



Company
Profile

13

14



Key Figures

Turnover:	USD 1.539 billion
R&D:	8.4 % of sales
Employees:	More than 5,500
Global footprint:	72 sites in 30 countries

Landis+Gyr is the leading global provider of integrated Energy Management products tailored to energy company needs and unique in its ability to deliver true end-to-end Advanced Metering solutions. Today, the Company offers the broadest portfolio of products and services in the electricity metering industry, and is paving the way for the next generation of the Smart Grid.

With annual sales of more than USD 1.5 billion, Landis+Gyr, an independent growth platform of the Toshiba Corporation (TKY: 6502) and 40 % owned by the Innovation Network Corporation of Japan, operates in 30 countries across five continents, and employs more than 5,500 people with the sole mission of helping the world manage energy better. More information is available at landisgyr.com.

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Milestones 2013/14

■ France: Landis+Gyr partnered with ERDF to speed up the Smart Grid in France. Both partners are part of a consortium to develop a next-generation chip that will power the millions of devices connected to the grid and allow them to communicate with each other.

..... April

■ USA: Landis+Gyr announced availability of Gridstream™ Meter Data Management System (MDMS) software release 3.2 with improvements centered on fine-tuning integration, performance, ease-of-use, and decision-making capabilities.
■ Japan: Toshiba Corporation and Landis+Gyr teamed up with Japan's New Energy and Industrial Technology Development Organization (NEDO) and the University of Kyoto to study Demand Response impacts at Los Alamos County Utility in New Mexico.

..... July

■ UK: British Gas and Landis+Gyr announced one of the industry's largest Smart Meter contracts, under which Landis+Gyr will supply most of the 16 million Smart Meters being installed by British Gas.

..... September

■ USA: Landis+Gyr signed an agreement with CPS Energy in San Antonio to supply 700,000 advanced residential electric meters for the utility's grid modernization efforts.

..... November

■ Germany: Landis+Gyr signed a cooperation agreement with German utility EnBW to pilot a state-of-the-art Smart Metering system that meets German data protection requirements, which demand the highest levels of end-consumer protection and security.
■ USA: Oregon Electric Utility selected Landis+Gyr to extend its Cloud-based Meter Data Management System (MDMS), and the Salt River Project utility picked Landis+Gyr to upgrade its Advanced Metering Infrastructure.

..... January

■ Finland: Landis+Gyr again demonstrated its status as the Smart Metering front-runner by leading the rollout of Smart Metering systems to 98% of Finland's households, thereby exceeding EU and national targets.
■ USA: Colorado Springs Utilities signed an agreement with Landis+Gyr to initiate an advanced Load Management program to better manage peak power consumption.

..... February

May

■ Japan: Tokyo Electric Power Company (Tepco) selected Toshiba's proposal for a Smart Metering communications system and associated Meter Data Management System (MDMS). Landis+Gyr plays a key role in this project – so far the world's largest Smart Grid rollout.

June

■ USA: Long Island Power Authority (LIPA) selected Landis+Gyr to deploy Advanced Metering and Smart Grid technology on Fire Island.

August

■ New Zealand: SmartCo, a joint venture of New Zealand transmission line companies, selected Landis+Gyr as a preferred Smart Meter vendor for the deployment of its advanced electricity network, which it plans to roll out across New Zealand in the years ahead.

October

■ USA: Middle Tennessee Electric Membership Cooperative (MTEMC), the sixth-largest electric cooperative in the USA, selected Landis+Gyr's Gridstream™ solution for its Advanced Metering and Load Management project.
■ The Netherlands: Landis+Gyr showcased its latest Gridstream™ solution with the integrated new S650 Smart Grid Terminal for low-voltage network monitoring and extended industrial and commercial meter support at the European Utility Week in Amsterdam.
■ USA: Landis+Gyr received Frost & Sullivan's AMI Company of the Year Award, which recognizes companies for demonstrating outstanding achievement and superior performance in areas such as leadership, technological innovation, customer service, and strategic product development.

March

■ USA: Central Lincoln Public Utility District, Oregon's fourth-largest electric utility, selected Landis+Gyr's dynamic voltage management solution to improve energy efficiency across its distribution system.
■ Europe: Landis+Gyr obtained prestigious certification for demonstrated excellence in information security management at its production sites in Greece and the UK.
■ USA: Landis+Gyr validated the real-world scalability of its Gridstream™ MDMS by successfully completing a performance benchmark test. The test was conducted with 30 million meters and recorded sustained processing of more than 427 million meter reads per hour.

Message From the Chairman

Landis+Gyr and Toshiba's ambition is to contribute to tomorrow's Smart Communities by offering the technology for a secure and efficient energy infrastructure while providing the greatest flexibility in integrating renewable sources and intelligently balancing supply and demand.

Joining Forces

Hiroshi Kurihara, Chairman Landis+Gyr AG

In 2013/14 Landis+Gyr and Toshiba Corporation strengthened their undisputed position as the leading one-stop provider for future Smart Community solutions by combining their expertise and unique technology portfolio and addressing new business development opportunities. Joint collaboration in the areas of R&D, components as well as business develop-

ment and marketing was intensified. Fast-growing market demand and new customer needs were identified, especially in the areas of Micro Energy Management Systems (μ EMS), interoperability and the integration of complementary technologies, as well as for enhancing existing infrastructure with state-of-the-art Head-End (HES) and Meter Data Management Systems (MDMS). Beyond these application fields, the two companies are working on new products and solutions to bring the vision of Smart Communities nearer to today's society.

Working closely with the highly experienced and skilled management team bolsters my confidence that Landis+Gyr will successfully navigate through the current market turmoil caused by structural change, the ongoing replacement of fossil fuels with renewable energy sources, and the constraints on public-sector investment spending. It is important that the Company steadfastly implement its strategy as a front-runner. In this context we are particularly pleased to have received Frost & Sullivan's 2013 AMI Company of the Year Award for demonstrating outstanding achievements and superior performance in areas such as leadership, technological innovation, customer service, and strategic product development. This award underscores the Company's ability to win major new contracts with utilities across the globe, which include the two largest Smart Meter roll-outs to date, British Gas and, in partnership with Toshiba, Tokyo Electric Power Company (Tepco). All of us at Toshiba congratulate and thank Landis+Gyr for these major achievements.

