lowest price for the level of quality and safety required is always accompanied by checks to ensure that suppliers also meet the required **ethical, social, and environmental standards**. Procurement contracts generally include clauses regarding the obligation to comply with Terna's Code of Ethics and its 231 Organisational Model.

Terna also makes sure that suppliers are not involved in the use of child labour, employment of off-the-books workers, exploitation of workers, or discriminatory behaviour towards employees. HR2

Since 2008, Terna has required its suppliers to sign a specific "Integrity Agreement", in which they undertake to avoid conflicts of interest and practices that could restrict competition.

In order to be included in Terna's supplier register, companies whose products belong to categories subject to qualification must demonstrate that they scrupulously manage ethical, social, and environmental matters in accordance with Terna's guidelines.

The most important fields for Terna's core business are supplies, contract work, and services regarding electric power transmission, telecommunications, and information technology. Only companies considered suitable by the **supplier qualification system** are included in the supplier register and may participate in tenders announced by Terna for their respective product categories.

In 2009, the percentage of total purchases from suppliers subject to the qualification process (35%) was lower than in 2008 (79%). This was due to the effect of a large order for laying the underwater cables of the SA.PE.I., which was entrusted to a company in a category not subject to qualification, because it consists of only two firms in the whole world.

The qualification process and supplier monitoring

The qualification process enables Terna to assess the suitability of suppliers with regard to observance of the law, economic, technical, and organisational soundness, and meeting the ethical, social, and environmental standards required by Terna's policy as stated in its Code of Ethics, such as:

- the application of conditions regarding rules and pay that are not inferior to those provided for by collective bargaining agreements for the same kind of work;
- compliance with laws regarding environmental protection and occupational safety;
- the existence of documented procedures adopted for protection of the environment and the safety and health of the workforce.

The purpose of monitoring, on the other hand, is to make sure that they maintain the required requisites over the entire three-year period during which the qualification is valid.

This monitoring includes the use of IT systems, the continual screening of different kinds of information, such as reports from Terna's Departments or external sources and news reported by the *media*.

If suppliers fail to behave in accordance with the qualification requirements, they may be admonished or suspended temporarily from the register. In the most serious cases, deletion is provided for. In 2009, two suppliers were struck off the register, while five were suspended.

The entire supplier qualification process – from the initial approval to the monitoring of actual behaviour and the imposition of sanctions – is managed by the **Supplier Qualification Committee**, which consists of eleven top executives and an external and independent Chairman possessing proven legal and technical expertise.

With a view to strengthening the governance of the supply chain, in early 2009 the Supplier Qualification Unit of the Purchasing and Contract Department merged with the Corporate Security Department. To make supplier monitoring even more effective, in November 2009 Terna and the Italian Financial Police (*Guardia di Finanza*) signed a strategic agreement aimed at preventing the risk of criminal infiltration through companies executing contracts connected with the construction of infrastructure for the National Transmission Grid.

An agreement for transparency in the award of contracts

Flavio Cattaneo, Terna's Chief Executive Officer, with the Commander in Chief of the *Guardia di Finanza* (Financial Police), General Cosimo D'Arrigo.

In November 2009, the commanding officer of the Financial Police, General Cosimo D'Arrigo, and Terna's Chief Executive Officer, Flavio Cattaneo, signed a strategic agreement aimed at preventing potential risks of criminal infiltration through companies executing contracts connected with the construction of infrastructure for the National Transmission Grid.
The Protocol will ensure greater transparency in the management of contracts thanks to the support of the Financial Police in monitoring the companies that participate in contract or supply tenders.
The Protocol between Terna and the Financial Police follows the one signed by the Company and the Home Office in July 2009, which aims to prevent and counter attempts to break into the IT and telecommunications systems that support the transmission and dispatching of electric power and ensure the physical protection of the sensitive infrastructure of the National Transmission Grid.

THE PROCUREMENT NUMBERS	2009	2008	2007
Categories qualified	36	36	35
Firms qualified over the year	63	60	74
Suppliers awarded contracts as of December 31	2,308	1,841	1,828

PROCEDURES ADOPTED FOR AWARDING CONTRACTS (% OF SUMS AWARDED)	2009	2008	2007
European tenders	57.5	76.9	65.0
Non-European tenders	27.1	13.4	18.6
Without tender	15.3	9.7	16.4

Contract work

Because it involves the use of external labour on Terna worksites, contract work is subject to even more stringent rules regarding qualification and subsequent management. This is due to both the severity of Italian law and Terna's particularly cautious approach.
In effect, Legislative Decree no. 81/2008, "Consolidation Act Regarding the Protection of Occupational Health and Safety", which went into effect on May 15, 2008, makes Italian law on this subject among the most stringent in Europe.
One of its most important provisions is the obligation to carry out an analytical assessment of the risks regarding the health and safety of the workers of contracting and subcontracting firms for all the activities that constitute the work process on the site. This risk analysis must be made by an external expert. **It should be emphasised that the resulting estimate of the costs of the safety measures to be adopted is excluded from the price competition for the award of a contract.**

EU16 With the objective of further reducing the risks regarding contract work safety, Terna requires additional specific certification for the employees of the contracting firms, such as:

- certification that the employee knows Italian and thus can understand the information provided regarding safety on the worksite;
- EU18 on worksites for the construction of overhead lines, certification that **all workers** have seen and have been appropriately trained in the use of personal protection devices, the risks described in the Worksite Safety Plan (PSC) and the Operating Safety Plan (POS) drawn up by Terna, and the measures for protecting the environment established by the specific operating procedure "Management of the Environmental Aspects during the Construction of Plants", which is attached to every contract;

- for several specific roles (e.g. workers involved in the installation and maintenance of overhead lines, as well as those who cut vegetation, site managers, foremen, employees responsible for safety), Terna requires proof that they have attended specific training courses lasting between 24 and 32 hours and planned in cooperation with training institutes specialised in the electricity industry and SINCERT certified according to the content required by Terna;
- the appointment of persons responsible for health, protection, and prevention (RSPP), worksite safety, and emergency management (and the latter's substitute), as well as the competent doctor.

HR2

In order to reduce to a minimum the risk of infractions of human and labour rights to the detriment of the employees of contracting companies, Terna also requires:

LA4

- a declaration stating the collective bargaining agreement applied to the company's employees;
- certification that the company duly pays its contributions;
- a copy of the insurance policy covering damage to third parties, persons, and things, including those owned by the contractor, for the entire duration of the work and for a sum that is appropriate for the kind of work in question;
- periodic copies of the national insurance payments made;
- certification by the competent doctor that the employees are suitable for the tasks assigned them.

During 2009 and the first few months of 2010 – the project is still in progress – 66 worksites for the construction of transmission lines and stations throughout Italy, about one-third of the total entrusted to contracting firms, were inspected. The duration of the work was considered in the selection of the worksites, with work that takes longer probably being more complex.

Improvement objectives

An increase in the number of product categories subject to the supplier qualification process is a constant improvement objective in Terna's procurement strategy.
As far as contract work is concerned, the objective is to increase the share of purchases from qualified firms until it is almost 100% of the total sum spent, with the exclusion of extraordinary contracts for work that is not normally part of Terna's business.
In 2008, the Company established the technical requirements for qualification in the category of cable-laying, cutting vegetation and painting.
In 2009, it established the technical requirements for qualification in the category of electro-mechanical installations and started training courses for the categories of vegetation cutting and painting.

Relations with electricity service operators

Terna's main counterparties are the electricity industry players, which fall into one or more of the following categories:

- owners of portions of electricity networks, to whom Terna must ensure the right to connection in compliance with regulatory and technical prescriptions;
- users of dispatching, i.e. producers, end customers, and wholesalers, with whom Terna regulates the dispatching service;
- interruptible customers, i.e. end customers of withdrawals who allow Terna to interrupt their load;
- distribution companies and owners of production plants, with which Terna regulates the transmission service on its grid.

Relations between industry players and Terna are governed mainly by the industry Authorities and are defined technically and commercially In the Grid Code.
Specifically, as part of its dispatching services, Terna settles with injection dispatching users economic items regarding the supply of the resources necessary to protect the security of the national electric system by balancing injections and withdrawals and ensuring that the grid parameters, such as voltage and frequency, are at their correct levels.

Economic items regarding supply on the Dispatching Service Market (DSM) and the imbalance for injection users are negative and in 2009 were worth about €1.3 billion.
Terna also settles with both injection and withdrawal dispatching users the economic items regarding imbalance, understood as the difference between the plans that the users presented on the energy markets and the real value of the energy injected and withdrawn.

The economic items regarding imbalance for withdrawal users, including invoicing for systems charges, are positive and were worth about €1.6 billion in 2009.

During 2009, Terna's **Customer Relationship Management (CRM)** system entered the implementation stage. The purpose of the system is to identify and develop methods and technologies integrated with communication instruments to manage relations with customers through a **web portal, My Terna**, where the parties can interact, communicate, and access Terna's applications. Another objective is to devise solutions for automating the business processes that include direct contact with external parties, such as, for example, contract and connection management. The MyTerna portal will become the official instrument of communication between customers and Terna. It will ensure accessibility and the traceability of contacts, as well as the management of the state of the requests and matters in progress, and will make the relevant data – both physical and economic – of customers available and allow access to detailed procedures and information.

In order to develop an instrument that represents fairly the requirements of both Terna and external parties, the dispatching users, distribution companies, and industry associations were involved in the presentation of the project and the institution of three work groups, which are entrusted with the task of validating the functional requirements, identifying the new needs, and contributing to the development of a set of reports. During the implementation of the project, which is scheduled for 2010, the groups will also be asked to contribute to the testing of the pilot portal.

As part of process automation, the new **Metering Portal** has been in operation since the end of 2009. In addition to improving the quality of the previous services – the monthly publication of the curves of energy injected and withdrawn – allows all the information necessary for metering to be consulted and exchanged via the Internet.

EU3 In 2009, Terna continued to supply resources for the **load-interruptibility service** to ensure the functioning of the national electricity system in case the resources supplied on the market are insufficient. The assignees of the interruptibility service in 2009 numbered about 130, with about 3,400 MW of power, and the related negative economic settlement is annually worth about €480 million.

ELECTRICITY MARKET PARTICIPANTS WITH RELATIONSHIPS WITH TERNA (NUMBER OF PARTIES) (1)

Parties	2009	2008 (2)	2007
Interruptible users	134	120	131
Distributors directly connected to the NTG	19	21	21
Owners of production plants	77	75	1,200
Injection dispatching users (producers and traders)	77	75	74
Withdrawal dispatching users (traders and end customers, including the Single Buyer)	106	102	98

(1) The number regards the physical entities located in Italy in December of each year.
(2) Since January 1, 2008, the great majority of small production plants has come under the ownership of the GSE. According to the provisions of Resolution no. 280/07, the Producer CTR consideration is settled directly between Terna and the GSE for all dedicated-withdrawal plants.

New rules for dispatching services

The recession that began in 2008 highlighted the problem of the high cost of electricity in Italy and its negative effects on the competitiveness of the Italian production system. Consequently, the rules of the electricity market were revised in order to adopt more efficient mechanisms.
In accordance with the directives issued by the government and the industry Authority, Terna contributed – after consultation with the stakeholders concerned – to establishing the new Dispatching Service Market (DSM), as well as carrying out in 2009 a number of actions aimed at reducing the quantity, and thus the supply costs, of the resources for electricity dispatching. With regard to the latter question, the Electricity and Gas Authority introduced a mechanism as an incentive for Terna to reduce the volume procured on the DSM with respect to the previous year, and thus the expense for the system. Terna has developed a program to reduce and optimise the volume of resources procured for the dispatching services. Specifically, the Company:

- reduced congestion by setting up a defence system;
- optimised the supply of the secondary reserve and introduced methods and instruments to support its use in real time;
- supplied the tertiary reserve on an hourly basis;
- managed and optimised the energy restrictions on the strategic production and pumping units;
- optimised the procedures regarding unavailability and the termination of restrictions, including by work on the grid;
- used optimal power flow in real time.

The effectiveness of these actions enabled the Company to reduce the quantity procured for DSM services by about 10 TWh with respect to the previous year. Because of this reduction, the system saved about €800 million, while Terna obtained as much as possible from the incentive plan, i.e. €40 million (see also the section on "Revenue structure and regulatory framework").

The new Dispatching Service Market

On December 31, 2009, the reform of the Dispatching Service Market (DSM) went into effect. The new DSM includes innovations in terms of the process and procedures of presenting offers.
The most important innovation is connected with the dynamics of offers. In the past, the parties could present 6 offers a day – one purchase bid and one offer to sell for each of the three time brackets into which the day was divided – which were valid in both the planning stage of the DSM and in the real-time stage.
Two innovations were included in the new DSM:

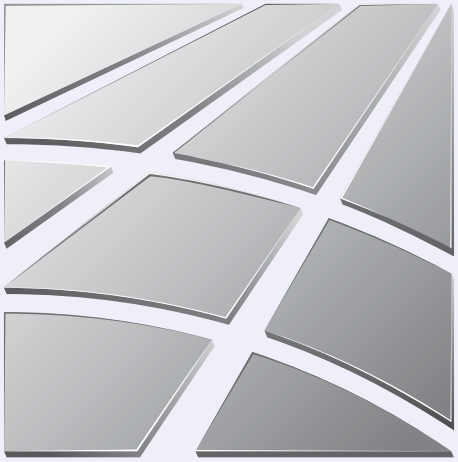
- a supply structure differentiated by time of day, power notches (up to 3 notches in purchasing and 3 in selling, with an explicit offer for the switch-off and the minimum of the production unit), and service type (use of the secondary reserve, sourcing and use of other dispatching services);
- a Balancing Market during the day divided into 5 sessions, in four of which the parties can revise their offers.

The parties will thus have more flexibility in their offer strategies. In particular, the possibility of better reflecting the cost incurred connected with the service performed will reduce the economic risk entailed by the previous offer structure, with benefits for the entire system.
The process that led to this change was conducted by Terna, with the involvement of all the interested parties concerned through a consultation procedure in accordance with the Grid Code and the organisation of workshops dedicated to explaining the innovations introduced.

“WITH THE 10X10 PROJECT WE SUCCEEDED IN ABATING THE CO_2 EMISSIONS OF OUR VEHICLE FLEET.”

Paolo Ramoni
Vehicle Fleet Management

2009



Environmental responsibility

Terna

Our approach

For Terna, seeking the right balance between energy requirements and protection of the environment means seeking appropriate solutions for supplying Italy with the electricity it needs at the best conditions regarding reliability, costs, and environmental sustainability.
Terna's business consists in providing the electricity transmission service, which it does through the high-voltage electric grid. Therefore, from the environmental point of view, the most evident impact of its business resides not so much in the use of natural resources or the emission of polluting substances as in the **physical presence of its lines and electric stations** and in their interaction with the surrounding environment, both natural and man-made.
In the last few years, increasing environmental awareness and the widespread local opposition to the construction of new infrastructure – phenomena that are characteristic of many industrialised countries, including Italy – have induced Terna to develop an approach that is very attentive to the environment and local communities. The course it has chosen for the construction of new lines is that of **consultation with local institutions** (regions, provinces, municipalities, park administrations etc.) in order to consider environmental concerns from the first stages of planning and then to take more and more details into account until the construction stage.
Respect for the environment and local communities are the credentials with which Terna wants to establish relationships based on trust with the national government (e.g. ministries and regulatory authorities) and local institutions that also have the power to issue or withhold permits for new infrastructure. In this way, consideration of environmental issues converges with Terna's interest in carrying out its investment in grid development and with the more general interest of society in the continuity, safety, and efficiency of the electricity service.

As far as the existing lines and their management are concerned, Terna's concern for the environmental impact of its activities are embodied in its Environmental Management System, which obtained **ISO 14001 certification** in December 2007. The certification regards all Terna's activities and covers the entire transmission grid (stations and lines) and all its offices.

Among the **significant environmental issues**, the following should be noted in particular:
- the visual impact of lines and stations;
- the impact of lines on biodiversity, with particular regard to birdlife;
- special waste and its disposal;
- the emission of electric and magnetic fields.

Greenhouse-gas emissions are also included among the significant issues. Terna does not produce electricity, and thus greenhouse-gas emissions are not a normal product of its activities. In effect, the Company is not subject to obligations under the Kyoto Protocol or to emission-trading schemes. Its concern about emissions – which can be seen mainly in the **control of leakage of SF_6**, a gas that is present in some station equipment and the control of the emissions of the vehicles of the corporate fleet – stems, therefore, from a general sensitivity to the problem of climate change. However, it should be pointed out that the investment provided for by the **Grid Development Plan** can have indirect positive effects on the reduction of emissions by the national electric system.

Terna has an environmental policy, which expresses its commitment to adopting practices to limit and reduce its environmental impact even beyond the obligations of the law provided this does not compromise the safeguard of the other general interests that the Company must ensure: the safety and continuity of the electricity service, keeping it efficient, adapting it to meet the country's productive and consumption needs, and equal access to the grid for industry players.

Terna's commitments for the environment regard mainly:
- planning grid development investment: listening to the demands of stakeholders, especially local institutions, and seeking agreement on solutions;
- constructing, managing, and maintaining the grid: the adoption of procedures in line with the provisions of the law and, when possible, with the objective of reducing environmental impact;
- relations with suppliers: the requirement that they gradually conform to the standards of respect for the environment adopted by Terna;
- electro-magnetic fields: strict compliance with the regulations, attention to scientific studies, and contribution to the correct description and understanding of the phenomenon;
- biodiversity: containment of plant impact, with particular regard to bird life, through mitigation actions possibly developed in agreement with environmental associations;
- climate change: acknowledgement of the importance of the problem and actions to reduce greenhouse-gas emissions.

With regard to mitigation actions, Terna continues to pursue emission reduction through feasibility studies and projects regarding SF_6 leakage, the electricity consumption of stations, and the corporate car fleet, while the continuation of its projects on biodiversity in cooperation with leading environmental associations, such as the LIPU and the WWF, will allow guidelines to be developed on the integration of electric lines in the environment and mitigation policies to be developed on a scientific basis.
In organisational terms, environmental responsibility is divided among different corporate departments, which participate on an Environmental and Sustainability Steering Committee whose purpose is to coordinate their activities and identify priorities and objectives to propose to the Top Management. The departments are Operation Italy, Corporate Security (which manages the integrated Quality, Environment, and Security System), Institutional Affairs, Human Resources and Organisation, and External Affairs and Communication. The Corporate Social Responsibility Department acts as the coordinator of the Committee.
The task of monitoring the environmental indicators is entrusted to a permanent work group of experts, who perform their duties as part of the Environmental Management System.
In the three-year period 2007-2009, no definitive administrative or judicial sanctions, monetary or non-monetary, were imposed on Terna for non-compliance with laws or regulations regarding the environment (further details on environmental litigation are reported in the tables of indicators and the "Disputes and Litigation" section). EN28 EN30
In 2009 and 2008, there was no significant leakage of pollutant liquids, whereas in 2007 the shearing of a cable insulated with fluid oil caused leakage in Venice province. After this event, 5 cubic metres of earth were decontaminated. EN23

Lines and local communities

SO1

The **construction of new lines** is a response to technical requirements of the electric system – such as congestion reduction or the elimination of overloading – and the increase in production and consumption of energy that accompanies the economic growth of specific areas or the entire country. The development of the grid serves general interests of society, but the environmental impact connected with the construction of new electric lines is concentrated in the areas through which the lines pass. In Italy, moreover, the population density of many areas and the artistic, cultural, and landscape value of many others increase the complexity of planning and the difficulty of constructing lines. In response to these problems, Terna adopted an approach based on dialogue and consultation with institutions to seek solutions that allow the wealth and potential of the environmental and cultural heritage of such areas to be preserved.
The need to work on **existing lines** usually stems from the fact that many of them were constructed decades ago. The gradual urbanisation of rural areas and the adoption of new regulations, which change the standards previously in effect with regard to the interaction between electric lines and surrounding areas, make it necessary to make changes in segments of the existing grid.

Consultation

EN26 EU19 EC8

In 2002, Terna started something completely new in infrastructure construction in Italy. In the practice that had been followed until then, discussion with local communities began only once the authorisation process had been initiated, when the planning of the infrastructure was already at the execution level. Environmental concerns were taken into consideration at that stage, through the Environmental Impact Assessment (EIA). This approach led to strong opposition by the local institutions and population involved, with the result that often the original project had to be modified and was thus delayed. In some cases, moreover, it was impossible to find a viable solution.

Terna's new approach was to start its discussion with local communities during the strategic planning stage of the new lines and stations included in its Development Plan. The method adopted included prior consultation with institutions at different levels – regions, provinces, municipalities – based on agreement on the criteria for characterising the area concerned and aimed at identifying the best location for the new installations. The solutions agreed on with local governments are ratified through specific agreements signed by Terna and the aforesaid governments. In short, Terna's approach entailed the voluntary development of a method of relating to local stakeholders based on the Strategic Environmental Assessment (SEA). The SEA was then the subject matter of EU Directive no. 2001/42/EC, which was to be adopted by Italian law only many years later – by Legislative Decree no. 152/2006 – and with much less complex implications with regard to relations with local institutions.
Over the years, the model inspired by the SEA has undergone important changes resulting from the well-organised and fruitful cooperation among the parties. Today the model comprises different levels of discussion, analysis, and assessment:

- at the strategic level, once the electric needs for developing the transmission grid have been identified, possible alternative responses to the problems identified are set out;
- at the structural level, after the strategic alternative for the work to be constructed has been established, it is possible to identify corridors – portions of land up to several kilometres wide – within the alternatives that are suitable for the planned works;
- at the execution level, within the corridor chosen the possible alternative locations for the line are identified as the feasibility strip for the route: portions of land up to several hundred metres wide inside of which the route can be developed.

The choice to be guided by the SEA method in creating a planning process that is transparent, documented, and participatory and can be gone over again was agreed on and developed by a work group at the national level (the SEA talks), which was formally instituted in 2005, with the participation of the Ministry of the Environment (ME), the Ministry of Cultural Assets and Activities (MCAA), the Ministry for Economic Development (MED), the regions, and the autonomous provinces.
Since 2002, Terna has reached agreements on the application of the SEA method with 18 regions, including the autonomous province of Trento.

SEA agreements signed in 2009

In 2009, Terna entered into three protocols of understanding – with Valle d'Aosta, Liguria, and Lazio – **signed by the Company's Chairman, Luigi Roth**, in July with the Governor of the autonomous region of Valle d'Aosta, Augusto Rollandin, in November with the Governor of the Liguria region, Claudio Burlando, and in December with the environmental councillor of Lazio, Filiberto Zarratto.

REGIONS THAT HAVE SIGNED PROTOCOLS OF UNDERSTANDING

● Signed protocols

Luigi Roth, Terna's Chairman, on the left, with Augusto Rollandin, Governor of the autonomous region of Valle d'Aosta.

EN26 **Territorial characterisation criteria**

In consultations with local communities, one of the most effective instruments for choosing the alternative with the least impact is agreement on the ERPA (Exclusion, Repulsion, Problematic nature, Attraction) location criteria.
The area in question is characterised according to criteria that express its greater or lesser suitability for the infrastructure planned. As part of the activity of the national SEA work group, Terna and the regions agreed on a system of criteria based on four categories:

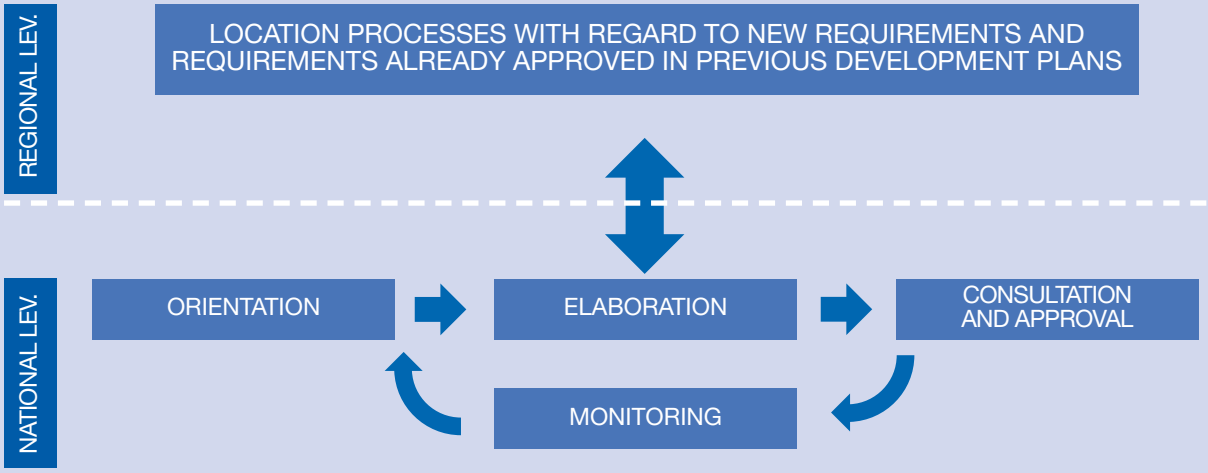
- **Exclusion:** areas in which no construction is allowed;
- **Repulsion:** areas in which nothing is to be constructed except when there are no alternatives or when the only alternatives are less environmentally compatible, and in any case in compliance within the normative framework agreed on;
- **Problematic nature:** areas in which construction is problematic for an objective reason documented by the bodies concerned and which therefore require further analysis. The latter establishes if the problem can be resolved through compliance with a normative framework agreed on with the bodies or if it is necessary to find alternatives. Unlike the other criteria, this one involves further study and does not have an automatic mechanism of *a priori* assessment;
- **Attraction:** areas that should be favoured, if possible, after ascertaining that they can bear the load.

Every category of the ERPA criteria contains sub-categories. Currently, the exclusion criteria includes the areas that are absolutely excluded by law, such as airports and military installations, as well as ones that are not directly excluded by law, but are nevertheless restricted by agreements between Terna and the bodies involved. Continuously urbanised areas, for example, fall into this category, for which the adoption of a criterion of the utmost protection was agreed on.
The criterion of repulsion includes areas that may be considered only if there are no alternatives – protected natural areas, for which agreements are made on the merit, and areas that are considered only if there is no alternative with greater environmental compatibility.
The criterion of attraction includes areas that present good compatibility with the landscape (A1) and areas that already have line infrastructure, such as infrastructure and energy corridors, in which, considering the load capacity of the area, the construction of a new line is more sustainable than it would be in new areas without any existing line infrastructure.

The integrated planning process

S01

INTEGRATED PLANNING OF THE NTG



The diagram shows the integrated planning process that Terna developed in agreement with the other parties in the "National SEA Work Group". This process exploits the consultation approach that Terna has developed over the years and harmonises it with the procedure prescribed by current regulations.
"Integrated planning" is planning of the electricity system that engages in a continual dialogue with the consultations. In this way, Terna believes it can contribute to ensuring the sustainability of the planning of the NTG, because it concretely integrates environmental "Considerations" that come up in discussions with local communities with electricity planning.
The national level is the formal level of the SEA, as defined in the regulations, which provide for the drafting of an environmental report identifying, describing, and assessing the significant effects that implementation of the plan or programme could have on the environment. The national level comprises the stages of orientation, elaboration, consultation, approval, and monitoring of the development plan and its related environmental report, which are the documents formally and expressly required by the SEA procedure. The regional level is the one at which the actual dialogue with local institutions takes place, i.e. the prior consultation that – in accordance with the aims of the national SEA – Terna has been carrying out since 2002 with regional and other local governments in order to reach agreement on the most sustainable and viable locations for construction work to develop the NTG.
All agreements reached with regional and other local governments are reported in the environmental report.
An essential aspect of the aforesaid integrated planning is coordination between the two levels. The decision-making process at the regional level should have a significant degree of autonomy, but it should take place in accordance with the criteria and methods established at the national level.

EN26 Environmental impact reduction

To reduce the impact of electric lines on specific areas and the environment in general, Terna can use a series of solutions, as described below.

Work on the grid

Rationalisation consists in complex work involving several segments of the grid at the same time, and often including the elimination of some portions in conjunction with the construction of new lines.
The grid is rationalised mainly by:

- replacing some lines with superior ones, for example new 380-kV links instead of a larger number of lower-voltage lines;
- eliminating grid segments whose utility is nil or negligible after new construction has upgraded the grid;
- avoiding upgrading infrastructure, mainly lines, that has reached the point of saturation by installing new grid components, such as, for example, stations.

When rationalisation is possible, the construction of new infrastructure can also lead to a reduction in the area of land occupied stemming from the removal of old lines. Especially in the vicinity of cities, rationalisation enables the Company to solve problems connected with the presence of electric infrastructure in areas undergoing urbanisation. In the overall rationalisation work included in the development plan, demolitions far exceed new constructions, with a net positive effect in terms of freeing areas from the presence of electric lines. The dismantling of stretches of line made possible by the construction of new lines constitutes the most significant contribution to the benefit of the environment stemming from grid development.

Sustainable development of the electric grid in Bussolengo and Verona

Luigi Roth, Terna's Chairman, at the Bussolengo event.