Hiroshi Kurihara, Chairman Landis+Gyr AG



Ownership

Toshiba Corporation	60 %
Innovation Network Corporation of Japan	40 %

TOSHIBA
 Leading Innovation >>>



Landis+Gyr Group

Landis+Gyr ended the year with a record-high order backlog while generating lower sales in 2013/14. Looking forward, the Group is confident sales will rebound thanks to the new technology agreements and major contracts signed during the year.

Substantially Increased Order Intake

In its financial year ending March 31, 2014, Landis+Gyr, an independent growth platform within the Toshiba Group, achieved sales of USD 1.539 billion (2012/13: USD 1.669 billion). Given the challenging global environment characterized by certain regional market slowdowns, continued budget constraints in the public sector and structural change in connection with the substitution of fossil fuels by renewable energy sources, the overall market experienced a significant contraction. Landis+Gyr was unable to escape this general trend as sales fell 7.8%, primarily due to the postponement of Smart Metering projects previously planned for the reporting period. Sales in the Americas and EMEA regions tracked the broader market decline, whereas sales in Asia Pacific decreased by 23.7% compared to the previous year, mainly as a result of a general contraction in the Advanced Metering Infrastructure (AMI) sector as well as several

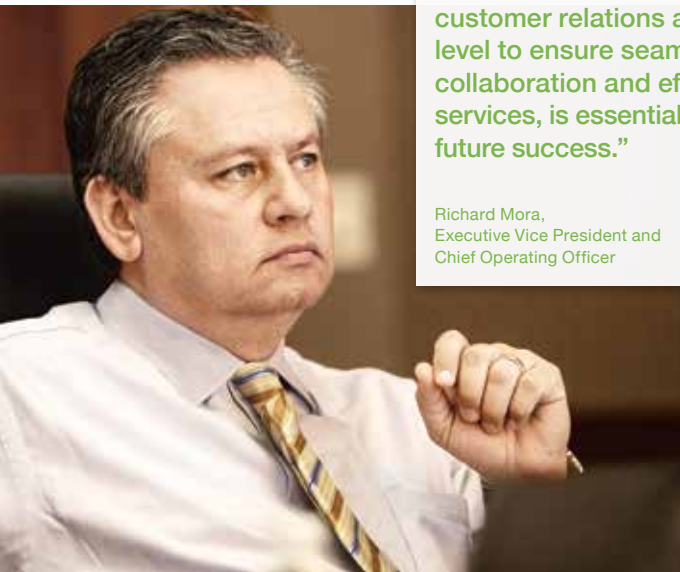


“By building on the strength of our technology portfolio we will play a key role in many of the upcoming Smart Meter rollouts worldwide as markets and demand pick up.”

Andreas Umbach,
President and Chief Executive Officer

project delays in Australia and the completion of a Smart Metering rollout in Victoria. Nevertheless, the number of meter devices produced and delivered increased slightly to 17,381,000 units in 2013/14 (2012/13: 17,273,000; +0.6%). Delays in various Advanced Metering projects resulted in a shift of the product mix away from bidirectional communicating smart devices.

Even though the Company suffered this temporary setback in the 2013/14 financial year, Landis+Gyr is looking to the future with confidence and expects to regain business momentum and revitalize its top-line performance. This guidance is underpinned by the highest-ever year-end order backlog. It reached



“Offering global solutions with cutting-edge technologies, while maintaining strong customer relations at the local level to ensure seamless collaboration and efficient services, is essential for our future success.”

Richard Mora,
 Executive Vice President and
 Chief Operating Officer

USD 2.879 billion as of March 31, 2014 (March 31, 2013: USD 2.150 billion; +33.9%), primarily due to the substantially increased order intake of USD 2.363 billion from the previous year (March 31, 2013: USD 1.423 billion; +66.1%). Based on these positive developments Landis+Gyr is confident it will further strengthen its leading market position in the years to come thanks to its innovative state-of-the-art products and solutions.

Winner of the Two Biggest Contracts

Landis+Gyr participated in state-of-the-art Smart Metering rollouts worldwide and scored significant new contract wins for ongoing or newly initiated projects in the year under review. A major announcement and a strong contributor to the Company’s future business success is the GBP 600-million large-scale Smart Meter deal with British Gas announced in September 2013. Under this agreement, the majority of British Gas’ 16 million Smart Meters will be supplied by Landis+Gyr for homes and businesses by 2020. The deal is the largest of its kind worldwide, and allows Landis+Gyr to achieve significant economies of scale in meter production and to expand its UK presence. The second-largest contract win industry-wide during the reporting period was likewise claimed by Toshiba and Landis+Gyr in May 2013 at Tokyo Electric Power Company (Tepco). While Toshiba will work as the prime contractor and system integrator of the communication system, Landis+Gyr will supply much of the project’s technical foundation, including the Head-End System (HES), network expertise, RF communications modules, and the Meter Data Management System (MDMS), providing Tepco with tools to help their 27 million customers manage energy better.

In April 2013, Landis+Gyr joined SOGRID, a consortium created to develop a next-generation chip that will power the millions of devices connected to the grid and allow them to communicate with each other. SOGRID is led by the French energy provider ERDF and the European semiconductor leader STMicroelectronics. In addition to SOGRID, Landis+Gyr France was one of the strategic suppliers for the Linky pilot project conducted by ERDF, which saw 300,000 Smart Meters successfully deployed in France by 2011. ERDF plans to deploy a total of 35 million Smart Meters in its domestic market by 2020. The renewed technological partnership puts Landis+Gyr in a favorable position to participate in this major rollout.

Sales 3rd worldwide, in million USD (– 7.8%) **1,539**

Americas		Total
2012/13	49 %	815
2013/14	49 %	741
EMEA		Total
2012/13	35 %	587
2013/14	38 %	575
Asia Pacific		Total
2012/13	16 %	266
2013/14	13 %	203



“We must deliver the solutions our customers need as they make the energy system smarter. My efforts focus on pushing innovative models for new business opportunities around the world.”

Roger Amhof,
Executive Vice President and
Chief Strategy Officer

In August 2013, SmartCo, a joint venture of New Zealand electricity transmission line companies, selected Landis+Gyr as a preferred Smart Meter vendor for the planned deployment of its advanced electricity network in New Zealand. SmartCo will serve more than 250,000 urban and rural consumers across New Zealand.

In January 2014, Salt River Project (SRP), the third-largest public power utility in the USA, providing electricity to about 985,000 customers in central Arizona, including the Phoenix metropolitan area, signed a ten-year agreement with Landis+Gyr to update and expand the Advanced Metering and prepay technology infrastructure used by its 142,000 prepay customers. SRP’s M-Power program is the largest electric prepayment program in the USA. The utility plans to install more than 1 million state-of-the-art Advanced Meters to offer both credit and prepayment options to all its customers beginning in summer 2014. These achievements underline the expertise and strong commitment of all Landis+Gyr employees as they consistently execute the Company’s mission to help the world manage energy better.

Reinforced Technological Leadership

In the reporting period, Landis+Gyr continued to demonstrate its ability to offer superior customer value in successful projects with leading utilities. It launched various new products and software solutions. At the European Utility Week in Amsterdam in October 2013, Landis+Gyr showcased its latest Gridstream™ solution with the integrated new S650 Smart Grid Terminal for low-voltage network monitoring and extended industrial and commercial meter support. Among the new software solutions released in 2013/14 were the Gridstream™ Meter Data Management System (MDMS) software release with improvements centered on



fine-tuning integration, performance, ease-of-use, and decision-making capabilities as well as an updated version of the operating software for monitoring and control of Gridstream™ Advanced Metering and grid management solutions.

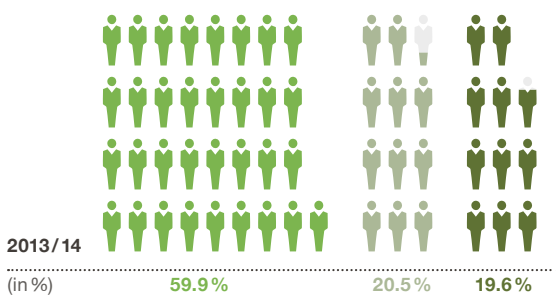
Moreover, the Company fully integrated the previously acquired Meter Data Management System (MDMS) from Ecologic Analytics in its Gridstream™ Smart Grid solution suite and expanded its joint business development initiatives with Consert, an intelligent Energy Management company acquired by Toshiba Corporation in February 2013 that converts electricity consumption in homes and small businesses into cost-effective



“Cash flow generation in 2013/14 was strong again for the third year in a row with net debt falling to USD 435 million and a debt-to-equity ratio of 24.8 %. This provides Landis+Gyr with an outstanding platform from which to finance future growth strategies.”

Jonathan Elmer,
 Executive Vice President and
 Chief Financial Officer

Employees worldwide 5,527



	2012/13	2013/14
Operations	3,073	3,309
R&D incl. Product Management	1,034	1,135
SG&A	1,206	1,083
Total	5,313	5,527

clean sources of capacity and energy reserves for utilities. Consert, through its Virtual Peak Plant (VPP) offering, extends Landis+Gyr’s fully integrated, intelligent Load Management solution for utilities, providing them with improved forecasting and capacity management, real-time outage management information, remote service connections and significantly enhanced customer service as well as end-consumer communications opportunities.

To strengthen and advance the Company’s vision of supporting people manage energy better, Landis+Gyr continued to invest in R&D projects, spending a record USD 129.6 million or 8.4 % of sales. These investments ensure further broadening of the Group’s state-of-the-art product and solutions pipeline.

Another milestone supporting Landis+Gyr’s efforts to strengthen customer capability and confidence with its solution offering was the signing of a cooperation agreement with German utility EnBW to pilot a

“We partner with the world’s best suppliers and the Toshiba procurement team, to optimize value for our customers, fostering a collaborative, innovative and sustainable procurement process across the Landis+Gyr Group, based on Monozukuri: excellent products at competitive cost, and made with passion.”

Dieter Hecht,
Executive Vice President and
Chief Procurement Officer



state-of-the-art Smart Metering system that meets German data protection requirements, which demand the highest levels of end-consumer protection and security. This achievement was underscored by the ISO 27001 certification received by Landis+Gyr’s production facility in Corinth, Greece, and its three sites in the UK in March 2014, which attest to the Group’s adherence to the highest levels of information security management as specified by recognized global standards in developing and manufacturing its Smart Metering products and solutions.

Realignment of Executive Team

At the beginning of 2014, Landis+Gyr realigned executive responsibilities and created new roles to spur the growth of business worldwide and adapt the organization to new customer requirements. Effective as of January 1, 2014, Richard Mora left his previous job as Executive Vice President Americas and was promoted to the newly created position of Chief Operating Officer based in Zug, Switzerland. Today, all regions report to Richard Mora and he also coordinates R&D and quality efforts. While the regional organization is a