In February 2010, the first pylon of the 132-kV "Bussolengo-Chievo" line was demolished in Bussolengo, in Verona province, in the presence of Chairman Luigi Roth, who gave the go-ahead to the removal of the line. The removal will be completed by June and is part of the rationalisation of the high-voltage grid in the Bussolengo and Verona area, which includes a series of works aimed at upgrading the local electric system and making it more secure. The works will lower the costs of the electric system by €1.3 million a year and significantly reduce the environmental impact of the transmission infrastructure. In particular, the work consists in the construction of two 132-kV electric lines in underground cable – the Chievo-Verona sud and Bussolengo-Chievo lines – with a total length of 24 kilometres, which were begun in May 2007 and completed in September 2009; the construction of a series of links regarding the new Bussolengo-Garda and Centrale Mincio-Castelnuovo-Pozzolengo lines; the adaptation of the Bussolengo-San Salvar electric station to the new requirements, currently being completed, and the construction of the related links, whose authorisation by the Minisitry for Economic Development is pending. The investment amounts to a total of €41 million. The renovation of infrastructure dating from the 1940s and no longer adequate for the requirements of the transmission system will produce benefits in terms of both the safety of the system and its environmental impact. In effect, thanks to the work, the grid's capacity to transport the loads of Verona will be enhanced, the hydroelectric supply from the Middle Adige will be more secure, and the operating flexibility of the grid between the nodes of Bussolengo, Verona, and Central Mincio will be improved. There will also be considerable environmental advantages. In effect, against 27 kilometres of new lines, of which 24 will be in underground cable, 45 kilometres of old and obsolete overhead lines, including about 160 pylons, will be demolished: a ratio of about one to two between the new and the old that will be replaced.

Renovation of the electricity networks of Turin and Rome

In June 2009 and March 2010, important agreements were signed for the renovation of the electricity networks of, respectively, Turin and Rome. The agreements regard work to upgrade and modernise the high-voltage networks of the two cities in order to increase the security, quality, and efficiency of the electricity service.

Turin

On June 12, 2009, Sergio Chiamparino, the Mayor of Turin, and Luigi Roth, Chairman of Terna, signed a protocol of understanding on the rationalisation of the city's 220-kV electricity network. The need for the work provided for in the agreement stems mainly from the fact that Turin's network, which dates from the 1950s, is no longer able to handle the power flows it transports, especially considering the city's forecast requirements. Another critical element is the antiquated and insufficient capacity of the existing cable links. Together, these factors entail a risk for the security and continuity of the electric service and require the adoption of urgent solutions. Terna has planned to invest €170 million in the project, which is in line with the Development Plan. The work will be carried out in two stages and regards: the construction of new 220-kV electric lines in underground cable, both inside the city and in neighbouring areas, new overhead 220-kV lines outside the city, the upgrading of several existing electric stations, and the construction of new transformation stations.
There will also be considerable advantages for the environment. While only about 7 kilometres of new overhead lines will be built, 58 kilometres of old lines will be demolished, with a significant reduction of the network's environmental impact. Furthermore, 72% of the new lines will be constructed using the old routes.
The signing of the protocol represents the completion of a process of effective cooperation over the last few years involving Terna, the regional government, and the municipality of Turin, with the goal of establishing a methodological approach and the choice of criteria to adopt for the SEA analyses. In particular, the project of rationalising Turin's 220-kV grid is part of the planning agreement between the regional government of Piedmont and Terna on the strategic objectives to upgrade and rationalise the electric transmission grid in Piedmont, which was signed in 2008 by Luigi Roth, Chairman of Terna, and Mercedes Bresso, Governor of Piedmont.

Rome

On March 17, 2010, Terna and the municipality of Rome signed an agreement for the largest programme of works to renovate electric lines ever carried out in the capital. The work will be completed in 2014, with, among other things, substantial benefits for both the environment and employment.
The agreement was signed and presented in Rome by Mayor Gianni Alemanno, Terna's Chief Executive Officer, Flavio Cattaneo, the Chairman of Acea, Giancarlo Cremonesi, the City Councilor for Public Works, Fabrizio Ghera, the City Councilor for the Environment, Fabio De Lillo – representing the Riserva Naturale Litorale Romano, a wildlife sanctuary – the President of the Veio Regional Park, Fernando Petrivelli, and the President of the environmental association Romanatura, an environmental association, Francesco Petretti. The agreement, which will also be signed by the Lazio regional government, provides for a capital expenditure of €360 million – 310 by Terna and 50 by Acea – to rationalise and develop Rome's electricity network in an environmentally compatible way. The work will regard mainly the northern part of the city (70%), with the rest being carried out in the southern (20%) and western (10%) zones. The planning stage will take place between March and October 2010, while the authorisation process will be initiated in November 2010 and should be completed – in accordance with the law – within 6 months thereafter. Subsequently, the worksites will be set up, and the work will last about three years, ending by the end of 2014. Within the subsequent year, work will begin on the planned demolitions.
In effect, Terna plans to demolish 165 kilometres of its lines, against 100 kilometres that will be constructed and 56 kilometres of lines that will be laid underground.

Laying cables underground eliminates or reduces the negative impact on the landscape that is typical of overhead lines. For this reason, local institutions often request underground lines as the first option for constructing new ones. Actually, underground lines involve a number of technical and economic problems. They are less reliable over time than overhead lines, take much longer to repair if something goes wrong, require appropriate roads while under construction, and cost from five to ten times as much.

Reclassification provides for the conversion of existing electric lines to a higher voltage through the construction of new conductors and supports. This work may entail the replacement of the old supports by ones that are larger and thus occupy more space, as happens, for example, when a 130-kV line is reclassified as 220-kV. With respect to the construction

of a new line, however, reclassification has the advantage of generally using already existing infrastructure corridors, thus avoiding the encumbrance of new portions of land.
Enhancement is aimed at reducing the exposure of people to electro-magnetic fields by, for example, raising line supports (see box "Electric and magnetic fields: the limits imposed by law"). Upgrading can also involve shifting the route, while at the same time dismantling stretches near densely inhabited areas or their reconstruction in cable, in this case with a positive effect on the landscape to boot.

Electric and magnetic fields: the limits imposed by law

The main reference values for emissions of electric and magnetic fields currently provided for by the law (Prime Minister's Decree of July 8, 2003) are the following.

- **Exposure limit.** In case of exposure to electric and magnetic fields at the frequency of 50 Hz generated by electric lines, the limits of 100 microTesla for magnetic induction and 5 kV/m for the electric field, understood as effective values, must not be exceeded.
- **Values of concern.** As a precautionary measure to protect people from possible long-term effects connected with exposure to magnetic fields generated at the network frequency (50 Hz), in areas where children play, residential environments, schools, and places where people stay no less than four hours a day, the value of concern is 10 microTesla, understood as the median value over 24 hours of normal operating conditions.
- **Quality objectives.** In order to gradually minimize exposure to electric and magnetic fields generated by electric lines operating at the frequency of 50 Hz, in designing new lines through areas where children play, residential environments, schools, or places where people stay no less than four hours a day, as well as in planning new settlements and areas of the aforesaid kinds, the quality objective is established as 3 micro-Tesla for magnetic induction, understood as the median value over 24 hours in normal operating conditions.

The values of the three parameters – in particular, the the value of concern (10 microTesla) and the quality objective (3 microTesla) – show that the Italian lawmakers adopted the prudential approach set forth in art. 15 of the Rio Principles. Compliance with the provisions of the law in its activities implicitly entails Terna's adoption of the same principle.

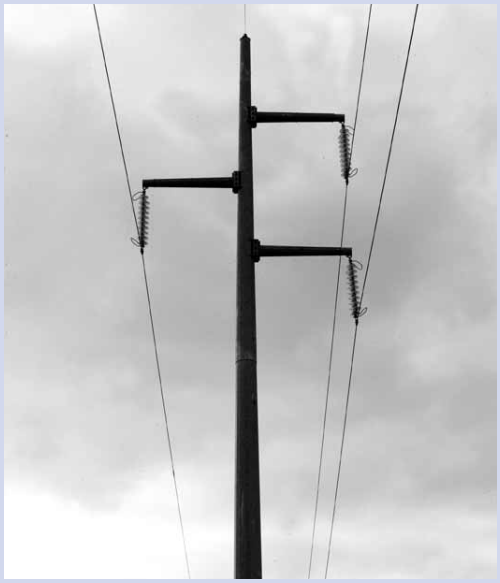
Measures adopted in the design stage

Terna is able to reduce the impact of electric lines on the landscape by identifying routes in areas that have good compatibility with the landscape and choosing supports that integrate well with it (see the box on the Trino-Lacchiarella line). In the last few years, Terna has increased the alternatives at its disposal by, among other things, having new supports designed by world-famous architects (see the "Low-environmental-impact supports" and "Pylons of the future" boxes).
Similar thinking applies to electric stations. Stations have a greater, but much more circumscribed impact. In some cases, trees are planted to mask them.

Mitigation

When the infrastructure in question already exists, mitigation measures are aimed at reducing its visibility and/or improve their integration in the landscape. In particular, Terna devises systems to hide fences, enhances the buildings, and uses naturalistic engineering techniques (for further examples, see the section on the management of impacts on biodiversity). These solutions also constitute the foundation for developing criteria for the design of new plants.

Low-environmental-impact supports



Tubular supports represent an important innovation in the construction of high- and very-high-voltage lines. In effect, their compact structure ensures that they occupy the least space possible and, in certain conditions of environmental integration, constitutes a valid alternative to traditional supports shaped like a truncated pyramid.
The most important features are:

- minimum space occupied at the base (on the order of 5 m^2 for one-stem supports against 250 m^2 of traditional truncated-pyramidal pylons for 380-kV lines);
- less visual impact, which can reduce the environmental impact of new lines in areas with landscapes of particular interest.

Tubular supports have been used for some time now on 150- and 132-kV lines (for example, 41 of them were installed during work to rationalise the 132-kV grid in Val d'Ossola Sud) and are now also being used more and more for 380-kV lines. In effect, more than 200 tubular supports will be installed on the following future 380-kV lines: "Sorgente-Rizziconi" (between Sicily and Calabria), "Trino-Lacchiarella" (between Piedmont and Lombardy), and "Chignolo Po-Maleo" (in Lombardy).

Terna began the engineering of the supports designed by internationally famous architects, such as the pylon designed by Sir Norman Foster, the British architect and designer, who is one of the leading representatives of high-tech architecture. The objective was to design supports for high-voltage overhead electric lines to be installed in the countryside or urban areas that would interact more harmoniously with the Italian landscape. 10 supports were installed in Tuscany in 2009 along the high-voltage "Tavarnuzze-Santa Barbara" line, near the Scandicci motorway junction, which combine aesthetic taste and technological innovation. The ultramodern design of Foster's pylons – which have a maximum height of 46.5 metres and occupy a space of 8 by 3.5 metres at their base – requires new installation techniques and therefore, studies have been conducted in cooperation with leading installers to find the best procedures for putting them into operation and maintaining them. With the Foster pylons, the electricity industry, which is characterised by essentially technical planning, has opened up to design by trying out new methods and infrastructure.

EU13

Worksite management

To ensure that worksites are managed in conformance with Terna's environmental policy, the Company has adopted an operating directive called "Management of environmental aspects during the construction of infrastructure". These instructions provide in particular that, technical requirements permitting, worksite areas and new access roads be located in zones with less valuable vegetation (agricultural areas).
If the areas do involve natural or semi-natural habitats, however, once the work is completed measures of environmental enhancement must be taken in order to restore the area concerned to a condition as near as possible to what it was before the work began. The schedule of the work itself must take into account the essential needs of the species that could be affected, avoiding work with the greatest impact in periods when the species reproduce.
Furthermore, special care must be taken with the waste produced on the worksite, in accordance with the regulations in force, avoiding temporary dumps and leakages of pollutants.
It is also mandatory to adopt the available technologies to reduce the acoustical emissions of stations and those caused by the corona discharge of the electric lines.

Contract work

The "Management of environmental aspects during the construction of infrastructure" directive also furnishes instructions for minimising environmental impact along the supply chain.
The environmental prescriptions applied to work contracted out to external firms were established in accordance with the provisions of applicable environmental law and of the ISO 14001 standard. They include aspects such as: the prevention of aquifer contamination, limiting damage to vegetation, management of accidents, minimising atmospheric emissions, use of vehicles, and the proper management of waste and excavation land.

EN26

The Trino-Lacchiarella line

The most important part of containing the environmental impact of infrastructure like electric lines is proper planning which carefully considers the different aspects of the environment and local area concerned. The planning of the Trino-Lacchiarella line included a series of measures to reduce interferences with the environment to a minimum, such as:

- the choice of a route that is compatible with other projects planned (the Broni-Mortara motorway) so as to exploit the infrastructure corridor provided for;
- whenever possible, constructing it next to existing infrastructure – using the same corridor without occupying additional land – such as, for example, the Milan-Genoa motorway or existing electric lines, which in turn have been duly repositioned using the same kind of supports;
- analysing the landscape concerned and minimising interferences with restrictions regarding land use;
- constructing in zones with the lowest environmental sensitivity whenever it was not possible to avoid crossing natural areas perpendicular to the line;
- using tubular supports with a low environmental impact for about 70% of the line, thus mitigating the visual impact thanks to their more harmonious shape, which integrates better with the landscape. Furthermore, a special paint will be used to camouflage the line by taking into account of the specific relationship between the support and its background. The use of these pylons will reduce the electro-magnetic field, thanks to the reduced distance between the conductors in the three phases. The bases of these pylons will be 2.5 m instead of 10 m, with a considerable saving in terms of the space occupied.

RATIONALISATION AND PROJECT WORK

Line voltage	Demolitions (km)	New HV/VHV overhead lines (km)	Balance HV/VHV overhead lines (km) (constructed-demolished)
132 kV	110.7	20.9	-89.8
220 kV	5.3	2.6	-2.7
380 kV	10.2	40.1	29.9
Total	**126.2**	**63.6**	**-62.6**

EN12 Biodiversity

Terna's infrastructure is spread throughout Italy in a grid that extends for about 56,000 kilometres. The relationship between the grid and the surrounding environment and the impact of the former on biodiversity differs according to whether the stage in question is that of construction or of operation. In the construction stage, the impact on biodiversity is connected with the worksite: the clearing of passageways in order to erect the pylons, excavation of the earth, and removal of waste material. The construction of lines and stations requires particular care if it takes place near or inside protected areas.

Once the line has been constructed, it has a two-fold relationship with the environment. On the one hand, its route may increase biodiversity and protect some species. When lines cross large open areas or extensive areas of grain monoculture, for example, the pylons and their bases constitute "islands" of concentrated biodiversity. Pylon bases, especially larger ones which support high-voltage lines, are the only places spared by the intensive agriculture and its intensive working and transformation of the land. These are the places where spontaneous grasses and brambles grow, in which wild rodents take refuge, because their den systems are not destroyed periodically by ploughing. They are also the places where predators of the rodents, birds of prey, congregate. In effect, birds, especially those of prey, commonly use electric lines and their pylons for both observing the surroundings and nesting.
On the other hand, the lines have potentially negative effects on biodiversity, which regard birds in particular. Terna's infrastructure does not present any risk of electrocution, which is connected with the narrow space between the conductors that characterises low- and medium-voltage lines[1] and can lead to the electrocution of birds – especially large ones – flying through them. High-voltage lines, instead, create the risk of collision. Actual collisions depend on the density of the birdlife and the frequency with which the birds fly near the lines. The most important factors are the routes of migratory birds – particularly important in Italy, which constitutes a bridge between Europe and Africa – the location of wetlands in the area, and the presence of protected areas, sanctuaries, and parks.

EN11 Lines in protected areas

Considering the importance of nearby protected areas or in any case ones of natural interest in determining the risk that Terna's infrastructure will have a negative impact on birdlife, the interaction between lines and such areas is constantly monitored. Given that the grid extends all over Italy, the main instrument for identifying the critical line is a complete database containing data from ministries and regional governments. These data were acquired through data-exchange protocols for the purpose of applying the SEA to the NTG Development Plan. The data collected were standardised and inserted in a standard cartographic system at the national level. In addition to the location of electric lines, the database provides information on aspects mainly regarding geology, hydrogeology, nature, and the landscape, including:

- seismicity level;
- climate data;
- polluted sites in Italy;
- the official list of protected areas, fluvial and other natural parks, wildlife sanctuaries, and land and marine national parks;
- sites of EU interest and special protection areas;
- Important Bird Areas (IBA);
- a map of landscape risk;
- legislative restrictions and administrative borders.

With the support of its database, in 2007 Terna made an inventory of the possible interferences of its lines and protected areas or ones with a high degree of biodiversity, comparing the data regarding the grid with environmental ones through the most reliable GIS (Geographic Information System) instruments. Considering all the kinds of protected areas established by different laws – regional and national parks, regional and national wildlife sanctuaries, areas of EU interest, special protection areas – and eliminating the overlaps, 11.4% of Terna's grid (about 4,400 km) was found to cross a protected area for anything from a few hundred metres to several tens of kilometres. For the sake of comparison, it should be noted that the aforesaid protected areas, net of overlaps, amount to 22.1% of Italy's land surface.
During the three-year period 2007-2009, no construction/demolition work on infrastructure in protected areas substantially modified the result of this census. In any case, the inventory will be updated in 2010 after all the approximately 18,500

(1) Given the wingspan of the bird species, in Italy high-voltage lines are not normally considered to be a risk for electrocution, which, instead, has been identified as the most important cause of death for accidents involving birds on low- and medium-voltage lines. The most important scientific study is still V. Penteriani, "*L'impatto delle linee elettriche sull'avifauna*", WWF Italia, Serie Scientifica no. 4, 1998.

km of new high-voltage lines acquired in April 2009 from Enel and currently owned by Terna's subsidiary TELAT have been georeferenced.

Management of impacts on biodiversity

EN14

Terna deals with impacts on biodiversity with a series of integrated instruments, which take such impacts into account right from the **planning stage**, and, if necessary, the adoption of appropriate mitigation and compensation measures (see the "The Molentargius-Saline Park" and "The SA.PE.I." boxes for examples of the use of different integrated instruments). Our approach is first of all preventive. In effect, right from the planning stage of development work, Terna takes into consideration the need to preserve the environment and the landscape by seeking solutions agreed on with local institutions for locating electric infrastructure. Like other environmental variables, biodiversity – and in particular the presence of protected areas – therefore constitutes an input to the planning of a sustainable grid. The biodiversity of protected areas where new infrastructure could be located are studied carefully. The information gathered then becomes part of the criteria for determining the route and are available in the detailed regional sections of the environmental report, which accompany the Grid Development Plan.
This approach was confirmed in the protocol of understanding signed by Terna and the WWF, on which see the box below. Among other things, the protocol provides for the integration of environmental criteria consistent with the WWF's conservation strategy in the planning of new lines.

Agreement with the WWF

EN13

View of the WWF's Padule Orti Bottagone oasis.

In January 2009, Terna and the WWF signed a protocol of understanding regarding the sustainable development of the electricity grid, with particular regard to reducing the environmental impact of large transmission lines and preserving biodiversity. The main objective of the agreement is the greater integration of environmental criteria in the planning stage of grid development and the harmonisation of this activity with the conservation strategy promoted by the WWF. The agreement will last three years and provides for a series of initiatives regarding both the planning of the grid and impact minimisation in several of the WWF's oases.
During 2009, work was begun on the "Guidelines for the environmentally sustainable planning and designing of high- and very-high-voltage electric lines in areas with great landscape and biodiversity value". The Company also completed planning regarding both mitigation measures, environmental monitoring, and the improvement of the enjoyment of nature in several WWF oases and actions to restore nature in several national parks in which it plans to remove existing lines. The planned actions are currently scheduled to be completed by the end of 2010.

In spite of the measures taken in the planning stage, there may be interferences between single works and a few species or habitats. To reduce such interferences to a **minimum, environmental mitigation measures are adopted, during both the construction and the operation of infrastructure**. If the mitigation measures are not sufficient to reduce the interferences to insignificant levels, the Company adopts **environmental compensation measures**, i.e. actions regarding environments near the electric line.

The most important mitigation and compensation measures involve:
- environmental restoration, which consists in building naturalistic works to regulate the surface outflow of meteoric water and thus control soil erosion;
- reforesting, through the planting of trees and bushes belonging to the native vegetation of the area;
- turfing with seeds of native species of grass, together with natural fertiliser adhesives that facilitate rooting. The use of native species avoids the risk of floristic pollution through the introduction of species extraneous to the environment;

EU13
- compensation: cutting down trees along line under construction is balanced by the planting of trees of the same species on an equivalent surface area.

EN13
The number of km^2 restored by mitigation works is not currently available.
For the species of fauna and flora that may be involved, see the 2009 environmental report, which is published online in the "Electric System" section of Terna's website.
During the construction of infrastructure, the habitats and the animal and flora species concerned are monitored. This is done to check the appropriateness and effectiveness of the mitigation and compensation actions taken and, if necessary, to make corrections. Specifically, environmental analyses are performed before the infrastructure is constructed and the data thus obtained are compared with those from samplings carried out subsequent to its completion in order to identify promptly any signs of deterioration.

As far as **already existing lines** are concerned, Terna has tried out mitigation systems regarding in particular the interference between lines and birdlife, which are described in the following paragraphs.

In 2008, together with the major concessionaires of infrastructure, organisations dedicated to the protection of the landscape and biodiversity, and other institutions, Terna was invited by the ISPRA (Institute for Environmental Protection and Research) to participate in a work group on the integration of line infrastructure with the surrounding area, with particular regard to their impact on ecosystems.
The group wrote a report on "The protection of the ecological connectivity of the environment and line infrastructure", which was published in March 2009. The purpose of the document is to identify possible mitigations of the impacts on ecosystems stemming from the construction of infrastructure and establish a GIS (Geographic Information System) method for defining and identifying areas of ecological connection.
Terna participated in the work group with a contribution aimed at promoting:
- the approach adopted for locating new infrastructure by describing its experience of integrating environmental and other restrictions on land use in constructing new lines;
- the measures taken to mitigate the impact of infrastructure constructed on fauna and vegetation.

The objective of the work group is to prepare guidelines to support the infrastructure planning stage, so as to mitigate the effects on natural habitats.

In 2009, Terna presented its 2009 LIFE + project – "*Urgent ecological conservation activities for integrating the electricity network with the Natura 2000 network*" – to the European Union.
The main objective of the project is the eco-sustainability of the National Transmission Grid in the Natura 2000 areas, in particular optimising the management of new high- and very-high-voltage (130-380 kV) electric lines and defining actions to support biodiversity and environmental monitoring.

Terna is also examining the possibility of using the **lines of the NTG to support environmental monitoring**. In effect, the installation of specific sensors on the pylons would allow programmes for collecting environmental data, established together with local governments and the administrative bodies of parks, to be initiated. In addition to enlarging the range of uses of its transmission infrastructure, Terna could thus make a significant contribution to the monitoring and management of biodiversity and the environment.

EN13

The “Molentargius-Saline” Park

WWF/F.Cianchi-Archive

In December 2009, Terna began the last stage of a project begun in February 2007 regarding the removal of conductors and pylons of the 150-kV overhead electric lines in the “Molentargius-Saline” Park, near Cagliari. The bases of the 10 pylons discarded more than two years were definitively removed from the Sardinian pond, along with 12 km of high-voltage electric lines inside the Park. Terna adopted advanced technologies to dismantle the 10 concrete blocks after breaking up the foundations, sawing with diamond wire to minimise the impact on the ecosystem of the Molentargius pond, a protected area with a wealth of local birdlife, including specifically many pink flamingos, which Terna aimed to preserve from the very beginning of the work carried out in Sardinia, showing great respect for the environment and concern for the area and its community. During the work, moreover, in agreement with the park administration and the regional government, the water and birdlife of the park’s pond were monitored. Terna used European Aircrane Elitankers to remove 80 reinforced-concrete blocks weighing between 4 and 7.5 tons. These helicopters can transport very heavy loads and make 40 round trips in one day. The work began in September 2009, with the sawing of the foundations. For the final stage, a suitable system was developed for slinging the blocks for transport by helicopter to a special area where they were accumulated for disposal in an authorised landfill after several samples were analysed chemically in order to classify the waste.

EN13

The SA.PE.I.

The SA.PE.I. (Sardinia-Italian Peninsula) undersea cable – one of the most important strategic works planned by Terna to upgrade the national electric system – was constructed in accordance with sustainability criteria. In October 2006, the geophysical and geotechnical investigation of the seabed began. After 5,000 project printouts based on 70 technical and environmental prescriptions, in 2008 the first of the two cables – 435 km long, 420 of which undersea – was laid. The SA.PE.I. first pole went into operation at the end of 2009, while the second one will be ready at the end of 2010.

The environmental sustainability of the SA.PE.I. cable began when the undersea route was being determined. In effect, once the landing places were set, Terna tried to avoid all the shipping routes in order to minimise the risk of the cables being damaged accidentally and monitored the sensitive marine areas, in particular the “Cetacean Sanctuary” and the meadows of *Posidonia oceanica* (Neptune grass) – which constitutes a major habitat in the Mediterranean – and *Cymodocea nodosa*, which is present in the vicinity of the continental landing site of Nettuno, in Rome province. In order to minimise the possible impacts on Neptune-grass meadows, the cable was laid on the seabed without excavating inside the substratum and was attached with special kinds of anchorage, similar to stirrups, which were positioned by specialised frogmen. The use of these devices – 621 in all – prevents oscillations of the cable from creating openings in the meadows, thus favouring erosion. Terna also maintained an attitude of great respect for the environment in the land segment of the SA.PE.I. cable – which near Nettuno crosses the Torre Astura area – where at Foglino it cut down only 3 trees, even though the Company was authorised to eliminate 53.

EN14 Lines and birdlife

Lines have potentially negative effects on birdlife.
While the risk of electrocution characterises low- and medium-voltage lines, Terna's high-voltage lines can be dangerous in particular because of the risk of collision. This is why in segments of line where birds fly by frequently the Company has installed devices called "dissuaders", which with their bulk and the noise they produce when wind strikes them make it easier for the birds to notice the lines when they are flying.

BIRDLIFE DISSUADERS ON THE NTG

No. of lines concerned	km of lines concerned	Total no. of dissuaders
30	146	8,845

In 2008, Terna signed an agreement with the LIPU (the Italian partner of Birdlife International) to carry out a scientific study on the interaction between high-voltage lines and birds.
The project constitutes an important opportunity to study the real interactions between birdlife and the high- and very-high-voltage electric lines of the National Transmission Grid for the first time systematically and on a large, national scale. Currently, in effect, the only studies available regard the electrocution of birds that touch two conductors with their wings at the same time, a phenomenon that is characteristic of low- and medium-voltage lines.
Seven test areas for study were chosen all over Italy on the basis of their particular concentration of wild birds (migration, stays, reproduction). These areas correspond to different environmental categories: wetlands, farmland, mountains, forests, coastal areas are classified as Special Protection Areas (SPAs) and Important Bird Areas (IBAs), and at the same time are characterised by the presence of NTG lines. In 2009, these areas were duly monitored as planned, an activity that will be completed by the end of the first half of 2010.

Terna has also been engaged for some time in experimenting with **alternative uses of electric lines for the benefit of biodiversity**, including in particular placing boxes on pylons so that birds of prey can build their nests in them. Numerous studies have shown how electric lines constitute observation posts for birds of prey when they are hunting. The birds perch on the pylons because of their height, as well as the protection from predators they provide.
In 2009, Terna continued to support the "**nests on pylons**" project in cooperation with the Ornis Italica ornithological association, thanks to which more than 300 boxes suitable for nest-building by birds of prey have been installed in the last few years. Constant monitoring by researchers has enabled them to collect a considerable amount of biological and ethological data and to note a positive effect in terms of biodiversity, constituted by an increase in the kestrel population in Rome. The boxes mounted on pylons were monitored again during the 2009 reproduction season to determine their occupation by kestrels and to collect reproduction data. The nests were inspected from the middle of March to determine their occupation, the size of the clutch, the laying date, and the reproductive outcome.
In May 2009, a first group of 23 nesting places for rollers was also installed on HV pylons, with 60% of the boxes being occupied by the birds for nest-building. The boxes were also occupied by sparrows and scops owls. About 20 scops owls, including three adults, and almost 10 rollers were ringed.
In 2009, Terna also continued to sponsor the "birdcam" project in cooperation with Ornis Italica, which provides for the installation of television cameras on artificial nests in order to follow the reproduction period of the birds online, at www.birdcam.it and on Terna's website. The webcam connection also enables researchers to observe the birds from a distance. The activities of the 2009 season began in February, when the cameras were turned on in the nest of Aria (Air) and Vento (Wind), the couple of peregrine falcons that nests on a building of the University of Rome "La Sapienza".