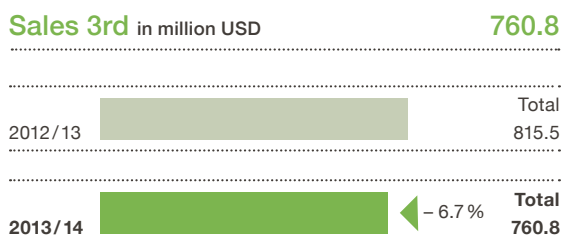
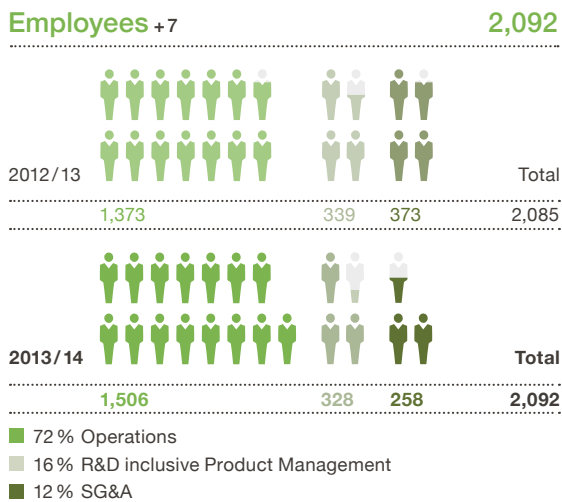
key success factor for the Group’s leadership position in energy meters, one of Richard Mora’s first priorities has been to review the best organizational structure and approach to coordinate global R&D efforts for Smart Grid, Smart Metering, related software and network communications technologies. His successor as Executive Vice President for the Americas region is Prasanna Venkatesan, who was most recently Landis+Gyr’s Senior Vice President and General Manager for the systems and services business in North America. In addition, Roger Amhof, who joined Landis+Gyr from Ernst & Young in April 2014, was named Chief Strategy Officer, the second new Zug-based executive position. Roger Amhof has been a trusted advisor of Landis+Gyr’s for many years. In his new role he is responsible for expanding corporate and business growth strategies, including international partnerships, ventures and innovative models for new business opportunities around the world.





Americas

In a fragmented market environment characterized by a varied Smart Metering rollout status, Landis+Gyr's sales in the Americas region decreased by 6.7 % to USD 761 million in 2013/14, in line with local market performance. However, Landis+Gyr is well positioned to outperform the market in the years to come.



Paving the Way for Future Growth

Prasanna Venkatesan, Executive Vice President Americas

A major focus of North American operations in 2013/14 was supporting the Group's efforts to develop the solution to meet the demanding technical requirements necessary for Tokyo Electric Power Company (Tepco), Japan's biggest utility. This technical capability builds on the region's existing know-how and forms the foundation for the Smart Metering communications and associated Meter Data Management System (MDMS) being delivered. Toshiba is acting as a prime contractor and system integrator of the communication network together with NTT Group and NEC Corporation. Tepco's 27-million-unit Smart Meter project is not just about Smart Meters though. It is also about creating an open-standards end-to-end, citywide Energy Management platform, meant to link meters, utility enterprise platforms and smart devices in homes and businesses. The project is likely to influence how the rest of Japan – and possibly Asian markets in general – approach the next generation of Smart Grid deployments.

In addition, today's utilities are confronted with changing generation resources and grid performance resulting from a shift to distributed energy resources and a need to manage bidirectional energy flows. Major projects are creating a need for energy storage systems that can adapt rapidly to changes on the grid. To explore these new requirements, Landis+Gyr is participating in the groundbreaking Los Alamos Smart Community project in New Mexico. Sponsored by the New Energy and Industrial Technology Development Organization of Japan (NEDO), Los Alamos County is testing the viability of a solar-fed microgrid with battery storage as part of a wider Demand Response program involving variable pricing and consumer engagement.

“We will expand our efforts to address the challenges utilities face by delivering solutions that support reliable and resilient energy grids, improved operational efficiencies through analytics and renewables integration. These areas are key for enhancing the distribution systems.”

Prasanna Venkatesan,
Executive Vice President Americas



High Number of Project Wins

In 2013/14, Landis+Gyr North America again won important new customer contracts in addition to managing numerous ongoing projects. These included the continued rollout at Hydro-Québec and the completion of landmark projects at Oncor and AEP Texas. PSEG Long Island selected Landis+Gyr to deploy Advanced Metering and Smart Grid technology on Fire Island. Middle Tennessee Electric Membership Cooperative (MEMCO) partnered with Landis+Gyr for the rollout of its Advanced Metering and Load Management project. Furthermore, new contracts were completed with CPS Energy, Central Lincoln Public Utility District, Salt River Project (SRP), and Colorado Springs Utilities. In February 2014, the regional management announced 13 new contracts for the Group's Gridstream™ PLX system, its next-generation power line carrier network. The new contracts bring the total number of utilities deploying PLX technology since its release at the end of 2012 to 24. Throughout the year, 9 projects employed Gridstream™ two-way water meter reading, expanding the resource management reach of the solution. A special 2013 milestone was

the integration of Consert Inc into the North American operation, following the acquisition of Consert by Toshiba in February 2013. Landis+Gyr can now offer utilities innovative solutions that reduce peak energy consumption by utilizing two-way wireless communications to establish a power management partnership between power utilities and consumers.

Solid Performance in South America

In South America, sales developed in line with targets, supported by the high volume of electricity meters sold to Companhia Paranaense de Energia (Copel), which serves more than 3 million customers in the southern Brazilian state of Parana, Coelce, serving close to 2 million customers in the northeast, Energisa Group, serving nearly 800 towns and 4 million customers in the north, northeast, west, central and southeast of Brazil. Shipments of SGP+M units delivered to Ampla and Light, both in Rio de Janeiro State, contributed to Landis+Gyr's dominant position of nearly 80% market share in Brazil's AMI segment. Additional shipments to CRE (Bolivia), Codensa (Colombia), Electricaribe (Colombia), EPE (Argentina), EPEC (Argentina) and ANDE (Paraguay) contributed to the region's overall performance.

While the deployment of Smart Metering infrastructure is still in its very early stages in South America, Landis+Gyr is one of the front-runners in the development of these markets and is participating in a number of groundbreaking pilot projects, among them Advanced Metering installations in the cities of Búzios and Sete Lagoas (both Brazil).





EMEA

In 2013/14, sales in EMEA declined by 2%, a contraction clearly smaller than in other regions, thereby outperforming the corresponding regional dynamics, thanks to strong anchor positions in various European markets.