Pellegrina is back flying in Rome

A fortuitous find which, thanks to a small alluminium ring on a leg, has provided an unexpected source of new information on the life of birds of prey. This, in fine, is the story of Pellegrina (Peregrine), a 3-year-old female born to Aria and Vento, the couple of peregrine falcons that reproduces in a nest on the roof of the Economics Department of the University of Rome "La Sapienza" and is monitored by Terna's webcam on the www.birdcam.it website of its scientific partner, Ornis Italica. In May 2009, Pellegrina was found in the Prati section of Rome with a deep wound on her chest, which may be caused by banging against a wire or an antenna. She was recognised thanks to the ring and taken to the LIPU's recovery centre, where a veterinarian and volunteers took care of her, cured her wounds, and followed her convalescence. The falcon was then entrusted to an expert at the Lake Vico Wildlife Sanctuary so she could tone up her muscles and improve the condition of her plumage.
Finding Pellegrina three years after her last sighting disproved the rooted opinion that these raptors fly thousands of kilometres in their first few years of life and permanently abandon their place of birth, showing instead their high degree of attachment to that place.
Four months after she was found, Pellegrina had completely healed and was in perfect physical shape. In the presence of numerous enthusiasts who had known her from her birth and had followed her recent vicissitudes, on October 14, 2009, she resumed her life as a wild falcon from the very roof of the Economics Department where she was born.

Energy efficiency and climate change

Terna's business is the transmission of electricity and it does not own any production plant, which are among the largest producers of greenhouse-gas emissions in the electric industry and industry in general. For this reason, Terna is subject to neither obligations regarding emission reduction according to the Kyoto goals nor to any kind of emission trading scheme. Terna's decision to commit itself in any case to the containment of its emissions is therefore completely voluntary.

Energy consumption

EN3-4

The transmission of electric energy requires the direct consumption of energy only for a few auxiliary activities:
- fuel for the Company's vehicles, which are used to inspect lines, repair failures, and other work connected in particular with the maintenance of lines and stations;
- oil for its emergency generating units, which go into operation only if there is a lack of electricity – the normal source of powering equipment – precisely to ensure the control and restoration of the normal functioning of the electric system;
- oil and methane for heating, in particular for its offices.

Indirect energy consumption is the electric energy used in the operation of stations and other infrastructure (over 90% of the total) and in offices and laboratories/workshops.

The following tables show Terna's direct and indirect consumption. The energy- consumption database is still being improved. In a few cases (oil for heating), monitoring regards purchases as indicators of consumption, which entails results that are not completely uniform from one period to another. In other cases (the electricity used in offices and stations), the reported values are estimated because of the problems connected with exhaustive measurement. It should be noted, however, that the estimated indirect consumption of electricity covers 100% of Terna's infrastructure and offices.

In 2009, the following increased:
- fuel consumption (petrol and oil) because of the enlargement of the corporate vehicle fleet following the expansion of the Company's grid;
- methane consumption, because the figure now includes all eight regional headquarters;

• electricity consumption, because of an increase in the number of stations managed, as well as of an improved method of measurement.

DIRECT AND INDIRECT CONSUMPTION OF ENERGY, BROKEN DOWN BY PRIMARY SOURCE - GROUP, GIGAJOULES [1]

	2009	2008
Direct consumption		
Petrol for vehicles	7,304	9,004
Diesel for vehicles	78,401	73,661
Methane for heating	6,144	4,837
Oil for generating units and heating	13,279	11,352
Total direct consumption	**105,129**	**98,854**
Indirect consumption		
Electric energy for stations and offices	633,600	564,444
Total consumption	**738,729**	**663,298**

DIRECT AND INDIRECT CONSUMPTION OF ENERGY, BROKEN DOWN BY PRIMARY SOURCE - ITALY, GIGAJOULES [1]

EN29

	2009	2008	2007
Direct consumption			
Petrol for vehicles	7,304	6,630	8,399
Diesel for vehicles	78,401	67,855	67,189
Methane for heating [2]	6,144	4,837	29,474
Oil for generating units and heating	13,279	8,319	7,470
Total direct consumption	**105,129**	**87,641**	**112,532**
Indirect consumption			
Electric energy for stations and offices	633,600	540,000	540,000
Total consumption	**738,729**	**627,641**	**652,532**

(1) The data on direct consumption in tons and thousands of m^3 are reported in detail in the tables of indicators. The parameters specified in the GRI - Global Reporting Initiative - G3 protocols were used to convert the volume of primary resources into gigajoules.
(2) The 2007 consumption of methane was estimated on the basis of partial information, which led to an excessive estimate.

EN16 Direct and indirect CO_2 emissions

The greenhouse-gas emissions connected with Terna's business come from:
• direct consumption of energy sources (petrol and diesel for vehicles, oil for generating units and heating, methane for heating);
• indirect consumption of energy sources (electricity);
• leakage of SF_6 (sulfur hexafluoride), a greenhouse gas used in station equipment because of its high insulating power.
SF_6 leakage is the main direct source of Terna's greenhouse-gas emissions. From 2007 to 2009, the quantity of SF_6 present in Terna's infrastructure increased by 35 tons (+11.5%). The incidence of leakage in 2009 was 0.89%, a decrease with respect to 2008 (1.07%), when, however, an incident occurred that increased the leakage abnormally. The measures taken to contain the emissions are reported in the dedicated section on page 115.

Leakage of R22 refrigerant was not included in the direct emissions of greenhouse gases. This leakage was estimated in 2009 for the first time from measurements that are not yet consolidated and do not ensure an accurate calculation of the actual emissions of gas into the air (see the "Other atmospheric emissions" section). In any case, such estimates show a value amounting to 976 tons of CO_2-equivalent.

TOTAL DIRECT AND INDIRECT EMISSIONS OF GREENHOUSE GASES
GROUP, TONS OF CO_2-EQUIVALENT [1]

	2009	2008
Direct emissions		
Petrol for vehicles	506	610
Diesel for vehicles	5,802	5,548
Oil for heating and generating units	983	853
Methane for heating	344	271
SF_6 leakage	71,828	81,499
Total direct emissions	**79,464**	**88,780**
Indirect emissions		
Electric energy	75,680	70,616
Total emissions	**155,144**	**159,396**

TOTAL DIRECT AND INDIRECT GREENHOUSE-GAS EMISSIONS
ITALY, TONS OF CO_2-EQUIVALENT [1]

EN29

	2009	2008	2007
Direct emissions			
Petrol for vehicles	506	445	582
Diesel for vehicles	5,802	5,118	4,973
Oil for heating and generating units	983	628	553
Methane for heating	344	271	1,652
SF_6 leakage	71,828	81,499	50,166
Total direct emissions	**79,464**	**87,961**	**57,926**
Indirect emissions			
Electric energy	75,680	69,750	71,250
Total emissions	**155,144**	**157,711**	**129,176**

(1) The conversion of direct consumption into emissions of CO_2-equivalent was made according to the parameters specified by the Greenhouse-Gas Protocol (GHG) Initiative. For the indirect consumption of electricity the conversion was made taking into account the weight of thermal production in the total Italian production of electricity in 2009. The reference for the break-down of the production mix is the December 2009 "Monthly report on the electric system", which is available online at www.terna.it. For 2008 and 2007, the data are from 2007 statistical data of the electric system.

Other indirect emissions of CO_2

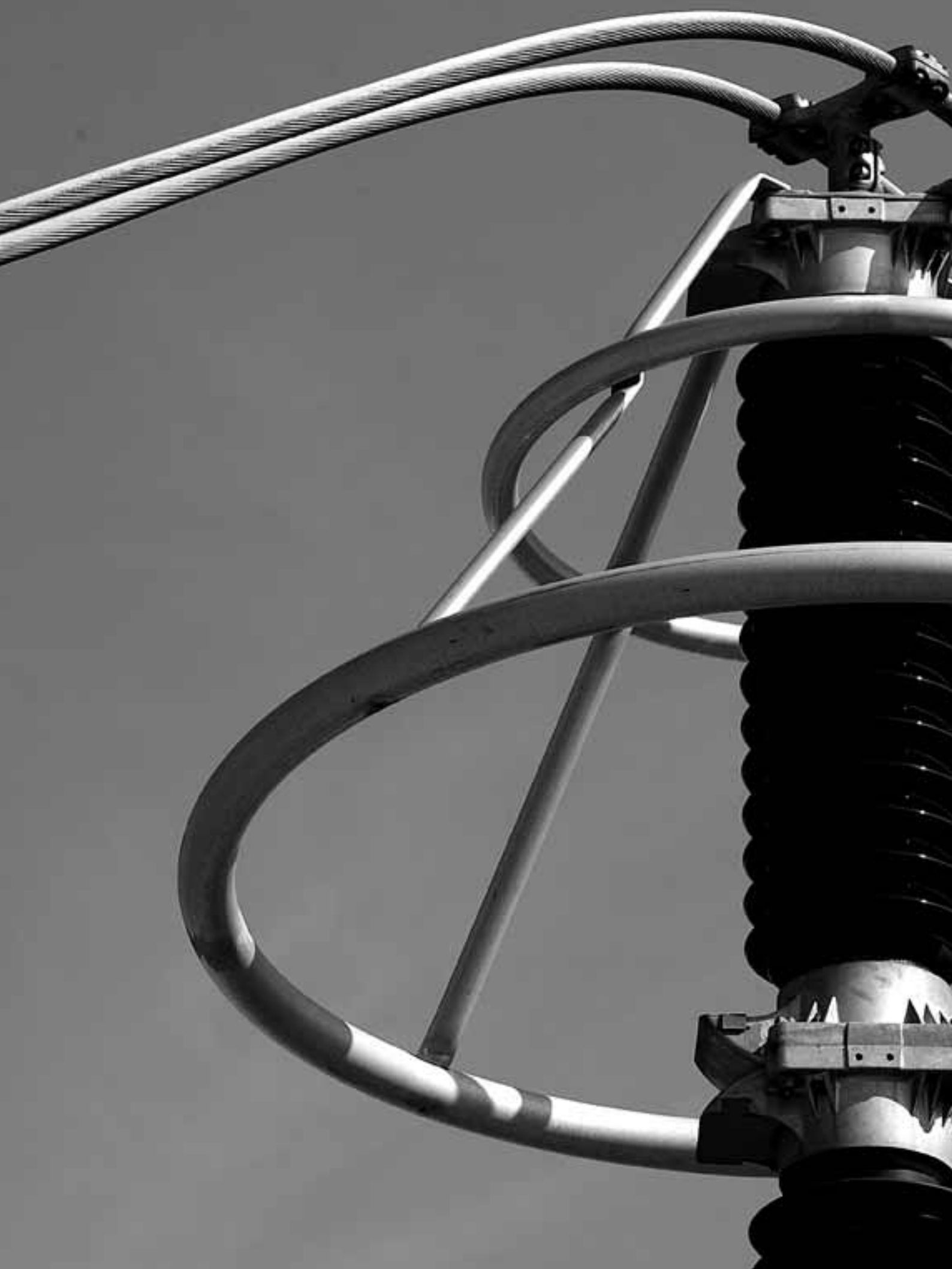
EN17

In addition to the emissions caused by electricity consumption, there are indirect emissions connected with the following aspects of Terna's business:
- air travel by employees;
- grid losses.

INDIRECT EMISSIONS OF CO_2
BECAUSE OF AIR TRAVEL BY EMPLOYEES

	Miles		CO_2 emissions (tons)	
Flight category	2009	2008	2009	2008
Domestic	3,511,970	3,793,592	1,013.1	1,090.0
International	1,223,462	1,306,497	259.9	268.5
Intercontinental	1,618,459	1,152,414	305.6	230.9
Total	**6,353,891**	**6,252,503**	**1,578.5**	**1,589.4**

Grid losses are defined as the difference between the energy injected by producers and end consumption. Among Terna's significant losses are those connected with the transmission grid. With its acquisition of approximately 18,500 kilometres of high-voltage lines from Enel, the losses on these lines are also taken into account. Both figures are the result of estimates, which break down the total losses of the system (including the distribution networks) in proportion to the voltage levels, beginning with calculations assuming particular grid configurations and also including the losses on the lines that are due to corona discharge (proportionate to the voltage) and the joule effect (proportionate to the current), as well as losses on the transformers.



EU12 GRID LOSSES [1]

	% of energy demand	(GWh)	Tons CO_2-equivalent
VHV grid [2]	1.23	3,897	1,657,013
HV grid	1.39	4,404	1,872,559

(1) Calculated using the "2009 provisional operating data of the national electric system".
(2) In 2008 and 2007, the losses on the VHV grids amounted to1.32% .

It should be noted that Terna can only contribute to the amount of the losses, which are not completely under its control. To understand this point, it is useful to distinguish between dispatching and grid development.
Dispatching transactions are necessary to ensure the constant balance between injections and withdrawals and avoid problems regarding grid security and dysfunctions. Such transactions take place according to regulated criteria and as part of the production structure determined by the energy market, and thus cannot be conditioned by Terna with the objective of minimising losses. It should be noted, however, that the energy market implicitly favours the more efficient producers and thus entails a trend of emission reduction greatly exceeding that of grid losses.
The production structure being equal, grid development would lead to greater efficiency and thus a reduction of losses. However, grid development allows the establishment of a production structure that was previously not possible and thus also allows consumption to increase. Furthermore, grid development itself is partly dictated by the need to connect new plants, whose location is not decided by Terna. Therefore, the overall effect of grid development on losses is not under the TSO's control and cannot be determined in advance. Other factors can more than offset the increase in efficiency deriving from development of the grid, in terms of both the absolute amount of losses and the incidence of losses with respect to the total energy consumed.

Other atmospheric emissions

Refrigerants affect the environment both by damaging the ozone layer and through the greenhouse effect. In 2009, measurement of the refrigerants in Terna's equipment was extended to sites that were not included in 2008, thus determining an increase in the amount reported. Coverage of the measurement is still incomplete. In particular, the Company's new main office is not included. In any case, measurement coverage has been extended – from 77% in 2008 to 85.6% in 2009 – with an increase in the amount that is more than proportional. In effect, among the new sites measured there are some with equipment in operation uninterruptedly for the security of the electric service, which require a larger number of refrigeration systems to keep the temperature constant.

REFRIGERANTS - QUANTITIES - TERNA S.P.A., KILOGRAMS	2009	2008
R22	4,380.3	2,591.8
R407C	816.6	784.0
R410A	333.9	348.7
Other	6.2	2.4
Total	**6,553.5**	**3,726.9**

In 2009, Terna began monitoring the consumption of refrigerant gases. The monitoring is limited for the time being to R22, which constitutes 65.7% of all the refrigerants in Terna's plants.

EN19 REFRIGERANTS - CONSUMPTION - TERNA S.P.A., KILOGRAMS

	2009
R22	1,016.5

The figure regards 100% of Terna's plants containing R22 and also contains the quantity of new gas injected in equipment during its maintenance. The latter begins with the controlled emptying of the equipment. This quantity of consumption, which is estimated to be 40% of the total, does not entail actual atmospheric emissions with effects on the environment.

Initiatives to reduce emissions

EN18

With regard to the reduction of greenhouse-gas emissions and the fight against global warming, Terna focuses on the following three voluntary programmes concerning the main sources of its emissions of greenhouse gases:

- a programme for containing SF_6 leakage. Terna has started a number of initiatives, such as the early detection of leaks and the pursuit of technological solutions for increasing the tightness of equipment;
- an energy-conservation programme focused mainly on a feasibility study regarding energy conservation in electric stations;
- a programme to reduce the consumption per kilometre of the Company's vehicle fleet, which in 2009 led to an 11.1% reduction of CO_2 emissions per kilometre driven.

The first two initiatives can have a significant quantitative effect, but only in the medium-to-long term. However, the energy-conservation measures adopted at Terna's new main office constitute an exception, on which see the "A new sustainable main office" box. The results of the third programme are already tangible, but concern a source of emissions that is quantitatively less important.

In 2009, **two new initiatives** to fight climate change started up. The first regards the **neutralisation of CO_2 emissions** connected with several corporate publications in 2010 (the house organ, Terna News, the annual financial report, and the present sustainability report). In all, about 18,000 square metres of land will be planted with trees, partly in Madagascar and partly in Rome, in the Aniene Park, in an area adjacent to Terna's new main office.

Much more significant is the second one, a business initiative entrusted by Terna to its subsidiary **SunTergrid**. As explained in the section on the Terna Group, SunTergrid started to build and manage photovoltaic plants (with a total capacity of about 100MWp) on land without plants adjacent to transformation stations, leased from the Parent Company. The production of energy in 2009 was absolutely negligible and will become significant only beginning in 2010. The energy produced will be withdrawn and priced by GSE S.p.A., thus ensuring Terna's complete neutrality with respect to the sale of the energy on the electricity market.

Containment of SF_6 leakage

Thanks to its chemical and physical properties, which make it an excellent insulator, the gas SF_6 (sulfur hexafluoride) is used in several kinds of electrical equipment, allowing production to take place with less encumbrance. Equipment insulated with SF_6 is also safer. If there is a serious malfunction, the consequences are not as dangerous as with traditional oil-insulated equipment. Thanks to these properties, the use of equipment with SF_6 is expected to increase, as is also happening in transmission companies abroad.

Some of the gas present in Terna's infrastructure seeps out into the air because the gaskets do not seal perfectly, as well as sometimes when the pressure is being restored. SF_6 is classified as a greenhouse gas. Therefore Terna plans to keep its leakage under control in order to contain and possibly reduce its incidence with respect to all the gas used (in absolute terms, leakage could actually increase because of an increase in the use of equipment insulated with SF_6).

By adopting the different measures mentioned, Terna plans to gradually reduce the incidence of leakage with respect to the approximately 0.7% in 2007 and 2008, net of the effect of the incident at Tavernuzze. According to plans for the installation of new equipment, the expected reduction is 0.1% over a period of five years. The actual availability of equipment with less leakage will play a crucial role, while there will also be a contribution from the application of the new procedure for monitoring equipment, which will enable anomalous leaks to be detected and prompt and targeted measures to be taken.

Type of programme/initiative	2009	2010
New procedure for monitoring leaks [1] and reducing dispersion when pressure is being restored	Application of procedure to all plants for the whole year	
Integrated compact modules – a set of different equipment – with at least a 30% reduction of the quantity of SF_6 needed for insulation with respect to steel-clad uprights	After positive test results, equipment is considered an applicative standard and will be installed as necessary	Installation of the first modules to test performance
Remote systems for detecting gas leaks in equipment [2]	Installation on the 380-kV section in the Lacchiarella E/S completed	Results examined and widespread application assessed
New sealed transformers (TA) or with max leakage of 0.1% a year (high-reliability TA) [3]	Prototype trials completed positively and production start-up	Plan to replace old equipment with new highly reliable, ultra-low-leakage equipment

(1) The new monitoring system records the gas used and dispersed at each station. Until 2007, leakage was calculated using the total quantity of SF_6 acquired, net of new installations.
(2) Early detection by the remote maintenance centre of equipment where the pressure is decreasing anomalously allows targeted action to be taken on the equipment, while also avoiding shutting down the plant because of loss of insulation.
(3) The particularity of this initiative, undertaken after detection of leakage exceeding the declared threshold, lies in the current unavailability on the market of equipment capable of ensuring an extremely low level of leakage over time.

EN7 Energy conservation in stations

Electricity is used in electric stations to ensure the functioning of equipment and its remote control.
The main sources of consumption are:
- for cooling power transformers;
- external lighting;
- local conditioning plants with electrical equipment;
- auxiliary circuits for the command, control, and protection of equipment and machinery.

Although the energy consumed is only the minimum strictly necessary to ensure operating security, the pursuit of opportunities for conservation is in any case focused on:
- systems with natural circulation and/or automated equipment that optimise the functioning of pumps and fans cooling transformers;
- feasibility studies on lighting solutions that conserve energy – see the "Consumption of floodlight towers" box – with the use of LEDs and automatic systems for switching them on and off that are sensitive to light and capable of signaling anomalies;
- installation of photovoltaic panels on station buildings to at least cover the consumption of the computers managing the plants.

It will be possible to measure the effects of the aforesaid initiatives only in the medium term, when the projects have reached a more advanced stage and more precise measures of station consumption are available.

Consumption of floodlight towers

Floodlight towers are used to light and protect electric stations. There is an average of 2 towers per plant, each of which is equipped with 6 1,000-watt floodlights. Thus the total installed power amounts to 12 kW.
Every evening, 30% of the floodlights are switched on, and if work is being done at night, so are the remaining 70%. The average use amounts to 11 hours a day throughout the year. Total consumption for lighting, including lighting for work, is 6.7 GWh per year.
Terna is examining the possibility of introducing new technologies – such as, for example, the use of LEDs mounted on floodlight towers – to reduce energy consumption. The use of LEDs would enable the Company to reduce consumption by about 60%.

A sustainable new head office

Until September 2009, departments of Terna's head office were housed in 3 different buildings from the early twentieth century in Rome, all of which had insufficient internal spaces and structural inefficiencies. In particular, the air-conditioning systems were obsolete, as well as the result of enlargements and changes that had not been coordinated, with negative effects on energy consumption and the livability of the buildings. Furthermore, the fact of the 3 locations caused diseconomies in the organisation of normal everyday work, such as, for example, meetings with people belonging to different departments. Terna's move to its new headquarters in September 2009 eliminated the moving around among the different offices. The building where the new head office is located was thoroughly renovated because the existing air-conditioning system was insufficient to compensate for poor thermal insulation. In renovating the building, the Company sought a balance between aesthetics – paying particular attention to corporate identity – and energy conservation, practicality, the well-being of people, and the biodiversity of the surrounding environment. The result is functional, livable, and very energy-efficient. The best materials available were used to insulate the building thermally, with regard to both the glass walls and the shading metal structure of the *façade*, which allow the heat passing from the outside to the inside to be reduced by 65%, as well as providing excellent acoustic insulation. Built with one of the most sophisticated technologies on the market, the air-conditioning system provides high-quality air and allows different parts of the building to have different temperatures, according to personal needs, with an average seasonal efficiency that is 25% higher than that of a traditional system. The ventilation system changes the air completely every 30 minutes, circulating the incoming air before releasing it outside through special heat exchangers, to the advantage of efficiency in terms of energy conservation. The building also conserves energy with a solar-energy plant that produces at least 50% of its annual requirements of hot water. Heating is entrusted to condensation boilers, which are 20% more efficient than traditional ones. Much care was taken to make the interior livable by optimising spaces and providing them with conveniences. Advanced solutions were chosen, in which suspended ceilings and moveable walls define spaces for people and their needs. In addition to being washable, the glazed stone floors are humidity- and fire-proof, reflect natural light, and ensure the best possible acoustic absorption. The lighting is the result of a study that considered the characteristics of the materials used in the offices and the incidence of natural light so as to ensure the best quality of light for every worktop. The quality of the lighting devices used is particularly high from both the technical and the aesthetic point of view, while all the light bulbs are low-consumption fluorescent ones. Terna also protected the biodiversity of the environment. Thanks to cooperation with the LIPU (Italian Association for the Protection of Birds), special measures were taken during the renovation work to make the building harmless for birds. In effect, the latter actually find that they can nest in parts of the building, as long as they do not interfere with cleaning and efficiency. The Company's new head office is the first example in Italy of a building in which concern for biodiversity was taken into consideration during the planning stage instead of with mitigation measures once the work was completed.

EN29

Reduction of the emissions connected with mobility

The Company's vehicle fleet – which is used mainly to inspect lines and to carry out work and repair breakdowns – is not concentrated in a few places, but is scattered over a vast territory. The problem is therefore not an impact on specific areas, but a general one of pollution. The Company's main action to reduce such pollution consists in its renewal of the fleet and scrupulous maintenance.

VEHICLE FLEET - ITALY	2009	2008	2007
Hybrid	9	9	9
Euro 5	170	100	0
Euro 4	1,112	1,126	949
Euro 3 (or below)	310	347	544
Total vehicles	**1,601**	**1,582**	**1,502**

In 2009, Terna reduced the per-kilometre emissions of its vehicle fleet by 11.1%, thus exceeding the target set by Quattroruote's 10X10 project, in which Terna is participating (see "The 10X10 project" box).

EN7

In the last few years, in addition to renewing much of its fleet, Terna has taken a number of other actions to reduce the impact of the mobility of its employees on the environment. In effect, it has:

- implemented a plan to improve the mobility of its employees, by concentrating all of its Rome offices in one building;
- begun to monitor employee commuting through a survey on their home/work commuting habits;
- begun to use videoconferencing equipment in 13 meeting rooms of its new head office in Rome, which can be connected with the equipment installed on the premises of suppliers, partners, or other Terna offices;
- implemented a plan to encourage the use of public transport by discounts for employees on yearly passes. The Company entered into agreements with the public-transport companies of Rome and Milan and organised a free-of-charge service linking the nearest public-transport junctions with two of its Rome offices. The result has been a 22% reduction in the use of private vehicles;
- made the position of mobility manager official;
- started up courses on eco-driving/safe driving, which have been taken by more than 160 employees;
- begun to monitor how Company vehicles move around through georeferencing.

EN18

The 10X10 project

Since July 2008, Terna has participated in the magazine Quattroruote's 10X10 project. So far, 31 companies have undertaken to reduce the CO_2 emissions of their vehicle fleets. By joining the project, Terna confirmed its intention to reduce the impact caused by corporate mobility, fuel consumption, and the efficiency of its fleet.
In the last two years Terna has renewed a significant part of its fleet by replacing obsolete, polluting vehicles dating partly from the 1990s with new and more efficient ones. In particular, the Company has started to use Euro 4/5 vehicles instead of the Euro 0 ones they replaced.
Since vehicles are used every day to inspect lines and get to operating infrastructure located all over Italy – places that often can be reached only by unpaved trails – the environmental impact of their use has decreased significantly. Specifically, in 2009 Terna reduced its per-kilometre CO_2 emissions by 24.08 g/km, or 11.1%. Considering the kilometres the vehicles are driven in a year, the improvements described have led to the avoidance of 783 tons of CO_2-equivalent.

The Grid Development Plan and CO_2 reduction

The construction of the new lines and stations included in the 2010 Development Plan produces positive effects in terms not only of service security and the final cost of electricity, but also of reduction of emissions by the electric system. Three kinds of results will be achieved when the Plan has been fully implemented:

- reduction of grid losses;
- improvement of the productive mix and interconnection with foreign grids;
- connection of plants using renewable energy sources.

Overall, the reduction of CO_2 emissions by the time the Plan has been completed could be on the order of 8 million tons a year.

Reduction of grid losses

Grid losses depend partly, but not entirely, on the distance electricity travels on the transmission grid. Consumption being equal, the more distant the point where energy is withdrawn (i.e. consumed) from the NTG is from the point where it is injected into the NTG, the larger the losses.

Furthermore, the distance travelled being equal, the lower the voltage of the line is, the larger the losses are.

Therefore, losses can be reduced by development work to improve the mesh of the grid, i.e. that bring the injection and withdrawal points closer to one another. Losses can also be reduced by upgrading a segment of the grid, for example by replacing a 150-kV line with a 380-kV on the same stretch.

When the work included in the 2010 Development Plan is completed, the reduction of losses at peak demand could reach 200 MW, which corresponds to a reduction of energy losses in the grid of about 1,200 GWh a year. If this reduction comes from a reduction in fuel-based production, it is estimated that the aforesaid actions will lead to an abatement of CO_2 emissions ranging from 500,000 to 600,000 tons a year[1].

Improvement of the production mix and interconnection with foreign grids

One of the main reasons for developing the grid is to overcome the limitations on transmission between "electric zones". These limitations impose restrictions on the possibility of producing with more efficient generating units – ones that pollute less in terms of CO_2 emissions – and at the same time make production with obsolete plants necessary for grid security. Together with the upgrading of interconnection with foreign grids, the work included in the Development Plan will make possible a more efficient production mix, with a larger share of production from more efficient plants. Thus the same quantity of final consumption would be possible with a smaller quantity of fuel. The benefits can be quantified as a reduction of up to 3,700,000 tons of CO_2 emissions a year.

Connection of plants using renewable energy

The main contribution to the reduction of CO_2 emissions comes from the connection of plants producing from renewable energy considered in the 2010 Development Plan. Energy production from renewable sources has grown considerably in the last few years. In particular, wind generating plants have increased remarkably especially in the South of Italy and on the islands. In 2009, 30 new wind plants went into operation with a total of about 1,100 MW of installed power. One of Terna's most important tasks is to plan upgrades of the NTG in order to facilitate the production of electricity from renewable sources, trying to overcome any grid and operation restrictions that could condition the injection into the grid of such energy, which is entitled to dispatching priority.

In this regard, the work included by Terna in its 2010 Development Plan will free about 3,700 MW of power from wind energy, thus obtaining a reduction of about 3,500 thousand tons a year of CO_2 emissions.

Category	Works	Power from renewable sources (MW)
Grid upgrading indirectly functional to the reduction of operating limitations in dispatching generation that facilitates production from renewable sources that cannot be planned	380-kV "Sorgente-Scilla-Rizziconi" line and upgrading of the VHV grid in Sicily	1,000
	Increase of the interconnection capacity between Sardinia and the mainland and between Sardinia and Corsica	700
	Reclassification of the 220-kV "Rotonda-Tusciano-Monte Corvino" line to 380-kV	900
Work to upgrade and eliminate congestion of HV grid segments into which production from renewable sources that cannot be planned are injected directly	Upgrading of the transmission grid in the Foggia-Benevento-Salerno area	1,100

(1) Note that the estimate was made with conditions being equal. A change in consumption or in the location of power plants could lead to different results.

A pact for the environment

In July 2009, a strategic alliance was formed to contribute to Italy's achievement of its objectives regarding emission reduction, energy conservation, and increased production from renewable sources, which were set after EU and international negotiations. The pact was signed by the Undersecretary of the Prime Minister's Office, Gianni Letta, the Minister of the Environment, Stefania Prestigiacomo, and 11 large Italian companies, which can contribute to combatting climate change: Enel, Eni, Edison, Autostrade, Edipower, Enac, Finbieticola, Ferrovie dello Stato, Italcementi, Sorgenia, and Terna. Terna is one of the companies that already have significant projects that are ready to go, such as the 6 infrastructure works, constituting a total investment of €1.6 billion, for which it has requested authorisation. These are 6 large electric lines: a connection between Sicily and Calabria (overhead segments of Sorgente (Messina province)-Rizziconi (Reggio Calabria province) 380-kV electric line), a Lodi-Pavia connection (Chignolo Po (Pavia province)-Maleo (Lodi province) 380-kV line), a connection between Padua and Venice (Camin (Padua province)-Dolo (Venice province)-Fusina (Venice province) 380-kV line), a connection between Puglia and Campania (Foggia-Benevento 380-kV line), a connection between Udine province and Gorizia province (Udine Ovest-Redipuglia (Gorizia province) 380-kV line), and a connection between Piedmont and Lombardy (Trino (Vercelli province)-Lacchiarella (Milan province) 380-kV line). These works regard both the North and South of Italy. The worksites could be opened in a few months with the go-ahead of the necessary authorisations. The lines will contribute to reducing CO_2 emissions by 1 million tons a year because of the conservation of about 440 million kWh a year thanks to a reduction in grid losses. A parallel effect will be to increase the production of electricity from renewable sources, thanks to decreased congestion of the backbones concerned by the installation of new wind plants. The Ministry of the Environment will monitor the progress of the 6 works once they have been authorised and will publish updates on its website. It will also support Terna's projects, which will be competing in the EU calls for research and innovation in the environmental field. The environmental benefits do not end with the 6 projects. Thanks to Terna's development strategy, which enables the electric grid to be rationalised when more modern and efficient infrastructure is built, the overall environmental impact of the electric lines will diminish. In effect, 800 kilometres of lines will be dismantled and 230 kilometres will be laid underground against 500 kilometres of new overhead lines. There will be 60 km fewer lines in the protected areas, with 180 km dismantled vs. 120 constructed. All this will free up more than 500 hectares of land, the equivalent of the Abetone Wildlife Sanctuary in Tuscany. Furthermore, with this agreement the environment becomes a driver of economic growth. In effect, not only will the investment in the grid produce the aforesaid benefits, but will also contribute to mitigating the current recession by providing work for many excellent Italian companies that contribute to the implementation of technologically advanced projects.

EU8

Wind energy as a priority

In 2009, the injection of wind energy into the grid increased considerably with respect to last year, totaling 6.0 TWh (+36% with respect to 2008) against 4.4 TWh in the previous year (+19% with respect to 2007). The increase was the result of both an increase in installed power and the particular windiness of the winter months.
This entailed a reduction of injections of electricity produced from non-renewable sources, in particular thermal production, with a consequent decrease in greenhouse-gas emissions.
The objectives of the EU and Italian regulations converge in dispatching priority to electricity produced from wind energy. Terna ensures this priority by reducing in normal operation the electricity produced from sources other than wind. However, the intermittency of the primary source and the fact that it is difficult to forecast require special care in planning in order to prevent the priority granted wind production from creating problems for the security and continuity of the service.
As part of its dispatching activities, in January 2008 Terna began a daily process of forecasting, with a 72-hour time horizon, injections of wind energy. The regulatory Authority established a specific remuneration as an incentive to make sufficiently accurate forecasts.
Accurate forecasts of production from wind enable Terna to plan production from non-renewable sources, such as thermal production, more effectively, with benefits in terms of both cost-effectiveness and security, especially with regard to the quantification of the system's operating reserve margins.
In 2009, the accuracy of Terna's forecasts was 22%[1].
Thus, for the second year in a row Terna achieved the maximum incentive remuneration possible in spite of the increasingly challenging target established by the AEEG through a mechanism with a retroactive effect on the electric system regarding part of the benefit obtained the previous year.

(1) Forecast accuracy is established as the sum of the absolute values of the forecast error on an hourly basis in proportion to the energy injected.

Resource use and waste management

The production of a service normally does not require significant material inputs, and thus does not entail the processing of a significant quantity of waste. The transmission service is no exception with regard to materials that enter and exit the production cycle. The most significant kinds of consumption regard energy and have already been discussed in the "Energy consumption" section.
However, the transmission service requires the construction and maintenance of a large stock of capital goods, mainly electric lines (pylons, conductors, insulators), transformation stations (transformers, switches, other equipment), and control systems.
Therefore, both Terna's resource use and its waste management regard mainly the construction and maintenance of electric and IT infrastructure.

Resources

EN1
EN2

As far as materials are concerned, Terna does not use raw materials, but electrical equipment and other components that it combines for use in the transmission service. The following table – which is produced in this report for the first time and is therefore to be considered as still approximate – shows the main raw materials contained in the supplies used by Terna. The weight calculation is based on the quantity used, the average or typical weight of the single elements, and the share of raw materials contained. In some cases, the elements consist of a single raw material (for example, insulators consist 100% of glass or ceramic, terminals 100% of alluminium), while in other cases the main material has been estimated (for example, copper constitutes 60% of the weight of an ATR transformer). At the present time, information on the use of recycled material by the suppliers of the materials and equipment used is not available.

MAIN RAW MATERIALS USED IN TERNA S.P.A.'S SUPPLIES, TONS	2009
Porcelain	494
Polymeric	258
Copper	2,628
Alluminium	2,224
Steel	6,496

The main material consumed in office work is paper.

PAPER CONSUMPTION - ITALY, TONS	2009	2008
Paper	52.8	53.3

Paper consumption regards the quantity purchased. The recording boundary is more inclusive than in 2008 and now includes all 8 operating areas with their main offices, with the exception of the head office, in Rome. The current figure is therefore lower than Terna's total consumption, which the Company plans to record completely for 2010, thanks to the completion of its recording scope.

Terna shifts to ecological paper

EN2

At the end of 2009, Terna introduced the use of ecological paper for printing in its offices, beginning with its head office. This action is part of the Company's commitment to encouraging the proper use of environmental resources, among other things by choosing supply sources that ensure respect for nature and sustainability over time.
The paper chosen is the Mondi Triotec IQ Premium, white paper that is similar to non-ecological paper and is obtained with a TCF pulp and thus without any chlorine whatsoever. Its porosity allows high-quality printing, including colour. Most importantly, it is certified by the FSC (Forest Stewardship Council – www.fsc.org), which guarantees that the forests from which the cellulose comes have been managed according to sustainability criteria from the point of view of both the environment and human rights. The company that produces it, the multinational Mondi Group, was founded in 1967 in South Africa and has received the most important international certifications. The company is also accredited by the FSC with the COC (Chain of Custody) 1180, which guarantees a production process by checking the origin of its raw materials. The choice of this new paper is part of the good practices that Terna is implementing for a correct use of resources. In 2010, the Company will publish the percentage of total purchases of paper constituted by ecological paper.

EN8 Water is not part of the production cycle of electricity transmission and dispatching. The water used for cleaning and personal hygiene in Terna's offices normally comes from connections to waterworks. The increase in consumption in 2009 reflects mainly the improvement in recording procedures begun in 2008, but also a leak in a pipe in one of the Company's regional offices.

WATER CONSUMPTION, CUBIC METRES	2009	2008
Group	158,942	105,851
Italy	158,942	98,041

EN22 Waste

Much of Terna's waste is recovered for productive recycling. **Only a small part is delivered for dumping**, and thus entails an environmental impact. In effect, **83.0% of all waste is recycled**.

WASTE BY CATEGORY (1) - GROUP, TONS	2009	2008
Waste produced	**7,053.3**	**8,023.7**
hazardous	3,995.7	4,011.4
non-hazardous	3,057.5	4,012.3
Waste delivered for recycling	**5,856.3**	**7,272.6**
hazardous	3,322.0	3,618.6
non-hazardous	2,534.4	3,654.0
Waste delivered for dumping (2)	**1,043.1**	**751.1**
hazardous	630.9	392.8
non-hazardous	412.3	358.3

WASTE BY CATEGORY (1) - ITALY, TONS	2009	2008	2007
Waste produced	**7,053.3**	**8,010.7**	**4,562.9**
hazardous	3,995.7	4,009.6	1,793.0
non-hazardous	3,057.5	4,001.2	2,769.9
Waste delivered for recycling	**5,856.3**	**7,270.6**	**3,960.8**
hazardous	3,322.0	3,616.8	1,560.6
non-hazardous	2,534.4	3,653.8	2,400.2
Waste delivered for dumping (2)	**1,043.1**	**740.2**	**602.1**
hazardous	630.9	392.8	232.4
non-hazardous	412.3	347.4	369.7

(1) Only waste that is part of the production process is included. Waste produced by service activities (urban waste) is not included. Also excluded is waste belonging to the "excavated earth and rocks" and "liquid sewage" categories deriving from the same, because they have – especially in large quantities – exceptional characteristics connected with particular civil works carried out in stations and would make the data series non-homogenous. The inclusion of these two items would have led to the following results in 2009: total waste produced: 23,106 tons, of which 4,041 tons were hazardous waste and 19,065 tons were non-hazardous waste.

(2) The figures on the waste delivered for dumping in 2009 are the result of an accurate collection of the data and may differ from the simple difference between waste produced and waste recycled – the calculation criterion adopted in 2007 and 2008 – because of the temporary storage of waste straddling the two years (i.e. part of the waste recycled or delivered for dumping in 2009 may have been produced in 2008).

Like the resources used, the waste concerns mainly from the upgrading and maintenance of the electric infrastructure.

The **main non-hazardous special waste produced** by Terna's operations consists of:

- **metallic waste** (about 65% of the total) from the dismantling of **transformers, electrical equipment, and machinery** (for example, generating units) no longer used, of which more than 90% is recycled;

- **glass and ceramic** (about 14% of the total) from the dismantling of insulators (materials used to insulate conductor cables from pylons) no longer used, of which more than 90% is recycled;
- **wood** (about 10% of the total), mostly from the packaging of the materials purchased, of which more than 80% is recycled.

The main hazardous special waste produced by Terna's operations consists of:
- **metallic waste** (about 68% of the total), contaminated by hazardous substances, from the dismantling of **transformers, electrical equipment, and machinery** no longer used, of which more than 90% is recycled after outsourced treatment;
- **batteries** (lead and nickel, about 5% of the total), which enable generating units to be turned on to keep the service of transforming and transporting electricity in operation during black-outs and 100% of which are recycled;
- **dielectric oils** for insulating transformers (about 34% of the total) replaced following periodical maintenance checks, of which about 60% is recycled. This percentage is lower than in the other cases because it also includes the oils mixed with rain water in the collection vats, which cannot be recycled.

The waste delivered for dumping mainly consists of materials stemming from the maintenance and cleaning of plants (slush, oily emulsions, and rags containing oils and solvents) and insulation materials containing asbestos, which cannot be recycled. These items account for about 75% of the total delivered for dumping.
For the details regarding the quantities and categories, see the tables of indicators.

Disposal of equipment containing oils with PCBs

EN1

Polychlorinated biphenyls (PCBs) were used all over the world as insulators in transformers and other electronic equipment, because they were an effective alternative to inflammable mineral oils. However, subsequent studies showed that PCB is endowed with an extraordinary bio-resistance that can have dangerous effects on living organisms. Legislative Decree no. 209/99, the CEO 10-38 standard, the guidelines of the Ministry of the Environment, and EU Law no. 62/05 introduced the obligation to declare the quantity of oils contaminated with PCBs one possesses and established the procedures and time frame for their disposal.
In compliance with this provision, Terna currently has a disposal programme summarised in the table below. As a result of this programme, the Company has no equipment containing oils with more than 500 ppm of PCBs. The quantity of oils contaminated by PCBs with concentrations between 500 ppm and 50 ppm remained almost the same as in 2008 because of the essential coincidence of the disposal of oils and equipment contaminated by PCBs and the acquisition of new assets containing equipment contaminated by PCBs. The disposal plan for 2010 has been changed. The original objective of reducing the quantity of oil with PCB concentrations between 50 and 500 ppm to less than 100,000 kg has been made more ambitious. The new goal for 2010 is to reduce the quantity to below 20,000 kg.

	kg of oil			
	2009	2008	2007	Disposal plan
Concentration of PCB				
PCB > 500 ppm	-	4,461.00	4,461.00	All disposed of by end of 2009
PCB > 50 ppm and ≤ 500 ppm	131,852.00	131,520.00	257,642.00	Quantity reduced to < 20,000 kg by end of 2010

EN30 Costs for the environment

Terna's commitment for the environment is shown in the costs incurred for environmental reasons, as both capital and operating expenditure. The year 2009 is the first one for which environmental costs are presented separately, on the basis of the definitions described below, by aggregating the information inferable from the Company's general and industrial accounting.

Accounting method

Environmental costs are identified in the first place on the basis of the available definitions, in particular those of the National Statistics Institute (Istat), Eurostat, and the GRI, as well as the recommendation of the European Commission regarding the recording and publication of environmental information in annual accounts and management reports (Recommendation no. 2001/453/EC). According to this recommendation, "the term 'environmental expense' includes the cost of actions undertaken by a company, directly or indirectly, in order to prevent, reduce, or repair damage to the environment caused by its operations. The costs in question include, among other things, waste disposal and measures aimed at preventing its creation, protection of the soil and of both surface and underground water, protection of the air and the climate from pollution, the reduction of acoustic pollution, and the safeguard of biodiversity and the landscape".

In the second place, the aforesaid definitions were cross-checked with the environmental aspects that were considered significant (for example, station noise, electro-magnetic fields) by the Company's ISO 14001 certified Environmental Management System, to identify Terna's operating and investing activities with environmental significance in the main corporate processes.

Many of Terna's activities described in this report entail expenses for the environment. However, several limitations were introduced in determining the reporting boundary:

- exclusion of integrated costs; that is, regarding activities that do not have an exclusively environmental purpose (for example, the use of pylons that, among other things, are innovative from the point of view of their environmental suitability);
- exclusion of the additional costs of restrictions and requirements for the safeguard of the environment in the stage of planning and designing new lines (detours, putting lines underground).

Other conditions were that the costs had to be a) significant, b) consistent with the reporting of the annual accounts (clear distinction between operating and investment costs), and c) directly identifiable by the existing corporate accounting system. The last condition satisfies the requirement of minimising the use of estimates based on analyses that are not part accounting.

Costs for the environment: first valuation for 2009

In the light of all this, the following table constitutes the best representation of the costs incurred by Terna for the environment in 2009.
These costs exclude expenses regarding internal resources and consider only expenses for external purchases. An exception is the item "Environmental activities - existing infrastructure", which instead includes the costs of internal personnel.

It should be noted that – according to the method adopted and the notes to the table – the environmental costs shown are a subset of the total environmental costs actually incurred, as explained above.

The costs shown in the table regard Terna S.p.A. The investment in SunTergrid's photovoltaic project is not included.

2009 ENVIRONMENTAL COSTS - INVESTMENT AND OPERATING COSTS, TERNA S.P.A., MILLIONS OF EUROS

Investment	
Environmental compensation [1]	28.9
Environmental impact studies [2]	0.4
Enviornmental activities - new infrastructure [3]	2.8
Environmental activities - existing infrastructure [4]	7.8
Demolitions [5]	2.7
Total investment	**42.6**

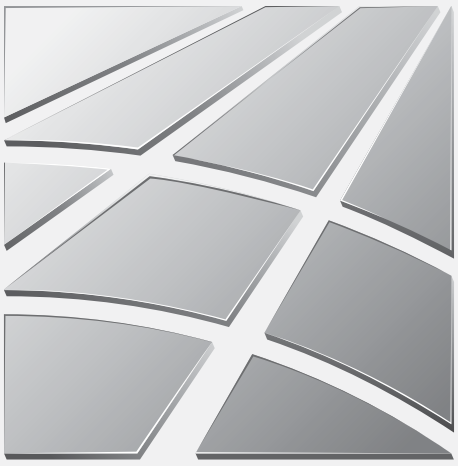
Costs	
Costs for environmental activities [6]	9.0
Total operating costs	**9.0**

(1) Sums spent on compensation for works included in the Grid Development Plan, as established by special agreements entered into with local institutions. These are recorded as investment when the commitment is undertaken, i.e. when the agreement is signed, while the cash flow depends on when the authorisation is granted and the work is done.
(2) Environmental impact studies regarding the infrastructure provided for by the Grid Development Plan that is being constructed and is awaiting authorisation by the relevant government agencies.
(3) The sum in question is an estimate. The analysis of several large investment projects showed that at least 1% of the total expense of the project was constituted by environmental items, usually stemming from requirements (for example, masking with trees, acoustical barriers, installation of dissuaders for birdlife, environmental monitoring, and analysis of excavated earth and rocks). Therefore, a value amounting to 1% of all 2009 investment costs has been considered for similar projects.
(4) Expense for adapting existing infrastructure to requirements and new provisions of the law regarding the environment (for example, noise, visual aspects, and the landscape).
(5) Cost for the definitive dismantling of lines as part of rationalisation projects. The figure for 2009 shows only the sum for the most significant demolition (Val d'Ossola), because isolating the sums involved solely in demolitions requires an analysis beyond accounting.
(6) Work regarding cutting plants, cutting grass, and waste management. These cost items – the only ones that at this time can be identified directly by industrial accounting – do not include all the environmental operating costs, but do constitute the largest part of them.

“THANKS TO THE TERNA PRIZE FOR CONTEMPORARY ART, WE OFFER UP-AND-COMING ARTISTS INSTRUMENTS FOR GROWTH AND AN OPPORTUNITY TO MAKE A NAME FOR THEMSELVES.”

Francesco Carderi
Branding, Events, and Image

2009



Social responsibility

Terna

OUR PEOPLE

Our approach

Human resources play a crucial role in Terna's business. It is people who have the distinctive technical, rare, or unique expertise in the field of electricity that enables Terna to perform its duties as well as possible, with a high level of professional competence and operating efficiency and to implement the Company's strategy and achieve its objectives. Diligence in renewing these capabilities constitutes an essential element of Terna's managerial approach to human resources. Just as important is another element: the concern for occupational safety required by operating activities characterised by particular risks, such as tasks performed at heights of many metres from the ground and maintenance work on high-voltage lines.

Over time, the importance of these aspects has led to an approach based on:
- concern for the safety of employees and the prevention of injuries to them;
- management and development systems aimed at improving performance and developing individual capabilities;
- investment in training to enable the Company and its employees to grow;
- pay and welfare policies aimed at aligning individual performance with the Company's goals and providing economic security for employees and their families;
- a well-organised system of industrial relations based on the involvement of the trade unions in numerous aspects of corporate life;
- listening to employees through surveys of their opinions.

Policies regarding the personnel are established by the Human Resource and Organisation Department, while resource management is also entrusted to the heads of the other departments. The Safety Department is responsible for matters regarding safety.
Until they were sold, Terna's Brazilian subsidiaries were also managed according to the approach described.
As far as relations with employees and the unions are concerned, see the section on stakeholder engagement, in addition to the following pages.

LA1 LA2 LA13 Personnel composition and changes

After a period of growth, the Group's personnel decreased in 2009. This reduction was essentially the result of, on the one hand, the sale of the Brazilian companies and, on the other, a larger than expected number of terminations at the end of the year, which will lead, among other things, to a larger number of hires in 2010. This result is in line with the Company's plans, which provide for – after a period of consolidation of the organisational structure begun in 2006 (+136 employees in Italy between the end of 2005 and the end of 2008) – a gradual increase in efficiency, on which see the box on "The management of generational change". Retirement is by far the most important cause of employee terminations, which are concentrated among the oldest workers. The turnover rate for spontaneous resignations is very low (0.7%), while the overall turnover rate reflects mainly retirements. In 2009, the average number of years worked in the Company at the time of retirement was 32.

AVERAGE LENGTH OF EMPLOYMENT OF EMPLOYEES LEAVING THE COMPANY [1] - ITALY [2]	2009
Total terminations	32.3
Men	33.0
Women	25.5
Less than 30 years old	1.0
Between 30 and 50 years old	8.6
Over 50 years old	34.1

(1) In the case of employees who entered Terna following acquisitions, the length of employment takes into account their employment at the company acquired.
(2) This information was compiled for the first time in 2009. Therefore, the data regarding Brazil are not available.

For the sake of completeness, it should be noted that as of December 31, 2009 Terna S.p.A. had 33 temporary workers – 15 in 2008 and 20 in 2007 – who were employees of an agency. Although they are not employees of the Company, they were included in Terna's activities for a pre-established period and fall under the G3 definition of "total workforce" as "supervised workers". These individuals are excluded from the personnel data shown in the table. In Italy, the reduction in the percentage of fixed-term workers (from 4.8% to 2.1%) reflects the movement to permanent status of employees who had been previously covered by beginner contracts, which have a pre-established term at the end of the period of training and professional integration.

PERSONNEL CHANGES - GROUP	2009	2008	2007
Total employees	**3,447**	**3,734**	**3,602**
Boundary change	-210	-	-
Employees hired during the year	57	279	330
Employees who left during the year, including	134	147	165
men	*122*	*134*	*155*
women	*12*	*13*	*10*
less than 30 years old	*1*	*13*	*9*
between 30 and 50 years old	*8*	*32*	*17*
over 50 years old	*125*	*102*	*139*
Termination turnover rates [1] (%)			
Total	**3.8**	**4.1**	**4.6**
Men	3.5	3.7	4.4
Women	0.3	0.4	0.3
Less than 30 years old	0.0	0.4	0.3
Between 30 and 50 years old	0.2	0.9	0.5
Over 50 years old	3.6	2.8	3.9

(1) The turnover rates show the ratio of terminations to the number of employees as of December 31 of the previous year, adjusted to take into account the sale of the Brazilian companies.

PERSONNEL COMPOSITION - GROUP	2009	2008	2007
Total employees	**3,447**	**3,734**	**3,602**
By contract category			
fixed-term	*3,374*	*3,568*	*3,469*
permanent [1]	*73*	*166*	*133*
By employment category			
full-time	*3,417*	*3,708*	*3,572*
part-time	*30*	*26*	*30*
By gender			
men	*3,092*	*3,344*	*3,239*
women	*355*	*390*	*363*
By age			
less than 30 years old	*393*	*412*	*375*
between 30 and 50 years old	*1,553*	*1,467*	*1,738*
over 50 years old	*1,501*	*1,855*	*1,489*

(1) "Fixed-term contract" comprises beginner and other fixed-term contracts in effect at the end of the year.

PERSONNEL CHANGES - ITALY	2009	2008	2007
Total employees	**3,447**	**3,524**	**3,495**
Employees hired during the year	57	155	280
Employees who left during the year	134	126	152
men	*122*	*119*	*144*
women	*12*	*7*	*8*
less than 30 years old	*1*	*6*	*5*
between 30 and 50 years old	*8*	*21*	*11*
over 50 years old	*125*	*99*	*136*
Termination turnover rates [1] (%)			
Total	**3.8**	**3.6**	**4.4**
Men	3.5	3.4	4.1
Women	0.3	0.2	0.2
Less than 30 years old	0.0	0.2	0.1
Between 30 and 50 years old	0.2	0.6	0.3
Over 50 years old	3.6	2.8	3.9

(1) The turnover rates show the ratio of terminations to the number of employees on December 31 of the previous year.

PERSONNEL COMPOSITION - ITALY	2009	2008	2007
Total employees	**3,447**	**3,524**	**3,495**
By contract category			
permanent	*3,374*	*3,358*	*3,362*
fixed-term [1]	*73*	*166*	*132*
By employment category			
full-time	*3,417*	*3,498*	*3,465*
part-time	*30*	*26*	*30*
By gender			
men	*3,092*	*3,165*	*3,154*
women	*355*	*359*	*341*
By age			
less than 30 years old	*393*	*409*	*343*
between 30 and 50 years old	*1,553*	*1,609*	*1,681*
over 50 years old	*1,501*	*1,506*	*1,471*

(1) "Fixed-term contract" comprises training, beginner, and other fixed-term contracts in effect at the end of the year.

To facilitate the interpretation of several indicators regarding the composition of the personnel, the following table shows the breakdown of Terna S.p.A.'s employees by professional category as of December 31, 2009.

PERSONNEL COMPOSITION BY CATEGORY - ITALY	2009
Senior executives	65
Junior executives	488
White-collar workers	1,874
Blue-collar workers	1,020
Total	**3,447**

In 2009, 336,600 days were worked by **employees of contractors on works on behalf of Terna**, the equivalent of 1,530 full-time employees (FTE), mainly blue-collar workers. The increase with respect to 2008 was due to the growth of investing activities. These data take into account the duration of work contracts, as well as the variability of the use of workers therein, and regard all of Terna's work contracts, from the worksites of large-scale construction work to the cutting of vegetation under electric lines. The days worked and the FTE were estimated on the basis of the average daily presences in the major worksites and the sums paid for contract work in the minor sites.

EMPLOYEES OF CONTRACTORS AND SUBCONTRACTORS - ITALY	2009	2008
Days worked	336,600	251,994
Full-time equivalent	1,530	1,145

EU17

EU14

EU15

EU21

The management of generational change

In the next few years, one of the main issues regarding Terna's human resources will be generational change. The age of many employees and the number of years they have worked at the Company will automatically lead to their retirement or make it possible for them to do so voluntarily.

AUTOMATIC AND POTENTIAL TERMINATIONS IN THE FIVE-YEAR PERIOD 2010-2015 - ITALY	2009
Senior and junior executives and white-collar workers	508
Blue-collar workers	296
Total	**804**

Potential retirements regard employees who, during the year, reach a combination of age and years of contributions that allows them to receive a pension, albeit possibly reduced, if they retire. There is no certainty that these employees will actually retire, but considering them together with the automatic terminations (upon turning 65) is a prudent choice. In effect, even in the recent past many employees have chosen early retirement. Above all, the number (23%) is significant to the total workforce and requires the Company to take appropriate measures in advance to ensure that it has the necessary resources and capabilities. Then there is the fact that, in any case, the potential retirements of the five-year period 2010-2015 become automatic retirements if the time window is enlarged. It is certain that in the decade 2010-2020, 1,082 employees (31%) will retire.

Terna has already taken a number of measures for managing the generational change. For example:

- the transmission of knowledge and experience, often specific to Terna, has been enhanced by the organisation of courses taught by in-house experts, for which see the section on training below, and in particular the "Campus" part;
- in 2009, a process was started up to identify and develop resources who could replace employees who currently hold key managerial positions.

It should also be noted that new resources with more years of schooling will make it possible to carry out current activities more efficiently (see the following section on search and selection).

EU14 Search and selection

Together with employee training, the hiring of new personnel constitutes the main instrument for ensuring the renewal and updating of the capabilities necessary to achieve the corporate mission. Managed by the Human Resource and Organisation Department, the process of searching for and selecting personnel includes maintaining relations with schools, universities, business schools, and employment offices. To facilitate finding the necessary professional capabilities, Terna has entered into agreements with more than twenty major Italian universities so as to be in contact with a large reservoir of supply, which is also useful for the requirements of its regional offices. The agreements provide a framework for *post*-graduate internships and other activities, such as the writing of theses on Terna or related subjects. In this way Terna begins a relationship with resources potentially interested in subsequent employment at the Company. In 2009, there were 12 internships (37 in the preceding two-year period). The hiring of personnel from the external labour market regards mainly recent secondary-school and university graduates in technical subjects, of whom engineers constitute a large part. The replacement of employees with a low educational level (elementary or middle school) who have worked for a long time at the Company with young secondary-school and university graduates has entailed a gradual rise in the educational level of the personnel in service.

PERSONNEL COMPOSITION BY EDUCATIONAL LEVEL - ITALY

Percentage figures	2009	2008	2007
University degree	18.0	17.0	15.8
Secondary-school diploma	45.6	45.0	44.0
Vocational-school diploma	17.0	17.0	17.2
Elementary-/middle-school diploma	19.4	21.0	23.0

The FiGi project - Engineering Faculty and Large Enterprises

The FiGi project was created by the formalisation of a protocol of understanding between the School of Engineering of the University of Rome "La Sapienza" and several large enterprises with operations in Rome. Terna decided to participate in the project because it provides an opportunity to open a special channel for recruiting electrical engineers, which is particularly critical nationally and even more so in Rome. The protocol of understanding provides for stable and organised cooperation between the university and the enterprises for the development of training that is up to date and in line with the requirements expressed by the labour market. Through special sections of the dedicated site:

- companies can provide students with information regarding offers of apprenticeships, meetings and conferences, scholarships, and job offers;
- students can send their CVs to the companies involved in the project and keep them up to date, as well as applying to write theses or for apprenticeships.

The main channel through which applicants are recruited is the special **"Lavora con noi" section of Terna's website**, where whoever is interested can leave his or her CV and receive an automatic response regarding whether the application was filed correctly. In addition to online applications, Terna also examines the lists furnished by schools and universities and the applications collected during job meetings and career days. If necessary, employment offices are contacted and want ads are published in specialised magazines and on websites.