EMEA Region Outperforms the Market

Richard Mora, acting Executive Vice President EMEA

Landis+Gyr's EMEA (Europe, Middle East and Africa) teams operated in an ongoing challenging market environment in the 2013/14 financial year. Thanks to a state-of-the-art product and services portfolio as well as its unmatched experience in Smart Meter rollouts, Landis+Gyr outperformed the general market. Nevertheless, the EMEA activities also experienced a contraction in sales, which were down 2% primarily due to delays and postponements of Advanced Metering projects throughout Europe. Markets in Europe remained soft because of the constraints on public investment spending in several countries in the aftermath of the financial crisis. However, this effect is expected to be limited over the mid-term thanks to the priorities set out in the European Union's Third Energy Package and the corresponding 20-20-20 goals.

Employees +161 2,207



- 54 % Operations
- 19 % R&D inclusive Product Management
- 24 % SG&A
- 3 % Group Headquarters

Sales 3rd in million USD 575.2



Three Landmark Highlights

A major success in the period under review was the GBP 600-million contract Landis+Gyr signed with British Gas in September 2013. As part of a government initiative, Smart Meters will be rolled out as standard to homes and businesses across Great Britain by 2020. This deal is the largest of its kind. Landis+Gyr also sealed a partnership agreement with ERDF to speed up Smart Grid deployment in France. Under this agreement Landis+Gyr joined a consortium created to develop SOGRID, a next-generation chip that will power the millions of devices connected to the grid and allow them to communicate with each other. A third milestone was the agreement with German utility EnBW to pilot a state-of-the-art Smart Metering system that meets German data protection requirements, which demand the highest levels of end-consumer protection and security.

Finland, a Smart Metering Front-Runner

In Finland, Landis+Gyr led the rollout of Smart Metering systems to 98 % of the country's households. This achievement makes Finland one of the most advanced metering markets in Europe. The project in which Landis+Gyr delivered one out of every three meters installed was quite complex, including logistics for the management of old and new meters, system installation and integrations as well as comprehensive field testing prior to project acceptance.

Recently, Landis+Gyr secured an Advanced Metering Management (AMM) contract in Poland from RWE, one of Europe's leading electricity and gas companies, for an interoperable device interface specifications (IDIS) certified solution to be implemented and installed by the end of 2014. The contract also includes maintenance of the IT system for a period of four years. In the Netherlands, Landis+Gyr received orders from Stedin, Enexis and Liander, all three innovative utilities driving the Smart Meter rollout in that country. These and other new contracts made the Netherlands Landis+Gyr's second-largest gas meter market in the EMEA region, right behind the UK, and put the Group in the market leader position for electricity meters and for gas meters in targeted countries. In Germany, the Group also signed new contracts for heat meters with various OEMs and end customers.



“The British Gas contract is the biggest of its kind the industry has ever seen. We will supply the majority of the 16 million Smart Meters British Gas will install in its customer base.”

Richard Mora,
acting Executive Vice President EMEA

Joint Presence with Toshiba at European Utility Week

Landis+Gyr and its parent company Toshiba joined forces at the European Utility Week in Amsterdam held in October 2013. The two companies showcased their joint product and solution highlights, such as Micro Energy Management System (μ EMS), the latest Gridstream™ Meter Data Management Systems (MDMS) software release, upcoming enhanced PLC communication security in Head-End Systems (HES), scalability performance improvements, as well as their combined expertise and collaborative efforts in the Smart Grid area.





Asia Pacific

In 2013/14, sales in the Asia Pacific region declined by 23.7%. The financial year under review was greatly influenced by unfavorable market conditions, including delayed Advanced Metering Infrastructure decisions and adverse currency movements. In spite of this, we are increasing our capacity for future growth, including increasing the R&D resources at the Group Development Center at Noida by 17%.

Preparing for Smart Meter Rollout in Japan

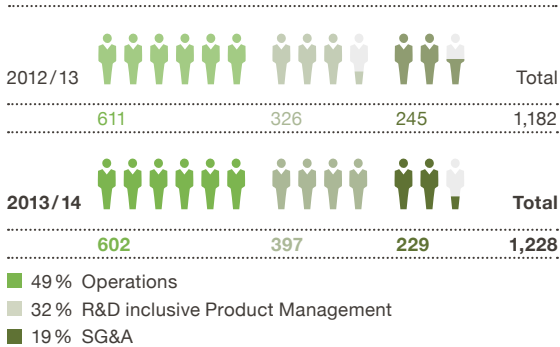
Oliver Iltisberger, Executive Vice President Asia Pacific

Landis+Gyr's Asia Pacific organization quickly adapted to the altered market conditions by adjusting its cost structures to cope with the temporary contraction in volumes in the years to come. Following the Group's substantial efforts to meet the requirements of Tokyo Electric Power Company (Tepco) in a large-scale energy infrastructure upgrade project awarded to Toshiba and Landis+Gyr in May 2013, the regional Asia Pacific management is currently evaluating opportunities to establish a new group company in the Japanese market focused on distribution and customer service. Landis+Gyr's Group Development Center in Noida, India, is working on specifications tailor-made to the needs of the Japanese market, where an acceleration of the Smart Meter rollout is expected once the Tepco project has paved the way. Landis+Gyr Asia Pacific also plans to play a key role in future Smart Metering projects in Japan, building on Toshiba Corporation's excellent customer network.

Joining New Zealand's Electricity Providers

In pursuit of a new business model for the New Zealand energy market, SmartCo, a joint venture of New Zealand transmission line companies, selected Landis+Gyr as a preferred Smart Meter vendor for the deployment of an advanced electricity network in New Zealand. Our solution for SmartCo, which will bring together New Zealand's electricity distributors

Employees +46 1,228



Sales 3rd in million USD 203.3



“The Group’s state-of-the-art technology portfolio has attracted utilities across the region to Advanced Metering projects, such as our pioneering AMI pilot with Tata Power, India’s leading private power distribution utility.”