Direct contact with students can make an important contribution to recruiting. In 2009, the following were the most important occasions for meeting students:

- Politecnico, Milan, job meeting (May);
- La Sapienza University, Rome, School of Engineering, job meeting (May);
- Luiss University, Rome, Young People and Work (May);
- Bologna University, The Role of Electrical Engineers in the Management of the National Grid (May);
- Nomisma, Milan, energy career day (September);
- Milan University, career day (October).

The **methods and instruments of selection** are diversified according to the kind (neo, junior, middle, or senior) and number of resources sought. In general, for the selection of recent secondary-school and university graduates the Company uses the assessment center, a set of tests aimed at ascertaining if the applicant meets the requirements in terms

of motivation and behaviour, and interviews to check the level of technical and professional knowledge and capabilities. These interviews also involve the heads of the departments to which the newly hired will be assigned.
In line with the Company's policy of transparency and fairness in relations with its stakeholders, the selection process always ends with all the applicants being **informed of the results**, whether positive or negative.

Training

EU14

Together with research and the hiring of resources from outside, training plays an important role in ensuring the continuity and evolution over time of the technical, managerial, and soft skills necessary for the electricity service and, in general, the implementation of the Company's strategies.
Terna's training programmes are designed to provide employees – when they first come to work at the Company and throughout their professional career – the elements of knowledge and technical competence necessary to perform effectively the different corporate roles. Therefore, over time the programme adapts to the change in the educational level of the newly hired and the change in the requirements of capabilities and know-how necessary for the Company's organisation.
Beginning in 2008, training planning has been reshaped by the creation of "Campus - Experiences on the grid", Terna's Company University, which intends to leverage the wealth of knowledge possessed by managers and engineers in service to organise a transfer and updating of expertise to the new generation and colleagues in other departments. The Campus faculty consists of about 200 Terna employees – department heads, managers, experts in specific professional fields – who contribute as course planners, instructors, supervisors of projects entrusted to external persons, and local tutors in central projects, making it possible to transfer and share knowledge. At the same time, the in-sourcing of training and the sharing of knowledge facilitate the development of a sense of belonging and integration inside the Company. Campus will also have its own central seat, with numerous appropriate classrooms and instruments, at the Roma Nord – Marcigliana electric station on premises that are currently being renovated. The Viverone Training Centre will remain the reference point for instruction in safely for climbing up pylons, using life-size training pylons, and working on live wires.
In addition to exploiting the wealth of in-house knowledge, Campus has undertaken a number of initiatives for cooperation with universities, business schools, and leading external centres. Thus the supply of training for Terna's personnel is in line with the highest standards on the market.
The current training programme consists of four main areas: Education, Context & Business Model, Training, and Itineraries.
Education. The courses of the Education area are aimed at managerial and personal development, in the sense of the sphere of soft skills. The trends that emerged from the "People Satisfaction" climate surveys, which are summarised in the "Terna People Care" action plan, led to the initiation in 2009 of courses aimed at facilitating the introduction of the Company's new Global Performance System (GPS) and satisfying the need for further knowledge about the assessment process. During the same year a selection of junior executives had the opportunity to take a course of their choice at prestigious business schools on the subject of managerial development.
Another part of the Education area is the Development Center, which is based on a method combining development and training objectives. The Center drills the skills acquired and spurs participants to assume responsibility with respect to their Development Plan. The Development Center is dedicated to white-collar workers who are university graduates and perform professional tasks.
Context & Business Model. The purpose of this training area is to furnish knowledge on the business context in which Terna operates. An intense training campaign addressed to all personnel on the application at Terna of the new Unified Law on occupational health and safety and an online campaign dedicated to the new special part of the 231 Organisational Model regarding IT crimes also took place in 2009.
Training. This area is quantitatively the most important (73.5% of all hours in 2009, excluding those included in the Itineraries area) and is aimed at developing the specific technical and professional skills of different professional fields and the acquisition of general skills, such as foreign languages and office automation. The following were among the numerous specialised courses given in 2009:
- safety in contract work;
- safe driving and personal safety devices;
- refresher course on the Terna's electric-risk instructions (DPRET);
- alignment of the capabilities and work methods of Terna's 8 regional units;
- a course for the internal auditors of the quality, environment, and security management system and ISO 20000 IT systems;
- specialised courses for work on live wires.

Itineraries. These are medium- and long-term (18-36 months) training itineraries specifically dedicated to newly hired secondary-school and university graduates (Terna master's degree) or to professional targets in the same line of work – such as shift workers involved in the line control of the electric system – to align their skills, bring them up to date, and qualify them. They involve a mix of initiatives belonging to the three macro areas (Education, Context & Business Model, and Training).

LA10 The training numbers

PERSONNEL TRAINING - ITALY	2009	2008	2007
Total hours	164,416	186,654	146,787
Average no. hours of training per employee	47	53	43
Percentage of coverage (1)	91	96	98

(1) Percentage of employees who took at least one training course during the year.

AVERAGE NUMBER OF TRAINING HOURS, BROKEN DOWN BY EMPLOYEE CATEGORY - ITALY	2009	2008	2007
Senior executives	25	34	25
Junior executives	43	34	38
White-collar workers	45	55	37
Blue-collar workers	53	65	56

The data refer to Italy. For the years previous to 2009, the Italian data are in any case representative of the Group situation, given the small incidence (5.6% in 2008) of personnel in Brazil. For Brazil, the only figure available for 2008 is the number of hours of training per employee (60).

In 2009, the total number of training hours and the number per employee showed an increase over 2007 and earlier years, but fell with respect to the peak of 2008, when an extraordinary training campaign on safety (prevention of electric risk) was carried out. Training normally takes place in a classroom, in direct contact with instructors, while only a marginal part (1.2%) is entrusted to online courses.
In 2009, the training dedicated to newly hired employees through the Itineraries constituted 15.0% of total training. Most of the other courses (73.5%) were given in the Training area. The fact that, as in previous years, more than 90% of all employees were involved in training activities shows the extent of Terna's **commitment to continual training**.
The accounting cost of training – which in 2009 amounted to €389 per employee – is not an accurate indicator of Terna's investment in training. In 2009, only 39% of training hours were outsourced, while the remaining 61% was handled by the in-house faculty.

Development and management

Terna's system of developing and managing human resources is based on performance as an indicator to guide growth. The essential elements of the system consist in establishing the expected goals and behaviour, assessing the results, giving feedback, and implementing development and training actions. The system makes use of numerous instruments that have been available for some time at the Company, such as Balanced Scorecards and Management By Objectives (MBO) but its core is constituted by the Global Performance System (GPS), which was designed in 2008 and went into operation in 2009, accompanied by a training campaign addressed to all the personnel concerned.
The Global Performance System is based on a definition of performance containing two aspects. The first is the actual achievement of the pre-established objectives, while the second regards the organisational skills employed in achieving them. A specially developed IT system, which the employees involved can access individually, contains the objectives to achieve and the behaviour expected. This instrument stores the results of assessments and ensures that they can be traced over time. Assessment is carried out by the employee's direct supervisor and is validated by the latter's superior. It includes feedback, which is essential for orienting behaviour, highlighting strong points and areas that need improvement, and implementing development actions, such as training. The repetition in annual cycles of performance assessment enables the Company to monitor and assist the growth of its employees. The application of the GPS currently involves employees with managerial and professional responsibilities: all senior and junior executives (except shift foremen assigned to real-time grid control), as well as some white-collar workers.

Overall, 651 employees, amounting to 19% of all personnel, were involved in the assessment cycle started in 2009. Less structured forms of assessment are applied to blue-collar workers and other employees not included in the GPS, among other things because the requirements of their positions and the paths of professional growth are most closely determined by provisions of the collective bargaining agreement. LA12
Performance assessment is also entrusted to another instrument. Terna has had for some time a strategic control system based on the Balanced Scorecard model, through which the Company monitors its progress in achieving its strategic objectives in economic and managerial terms, including the main objectives regarding environmental and social performance.

Performance assessment is also linked to the payment of the variable parts of remuneration. In particular, Terna's top management participates in a Stock Option Plan adopted in December 2005, which was to end in 2010 and was then extended to 2013. Among other things, the adoption of this plan equipped the Company with an effective instrument for ensuring the loyalty of senior executives who hold the most important positions with regard to the achievement of strategic results. The long-term incentive (LTI) plans serve the same purpose. The three-year 2005-2007 Plan – which involved senior executives not covered by the Stock Option Plan – ended in 2008 and the 2008-2010 Plan, which is linked to corporate goals, was initiated for the top management and executives who hold key positions in the Company.
Performance objectives with annual horizons are the parameters for other variable-pay schemes. Management By Objectives (MBO) is reserved for corporate management and links the sum of individual bonuses to the extent to which objectives – both corporate and individual – have been achieved. The Company's objectives, including those regarding environmental and social performance – are established in connection with the Balanced Scorecard model.
Recognising the importance of widespread involvement of the personnel in implementing its programmes and projects on productivity and quality, Terna signed an agreement with the unions which regulates a corporate result-based bonus to incentivise labour productivity, on which also see the section on industrial relations.
The bonus constitutes a variable component of pay and has two aspects:
- "corporate profitability" linked to the Company's general performance and paid to all employees, except for senior executives;
- "productivity/quality incentives" linked to employee performance and paid to blue- and white-collar workers.

As in other large electricity companies, the employment terms of Terna's personnel – pay, working hours, vacations, and other aspects – are substantially better than the Italian average.
In particular, the following benefits are provided for all employees: LA3
- supplementary health insurance;
- supplementary pension fund (participation voluntary);
- non-occupational injury insurance;
- recreational associations;
- more extensive maternity rights than those provided for by the law;
- concessional loans for purchase of first home and serious family needs;
- cafeteria or meal vouchers.

The benefits are available to all employees once they have completed the trial period. Part-time employees and those with beginner contracts are also included. Insurance coverage for occupational injuries is regulated by law and extends to all employees. Terna provides better conditions for specific categories.
Furthermore, except for senior executives, Terna's employees receive automatic membership in the FISDE (Fondo Integrativo Sanitario per i Dipendenti del Gruppo Enel) supplementary health insurance fund. This fund organises prevention campaigns for its members which include preventive medical examinations and information sessions on the main health risks. Information and prevention campaigns have regarded the following subjects: LA8
- smoking;
- alcohol;
- tumors;
- cardiovascular diseases;
- ophthalmological diseases;
- disabilities.

Medical treatment of diseases is partly paid by the FISDE not only for members, but also for their dependent family members.

Beneficiaries	Education and training	Consultation	Risk prevention	Treatment
Employees	yes	yes	yes	yes
Employees families	no	yes	no	yes

LA13 LA14 Diversity and equal opportunity

Terna uses systems for selecting, developing, and paying employees that recognise and reward merit and performance. The Group's Code of Ethics explicitly forbids any kind of discrimination, beginning with their selection and integration in the Company.

The great majority of employees are men, because of a traditional scarcity of the supply of female labour in the more technical professions. However, the presence of women is increasing, partly as a reflection of a general trend in the labour market, with greater labour force participation by women. The percentage of women employees at Terna in Italy was 9.0% in 2005 and increased from 9.8% in 2007 to 10.3% in 2009.The growth also regards higher positions. The women who are senior or junior executives increased from 13.3% in 2007 to 15.7% in 2009.

During 2009, in Italy the percentage of newly hired employees who were women – excluding blue-collar workers – was 18.6%, higher than that of women already employed by the Company, again excluding blue-collar workers.

Several terms that are improvements on those provided for by the law and included in the collective bargaining agreement contribute to facilitate the employment of women at Terna. For example, salaries during maternity leave are higher than required by the law, both in the period of obligatory abstention from work (100% of the last salary payment instead of 80%) and in the period of optional abstention (45% in the first month, 40% in the second and third, and 30% in the next three, instead of 30% for 6 months).

The main indicators of the equality of opportunity between men and women show that Terna's management systems do not generate discriminatory treatment to the detriment of women. The main factor in the employment of women regards an outgoing flow that is lower than men's and an inflow that is considerably higher than men's.

Women are not penalised from the career point of view. Terna's development policies reward merit irrespective of gender. Pay also shows only limited differences for white-collar workers and junior executives, while for senior executives they are more significant, but decreasing.

Demonstrating its real concern for promoting the contribution of women, in 2009 Terna joined **Valore D**, an association founded by several women managers in a number of important Italian and multinational companies with the objective of creating synergy, increasing women's professional qualifications, and giving them more opportunity for representation in enterprises. In practice, the women present in these companies put their expertise at the disposal of the women in the member companies to foster the development of women's professional capabilities, as well as opportunities for networking.

EC7 Almost all of Terna's employees are Italian citizens, with only 3 having foreign citizenship. This fact shows how rooted Terna is in Italy's economy without any specific corporate policies in this regard, as well as the predominance of its Italian business even in the period, which ended in November 2009, when the Group had a stable presence in Brazil.

With regard to **employees who belong to protected categories (for example, differently abled persons)**, in Italy as of December 31, 2009 there were 114 (120 in 2008 and 109 in 2007). This figure is in line with the requirements applicable to Terna – in particular the Ministerial Decree of March 21, 1996 and the Ministerial Decree of May 15, 2000 – which provide for gradually increasing the employees in the protected category to 7% (a general legal obligation) by increasing their percentage of the newly hired.

Finally, the following table shows the composition of Terna's Board of Directors by gender and age:

COMPOSITION OF THE BOARD OF DIRECTORS - TERNA S.P.A.

Percentage figures	2009	2008	2007
Men	100.0	100.0	100.0
Women	0.0	0.0	0.0
less than 30 years old	*0.0*	*0.0*	*0.0*
between 30 and 50 years old	*44.4*	*66.7*	*40.0*
over 50 years old	*55.6*	*33.3*	*60.0*

EQUAL OPPORTUNITY, MEN AND WOMEN - ITALY [1]	2009	2008	2007
Women as % of total employees			
Women/total	10.3	10.2	9.8
Women/total, excluding blue-collar workers	14.6	14.6	14.2
Employment growth %			
Annual change, women	-1.1	5.3	5.2
Annual change, men	-2.3	0.3	0.1
Outflow %			
Outflow, women	3.3	2.1	2.5
Outflow, men	3.9	3.8	4.6
Inflow %			
Inflow, women	2.2	7.3	9.0
Inflow, men	1.6	4.2	4.8
Employees in executive positions %			
Women executives/total women	2.8	2.8	2.9
Men executives/total men (excluding blue-collar)	2.7	2.6	2.8
Promotions [2]			
Promotions to junior executive as % of original category, women	1.5	3.0	1.2
Promotions to junior executive as % of original category, men	1.2	1.2	1.0
Pay difference men/women [3]			
Senior executives	1.27	1.40	1.31
Junior executives	1.09	1.10	1.1
White-collar workers	1.07	1.07	1.06

(1) The information available for Brazil are limited to the ratio between base pay for men and women of white-collar workers, amounting to 1.23 in 2007 and 1.56 in 2008.
(2) Promotions from blue-collar to white-collar worker and from junior to senior executive are not considered because their number is not significant on a yearly basis. The figure is determined by the ratio between the promotions to junior executive that took place during the year and the number of employees classified as white-collar workers in the previous year, calculated by category (men/women). Promotions from blue-collar to white-collar worker and from junior to senior executive are not considered, because their number is not significant on a yearly basis.
(3) The figure is determined by the ratio between the annual base pay of women for the different categories to which they belong. The figure was not calculated for blue-collar workers, because there are no women employees in that category.

Internal communication

Terna recognises the essential role of internal communication in facilitating the exchange of information, fostering integration and teamwork, and speeding up processes. By now, the corporate intranet – the mechanism for the cascade dissemination of team briefings – and Terna News, the house organ, are consolidated instruments. Among the initiatives carried out in 2009, the following should be noted.

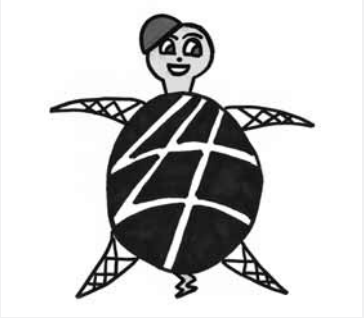
From left to right: Umberto Colonna, Head of Infrastructure Maintenance; Luigi Roth, Terna's Chairman; Gianni Armani, Head of Operations Italy; Sonia Bini, who received an award in Florence for her 35 years of service.

- **Celebrations of 25 and 35 years of service.** After being suspended for many years, Terna started celebrating employees who have completed 25 and 35 years of service again. A celebration format was developed which was then adopted by the Company's 8 regional offices with local adaptations. The over 800 employees celebrated received a commemorative medal produced according to a design by their colleague Edi Driutti, who works in the Padua office. Chairman Luigi Roth participated in all the events to personally present the medals and thus highlight the importance to the Company of its human resources. Other representatives of the Company's top management, as well as the employees' families, attended the events. A book of photographs of the "2009 Loyal Employees" was produced and given to all the employees concerned.

- **The "Welcome to viale Galbani" project"**. When the new head office on viale Galbani in Rome – on which see the "A new sustainable head office" box – was inaugurated, the approximately 600 employees assigned to it were driven there and welcomed to the new building by a dedicated communication programme. A few official announcements by the management and numerous posts on the intranet and in the periodical Terna News started things off and kept the employees up to date on the final work being done to put the finishing touches on the new office. At the same time, a virtual desk was opened to answer e-mails requesting information and an application produced with Google Map enabled employees to get to know the neighbourhood around the building, as well as to identify the best routes to get there. When they arrived at the new office, all employees received a welcome kit and were called in small groups by their department heads to receive a briefing on the practicalities of the building. The whole project constituted a prototype for transfers of Terna employees to a new office.

- **A coordinated image of Terna.** 2009 was also an important year from the point of view of the results obtained regarding the construction of the Company's identity and image. In effect, the coordination of the visual instruments for internal and external use was completed. These constitute the "dress" in which the Company presents itself and respond to the need to systematically apply the new corporate trademark in all its expressions and to create a consistent structure of identity and image. The actions involved form design, stationery, publications, events, dress, promotional material, and the decoration of the regional offices, with the objective of ensuring a recognisable and appropriate institutional image of Terna by communicating its values, its history, and its objectives with immediacy.

- **The second annual "CreativInTerna" internal photography and drawing competition.** In 2009, the theme of the competition – which is dedicated to employees (photography) and their children (drawing) – was the "Transmission of Values". There were more entries than in the first edition, with 195 photographs (twice as many as in 2008) and 56 drawings (three times as many as the year before). The judges – Terna's Chairman, Luigi Roth, and figures from the world of art and photography – selected the winners, whose works were used for corporate material (2010 engagement books and calendars) and reproduced in prestigious publications. The children's drawing competition focused on the value of safety and the entrants were requested to conceive an imaginary character that would become **Terna's safety mascot**. The winning drawing was inspired by turtles and will be used in all the Company's initiatives on safety.



"Ternaruga" by Sofia Colnaghi.

- **We:Me Meeting.** Among other things, the fourth annual meeting of all of Terna's senior and junior executives discussed questions regarding values, ethics, and sustainability.

Occupational health and safety

EU16

Terna's commitment to safety has to be understood **in the context of the existing regulations**. Although Italian law regarding safety was already strict, Legislative Decree no. 81/2008 ("Consolidation Act regarding the safeguard of occupational health and safety"), which went into effect on May 15, 2008, made it one of the most rigorous in Europe. The obligations of companies concern numerous matters: training, risk analysis. Identification of the responsibility chain starting with the employer, protective procedures and devices, supervision of work, including work entrusted to contractors and subcontractors. Among the most important aspects of the new decree is the obligation to carry out an analytical assessment of the risks regarding the health and safety of workers. This assessment must regard not only the specific risks of single jobs, but especially those stemming from the interferences of the work of contractors and subcontractors for all the operations that constitute the work process of the worksite. Risk analysis must be performed by an expert. The costs of eliminating or attenuating interference risks are excluded from economic competition to present the lowest price to win tender awards.

In this situation, Terna's concern for occupational safety is based on the following elements.

- **Clear guidelines for safety policy.** The importance of safeguarding the safety of people is emphasised in Terna's Code of Ethics, which identifies the fundamental principles that everyone, at all organisational levels, must follow so that policies, procedures, technologies, and knowledge contribute to the awareness and prevention of risks. The Company's Occupational Safety Policy – which is an integral part of its Integrated Quality, Environment, and Safety Management System – specifies the guidelines of the Code of Ethics, stressing in particular the importance of continual training and cooperation with the relevant bodies in order to improve. The commitment to promoting the prevention of injuries for all employees, including those of contractors, is also made explicit.
- A **Safety & Security portal** on the corporate intranet containing a complete and up-to-date file of legislation on occupational safety (Italian national and regional regulations, as well as technical regulations issued by competent bodies). The portal also provides access to an online consulting service to help users interpret regulations and audit the related application procedures, as well as a file of auditing programmes and the related results.
- An **organisational entity responsible for safety** with a central office (Corporate Safety Department) and local heads in the regional offices and on worksites. As provided for by the law, employers – including the heads of the regional operating areas – have an unlimited power of attorney for expense regarding occupational safety. **In 2009**, the Company started an organisational revision that includes the introduction of new roles – Corporate Safety Monitors – as local representatives in the 8 regional areas of the Corporate Safety Department. The new figures will work with the local heads of the Regional Operating Areas and of Safety, Prevention, and Protection and will have the task of checking that corporate policies and instructions are correctly implemented by monitoring everything regarding safety, including worksites and contract work. At present, there are Corporate Safety Monitors in 4 Regional Operating Areas and it is expected that all 8 of them will be covered by the end of 2010. The new organisational structure will lead to even greater attention to occupational safety and the Company's ability to control the safety aspects of operating activities.
- A **management system** that obtained **OHSAS 18001 certification** in 2007. The system is integrated with the quality and environment one and is based on careful risk mapping. Elaborated by the employer and the head of Safety, Prevention, and Protection and checked by the competent doctor, the Risk Assessment Document highlights the seriousness of specific risky events for every single role and task performed by Terna's employees and the probability that they will occur. The management system consists in a systematic and detailed collection of **operating procedures and instructions** for all activities regarding safety (training, work methods, use of individual protection devices), with greater detail for activities entailing electric risk (provisions for the prevention of electric risk) or off-the-ground work (methods for climbing up pylons). The documents of the management system can also be accessed through the corporate intranet.
- **Close supervision.** In addition to constant supervision by employers, the full and correct application of procedures is also subject to two inspections a year by the head of Safety, Prevention, and Protection, as well as **internal audits** of conformance, in every Regional Operating Area. The **external audits** for certification confirmation contribute to raising the level of attention to compliance with behavioral rules and to safety issues, as do the elected representatives of the employees entrusted with the task of checking the application of regulations (on which see the LA6 indicator). In 2009, a new initiative was started up to monitor – with the assistance of an external specialised company – the approximately 100 most important worksites with work being done on behalf of Terna. Specifically, during 2009 33 worksites were monitored, with 3 follow-up inspections, and this activity was intensified in the first few months of 2010, with about 70 worksites having been monitored so far. The purpose is to check that all the formal and substantive requirements regarding safety are satisfied and to produce monitoring reports that are useful for improving the system and ensure its alignment with the best management practices.
- Intense, continual **information and training**. All employees are informed of the main ideas and innovations regarding safety through different channels, including the corporate intranet and the organisation of briefing sessions. The annual

training programme always includes both courses at the general Company level and specific supplements at the regional level, based on risk analysis. The courses cover all safety issues, from regulatory innovations to operating instructions for all risky tasks, such as off-the-ground work and the use of personal safety devices. In particular, several kinds of equipment in the **Viverone Training Centre, in Turin province**, allow employees to be trained in climbing up pylons safely through the use of life-size training pylons and in work on live wires in a controlled environment. Among the activities carried out in 2009, special mention should be made of the first **Safety Day**, which involved all the Company's employees with the goal of explaining the most recent changes in the law and maintaining a high level of awareness among all the personnel regarding safety issues. During Safety Day the new "Occupational Safety Manual" was distributed to all employees and was then also made available on the corporate intranet.

- The inclusion of **occupational safety performance objectives** in the set of indicators to which the variable pay of the departments concerned is linked (Corporate Safety, Human Resources and Organisation, Infrastructure Maintenance). The management system is based on the objective of continual improvement, with annual goals to be achieved. Among other things, it includes the monitoring of injuries and the analysis of the causes becomes an input in devising corrective actions.
- **Applied research**: a special organisational unit of the Engineering Department experiments with safety materials and devices, testing their reliability through resistance trials in extreme conditions.

The "**Context analysis and identification of incentives to foster safe occupational behaviour**" project has also started in 2009. Scheduled for completion in 2010, the project aims to find out what employees think and feel with regard to safety. The objective is to enable bottom-up ideas to express themselves and to exploit incentives that could lead to safer occupational behaviour. Studies on this subject show that the human factor is decisive in occupational injuries. Therefore, in addition to making equipment and work environments safer, Terna wanted to observe the work habits of its employees in order to propose strategies that could lead to changes and reduce accidents. The survey was conducted through about 150 anonymous interviews of employees, carried out by sampling in 5 technically and geographically representative regional areas.

In addition to the introduction of the aforesaid innovations – Corporate Safety Monitors, worksite monitoring, Safety Day, the safety manual, and the safety survey – in 2009:

- OHSAS 18001 certification was confirmed;
- in compliance with the law, the heads of Safety, Prevention, and Protection and of Regional Operating Areas carried out about 133 inspections and the competent doctor inspected about 263 workplaces;
- six internal audits were performed at the regional level, each of which engaged three auditors for three days;
- periodical preventive medical examinations were performed, including for atypical workers, as provided for by Legislative Decree no. 81/08;
- 46,537 hours of training were dedicated to safety.

HOURS OF TRAINING ON HEALTH AND SAFETY - ITALY	2009	2008	2007
Senior executives	232	207	143
Junior executives	2,781	3,122	2,084
White-collar workers	18,781	28,265	14,622
Blue-collar workers	24,743	38,875	29,567
Total	**46,537**	**70,469**	**46,416**

Much attention was dedicated to occupational safety in the supply chain, with particular regard to the **contractors** that do work on worksites on behalf of Terna. Among the safety measures introduced or made more stringent by Legislative Decree no. 81/08 – on which see the "Relations with suppliers" section of the economic responsibility chapter on pages 87-89 – are those regarding contract work to construct electric overhead lines and stations, for which Terna requires a declaration stating that all the personnel on the worksite has been trained and informed with regard to the use of the individual protection devices, as well as to the risks identified in the Company's Worksite Safety Plan (PSC) and Operating Safety Plan (POS).

For several jobs – such as workers assigned to the installation and maintenance of lines, cutting vegetation, and painting, as well as foremen and safety heads – Terna requires additional certification that they have received training (ranging from 24 hours in some cases to 32 hours in others) for the specific role they perform, conceived in cooperation with training institutes specialised in the field of electricity and SINCERT certified.

During its supplier qualification process, finally, Terna requires documentation of the procedures adopted by the company for the safeguard of the health and safety of its workers.

Occupational injuries

LA7

In 2009, the injury indicators showed improvement with respect to 2008. Because the phenomenon practically did not exist, the occupational disease rate is not available. No fatal occupational injuries were recorded, nor was it definitively established in 2009 that the Company was in some way liable for any fatal or serious accidents that had taken place in previous years. It should be noted that no occupational injuries occurred at Terna's Brazilian subsidiary, Terna Participações, in the three-year period 2007-2009.

OCCUPATIONAL INJURIES [1] - ITALY, TERNA EMPLOYEES	2009	2008	2007
Injury rate	1.21	1.72	1.45
Lost-day rate	40.0	329.1	51.2
Absentee rate [2]	8,101	9,442	10,381
Number of accidents	36	50	40
fatal	*0*	*1*	*0*
serious	*0*	*1*	*0*

(1) The definitions adopted are those of the International Labour Organisation (ILO):
- Injury Rate - This is the number of injuries entailing abstention from work for at least one day divided by the number of hours worked during the year, multiplied by 200,000, which corresponds to 50 weeks of work * 40 hours * 100 employees.
- Lost Day Rate - This is the ratio between the days not worked because of injury and the number of hours worked during the year, multiplied by 200,000. The days are calendar days and are counted from the day on which the injury occurred.
- Absentee Rate - This is the number of days of absence because of illness, strikes, and injury over the number of days worked in the same period, multiplied by 200,000.

(2) The reasons for absence considered do not include maternity, marriage leave, study leave, leave for union activity, other cases of paid leave, and suspensions. To facilitate the comparison with other sources, the following are the absentee rates calculated as percentages of the days worked: **2009** 4.1; **2008** 4.7; and **2007** 5.2.

The calculation of the injury rate of contractor employees – which was published for the first time experimentally and with only partial coverage in last year's report (1.23% for 2008) – has been temporarily suspended. The data available on such injuries, for which a process of uniform collection is currently in progress, regard serious injuries (more than 30 days of absence from work) and fatal ones. The figure available for other injuries is partial and – given the large number of worksites – does not allow Terna to calculate a reliable estimate. Measures have been taken to improve the recording of this information during 2010.