Oliver Iltisberger,
Executive Vice President Asia Pacific



In India, Landis+Gyr achieved successful on-time delivery of 1.5 million electricity meters for West Bengal State Electricity Distribution Company Limited (WBSEDCL) last year, placing it in a strong position to win further business with this utility. Landis+Gyr is also part of the project team for India’s first AMI pilot contract. The Tata Power Delhi Distribution Limited initiative – which includes end-to-end solutions involving meters, RF communications, network elements, meter data management and analytics – has attracted great interest from the energy industry. Revenue in India grew by 51 % in local currency terms.

In China, Landis+Gyr continued to face a challenging market environment. New contracts were won by the Group, especially in tender offers with a focus on product quality and reliability. In the area of heat meters, Landis+Gyr expanded its position, allowing the Group to build up a dedicated heat meter manufacturing line in Zhuhai.

and retailers for greater operational efficiency, will create a variety of Demand Side Management opportunities. The SmartCo deployment is an important milestone in the development of Smart Metering and Smart Grid technology in New Zealand. It brings to market a platform capable of meeting both retailers and network companies’ requirements for managing energy better. Together with SmartCo, Landis+Gyr will deploy the functionalities of an enhanced Smart Metering technology, delivering benefits that include remote reading of electricity consumption, real-time notification of outage and power quality data, and advanced management of Load Control solutions.

Promising Prospects and Project Leads

In Australia, Landis+Gyr is fine-tuning its product and service offering as the Victorian push to deploy Smart Meters is wrapped up and gives way to different approaches in other states. There are many attractive options for these expanded offerings, which will be introduced later in 2014.





Manage Energy Better

Energy providers are arriving at a new frontier. Ahead lies the promise and potential of the Smart Grid, the path to more efficient, less costly, cleaner, and safer energy distribution. This new path poses a dual challenge to retrofit and modernize the existing grid and to design tomorrow's energy grid.

Transforming Energy Grids

The energy market is currently undergoing a transformation process requiring energy grids with even more built-in intelligence, communication, and the flexibility to adapt to the future. Technological progress and new supply sources are creating new challenges for power grids. The concept of large-scale centralized power generation and transmission to end users is evolving as decentralized micro-systems, renewable energy and new power storage capabilities enter the picture. For the global community, this transformation creates new opportunities to reduce carbon emissions and increase energy efficiency. This process requires the utilities to adapt to the new trend toward more flexible management of power supply. Both utilities and end customers must have access to power-relevant information in order to better control energy distribution and use. Landis+Gyr is committed to supporting and providing products and services that satisfy those needs.

By offering an extensive portfolio of energy meters, integrated Smart Metering solutions, and Smart Grid applications, Landis+Gyr enables utilities and end users to make better use of scarce resources, reduce operating costs and protect the environment by managing energy better. The Company's central strategic drivers as outlined below support this goal:

- Focus on utility customers
- Leading in technology
- Cost competitiveness and synergies
- Operational excellence
- Valuing employees



Smart Grid Applications

Smart Grid Applications

In its strategic vision 2020, Landis+Gyr seeks to establish the leading industry offering for Smart Grid applications, including:

- Advanced Distribution infrastructure control and management and substation automation and supervision
- Demand Side Management and distributed Load Control including street lighting
- Distributed energy resource and renewables integration management
- Micro Energy Management solutions including storage
- Virtual Power Plant and advanced data analytics

Over and above these opportunities, Landis+Gyr will benefit from the further integration of Toshiba's capabilities and technologies into its own Smart Grid offering.



Smart Metering Solutions

Smart Metering Solutions

In the field of Smart Metering solutions, Landis+Gyr covers all major communications technologies – currently holding a 20% plus global market share. In close collaboration with customers, Landis+Gyr provides major innovations for new solutions. It is the Group's goal to lead the industry in open architecture, interoperability and modularity to provide seamless integration of Landis+Gyr's market-leading Gridstream™ solution with state-of-the-art IT systems. Ongoing improvements ensure future-proof solutions through scalability, speed and robustness of technologies.



Energy Meters

Energy Meters

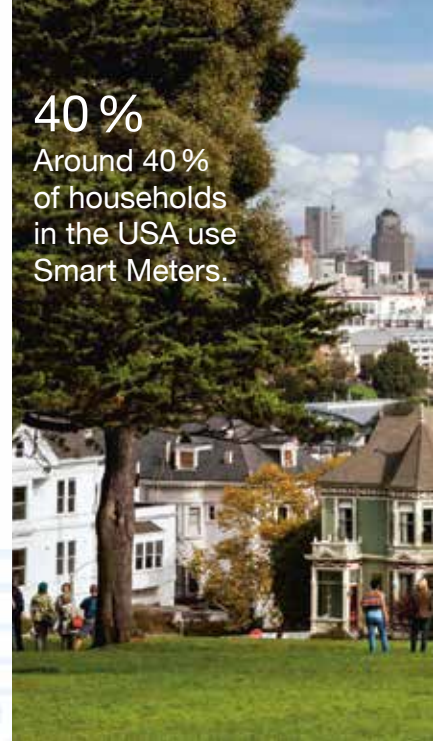
In its energy meters business, Landis+Gyr's ambition is simple: to meet customer requirements around the world and build the industry's broadest portfolio. Highest quality standards and long-term reliability combined with cost competitiveness and superior lifecycle cost represent the added value that the Company offers its clients. The Group's organization has the flexibility to capture additional business opportunities to maintain and expand Landis+Gyr's position as market leader with a 15% share of the global market.

Americas

North America is a dynamic, highly technology-driven market that faces a somewhat challenging market environment with high regulatory pressure. Meanwhile, South America is experiencing an economic slowdown resulting in a tougher market environment for utilities.

- Natural disasters and other events, such as blackouts, have decreased the confidence North American consumers have in power reliability. The state of repair for public energy transmission and distribution assets accentuates the need for continued investments in the power grid infrastructure.
- The expansion of distributed generation, the advancement of technology in the areas of energy storage and the growth of electric vehicle adoption all impact the distribution of energy for utilities. They must find new ways to manage and control the delivery of high-quality energy in this changing environment.
- The struggling economy in South America has led to some foreign investment decrease and regional currency weakness affecting the market environment for utilities. On the other hand, the large share of hydraulic power generation makes the integration of decentralized power generation assets less urgent.