OCCUPATIONAL INJURIES OF CONTRACTOR EMPLOYEES - ITALY	2009	2008	2007
Serious injuries	1	0	0
Fatal injuries	1	2	0

Industrial relations

The industrial relations of interest to Terna and the unions that represent its employees take place at both the electricity industry and the Company level.

LA4 All of Terna S.p.A.'s employees are covered by a **collective bargaining agreement** entered into by the companies in the **electricity industry** (CCNL - the National Collective Labour Contract for employees in the electricity industry). The industry contract regulates many aspects of the terms of employment, such as the minimum pay for the different categories of employees, the pay of shift workers, vacations, overtime, supplementary health insurance, and supplementary pension funds. Terna contributes to establishing the industry rules, because it is part of the delegation of employers that negotiates the renewal of the contract with the unions. On March 5, 2010, a draft agreement on the CCNL – which expired on June 30, 2009 – was signed. The new contract will expire on December 31, 2012.

HR5 The relationship with the industry unions also led to the **regulation of the indispensable tasks** that must be performed, **in the event of a strike**, to ensure the continuity of the service. Terna applies the national union agreement of November 12, 1991, which implemented Law no. 146 of June 12, 1990, regarding the right to strike in essential public services and was approved by the committee established to ensure the implementation of the aforesaid law.

Among other things, the agreement provides exemption from the strike for employees who are indispensable for the continuity of the service (those assigned to short-term planning and the operation and maintenance of the production and transmission system). With regard to this provision, the Terna employees who are exempted from strikes are in any case the shift workers of the National Control Centre, the Network and Production Plan Services, the Distribution Centres, and the Plant Remote-control Centres.

As far as employees on call are concerned, the agreement in question provides that, even though they have the right to suspend their normal tasks during the strike, they are obliged to be on call throughout the duration of the strike. Provided the strike is called in accordance with the provisions of the law, there are no limitations on Terna's remaining employees regarding their exercise of the right to strike.

It should be noted, however, that when the CCNL that expired on June 30, 2009 was renewed, guidelines were established for the subsequent definition of the new regulation of the right to strike in the electricity industry. These guidelines retain the principle of ensuring service continuity in the event of a strike and introduce on an experimental basis innovations regarding the strike procedures of personnel on call.

LA6 LA9 The renewal of the CCNL also included the institution of a bilateral, industry-level organism on "health, safety, and the environment", which is entrusted with enhancing occupational safety, beginning with common objectives agreed on by the parties. Specifically, the organism is to make proposals, monitor, and coordinate training regarding environmental and safety issues. Provision was made for the possibility of establishing, in companies with more than 500 employees, bilateral corporate committees that would work in agreement with the industry organism.

Employee involvement regarding health and safety is currently regulated by the law, which provides for Employee Safety Representatives (RLS) to be elected by all the employees. The RLS thus represent 100% of the employees and their number depends on the number of the company's employees and offices. Their role involves seeing that regulations on the health and safety of workers are applied. During the aforesaid renewal of the CCNL, the role of the RLS was expanded to include environmental issues, so they are now RLSA.

Representatives may ask the company to carry out inspections. They are consulted with regard to risk assessment and the identification of preventive measures. At least once a year they participate in meetings with the employer and other corporate figures responsible for health and safety to examine the suitability of the individual protection devices and training programmes, as well as the effects of the introduction of new technologies.

In March 2009, Terna and the Company unions signed an application agreement. In June 2009 the new RLS for all local Terna units were elected, while the new RLS for the Company's offices in Rome were elected in October of the same year.

The aforesaid corporate agreement of March 2009 is only one of the numerous aspects of the **relationship between Terna and the unions at the Company level**. Industrial relations inside the Company are based on the involvement of the unions in the main aspects of corporate life, the distinction in roles and responsibilities being understood. Union relations at the Company level are regulated by the Protocol on the system of industrial relations, which establishes a structured system of relations on prior and/or periodical bargaining, discussion, consultation, and information.

The **employee union membership rate** at Terna S.p.A. in 2009 was 65.1%, which is high with respect to the industry average and essentially in line with that of previous years. Membership is concentrated in the major unions, which determines the absence of fragmentation in union representation and constitutes the condition for a high-level system of relations. Management of the industrial relations protocol has enabled the parties to develop and consolidate an effective network of relations at all levels, which allows processes of change of great interest to the Company to be governed.

In the three-year period 2007-2009, bargaining with the professional unions led to the **signing of 31 agreements**. With particular regard to 2009, a very significant event was the signing of an agreement with the national leadership of unions concerning the allocation of funds for the Performance Bonus for 2009 and 2010, with an increase of 4.5% and 14.5%, respectively, over the one established for 2008.

It should be noted, finally, that a preliminary discussion regarding the new organisational structure of the Operation Italia Department took place. The involvement of the unions in **the event of organisational changes** is one of the essential aspects of industrial relations, and it is regulated by provisions of the law and the industry contract, as well as agreements at the corporate level. According to the law, in the event of mergers, acquisitions, or other significant changes in the ownership structure, as specified by the aforesaid law, the workers' representatives must be informed and consulted no less than twenty-five days prior to binding agreements.

LA5

On the basis of the union agreements in effect at Terna, in the event there are significant organisational changes there must be preliminary discussions held with the unions, to be concluded within three months. The discussions require the Company to make available all the documentation necessary to allow the union representatives to have a complete view of the organisational project in order to make observations and proposals. In this phase, the preliminary information stays at the collective level. Individual employees are informed in advance only if the organisational change entails their transfer to a different office. In this case, workers must be informed in writing at least thirty days in advance.

Our approach

Terna is an infrastructure company that is strategic for the Italian economy and provides a service of public utility. Society – understood in both a general sense as the recipient of Terna's service and a more local sense as the communities more directly affected by investment projects for developing the transmission grid – is an essential stakeholder.

SO1 Terna's approach to the local communities that host the construction of new infrastructure is discussed in depth in the chapter on environmental responsibility, because the visual and landscape impacts are the most significant ones of such activity. In this chapter, other possible impacts – for example, legal ones – on individuals and on society are discussed.

EU20 The construction of new electric lines does not entail the physical displacement of individuals or entire communities, but only the use of land – usually agricultural land – with a surface ranging from about 30 to about 250 square metres for every pylon. Even though Terna is authorised by the law (Law no. 1775 of 1933 and Presidential Decree no. 327/2001 Consolidation Act on expropriations) to follow an expropriation procedure to obtain the land, the Company prefers solutions based on mutual consent, paying a one-off compensation for the line's right of way through private land (construction of the pylons, putting up the overhead wires, laying the underground cables). In this case, the owner will no longer be able to use the land occupied by the pylons, it being understood that if the lines are dismantled, the land will once again be at his complete disposal.

EU22 The pursuit of a consensual solution fails only in a minority of cases, making it necessary to use coercive measures. In the three-year period 2007-2009, Terna constructed about 350 km of electric lines, which entailed obtaining easements from about 6,300 land owners. In only 30% of the cases was it necessary to make use of coercion to obtain the right of way.

When Terna constructs a station, which occupies much more land, the Company normally purchases the necessary land.

Given its role as a public utility and the regulatory framework in which it operates, Terna complies scrupulously with the relevant laws and regulations that regard it.

In accordance with this fair and law-abiding approach, Terna considers social, humanitarian, and cultural initiatives to be an integral part of its mission, as concrete signs of its participation in the civil development of the communities in which it carries out its operations.

As provided for in its Code of Ethics, in its relations with institutions and associations, Terna represents its interests and positions in a transparent, meticulous, and consistent manner, avoiding collusive attitudes.

HR1 Human rights

HR4

HR5

HR6 The subject of human rights is particularly significant only for companies that have offices or operations in countries where such fundamental rights are not respected.

HR7 The Terna Group operates in Italy, where the legal framework and the level of civil development are strong guarantees of the respect of human rights, freedom of association, and collective bargaining, thus making it superfluous for a company to dedicate particular diligence to these matters through the establishment of dedicated management policies.

HR9

Compliance with the law and the Code of Ethics – which also is implicitly cited through the reference to Terna's governance in the memorandum of understanding for the Company's acquisition of its equity interest in the TSO of Montenegro – on which see the box on page 32 – ensure that there are no incidents regarding discriminatory practices or the use of child or forced labour.

The only other country in which Terna did business through its subsidiaries was Brazil, until November 2009. The laws of that country guarantee observance of the main principles and conventions of the United Nations and the International Labour Organisation (ILO). It should also be noted that, according to the ILO website and the FTSE4GOOD Advisory Committee, Brazil is not considered a country at ethical risk with regard to human rights. Finally, it should be noted that:

- neither in Italy nor in Brazil have any incidents of discrimination or violation of the human rights of indigenous peoples been recorded;
- given the specialised nature of the activities and the direct supervision of the worksites, child labour was not considered a specific risk to be monitored even for outsourced activities.

In 2006 Terna adopted the principles of the Global Compact and incorporated them in its Code of Ethics, thus drawing a clear line for all the situations in which the Company may become involved in the world. This commitment was made even firmer in December 2009 by the formal decision of the Board of Directors to join the Global Compact, on which see the box on page 36.

The current inexistence of the problem being understood, managerial responsibility for human rights is generally within

the sphere of the Human Resource and Organisation Department, while – considering that many aspects regarding human rights are drawn referred to in the Code of Ethics – the Audit Department is entrusted with ensuring that the rules are correctly applied. Finally, the Corporate Social Responsibility Unit tracks changes in external references (for example, international conventions), with an eye to, among other things, Terna's possible future involvement in other countries.

Prevention of corruption

At Terna, the prevention of corruption is a strategic activity which meshes with the internal control systems. Legality and honesty are two of the general principles on which the Code of Ethics and the conduct of the Company's activities are based. Terna's strategy covers three major areas:

Risk management: in 2001, Terna adopted the 231 Organisational Model, a set of guidelines, procedures, training commitments, and control mechanisms, which forms an integrated system for the prevention of specific risks, including the crimes of corruption (see page 37).

During the period 2006-2009, the Audit Department examined 100% of Terna's departments and those of its subsidiaries with regard to all the corporate risks, including those regarding corruption, and produced risk assessment reports on the corporate activities, positions, and departments at risk of illegality and corruption. A process is now in progress for the new subsidiaries, SunTergrid and TELAT. S02

Monitoring: in cooperation with the Audit Department, the Fraud Management Unit of the Security Department coordinates actions to prevent illegal events through the continual monitoring of Terna's risk factors and its degree of exposure to the risk of crimes, the elaboration of financial analyses of the new parties – customers, suppliers, partners – with which the Company is preparing to have business relations, and assistance to the different corporate departments with the required audits.

Personnel training: every year since 2005, Terna has organised training courses on the Code of Ethics and 231 Organisational Model. The purpose of these courses is to ensure, at all corporate levels, awareness of the rules of conduct and the procedures established for the prevention of crimes and to train and inform employees on the areas at risk of crimes and the potential crimes associated with the activities carried out, as well as to explain the principles of conduct and of implementation of the Model, with specific regard to the areas of risk and the activities identified beforehand. In 2009, awareness of the Code of Ethics was also pursued through the campaign described in "The internal campaign on the Code of Ethics and Vote your value" box. The following table shows the data on the employees who have taken the course in the last three years. S03

COURSES ON THE CODE OF ETHICS AND 231 ORGANISATIONAL MODEL [1]	2009	2007
Participants in the course	**1,053**	**1,999**
including:		
senior executives	*12*	*43*
other categories	*1,043*	*1,956*
% coverage of total	**31%**	**57%**
% senior executives	19%	63%
% other categories	31%	57%

(1) No courses were held in 2008.

As in the two previous years, in 2009: S04
- no cases of litigation regarding corruption ended;
- there were no disciplinary penalties for incidents of corruption;
- there were no verified reports of violation of the Code of Ethics regarding corruption.

As of December 31, 2009, no litigation was pending regarding corruption.

Terna's already scrupulous inspection of suppliers was made even more rigorous by the Company's previously mentioned agreement with the *Guardia di Finanza*, on which see the box on page 88.

Prevention of corruption: Terna among the best companies in the world

A study by the rating agency Vigeo shows that Terna is the leading Italian company and the twentieth one worldwide, as well as the world's number one electricity company, in terms of its commitment to the fight against corruption.
In the period 2007-2009, the French agency compared the strategies for preventing corruption adopted by 772 European and North American companies – 18 countries in all – included in the Dow Jones Stoxx Global 1800 index. To perform its analysis, Vigeo used the most important corporate public documents, the answers given in the questionnaires used by the agency for its sustainability rating, reports produced by non-government organisations (NGOs) and trade unions, and articles published in the international press.
The analysis considered the completeness and relevance of policies for the prevention of corruption, the extent to which they were implemented (the sophistications and effectiveness of the different instruments and processes and their inclusion in corporate plans), the management's involvement, the involvement of the different hierarchical levels, and the results obtained: that is, the adoption and degree of coverage of the best practices and whether or not there had been accusations of corruption in the previous 18 months.
These are the main findings of the study, with the data regarding Terna in brackets:

- at least one accusation of corruption was made against 13% of the European companies and 15% of the North American ones in the 18 months that preceded Vigeo's analysis (Terna: no accusations);
- the management of and responsibility for the objectives regarding the prevention of corruption are entrusted to a specific corporate department in 33% of the European companies (Terna: Corporate Security Department, Audit Unit);
- only 24% of the European companies and 16% of the North American ones organise specific training courses for all their employees regarding the prevention of corruption;
- 61% of the European companies and 35% of the North American ones have a system for managing confidential reports of corruption which are formally verified by specific departments, such as audit;
- only 31% of the European companies and 29% of the North American ones have appropriate procedures for internal control regarding corruption;
- only 17% of the European companies make the number and kind of reports public (Terna: publishes the number of reports and results of the investigations annually in its sustainability report).

S05 Relations with institutions and associations

The strategic nature of Terna's business makes it necessary for the Company to constantly discuss with both the national and local government, as well as local communities, to learn about the requests and requirements of institutions and individuals. The Company also constantly monitors both local and national legislative activity, accompanied by its presence at hearings, meetings, conferences, and forums.
During 2009, Terna's top management participated in two parliamentary hearings, at the Senate: in April, as part of a fact-finding inquiry on renewable energy sources, with a contribution regarding investment in generation from such sources, and in July, as part of a fact-finding inquiry on prices along the supply chain of oil products, as well as the effects of the cost of electricity and gas on the incomes of families and the competitiveness of businesses, with particular regard to grid development to eliminate congestion and improve the quality and security of the electricity service.
The top management also met with the institutional world in 2009 to discuss issues that are particularly important for the Company, such as investment in Italy, the works awaiting authorisation, and the problems caused by the uncertainty of when the authorisations will come through and thus the need to approve the works Italy urgently needs. The discussions focused on Decree Law no. 78/09 on external administrators, new electric lines interconnecting with other countries, and the connection of generation from renewable sources.
In accordance with the commitments undertaken in its Code of Ethics, Terna cooperates and discusses with and supports the work of the associations to which it belongs in order to contribute to the general improvement of the industry and its regulations and technical standards.

Italian associations

Terna continues to belong to Confindustria, the most important association representing the interests of Italian firms. In April 2008, the Company also signed a protocol of understanding with the ANIE (National Federation of Electro-technological and Electronic Companies), which is a member of Confindustria. The agreement has a term of three years and provides for common initiatives aimed at institutional and financial interlocutors and the operators of the electricity grids of the other countries of common interest with regard to their respective objectives of international growth. The ANIE undertakes to encourage its members to offer, at Terna's request, technical advice on foreign markets and facilitate both exchange of data and other information to improve knowledge about markets of interest. Terna also participates actively on the CEI (Italian Electro-technological Committee), an organism entrusted with tasks regarding the industry's technical standards. Finally, employees with technical roles often belong to professional associations whose purpose is to keep their members up to date, for example, the electrical engineers and the AEIT.

Initiatives in communities

In accordance with its intention of returning value to the civil society and the local communities where its activities to maintain and develop the grid have a strong impact, in 2009 Terna confirmed its support of social, cultural, and environmental activities. The Company also made an extraordinary contribution in Abruzzo after the destructive earthquake.
Terna's corporate giving can be broken down into two big categories: sponsorships and donations, to which it allocated, respectively, about €1.1 and €0.6 million.
Specifically, sponsorships are expenses for initiatives of third parties in fields other than Terna's core business. They are supported for reasons regarding the Company's image and contracts provide for an explicit return in terms of visibility. Donations, instead, are contributions without a contracted return and can be in money or in kind (free-of-charge use of corporate assets, know-how, or services).
As provided for in Terna's Code of Ethics, in neither case are such contributions made to political parties or their representatives. S06

CORPORATE GIVING EXPENSE - TERNA S.P.A.

In euros	2009	2008
Sponsorships	1,100,458	938,902
Donations	659,425	1,110,600
Total	**1,759,883**	**2,049,502**

COMPOSITION OF CORPORATE GIVING EXPENSE 2009 - TERNA S.P.A.

In euros	Sponsorships	Donations	Total
Purpose			
Energy	194,807	17,000	211,807
Environment	80,000	20,000	100,000
Art and culture	403,400	481,439	884,839
Social hardship, charity	295,747	65,486	361,233
Other	126,504	75,500	202,004
Total	**1,100,458**	**659,425**	**1,759,883**

The allocation of corporate giving reflects the importance of artistic and cultural aims, as shown, among other things, by the organisation of the Terna Prize for contemporary art. This initiative is part of the three-year protocol of understanding signed in 2008 with the Ministry of Cultural Assets and Activities. In addition to the Prize, the agreement provides for activities to promote and enhance the MAXXI, the National Museum of the Art of the 21st century, as well as initiatives to get people involved with museums and other institutions dedicated to art, especially contemporary art by disseminating knowledge about works and artists. To this end, Terna promotes contact between its stakeholders and art in cooperation with the AMACI, the Association of Italian Museums of Contemporary Art.
Expense for the environment is not normally channeled through corporate giving, because it is generally integrated with operating activities (see the section on environmental costs).
It should be noted that in the past few years the former subsidiary Terna Partecipações had also made donations. Specifically, in 2008 social expense amounted to about €694,000.00.

The following are the most important initiatives carried out in 2009, broken down by category.

Energy - Economics

- First Master in "**Energy and Environmental Management**" of the Il Sole 24 Ore Group. Initiated in November 2009, it includes 5 months of classes and a 4-month internship. Terna supports this initiative, which enables recent university graduates to acquire the knowledge and instruments necessary for working at a high level of competence and professionalism in fields that are highly innovative and growing rapidly.
- "**Eureka!**", a CD with information about energy, which was produced by the Culture and Science Association, with contributions from the Ministry for Education, the AEEG, and Terna, for an awareness campaign in schools prior to the world conference on climate change in Copenhagen.
- **Confindustria's 39th National Conference of Young Entrepreneurs** in Santa Margherita Ligure. The issue last year was very relevant to Terna's business: reviving productivity and consumption to identify prospects for Italy's recovery and competitive development.

The environment

- **G8 Environment – Siracusa** (April 22-24, 2009), which focused on the safeguard of biodiversity, a commitment shared by Terna.
- 3rd edition of the **Pimby (Please In My Backyard) Prize**. Conceived by the association of the same name, it is an award to entities that promote a sustainable culture of doing by constructing works in their area in compliance with the regulations and with the consent of the local inhabitants. Terna supports the prize to foster a sustainable and cooperative approach with local communities.
- Terna entered into an agreement with the Rome Biopark to support the protection of the **Neghev turtle**, one of the species at greatest risk of extinction in the world.

Culture - Art

- **Connectivity 01**: is a project to internationalise the Terna Prize by connecting Italian and foreign artists so they can share and exchange experiences to encourage the talent of up-and-coming artists and make them known at the international level, too. Supported by the Ministry of Cultural Assets and Activities and developed in cooperation with the Ministry for Foreign Affairs, it provides for the selection every year of a world capital of contemporary art with which to enter into connectivity. The first event was the exhibition at the **Chelsea Art Museum of New York**, from June 25 to July 12, 2009, of the 16 works that won awards in the Terna Prize 01.
- **Terna Prize 02**, on which see the dedicated box.
- **Art and the art system:** to support the Terna Prize, its main commitment in the field of culture, Terna sponsored a series of 5 meetings – promoted by the LUISS – of the critic Achille Bonito Oliva with protagonists of the art system to analyse the dynamics that determine the creation of artistic surplus value.
- **Campiello Foundation:** Terna supported the 47th edition of the Campiello Prize for literature, which was organised and promoted by Confindustria Veneto.
- **Indeependance** is a session of performing art promoted by the Terna Prize 02 and the MAXXI, in cooperation with the Ministry of Cultural Assets and Activities, to support "Let's Save Art in Abruzzo", a fund-raising initiative promoted by the Ministry for the artistic heritage of the region. Specifically, Terna supported the **MU.SP.A.C.**, the **Experimental Museum of Contemporary Art of the city of L'Aquila**, which was badly damaged by the earthquake on April 6, 2009.

Aid

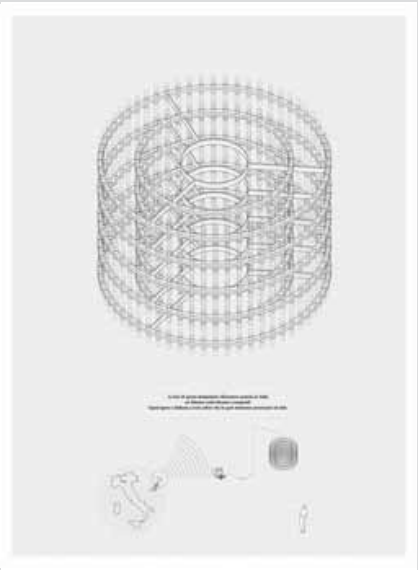
The earthquake in Abruzzo in April 2009. Terna cooperated with the Civil Defense Department to coordinate its actions from the very first hours after the earthquake. In addition to restoring the service and ensuring that its infrastructure was working, the Company assigned men and equipment to assist the rescue and emergency operations: a team of 20 workers with 2 heavy-duty vehicles equipped with cranes able to lift more than 17,000 kilograms, 2 lorries, 2 vehicles with cherry pickers capable of rising more than 18 metres, and 4 all-terrain vehicles.

In 2009, Terna donated tables, chairs, and stoves from three offices it was closing to non-profit associations. Specifically, they were given to a centre for the elderly in Fiano Romano and to Agape Onlus for the kitchen of a centre it runs in Romania. About 200 pieces of obsolete IT equipment (PCs, printers) was also donated to non-profit organisations, schools, and parish churches throughout Italy.

Terna continued to support the volunteer social initiatives of its employees in 2009, among which particular mention should be made of:

- **KAMI project (Bolivia):** for about three years, several Terna employees, in cooperation with COOPI (*Cooperazione Internazionale*) and the local mission of the Salesian Fathers, have been contributing with their expertise to the management and upgrading of the new local electricity network, which will connect about 3,700 families and a total of 15,000 people. The project will be completed by the end of 2010.
- **"The Sun for Water" Project (Niger):** conceived by the RECOSOL (*Rete dei Comuni Solidali del Piemonte*) association and coordinated by Terna employees, this project aims to develop female horticulture thanks to systems for pumping irrigation water driven by solar panels, each of which provides more than 20 cubic metres of water a day, which is enough to irrigate over half a hectare of land. Terna put material it does not use any longer at the project's disposal.

Terna Prize 02, in pursuit of a new aesthetics between topicality and sustainability



Thunderstorms, by Alberto Garrutti, first place in the Terawatt category of the Terna Prize 02.

The Terna Prize is an ambitious project for promoting artists and contemporary art through an original formula for synergy between the art system and that of the enterprise.
The numbers of the second edition show how much Terna has contributed to Italy's cultural growth:

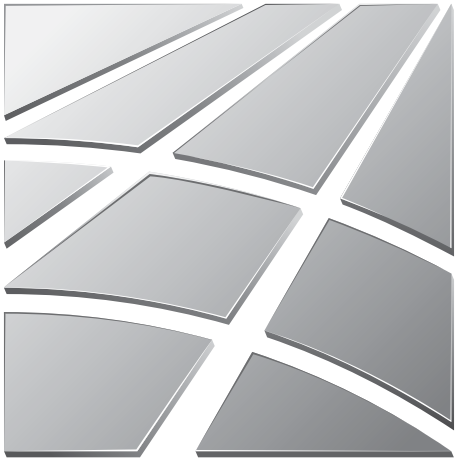
- 3,527 works entered, 371 more than for Terna Prize 01;
- 45 famous artists in the competition (almost twice as many as in the first edition);
- 14 award-winning works displayed in Rome at the MAXXI on the evening of the awards, the very first exhibition in the new National Museum;
- 57 works exhibited at Hadrian's Temple in Rome during the Christmas season, with more than 30,000 visitors;
- 4 million page views on the www.premioterna.com website;
- more than 85,000 headwords present online on research engines;
- over 100,000 people registered for the Prize newsletter (+40% with respect to 2008);
- more than 600 *media* reports (TV, radio, press, and Web);
- 4 publications (catalogue of TP01 in New York, TP02 catalogue, TP02 exhibition catalogue, Study on the Future of the Visual Arts in Italy);
- 10,000 coupons, with a special formula of Christmas greetings for Terna's employees and stakeholders to enter free-of-charge to one of the museums in the AMACI network.

Its ability to inject the energy of both famous artists and up-and-coming ones, combining research and competition, the transmission of values and ideas, and public and private initiative have made the Terna Prize an original event on the Italian cultural scene, and cooperation with the Ministry of Cultural Assets and Activities has made it even more so.
In effect, in 2008 Terna entered into an innovative three-year protocol of understanding with the aforesaid Ministry. For the first two editions, the Honorary Committee was chaired by the Minister and the Prize obtained, among the various kinds of patronage, the medal of the President of the Italian Republic. Furthermore, 100,000 works have been displayed on the Terna Prize website, making it in effect the largest online art gallery in Italy.
The 2009 edition presented numerous innovations, the most important of which was the theme: "Energy:Humanity = Future:Environment. The proportion for a new aesthetics", which was aimed at making artists and public aware of the new challenges of the future with regard to topicality and sustainability.
In 2009, Terna launched the Connectivity project, whose purpose is to internationalise the Prize through a new category for artists, including Italians, who work permanently outside of Italy. Every year a world capital is chosen with which to establish a connection. The first one was New York City, where on June 25 last year the Chelsea Art Museum inaugurated an exhibition of the 16 works that received Terna Prize 01 awards.
Another innovation was the creation of the "Art Gallery Managers' Committee" to promote a more authentic and constructive dialogue between artists and the market beyond the time period of the competition. In a series of dedicated meetings, the gallery managers discussed issues of interest to and educational for artists, such as career construction, the dynamics of the art market, the relationship between public and private, and the role of galleries and collectors.
The ability to combine culture and Corporate Social Responsibility, which characterises the Prize, materialised in the Artist Residence Programme: for the winners in the Megawatt and Gigawatt categories at the International Studio & Curatorial Program (ISCP) in New York and for the winner in the Connectivity category at the American Academy in Rome. In addition, 70% of the most important prize was donated to an artistic and cultural initiative.
Finally, the Terna Prize promoted two surveys in cooperation with the ISPO (Institute for Public Opinion Surveys) and S3*Studium* on the market dynamics of Italian museums and the future of the arts in Italy. Together with those conducted in 2008, these constitute a scientific study of artists and contemporary art in Italy. The results of the surveys provide a very interesting picture and a basis for research for people who work in the field and for everyone who is interested in this important cultural phenomenon.

WE CREATE VALUE THROUGH A RELATIONSHIP BASED ON TRANSPARENCY AND TRUST WITH THE PEOPLE WHO INVEST OR ARE THINKING OF INVESTING IN OUR SHARES.

Martina Guzzo
Investor Relations

2009



Tables of indicators

Terna

The indicators contained in the following tables are additional with respect to those provided for by the G3 Sustainability Reporting Guidelines, but Terna believes it is important to publish them to describe its performance in the field of Corporate Social Responsibility. In several cases, data already presented in the text of the report are also shown for the sake of completeness.

The indicators are divided into the five areas corresponding to the structure of the report, as well as into the thematic sections shown in the following scheme.

Area	Section
1. Terna profile	Corporate Governance Ethical Auditing
2. Responsibility for the electricity service	The grid
3. Economic responsibility	Shareholders Providers of capital Suppliers Customers - Regulated market
4. Environmental responsibility	Environmental performance
5. Social responsibility	Number and composition of personnel Employee satisfaction and development Equal opportunity Safety Relations with trade unions

With respect to the tables published in the 2008 sustainability report, there are the following changes in the tables of indicators of economic responsibility: net profit, EBT, and equity for 2007.

For each indicator the tables show:
- the unit of measurement;
- the figures for 2009, 2008, and 2007;
- if it is significant, the absolute change between 2008 and 2009;
- if it is significant, the percentage change between 2008 and 2009.

The boundary concerned is Italy; for the economic data, Terna S.p.A.

The data are normally calculated as of December 31 and flow indicators regard the entire year.

To facilitate reading the indicators, the following table shows the units of measurement in which they are expressed. See also the table of acronyms and the glossary after the indicators.