40 %
Around 40 %
of households
in the USA use
Smart Meters.



1 Million

Brazil is implementing pilot projects with over one million Smart Meters deployed.



8 of 10

Eight of the ten countries
in South America already
have significant Smart Grid
pilot projects in place.





14 Million

Over 20 utilities with nearly 14 million end points rely on Landis+Gyr's unique managed service offering in North America.



11 Million

Landis+Gyr delivered over 70 Grid-stream™ solutions with more than 11 million end points in North America.



Expected Future Grid Transformation

Expectations and viewpoints of 53 utilities worldwide about the future developments of energy grids

Business Model Changes

Level of business model changes compared with today

NA (North America)



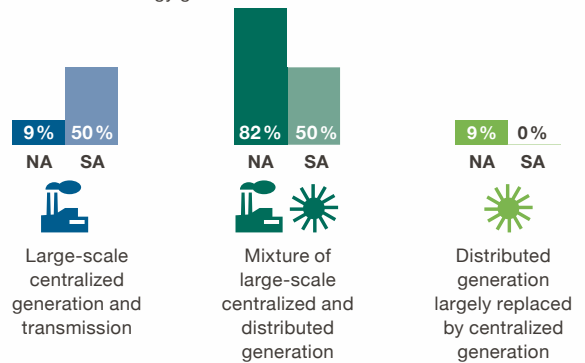
SA (South America)



Legend: ■ The same ■ Important change ■ Transformed

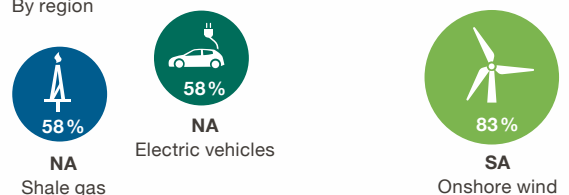
Expected Future Market

Direction of energy generation transformation



Top Technological Impact

By region



Landis+Gyr Demonstrates Its Pioneering Role

With cost pressures and the aging infrastructure in the North American markets, upgraded metering technologies, improved network information and Smart Grid technologies that support dynamic pricing models and Demand Response options are favored. In South America, the modernization of power grids is one of the key priorities of the utilities.

- Advanced Metering Infrastructure helps North American utilities balance load and allows consumers to monitor their energy use and adapt their behavior, both of which help stabilize volatile energy consumption patterns.
- The deployment of Smart Grid applications is at an advanced stage in this region. With the introduction of a new Virtual Power Plant solution (VPP) and distribution grid management solutions, Landis+Gyr offers its clients a technological platform that accommodates current and future needs.
- In South America, high energy losses – both technical and nontechnical – are challenging. A high percentage of these losses are related to energy theft. Landis+Gyr's anti-theft offering including underground vault solutions has attracted considerable interest from utilities.



Nashville Electric Service (Tennessee)

NES is the 12th largest municipal-owned power company in the United States. The utility provides electric service to 360,000 customers in the Nashville greater metropolitan area and purchases all power from Tennessee Valley Authority (TVA). Challenges include; rising peak power costs for distribution utilities; implementing low impact, high return demand response; maintaining power quality, reliability and customer satisfaction.



Hydro-Québec (Canada)

Hydro-Québec is Canada's largest electricity producer and one of the world's largest hydroelectric power producers. It boasts 35,829 MW of installed generation capacity and a 33,900-km-long transmission network and serves 114,650 km of distribution lines as well as 4.1 million customers. Stricter measurement requirements in Canadian standards require the utility to provide more precise meter information.



Salt River Project (Arizona)

Salt River Project (SRP) is the third-largest public power utility in the USA, providing electric service to about 985,000 customers in central Arizona, including the Phoenix metropolitan area. SRP's M-Power meets the latest customer billing requirements and is the largest electric prepayment program in the USA offering both credit and prepayment options.

Landis+Gyr – Solution

- System-wide Gridstream RF communications network to support voltage management and load control
- 60,000 advanced meters returning voltage at key points in the service area
- Integration of AMI data and distribution automation controls

Benefit

- 41 MW of peak demand reduction through advanced voltage management
- Potential of additional reduction from direct load control
- Over USD 6.5 million in power cost savings since program inception

“Landis+Gyr delivers a wide range of smart grid solutions helping us realize significant power cost savings and supporting our load management goals.”



Tony Richman,
Meter Services Manager Smart Grid, NES

Landis+Gyr – Solution

- Deployment of 3.75 million end points from 2012 to 2016
- Residential meters provide 15-minute data intervals; 5-minute C&I data, service disconnect and HAN, integration with MDM
- Advanced security functionality

Benefit

- Project is ahead of schedule:
- Successful and quick proof of concept
 - Nearly 2 million end points deployed
 - 99.8% read success rate
 - Meeting all technical milestones

“We are very glad to have partnered with Landis+Gyr for our Smart Meter deployment because they offer the best value proposition in the market. Landis+Gyr’s mature, evolvable technology makes us more efficient.”



Georges Abiad,
Directeur Infrastructure de Mesurage Avancée,
Hydro-Québec

Landis+Gyr – Solution

- Gridstream™ RF network to support ongoing improvements to the technology used by SRP’s 142,000 prepay customers
- More than 1 million E350 AX-SD meters

Benefit

- Providing SRP with the technology to offer its customers convenient access to a broader range of information
- Supporting many options for utilities offering prepayment choices

“Our M-Power program helps our customers to manage their energy budget. We will now have the tools to expand prepayment options to our entire customer base in the coming years.”



Michael Mendonca,
Senior Director of Revenue Cycle Service, SRP

EMEA

The EMEA region shows a heterogeneous picture regarding its energy infrastructure modernization efforts. The picture in countries outside the European Union is similar, the one difference being that a fundamental transformation of energy systems is viewed with less urgency at the political level.