Units of measurement	
%	Percentage
€	Euros
€/000	Thousands of euros
€/mln	Millions of euros
GWh/y	Gigawatthours per year
h	Hours
kg	Kilograms
km	Kilometres
min	Minutes
MVA	Megavoltampere
MW	Megawatts
MWh	Megawatthours
no.	Number
t	Tons
y	Years

Terna profile

Corporate Governance

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Board of Directors						
Total members BoD	no.	9	9	10	0	-
Independent Directors on BoD	no.	4	4	4	0	-
Directors designated by minority interests	no.	3	3	3	0	-
Women on BoD	no.	0	0	0	0	-
Board meetings	no.	9	13	12	-4	-30.8%
Meetings of Compensation Committee	no.	3	3	6	0	-
Meetings of Internal Control Committee	no.	7	10	8	-3	-30.0%

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Implementation of Code of Ethics						
Total reports received	no.	1	3	3	-2	-66.7%
Total violations of Code of Ethics ascertained	no.	0	0	0	0	-

Responsibilty for the electricity service

Grid

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Electric stations*						
380 kV						
stations	no.	136	135	133	1	0.7%
power transformed	MVA	88,284	86,220	85,870	2,064.00	2.4%
220 kV						
stations	no.	147	143	143	4	2.8%
power transformed	MVA	30,265	29,452	28,779	813	2.8%
Lower-voltage (≤150 kV)						
stations	no.	100	93	90	7	7.5%
power transformed	MVA	2,953	2,868	2,895	85	3.0%
Total						
stations	no.	383	371	366	12	3.2%
power transformed	MVA	121,501.00	118,539.00	117,543.00	2,962.00	2.5%
Electric lines*						
380 kV						
length of 3-wire circuits	km	11,212	10,727	10,717	485	4.5%
length of lines	km	10,313	9,821	9,812	492	5.0%
220 kV						
length of 3-wire circuits	km	12,083	12,113	12,142	-30	-0.2%
length of lines	km	9,725	9,771	9,771	-46	-0.5%
Lower-voltage (≤150 kV)						
length of 3-wire circuits	km	39,208	21,332	21,342	17,876	83.8%
length of lines	km	36,653	19,864	19,863	16,789	84.5%
Total						
Length of 3-wire circuits	km	62,503	44,172	44,201	18,331	41.5%
in underground cable	*km*	*1,043*	*465*	*445*	*578*	*124.3%*
in submarine cable	*km*	*914*	*434*	*434*	*480*	*110.6%*
in 200-, 400-, and 500-kV direct current	*km*	*1,560*	*1,068*	*1,068*	*492*	*46.1%*
Length of lines	km	56,691	39,456	39,446	17,235	43.7%
in underground cable	*km*	*1,043*	*465*	*445*	*578*	*124.3%*
in submarine cable	*km*	*914*	*434*	*434*	*480*	*110.6%*
in 200-, 400-, and 500-kV direct current	*km*	*1,240*	*749*	*749*	*491*	*65.6%*
% connections in direct current						
- 3-wire circuits	*%*	*2.5*	*2.4*	*2.4*	*0.1*	*4.2%*
- lines	*%*	*2.19*	*1.7*	*1.9*	*0.49*	*28.8%*
Grid efficiency						
Energy supplied	GWh/y	317,602	337,600	340,000	-19,998	-5.9%
Technical quality						
Indices of service continuity:						
ASA (Average System Availability) (1)	%	99.03	99.15	99.28	-0.12	-0.1%
SAIFI+MAIFI (System Average Interruption Frequency Index)	no.	0.19	0.22	0.23	-0.03	-13.6%
AIT (Average Interruption Time) (2)	min	0.55	0.66	0.99	-0.11	-16.7%
ENS (Energy Not Supplied)	MWh	800	1,166	644	-366	-31.4%

(*) The number of plants as of December 31, 2009 includes TELAT's assets.
(1) The indicator is the total percentage ASA – used in international benchmarks – calculated with regard to single territorial areas or to the entire country, taking into account: planned unavailability, occasional unavailability, unavailability because of malfunction, unavailability because of external causes, and unavailability because of development work.
(2) Average Interruption Time of the National Transmission Grid (NTG) in a year, calculated as the ratio between the energy not supplied in a certain period (ENS value) and the average power absorbed by the NTG in the period considered.
(3) Energy not supplied because of interruptions on the NTG during the period. The calculation of the ENS excludes significant incidents. Until December 31, 2007, as defined in AEEG Resolution no. 250/04, by significant incident was meant an interruption with the energy not supplied amounting to more than 150 MWh and lasting more than 30 minutes. With the coming into effect of the regulatory period 2008-2011 and Resolutions nos. 341/07 and 333/07 on the regulation of service quality, by significant incident is meant any interruption with more than 250 MWh of energy not supplied. The 2008 figure was calculated according to the latter definition.

Economic responsibility

Shareholders

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Composition shareholder base						
Other institutional investors + Retail	%	55.9	59.7	59.7	-3.82	-6.4%
Cassa Depositi e Prestiti S.p.A.	%	29.99	29.99	29.99	0	-
Significant institutional investors	%	9.0	5.2	5.2	3.81	73.3%
Enel S.p.A.	%	5.1	5.1	5.1	0.02	0.4%
Socially responsible investors (SRI) (1)						
SRI funds in shareholder base	no.	67	38	46	29	76.3%
Terna shares held by SRI funds	%	15	10	12	5	45.7%
Weight of SRI in institutional funds	%	41	31	38	10	29.7%
Share performance						
Financial performance of shares	%	28.48	-15.34	6.08	43.82	285.7%
Dividend yield (2)	%	6.55	6.93	5.5	-0.38	-5.5%
Terna in world stock indices						
FTSE Italy All Share (3)	%	1.44	1.22	0.73	0.22	18.0%
FTSEMib (3)	%	1.63	1.58	0.99	0.05	3.2%
Dow Jones STOXX 600 Utilities	%	1.23	1.00	0.70	0.23	23.0%
Sustainability indices that include Terna						
FTSE4GOOD	yes	yes	yes			
ECPI Ethical Indices	yes	yes	yes			
Dow Jones Sustainability World (4)	yes					
ASPI - Advanced Sustainable Performance Indices-Eurozone (4)	yes					
Ethibel Sustainability Index Excellence Europe (4)	yes					
Shareholder return						
EPS (Earnings per share)	€	0.385	0.168	0.203	0.22	129.2%
DPS (Dividend per share)	€	0.190	0.158	0.150	0.03	20.3%
Total Shareholder Return (TSR)						
- since IPO	%	*142.28*	*76.65*	*96.92*	*65.63*	*85.6%*
- since beginning of year	%	*37.16*	*-10.30*	*11.99*	*47.46*	*460.8%*
Communication with shareholders						
Meetings/conference calls with investors ("buy-side")	no.	342	157	107	185	117.8%
Meetings/conference calls with financial analysts ("sell-side")	no.	338	248	266	90	36.3%
Meetings with investors, dedicated and/or with discussion of CSR issues	no.	3	5	3	-2	-40.0%
Requests for information from retail shareholders (5)	no.	29	27	17	2	7.4%
Economic performance						
Revenue	€/mln	1,295.2	1,196.1	1,121.4	99.1	8.3%
EBITDA	€/mln	933.8	850.7	795.2	83.1	9.8%
EBIT	€/mln	654.4	597.2	586.6	57.2	9.6%
EBT	€/mln	505.3	509.9	555.7	-4.6	-0.9%
Net profit (6)	€/mln	790	335.3	408.1	454.7	135.6%
ROACE	%	11.4	12.0	14.0	-0.58	-4.8%

(1) Investments made on the basis of ethical criteria, in addition to traditional ones.
(2) The value was calculated as the ratio between the dividend for the year and the average price concerned in December.
(3) Since June 1, 2009, the S&PMib and the Mibtel have been called, respectively, FTSEMib and FTSE Italy All Share.
(4) Terna entered the index in 2009.
(5) The figure takes into account the requests received via e-mail.
(6) The change in net profit is due to the incidence of the net profit of the discontinued operations in Brazil. The net profit of Terna S.p.A.'s continuing operations for 2009 amounts to €325.8 million, while for 2008 the recalculated figure amounts to €298.5 million.

Providers of capital

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Debt						
Financial debt	€/mln	3,260.9	2,954.1	2,308.7	306.76	10.4%
Equity	€/mln	2,468.3	2,028.0	2,027.6	440.3	21.7%
Debt to equity	%	132.1	145.7	113.9	-13.56	-9.3%
EIB loans						
Remaining debt on EIB loans	€/mln	766.7	811.4	540.9	-44.65	-5.5%
Rating [1]						
S&P (since September 2, 2004)						
Outlook	index	Stable	Negative	Stable		
M/L Term	index	A +	AA -	AA -		
Short Term	index	A - 1	A - 1 +	A - 1 +		
Moody (since September 2, 2004)						
Outlook	index	Stable	Stable	Stable		
M/L Term	index	A2	A1	Aa3		
Short Term	index	Prime - 1	Prime - 1	Prime - 1		
Fitch (since May 4, 2006)						
Outlook (issuer)	index	Stable	Stable	Negative		
M/L Term (issuer)	index	A	A +	AA-		
Short Term (issuer)	index	F1	F1	F1 +		
FitchSeniorUnsecured Debt	index	A+	AA -	AA		

(1) Source: Borsa Italiana as of December 30, 2009.

Suppliers

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Number of suppliers						
Suppliers awarded contracts	no.	2,308	1,841	1,828	474	25.4%
Procurement of goods and services						
Supplies	€/mln	461.3	341.7	298.5	119.66	35.0%
Works	€/mln	253.2	188.5	99.4	64.67	34.3%
Services	€/mln	210.9	120.3	96.6	90.64	75.3%
Management instruments						
Qualified enterprises in supplier register [1]	no.	180	303	265	-109	-40.6%
Categories qualified	no.	36	36	35	0	-
Online tenders	%	10	10	30	0	-
Litigation with suppliers						
Proceedings pending	no.	16	16	17	0	-
Proceedings initiated	no.	0	3	0	-3	-100.0%
Proceedings concluded	no.	0	4	4	-4	-100.0%

(1) The reduction of almost 41% was due mainly to the expiry of a significant number of enterprises that as of the year end had not initiated the qualification-renewal process.

Customers - Regulated market

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Customer portfolio						
Users of transmission service:						
Distributors directly connected to the National Transmission Grid	no.	19	21	21	-2	-9.5%
Owners of production plants (1)	no.	77	75	1,200	2	2.7%
Users of dispatching service:						
Injection-side users of dispatching	no.	77	75	74	2	2.7%
Withdrawal-side users of dispatching	no.	106	102	98	4	3.9%

(1) Since January 2008 almost all small production plants came under the contract of the GSE, which manages relations with Terna.

Litigation with customers

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Litigation with customers						
Proceedings pending	no.	8	7	3	1	14.3%
Proceedings initiated	no.	1	4	2	-3	-75.0%
Proceedings concluded	no.	0	0	0	0	-

Environmental responsibility

Environmental data

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Emissions of SF_6						
Percentage of SF_6 leakage out of total	%	0.89	1.07	0.69	-0.18	-17.3%
Emissions of greenhouse gas SF_6	kg	3,005.36	3,410.00	2,099.40	-404.64	-11.9%
Volume of SF_6 (1)	kg	339,467.72	318,694.30	304,424.10	20,773.42	6.5%
- in equipment in operation	*kg*	*305,780.94*	*288,628.55*	*272,899.80*	*17,152.39*	*5.9%*
- in cylinders	*kg*	*33,686.78*	*30,065.78*	*29,597.60*	*3,621.00*	*12.0%*
Waste management (2)						
Waste produced	t	7,053.25	8,010.70	4,562.90	-957.45	-12.0%
Waste recycled	%	83.03	90.8	86.8	-7.77	-8.6%
Non-hazardous special waste						
Machines, equipment, supports, conductors, cables						
- quantity produced	*t*	*2,250.94*	*1,866.70*	*2,019.70*	*384.24*	*20.6%*
- quantity delivered for recycling	*t*	*2,096.82*	*1,763.30*	*1,990.80*	*333.52*	*18.9%*
Packaging						
- quantity produced	*t*	*242.58*	*131.9*	*287.8*	*110.68*	*83.9%*
- quantity delivered for recycling	*t*	*204.13*	*107.1*	*265.3*	*97.03*	*90.6%*
Other (3)						
- quantity produced	*t*	*564.03*	*2,002.60*	*462.4*	*-1,438.57*	*-71.8%*
- quantity delivered for recycling	*t*	*233.41*	*1,783.40*	*144.1*	*-1,550.00*	*-86.9%*
Total non-hazardous special waste						
- quantity produced	*t*	*3,057.54*	*4,001.20*	*2,769.90*	*-943.66*	*-23.6%*
- quantity delivered for recycling	*t*	*2,534.35*	*3,653.80*	*2,400.20*	*-1,119.45*	*-30.6%*
Hazardous special waste						
Machines, equipment, supports, conductors, cables						
- quantity produced	*t*	*2,746.09*	*2,914.70*	*934.4*	*-168.61*	*-5.8%*
- quantity delivered for recycling	*t*	*2,554.75*	*2,808.20*	*912.9*	*-253.45*	*-9.0%*
Oils (4)						
- quantity produced	*t*	*933.19*	*992.8*	*487.6*	*-59.61*	*-6.0%*
- quantity delivered for recycling	*t*	*544.37*	*707.7*	*472.6*	*-163.33*	*-23.1%*
Batteries (5)						
- quantity produced	*t*	*185.28*	*73*	*93.6*	*112.28*	*153.8%*
- quantity delivered for recycling	*t*	*185.33*	*72.1*	*84.8*	*113.23*	*157.0%*
Waste containing asbestos						
- quantity produced	*t*	*69.24*	*31.1*	*63.8*	*38.14*	*122.6%*
- quantity delivered for recycling	*t*	-	-	-	-	-
Other						
- quantity produced	*t*	*61.91*	*112.8*	*213.7*	*-50.89*	*-45.1%*
- quantity delivered for recycling	*t*	*37.51*	*12.6*	*90.4*	*24.91*	*197.7%*
Total hazardous special waste						
- quantity produced	*t*	*3,995.71*	*4,009.60*	*1,793.00*	*-13.89*	*-0.3%*
- quantity delivered for recycling	*t*	*3,321.97*	*3,616.80*	*1,560.60*	*-294.84*	*-8.2%*
Consumption						
Direct consumption						
Petrol for vehicles	t	163.03	147.66	187	15.37	10.4%
Diesel for vehicles	t	1,809.4	1,565.61	1,551	243.79	15.6%
Oil for generating units and heating	t	306.47	192	172	114.47	59.6%
Methane for heating	thousands of m^3	157.51	124	756	25.71	20.7%
Indirect consumption						
Consumption of electricity	GWh	176	150	150	26	17.3%
Environmental litigation						
Proceedings pending	no.	163	180	172	-17	-9.4%
Proceedings initiated	no.	11	31	25	-20	-64.5%
Proceedings concluded	no.	28	23	11	5	21.7%

(1) The total quantity of SF_6 for 2007 includes the amount of SF_6 present in equipment that is not in operation. This item is no longer present in the table, because the procedure for collecting the information has changed and the amount present in equipment that is not in operation is considered "waste".
(2) Only waste from the production process is included, and therefore waste produced by service activities (urban waste) is excluded. Waste belonging to the categories Excavation Earth and Rocks and Effluent deriving from them are not included, because they are exceptional and would therefore make the series even less homogeneous and their production cannot be considered a variable managed directly in the production cycle. Inclusion of the Excavation Earth and Rocks items would have determined the following results in 2009: 23,106 tons of Waste Produced, including 4,041 tons of Hazardous Waste and 19,065 tons of Non-hazardous Waste. In effect, the Excavation Earth and Rocks containing hazardous substances amount to 45.5 tons, while Non-hazardous Excavation Earth and Rocks amount to 14,788.5 tons and the effluent deriving from them to 1,219.3 tons.
(3) With regard to non-hazardous waste, the item "Other" also contains the quantity of toner.
(4) The item "Oils" includes the sum of the separate items "Exhausted oils with PCBs>25 ppm" and "Exhausted oils without PCBs or with PCBs≤25 ppm" for 2008 and 2007.
(5) The amount includes the quantities temporarily stored the previous year.

Social responsibility

Number and composition of personnel

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Number						
Number of employees	no.	3,447	3,524	3,495	-77	-2.2%
Hired during the year	no.	57	155	280	-98	-63.2%
Left during the year	no.	134	126	152	8	6.3%
Composition						
Professional status						
Senior executive	%	1.89	1.84	1.95	0.05	2.7%
Junior executive	%	14.16	13.76	13.28	0.4	2.9%
White-collar	%	54.36	54.12	53.65	0.24	0.4%
Blue-collar	%	29.59	30.28	31.13	-0.69	-2.3%
Education						
University graduate	%	17.95	17	15.8	0.95	5.6%
Secondary-school graduate	%	45.6	45	44	0.6	1.3%
Vocational-school graduate	%	17.02	17	17.2	0.02	0.1%
Elementary/middle school graduate	%	19.43	21	23	-1.57	-7.5%
Age and years at Terna						
Average age	y	46.4	46.1	46.2	0.3	0.7%
Average years at Terna (1)	y	21.5	21.3	21.5	0.2	0.9%
Flexible employment						
Fixed-term contracts (2)	no.	73	166	132	-93	-56.0%
Beginner and training contracts that became permanent during the year	no.	120	56	6	64	114.3%
Interns and apprentices	no.	12	13	24	-1	-7.7%
Part-time	%	0.87	0.77	0.89	0.1	13.0%
Overtime	%	6.12	5.52	4.93	0.6	10.9%

(1) With regard to employees who entered Terna following acquisitions, the average number of years employed by the Company takes into account their previous employment.
(2) The amounts include training contracts, beginner contracts, and fixed-term contracts.

Employee satisfaction and development

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Compensation						
Average employee cost [1]	€	75,640	70,500	67,500	5,140	7.3%
Senior executives with stock options [2]	no.	14	15	16	-1	-6.7%
Senior executives with Long-Term Incentives (LTI)	no.	47	44	45	3	6.8%
Variable pay as % of fixed pay [3]	%	9.01	8	5.4	1.01	12.6%
Training						
Training hours per employee	h	47	53	43	-6	-11.3%
Training expense per employee [4]	€	389	300	447	89	29.8%
Employees covered by training [5]	%	91	96	98	-5	-5.2%
Corporate climate						
Total spontaneous resignations	no.	26	28	16	-2	-7.1%
Absences per employee [6]	h	103	112	115.6	-49.57	-44.3%
Litigation with employees						
Proceedings pending	no.	37	51	69	-14	-27.5%
Proceedings initiated	no.	3	13	12	-10	-76.9%
Proceedings concluded	no.	17	31	47	-14	-45.2%

(1) The figure regards all the Company's employees, including senior executives.
(2) There is only one Stock Option Plan (Resolution of December 21, 2005), which expires in 2013.
(3) The amounts regard the incentives provided for all employees, including senior executives. Fringe benefits are excluded.
(4) The training costs do not include the cost of the hours not attended or of the hours taught directly by employees.
(5) % of employees who took at least one course during the year.
(6) Non-contractual absences recorded during the year.

Equal opportunities

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Equal opportunities for female employees						
Female employees	**no.**	**355**	**359**	**341**	**-4**	**-1.1%**
Senior executive	no.	10	10	10	0	-
Junior executive	no.	77	73	61	4	5.5%
White-collar	no.	268	276	270	-8	-2.9%
Blue-collar	no.	0	0	0	0	-
Women as % of personnel	%	10.3	10.18	9.75	0.12	1.2%
Women as % of executives	%	15.73	15.09	13.34	0.64	4.2%
Female executive pay [1]	%	14.21	13.63	11.96	0.58	4.3%
Women as % in other roles	%	9.26	9.28	9.11	-0.02	-0.2%
Female pay for other roles [2]	%	9.34	9.2	9.1	0.14	1.5%

(1) By this is meant the share of the gross annual pay of junior and senior executives paid to women who hold managerial positions.
(2) By this is meant the share of the gross annual pay of blue-collar and white-collar workers paid to women who hold non-managerial positions.

Safety

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Employee occupational injuries						
Occupational injuries	no.	36	50	40	-14	-28.0%
fatal	*no.*	*0*	*1*	*0*	*-1*	*-100.0%*
serious	*no.*	*0*	*1*	*0*	*-1*	*-100.0%*
Injury rate [1]	%	1.21	1,72	1.45	-0.51	-29.4%
Lost day rate [2]	%	40.04	329.1	51.2	-289.06	-87.8%
Safety expense per employee [3]	€	242	1,043	552	-800.94	-76.8%
Periodical health inspections	no.	2,088	2,049	2,502	39	1.9%
Occupational injuries contractor employees						
Serious injuries contractor employees	no.	1	0	0	1	
Fatal injuries contractor employees	no.	1	2	0	-1	-50.0%

(1) This is the number of injuries with at least one day of absence from work divided by the number of hours worked during the year, multiplied by 200,000 (corresponding to 50 work weeks*40 hours*100 employees). The formula is in line with the criteria of the Global Reporting Initiative. This indicator is also calculated in accordance with the UNI 7249:2007 standard by the following formula: N/H*1,000,000, where N is the number of injuries with at least one day of absence from work that occurred during the year and H is the number of hours worked during the same period. According to this calculation method, the injury rate would be 7.3 in 2007, 8.6 in 2008, and 6.07 in 2009.
(2) This is the ratio between the days not worked because of injury and the days worked during the year, multiplied by 200,000. The days are calendar days and are counted from the day the injury occurred. The formula is in line with the criteria of the Global Reporting Initiative. This indicator is also calculated in accordance with the UNI 7249: 2007 standard by the following formula: G/H*1,000, where G is the number of actual days of disability during the year and H the number of days worked during the same period. On the basis of this calculation method, the serious injury rate would be 0.3 in 2007, 1.7 in 2008, and 0.2 in 2009.
(3) The amounts regard the expense incurred for the purchase of Individual Protection Devices (IPD) and clothing.

Relations with trade unions

Indicator	UM	2009	2008	2007	Var. '08-'09	Var. '08-'09%
Employee union membership						
Union membership rate	%	65.1	64.0	66.5	1.1	1.7%

Acronyms

ACEA	Azienda Comunale Energia e Ambiente (Municipal Energy and Environment Company)
AEEG	Autorità dell'Energia Elettrica e del Gas (Italian Authority for Electricity and Gas)
AGCM	Autorità Garante della Concorrenza e del Mercato (Italian Antitrust Authority)
AIT	Average Interruption Time
AOT	Aree Operative Territoriali (Transmission Operational Area)
ASA	Average System Availability
AU	Acquirente Unico (Italian Single Buyer)
BoD	Board of Directors
CDP	Cassa Depositi e Prestiti
CEI	Comitato Elettrotecnico Italiano (Italian Electrotechnical Committee)
CESI	Centro Elettrotecnico Sperimentale Italiano (Italian Electrotechnical Testing Centre)
CIGRE	Conseil International des Grands Réseaux Electriques à Haute Tension
CONSOB	Commissione Nazionale per le Società e la Borsa (National Commission for Companies and the Stock Exchange)
CSR	Corporate Social Responsibility
DAEM	Day Ahead Energy Market
DP	Development Plan of the National Transmission Electricity Grid
DPS	Dividend Per Share
DSM	Dispatching Service Market
DT	Distance Training
EBIT	Earnings Before Interest and Taxes
EIA	Environmental Impact Assessment
EMO	Energy Market Operator
EMS	Energy Management System
ENS	Energy Not Supplied
EPS	Earnings Per Share
EPSES	Emergency Plan for the Security of the Electricity System
ERA	Exclusion, Repulsion, Attraction
ETSO	European Transmission System Operators
GAAP	Generally Accepted Accounting Principles
GIS	Geographic Information System
GRI	Global Reporting Initiative
GRTN	Gestore della Rete di Trasmissione Nazionale (National Transmission Grid Operator)
GSE	Gestore Servizi Elettrici (Electric Services Management)

HV	High Voltage
IBA	Important Bird Areas
IEA	International Energy Agency
IPD	Individual Protection Device
IPO	Initial Public Offering
ISPRA	Istituto Superiore per la Protezione e la Ricerca Ambientale
ISTAT	Italian National Statistics Institute
MBI	Maintenance and Business Intelligence
MBO	Management By Objectives
MED	Ministry for Economic Development
MEF	Ministry of Economy and Finance
MELC	Ministry for the Environment and Land Conservation
MPA	Ministry for Productive Activities (now the Ministry for Economic Development - MED)
N.A.	Not Available
NCC	National Control Centre
NTG	National Transmission Grid
OECD	Organisation for Economic Cooperation and Development
PCB	Polychlorinated biphenyls
PCT	Polychlorinated terphenyls
ROACE	Returns on Average Capital Employed
S&P	Standard & Poor's
SCADA	Supervisory Control And Data Acquisition
SEA	Strategic Environmental Assessment
SETSO	South European Transmission System Operators
SISTAN	National Statistical System
SRI	Socially Responsible Investment
TFR	Trattamento di Fine Rapporto (Staff Severance Indemnity)
TSO	Transmission System Operator
TSR	Total Shareholder Return
UCTE	Union for the Coordination of Transmission of Electricity
VHV	Very High Voltage
ZPS	Special Protection Area

Glossary

231 Organisational Model
231 Organisational Model takes its name from Legislative Decree no. 231, 2001. This decree imposes a company liability in case of specific crimes perpetrated by managers, employees or partners in the interest or advantage of the company itself (e.g. public managers bribery, company frauds, crimes against private person, market abuse). The model is a set of guidelines, procedures, training commitment and control mechanisms that aim to prevent the risk of committing such crimes. 231 Organisational Model thus represents an integrated system to avoid specific risks; when defined according to law instructions, this system ("231 Organisational Model") can also avoid sanctions to the company – or reduce their extent – in case the crimes are actually perpetrated.

Accident frequency index
This is calculated using the following formula: N/H*1,000,000, where N is the number of accidents with at least one day's absence from work during the year, and H is the number of hours worked during the same period.

Accident seriousness index
This is calculated using the following formula: G/H*1,000, where G is the number of effective days of unavailability during the year, and H is the number of hours worked during the same period.

AIT (Average Interruption Time)
Average duration of interruption of supply to the electrical system during the year.

ASA (Average System Availability)
Average real availability of all elements of the National Transmission Grid during the period.

Availability of a grid element
State in which a grid element may be used for transmission activities under the conditions provided under operational consistency as set forth in Attachment 1 of the Operator/Owner Standard Agreement.

Average number of outages per grid user (N)
The average number of outages per grid user directly connected to the NTG is defined by the following formula:

$$\frac{\sum_{i=1}^{n} Ui}{Utot}$$

Where the sum includes all n outages that occurred in the period and/or calendar year and area, and where:
- Ui is the number of users involved in the nth considered outage;
- Utot is the total number of users directly connected to the NTG during the calendar year.

Balancing Services Market (BSM)
The market provided and regulated within the Dispatching Service Market (DSM) for the procurement of the resources necessary for balancing.

Bay
Group of power plants and accessory plants serving a power line or a transformer which connect the Grid elements to the bar system of a power station.

Bersani Decree
Legislative Decree no. 79 of March 16, 1999, which was issued to implement EC Directive no. 96/92/EC, regarding shared standards for the domestic electricity market and the liberalisation thereof.

Bilateral contract
An energy supply contract between two market operators.

Code of Ethics
It is often called a "business charter", as it represents the foundation of the company's culture and explicitly sets forth the rights and duties and areas of responsibility that the business undertakes to respect in dealing with its stakeholders. It is an official document, signed by the BoD, which requires the compliance of all personnel.

Congestion Resolution Market (CRM)
The market provided and regulated within the Dispatching Service Market (DSM) for the procurement of the resources necessary for resolving congestion.

Connection
The group of grid elements forming the transmission line, and the bays at the borders of the same, including the related circuitry isolating apparata. Connections are classified by voltage level with reference to rated voltage. The length of the connection is generally the length of the line which forms the connection itself.

Connection line
Any power line that links the power distribution plant with the user's plant, or the power distribution plant with the connection station.

Connection station
Power station which is part of the NTG, whose supply plant is connected to one or more power lines.

Control area
Electricity system able to regulate its own production by maintaining exchanges of power with other interconnected systems at planned levels, and to contribute to the regulation of the interconnection frequency.

Control Centre
A group of plants used for the control and operation of the NTG or a User's electricity system (different from a Production System).

Control System
A group of calculation systems, data transmission lines and apparata which enables the secure and economic control of the entire electricity system.

Controlled electricity system
The group including the National Transmission Grid and directly connected users' plants, including the associated devices for ancillary services.

Corporate Governance
The form of governance of the company, meaning the system of relations between managers, directors, shareholders and other stakeholders of the company.

Corporate Social Responsibility (CSR)
"The integration, by the firms, of social and ecological concerns in their commercial operations and their relations with parties involved. Being socially responsible means not only completely fulfilling applicable legal obligations, but going beyond, to invest in human capital, the environment and in other relations with parties involved" (Green Book of the European Commission, July 18, 2001).

Customers
Businesses or distribution companies, wholesalers and the final buyers of electrical energy.

Data privacy
Data is considered confidential if, when transferred from one telecommunications and/or processing system, the data content is not to be read by unauthorised persons. This is a data and information treatment condition of direct commercial importance.

Day Ahead Energy Market (DAEM)
The trading of bids for the purchase and supply of electrical energy for each hour of the next operating day following that of trading. This market deals with the energy units which define the production and withdrawal plan for the following day (preliminary cumulative programmes).

Defence plans
The control activities – automatic and/or manual – set forth by Terna and carried out through single systems and/or plants designed to maintain or to return an electricity system to a normal condition, also passing through a reinstatement stage, once such a stage has already begun, or emergency conditions are already present.

Development
Works on the electricity grid which lead to the adjustment or upgrading of the transport, transformation, connection and interconnection capacity, or an increase in operating flexibility of the grid, or the removal of grid elements.

Direct connection to the NTG
Connection of all plants with existing circuit continuity at least in one point, without the interposition of ancillary power plants, to the NTG.

Dispatching
The activity aimed at issuing provisions for the coordinated use and operation of production plants, the National Transmission Grid, the grids connected to the same, and ancillary services of the electricity system.

Dispatching Service Market (DSM)
The market for the negotiation of the procurement of several resources required for the dispatching service. In general, it is required to be composed of several markets: Congestion Resolution Market (CRM), Reserves Market (RM), Balancing Services Market (BM).

Distribution
The transport and transformation of electrical energy on high-, medium- and low-voltage distribution grids for supply to the final customers.

Dividend Yield
Calculated as the ratio of the last dividend distributed by a company and the current price of its shares. It indicates the immediate profitability of a share.

DPS (Dividend per Share)
Dividend per Share: calculated as the total amount of dividends distributed by a company divided by its total number of ordinary shares.

EBIT (Earnings Before Interest and Taxes)
One of the key profitability indicators for typical company management. It measures company profits before taxes, financial income/charges and extraordinary components; it is also called operating profit or operating income.

EBITDA (Earnings Before Interest, Taxes, Depreciation and Amortisation)
Profit before taxes, financial income/charges, write-downs, amortisation and extraordinary components. It is similar to the term GOP (Gross Operating Profit), which measures operating profits gross of amortisation and allocations to provisions.

EBT (Earnings Before Taxes)
A company's profits (losses) before tax.

Electricity Grid
A group of plants, lines and stations for transferring electrical energy and supplying the necessary ancillary services.

Electricity market
The system of wholesale selling of electricity, which determines which power generation systems or plants will be used to meet the demand at any moment, and determines the price of energy at that specific moment.

Electricity markets
Intended as the combination of the Energy Market and the Dispatching Service Market (DSM).

Electrocution
Phenomenon known as an electric "shock", caused by contact between a body and electrical current. This can have damaging and/or lethal effects on an organism depending on the intensity of the current and the duration of exposure.

Eligible customer
The natural person or legal entity who is free to stipulate supply contracts with any producer, distributor or wholesaler, both in Italy and abroad. Starting from May 1, 2003, eligible customers are defined as those consuming more than 100,000 kWh per year.

Emergency condition of an electricity system
Operational situation of an electrical grid which results in exceeding operating limits of grid elements and/or outages of load portions, due to faults or disturbances.

Emergency intervention
Group of operations executed following anomalies or faults on plants, to ensure the recovery of efficiency of such plants in as short a time as possible and/or enable, in emergency conditions, the local running of the plants.

Emergency Plan
Group of automatic and manual procedures implemented during critical operating period, in order to avoid or limit the going offline of the electricity system itself or part of it.

Emergency Plan for the Security of the Electricity System (EPSES)
In case of critical events, EPSES sets forth the methods for selectively suspending the supply of electrical energy to domestic and industrial users, with different levels of severity.

Energy market
Intended as the combination of the Day Ahead Energy Market (DAEM) and the Real Time Energy Market (RTEM).

Energy Not Supplied (ENS)
Energy Not Supplied due to outage, defined by the following formula:

$$\sum_{i=1}^{n}\sum_{j=1}^{m}(P_{i,j} * T_{i,j})$$

where the sum includes all outages that occurred in the period and/or calendar year and area and, for each of these, all direct and indirect users affected by the same outage, where:
n is the number of outages in the period under observation;
m is the number of users affected by the ith outage;
Ti,j and Pi,j are, respectively, the duration (in hours) of the outage and interrupted power (MW) for the jth user affected during the ith outage;
Pi,j is the average constant value of the first 15 minutes if the duration of the interruption is less than or equal to 15 minutes; if the length exceeds 15 minutes, this is estimated based on the forecast and/or historic capacity power diagram.

EPS (Earnings Per Share)
Calculated as the ratio of net profit to the number of a company's outstanding ordinary shares.

Equity
Term used to indicate the shareholders' equity of a company; in the context of asset management, it is used to refer to the stock segment.

Ethical Auditing
Consists in verifying the application of and compliance with the Code of Ethics. The company management assigned this task must ascertain and promote continuous improvement in ethics with the company through analysis and evaluation of the ethical risk control processes.

Extraordinary maintenance
Performed for the recovery and extension of the useful life of a plant, without modifying the functional consistency or technical characteristics, as specified in Attachments 1, 2a and 2b of the Operator-Owner Standard Agreement.

Fault
The yielding of an electric component or a condition of danger to persons or things, which results in a grid element being immediately taken offline. The fault can be:
- transient, when it is eliminated through the automatic sequences of immediate opening and reclosure of the circuit breakers;
- permanent, in all other cases.

Final customer
The natural person or legal entity who purchases electrical energy exclusively for their own use.

Free market
Market where producers and wholesalers of electrical energy, both Italian and foreign, compete freely to provide electrical energy to eligible customers.

Frequency
The number of oscillations per second, in which the value of the alternating current, such as voltage, varies from positive polarity to negative polarity. It is measured in Hertz (Hz).

Fringe Benefit
Compensation in kind, meaning benefits which do not consist in the payment of money, but the use of a service or an object: such as the company canteen, lunch vouchers, company car or mobile telephone.

FTSE4Good
Financial Times index which groups the best companies meeting specific sustainability requirements. These companies are identified by the EIRIS, through specific questionnaires.

Gestore Mercato Elettrico (Energy Market Operator - GME)
Joint stock company created in 2000 by GRTN, which is in charge of the economic management of the electricity market in accordance with criteria of transparency and objectivity, in order to promote competition between producers, ensuring the availability of a suitable level of power reserves.

Gigawatt (GW)
Unit of measurement equal to one billion Watts (1,000 Megawatts).

GRI (Global Reporting Initiative)
An independent international association with the aim of the development and global diffusion of the Sustainability Reporting Framework, in order to support companies which voluntarily decide to publish data regarding their economic, social and environmental performance.

Grid Code (Code for transmission, dispatching, development and security of the grid)
The document that governs the procedures regarding the activities of connection, management, planning, development and maintenance of the National Transmission Grid, as well as dispatching and measurement of electrical energy. More specifically, the Grid Code sets forth transparent, non-discriminatory regulations for:
- access to the Grid and its technical regulation;
- development, management, and maintenance of the Grid;
- the performance of dispatching services;
- the supply of services of measurement and the aggregation of measurements;
- the settlement of financial charges connected to the various services;
- security of the national electricity system.

Grid diagram
Circuit infrastructure of the grid, represented in a single line diagram at a sufficient level of detail to illustrate the elements of the Grid, as well as the components making up such elements.

Grid management
The activities and procedures which determine the operations and the operations forecast, under any conditions, of a power grid. Said activities and procedures include the management of electric power flows, interconnection devices and necessary ancillary services, as well as the decisions to perform maintenance and development works.

Grid operator
The natural person or legal entity who manages a power grid, also without owning said grid.

Grid user
The natural person or legal entity who supplies or is supplied by a transmission or distribution grid.

High voltage (HV)
Rated voltage greater than 35 kV and lower than or equal to 220 kV.

Indirect connection to the NTG
Connection of all plants relevant in terms of the operations of transmission and dispatching, with existing circuit continuity at a minimum of one point, with the interposition of ancillary power plant, to the NTG.

Interconnection line
High-voltage power line in alternating current (AC) or direct current (DC) which links to different electrical transmission or distribution grids or even two generation plants.

Interconnection of electricity grid
Connection between electricity grids required for the transfer of electricity.

Internal Dealing
Governs transparency obligations in relation to the market, for operations in financial instruments of a company or its subsidiaries, performed by persons in possession of significant company decision-taking powers, and which have access to price-sensitive information (“significant persons”).

Interruption
Condition in which the voltage of the terminals delivering electrical energy for a user is lower than 1% of the rated voltage.

Interruption with notice
Interruption generally due to the execution of planned intervention and manoeuvres on the grid, preceded by notice to users involved of the duration of the interruption, using suitable means and with advance notice of no less than one day.

Interruption without notice
All cases of interruption where users are not notified in advance through suitable means and with advance notice of no less than one day. An interruption without notice may be classified as:
- long-term interruption, if it has a duration of more than three minutes;
- short-term interruption, if it has a duration of more than one second but no more than three minutes;
- transient interruption if it has a duration of no more than one second.

IPD (Individual Protection Device)
Any equipment designed to be worn or held by the worker, for the purpose of protecting him/her against one or more risks likely to threaten his/her safety or health in the workplace, as well as any complement or accessory designed for such purpose. IPDs must comply with Directive EEC 686/89 and subsequent modifications, with the EN 345 regulations, as well as Legislative Decree no. 475 of December 4, 1992.

IPO (Initial Public Offering)
Indicates an initial offer of shares of a company being listed. It is a synonym of “Public Offer for Sale”, “Public subscription of shares” and “New listing”.

Italian Authority for Electricity and Gas (AEEG)
Independent authority created by Law no. 481 of November 14, 1995, which is charged with regulating and controlling the electrical energy and gas sectors.

Kilowatthour (kWh)
Unit of measurement that expresses the quantity of electricity equal to 1,000 Watts provided or requested in one hour.

kV
(kilovolt=1,000 Volts) unit of measurement of voltage.

kW
(kilowatt) unit of measurement of power (1 kW=1,000 J/sec), which expresses the amount of energy per unit of time.

kWh
(kilowatthour) and its multiples MWh (Megawatthour, 1,000 kWhs), GWh (Gigawatthour, 1,000,000 kWhs) and TWh (Terawatthour, 1,000,000,000 kWhs) measure electrical energy. They are equal to an amount of kWs (and multiples) over one hour.

Load curve
Diagram which shows the power demand on an electricity grid over time.

Maintenance
Operations and works for the maintenance or recovery of efficiency, and smooth operation of the electric plants, taking into account any decrease in performance.

Medium voltage
Rated voltage greater than 1 kV and lower than or equal to 35 kV.

Megawatt (MW)
Unit of measurement equal to one million watts (1,000 kilowatts).

Monitoring
All the actions through which the current operational status of an electricity system is ascertained.

National electricity system
The national electricity system comprises the total of production plants, transmission and distribution grids, auxiliary services and interconnection and dispatching devices located in the Italian territory.

National Transmission Grid (NTG)
Electricity grid for national transmission as set forth by the Minister of Industry Decree dated June 25, 1999 and subsequent amendments and additions.

Normal alarm condition of an electricity system
Situation in which the total load demand is satisfied, in stable regime there are no violations of operating limits of system components, but the required security criteria are not met.

Normal condition of an electricity system
Situation in which the total load demand is satisfied, in stable regime there are no violations of operating limits of system components, and the required security criteria are met (criterion n-1).

Operation
The methodical use of power plants and accessories according to procedures codified in the implementation of the decisions regarding the operation of the Grid. Operation includes:
- the running of the plants in order to carry out Terna's orders and autonomous deliveries;
- emergency assistance following fault or anomalies;
- operations for going offline and for the security of the plants;
- the monitoring of the status of the plants;
- plant inspections.

Operations planning
Preparation of plans and schedules for the operation of the electricity system.

Partial availability of a grid element
State in which a grid element may be used under conditions different to those provided under operational consistency as set forth in Attachment 1 of the Operator/Owner Standard Agreement.

Permanent disturbance
Disturbance in which, following the automatic opening of the circuit breakers as a result of operation of the protection systems, irrespective of execution of the automatic rapid reclosure or slow reclosure (automatic or manual) of the circuit breakers, repair works are required on grid elements or plant components.

Planned maintenance
Maintenance, not of an urgent nature, which lasts more than or equal to 5 total days, scheduled in the annual unavailability plan, or subsequently agreed.

Planning
Definition of the usage plans, for a specific period of time, for the available means of production and transmission, in order to satisfy the energy requirements with respect to quality and continuity of service.

Power recovery
The activities coordinated by Terna in order to restore an electricity system after a black-out.

Power restart plan
Group of automatic and manual procedures which enable reinstatement of the electricity system to normal operational conditions, following the going offline of the electricity system itself or part of it.

Power station
The part of a grid which is concentrated and closed in a specified site, and used for switching electrical energy among the lines of a grid, for transferring the electrical energy between grids with different levels of voltage, and for transforming the electrical energy to the lowest voltage usable by the user.

Power supply quality
Continuity and regularity over time of the voltage and frequency values of the electrical energy supplied.

Production
Generation of electrical energy, in any way.

Rated voltage of the system
Value of the voltage used to designate or identify the system.

Rating
Letter symbol which expresses the level of risk of securities representing a specific debt. This is one of the most significant tools for forecasting and controlling the risk of insolvency in modern securities markets. Ratings are published by specialised rating agencies. The most well-known, on the global level, are Moody's and Standard & Poor's. Ratings are announced at the moment of issuing the security, but may be subsequently modified (uprating or downrating), which will positively or negatively influence the image of the company and a significant part of trading. The highest rating is indicated starting from the symbol "AAA", "AA+", to arrive at the worst rating, indicated by "D".

Real Time Energy Market (RTM)
The site of trading of bids for the purchase and supply of electrical energy in order to adjust the programmes of energy input and withdrawal defined on the Day Ahead Energy Market (DAEM).

Reinstatement condition of an electricity system
Situation in which, following total or partial load disconnection, the actions required to return the system to normal conditions are carried out.

Reliability
The fulfilment of two conditions:
- **availability:** capability to respond, statically and in every moment, to the customers' global demand for power and electrical energy at the connection points, taking into account planned and forced going offline of the components of the electricity system;
- **security:** capability to respond to sudden disturbances such as short-circuits or forced loss of components of the electricity system. Thus, this aspect specifically considers transition effects which are not covered by the first criterion.

Remote control and telemetry system
Group of remote data transmission devices which allows for the management of plants and the control and measurement of the supply to the client.

Remote control equipment (with reference to the registration of the interruptions in the distribution of electrical energy)
The system used to remotely manage and supervise the high- and medium-voltage distribution grid. This system also registers, automatically and continuously, the events of opening and closure of circuit breakers and other command devices (caused both by remote commands and interventions of protection or by automatic equipment), and events of black-out in the interconnection points with the National Transmission Grid or with other operators.

Requirement
Demand for electrical energy to be satisfied by the national electricity system. It shows a variable trend throughout the day, month and year.

Reserves Market (RM)
The market provided and regulated within the Dispatching Service Market (DSM) for the procurement of the secondary and tertiary reserves.

ROACE (Returns on Average Capital Employed)
Index of return on invested capital; it is calculated as the ratio of the EBIT and net average capital employed by a company.

Routine maintenance
Activity carried out on plants or parts of plants for maintenance or recovery of efficiency and correct functioning, in relation to a fall in performance, without any modification of the number or function of the plants involved. Routine maintenance is defined as:
- periodic or cyclical if the activity regards regularly scheduled interventions independent of external causes;
- conditional or predictive if the activity follows the verification or monitoring of plant functionality;
- occasional if the activity follows upon the existence of anomalies.

Occasional routine maintenance is divided into:
- deferrable maintenance, if the execution of the activity may be delayed by at least one week from the moment that Terna's notified of the anomaly;
- non-deferrable if the execution of the activity, based on the owner's evaluation must be performed immediately and no more than one week from the notification of the anomaly to Terna, in order to avoid danger to persons or things, or the existence of a fault;
- on the fault, if the activity follows upon the existence of anomalies.

Secondary power reserve
Share of power in the generation pool which must cover the imbalance between production and load, due to random variations in requirements, errors in the forecast of requirements, unexpected unavailability of generation (for example, due to breakdowns) and unexpected variations in the programmes of exchange with foreign countries. Generally, based on the operational status of the groups which can make the reserve available, it can be classified into two categories: rotating reserves and cold reserves.

Service quality of electrical energy supply
Quality of the technical/commercial services provided to users, and the quality of the electric parameters of the energy supplied.

Single Buyer
A stock company established in 2000 by the National Transmission Grid Operator (GRTN) to guarantee Captive Customers the supply of electrical energy under conditions of continuity, security and efficiency of the service. The Single Buyer guarantees the application of a single national tariff to these customers.

SRI (Socially Responsible Investment)
Investments which take into account not only economic performance, but also social, environmental and ethical criteria. The choice of shares is guided by negative criteria (exclusion) or positive criteria (inclusion): the first type excludes specific types of companies (e.g. tobacco producers, arms manufacturers etc.) or countries which do not respect human rights or workers' rights, while the second type socially responsible companies are chosen for investment (i.e. those with CSR policies).

Stakeholder
Everyone (individuals, groups, organisations, institutions) interested in the company, especially if directly affected by company's activities in economic terms – such as shareholders, employees, customers and suppliers – but also when only indirectly affected, such as the general public bearing an interest in the protection of the environment.

Static power meter
Energy meter in which the current and voltage, when applied to an electronic measurement element, produce frequency pulses in proportion to the power.

Supervisory Control and Data Acquisition System (SCADA)
Computerised system for controlling production and transmission, with data acquisition functions and human-machine interface, for presenting data to operators in the control centers.

Telecommunications system
Infrastructure composed of a physical means and hardware/software devices required by the Primary Acquisition System in order to acquire the measurement data from the measurement devices.

Transformer
Electrical machine used for the connection and transfer of energy between grids at different voltage levels.

Transforming station
Part of a grid composed of a group of apparata used for transferring electrical energy between grids with different levels of voltage.

Transmission
Electricity transport and transformation activities along the interconnected high- and very-high-voltage grid for the purposes of delivery to customers, distributors, and recipients of self-produced energy.

Transmission activities
The activity of transporting and transforming electrical energy on the grid. Transmission activities include:
- the unified management of the Grid and the parts of electrical stations not included in said grid, but connected and functional to transmission activities pursuant to art. 3, paragraph 5, of the Decree of the Minister of Industry, Commerce and Crafts dated June 25, 1999;
- the planning and identification of development activities;
- annual authorisation of maintenance works.

Transmission line
High- and very-high-voltage power line, overhead or cable, used for the transport of electricity from the production plants to the distribution grids or to users.

Transmission plants
Infrastructures dedicated to the transmission of electrical energy, belonging to the NTG, such as lines and switching stations and transforming stations.

Triad
Group of three conductors (or groups of conductors), each prepared for the transport of one of the phases of the threephase electric field used on the grid in alternating current.

TSR (Total Shareholder Return)
This is the most complete measurement of value created by a company for its shareholders. It is calculated using the following formula: (Share price at end of period - Share price at beginning of period + Dividends)/Share price at beginning of period. The calculation of TSR provides the annual rate of return for an investor who purchased a security on date X and sold it on date Y. This calculation considers all paid dividends reinvested in the security at the coupon payment date.

Unavailability of a grid element
Situation in which an element of the Grid is not usable by the operator for transmission activities. Unavailability may be:
- planned, if it is included in the annual unavailability plan or in the quarterly unavailability plan, and has a duration of less than five days;
- occasional, if not included in the annual plan, but included in the quarterly unavailability plan and has a duration greater than or equal to five days; or it is not included in the quarterly plan but in the monthly plan.

Occasional unavailability may be:
- deferrable, if it involves occasional maintenance which can be deferred;
- non-deferrable, if it involves occasional maintenance which cannot be deferred;
- due to fault, if the result of the existence of a fault;
- due to external causes, if the result of the needs of third parties or events which cannot be attributed to the owner, such as: works or tests requested by operators/owners of bordering grids or other operators, natural disaster, or requirements of public authorities.

Unified Grid management
Coordinated management of all portions of the NTG.

Very high voltage (VHV)
Rated voltage with a value higher than 220 kV.

Volt
Unit of measurement of voltage.

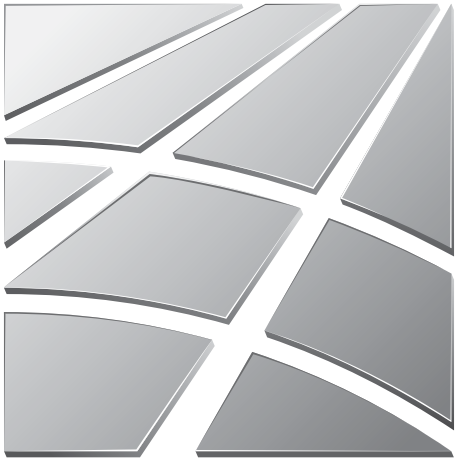
Watt
Unit of measurement of electric power.

Wholesale customer
The natural or legal person which purchases electrical energy without carrying out production, transmission, or distribution activities in the countries of the European Community.

“EVERY YEAR WE PREPARE A DEVELOPMENT PLAN TO ENSURE THAT THE GRID IS ALWAYS ABLE TO COPE WITH THE EVOLUTION OF THE NATIONAL ENERGY SYSTEM.”

Modesto Gabrieli Francescato
Grid Planning

2009



Report

Terna

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(Translation from the Italian original which remains the definitive version)

Independent limited assurance report on the sustainability report

To the board of directors of
Terna S.p.A.

1 We have reviewed the 2009 sustainability report of the Terna Group (the "Group"). The parent's directors are responsible for the preparation of the sustainability report in accordance with the "Sustainability Reporting Guidelines & Electric Utility Sector Supplement" issued in 2009 by GRI - Global Reporting Initiative, as set out in the "Methodological note" section. They are also responsible for determining the Group's objectives in respect of sustainable development performance and reporting, including the identification of stakeholders and material issues, and for establishing and maintaining appropriate performance management and internal control systems from which the reported performance information is derived. Our responsibility is to issue this report based on our review.

2 We carried out our work in accordance with the criteria established for review engagements by "International Standard on Assurance Engagements 3000 - Assurance Engagements other than Audits or Reviews of Historical Financial Information (ISAE 3000)", issued by the International Auditing and Assurance Standards Board (IAASB). That Standard requires that we comply with applicable ethical requirements (the Code of Ethics for Professional Accountants issued by the International Federation of Accountants, IFAC), including independence requirements, and that we plan and perform the engagement to obtain limited assurance, which is less than that obtainable through an audit, about whether the report is free from material misstatement. A limited assurance engagement on a sustainability report consists of making inquiries, primarily of persons responsible for the preparation of information presented in the sustainability report, and applying analytical and other evidence gathering procedures, as appropriate. These procedures included:

- comparing the information and data presented in the "Terna's economic impact" paragraph of the sustainability report to the corresponding information and data included in the Group's consolidated financial statements as at and for the year ended 31 December 2009, on which we issued our report dated 31 March 2010 pursuant to article 156 of Legislative decree no. 58 of 24 February 1998;

- analysing how the processes underlying the generation, recording and management of quantitative data included in the sustainability report operate. In particular, we have performed the following procedures:

  - interviews and discussions with management personnel of Terna S.p.A. to gather information on the IT, accounting and reporting systems used in preparing the sustainability report, and on the processes and internal control procedures used to gather, combine, process and transmit data and information to the office that prepares the sustainability report;

  - sample-based analysis of documentation supporting the preparation of the sustainability report to confirm the effectiveness of processes, their adequacy in relation to the objectives described, and that the internal control system correctly manages data and information;

- analysing the compliance of the qualitative information included in the sustainability report in relation to the guidelines referred to in paragraph 1 and its overall consistency, in particular with reference to the sustainability strategy and policies and the determination of material issues for each stakeholder category;

- analysing the stakeholder involvement process, in terms of methods used and completeness of persons involved, by reading the minutes of the meetings or any other information available about the salient features identified;

- obtaining the representation letter signed by the legal representative of Terna S.p.A. on the compliance of the sustainability report with the guidelines indicated in paragraph 1 and on the reliability and completeness of the information and data contained therein.

A review carried out in accordance with ISAE 3000 is less in scope than an audit, and, therefore, it does not enable us to obtain assurance that we would become aware of all significant matters that might be identified in an audit. Therefore, we do not express an audit opinion on the sustainability report.

The sustainability report includes the corresponding information and data of the prior year sustainability report for comparative purposes, with respect to which reference should be made our report dated 1 July 2009.

3 Based on the procedures performed, nothing has come to our attention that causes us to believe that the 2009 sustainability report of the Terna Group is not prepared, in all material respects, in accordance with the "Sustainability Reporting Guidelines & Electric Utility Sector Supplement" issued in 2009 by GRI - Global Reporting Initiative, as set out in the "Methodological note" section.

Rome, 13 May 2010

KPMG S.p.A.

(signed on the original)

Marco Maffei
Director of Audit

Coordination and Development by Terna S.p.A.

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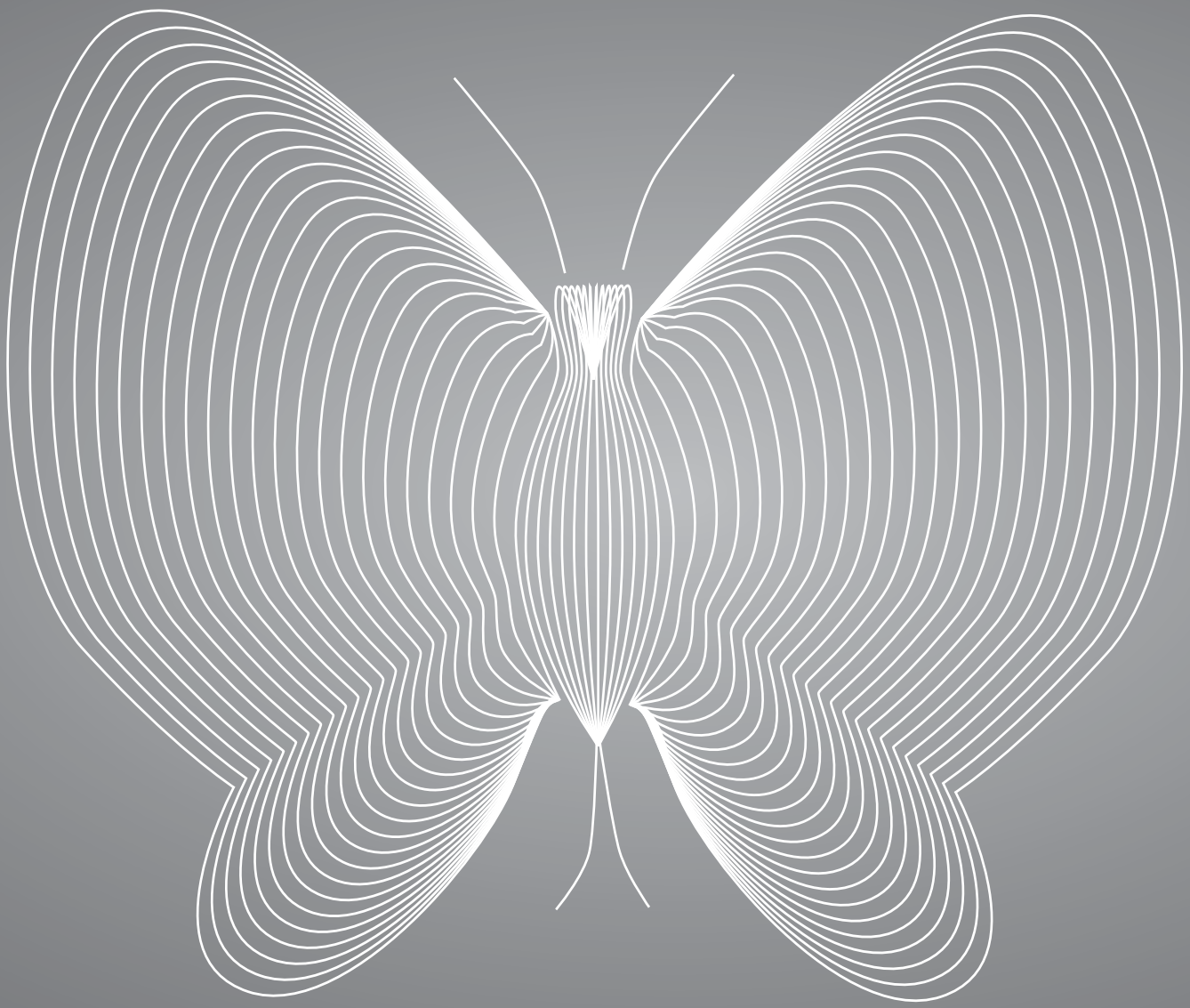
WE WORK FOR A **GRID** THAT'S **LIGHT** FOR THE ENVIRONMENT



WORKING FOR SUSTAINABLE DEVELOPMENT
ALSO MEANS TRANSMITTING ENERGY RESPONSIBLY.
THIS IS TERNA'S JOB.

Terna

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