- The European energy policy targets to a 20 % increase in energy efficiency, a 20 % reduction of CO₂ emissions, and 20 % renewables by 2020. The transformation requires large-scale implementation of Smart Metering technology and a smart electricity grid.
- Countries such as Finland and Sweden are at advanced stages whereas other EU nations are moving at a slower pace. The sluggish economic recovery from the financial and sovereign debt crisis has not allowed for an acceleration of efforts to introduce Smart Grids.
- For some large EMEA countries outside the EU, energy issues are not yet a political priority as conventional energy is still inexpensive, such as in Russia and in the Middle East. In Africa, prevailing regulatory uncertainty and low electrification rates represent the main challenges for utilities.

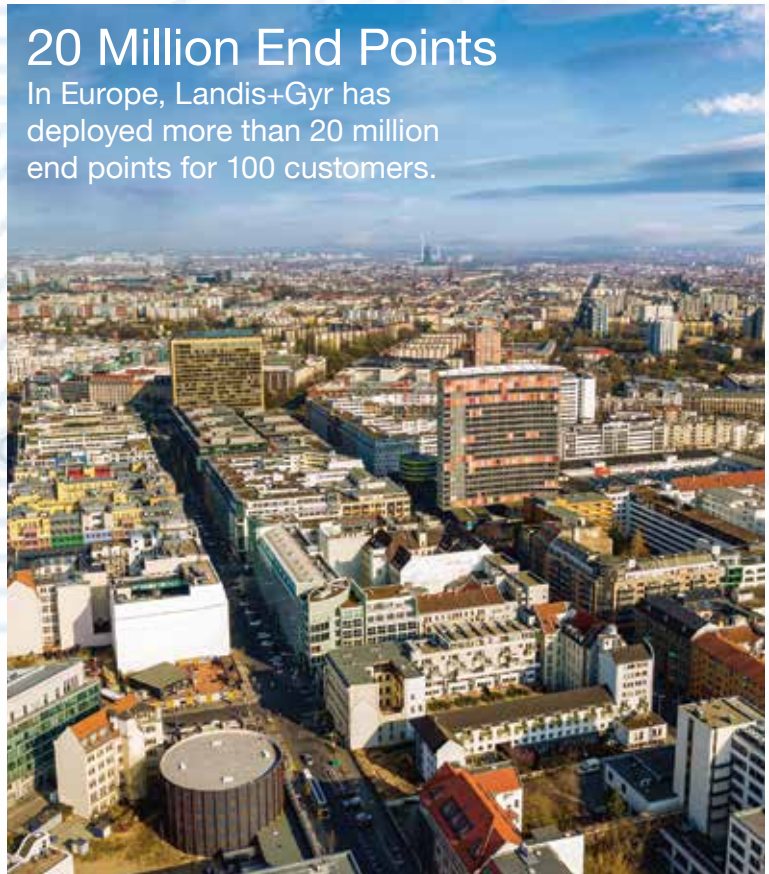
100 Grid Projects

The Ten-Year Network Development Plan of the European Network of Transmission System Operators for Electricity (ENTSO-E) includes over 100 grid development projects.



20 Million End Points

In Europe, Landis+Gyr has deployed more than 20 million end points for 100 customers.





Smart Metering Rollout

Thirteen European countries have already developed regulatory roadmaps for the full-scale introduction of Smart Meters.



Expected Future Grid Transformation

Expectations and viewpoints of 53 utilities worldwide about the future developments of energy grids

Business Model Changes

Level of business model changes compared with today

EUR (Europe)



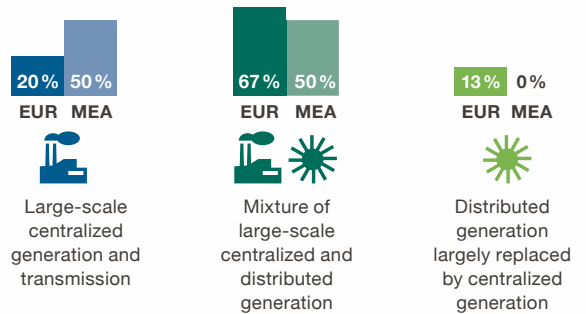
MEA (Middle East & Africa)



■ The same ■ Important change ■ Transformed

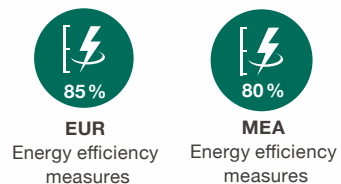
Expected Future Market

Direction of energy generation transformation



Top Technological Impact

By region



Landis+Gyr Sets the Technological Standard With Its Gridstream™ Solution

The European energy industry is going toward microgeneration with renewable energy production. The plans to roll out the advanced energy infrastructure by 2020 require accurate energy information and powerful tools to manage and automate the network.

- Helping to the European 20-20-20 goals, Landis+Gyr has implemented its Gridstream™ solution in many projects. This end-to-end solution provides all the required Energy Management functions on a single platform ranging from energy metering to communications, Load Management, software, applications and managed services.
- The Gridstream™ solution also includes smart heat and gas metering systems which respond to a major trend especially in the UK and the Netherlands.
- Gridstream™ provides accurate energy consumption data, on-time information on the LV network status and foundation for transformer monitoring. It supports distribution system operators in improving energy distribution quality, which is also an increasing interest of the European regulators.



Stedin (Netherlands)

Stedin is the second-largest energy company in the Netherlands and provides reliable transport of gas and electricity to more than 2 million customers in the Randstad and Rotterdam harbour area. Two challenges are the integration of renewables into the network and raising the energy efficiency of public street lighting.



Elektrilevi (Estonia)

Elektrilevi is a subsidiary of state-owned Eesti Energia. Serving 92 % of the Estonian population, Elektrilevi is the largest distribution network operator in Estonia, supplying electricity to 475,000 customers on a network 61,000 km in length. Due to a change in regulations Eesti Energia has to modernize its meter park to enable hourly consumption measurement as of 2017.



British Gas (UK)

British Gas is the UK's leading energy supplier and serves around 12 million homes – nearly half the country's homes – and 1 million businesses in the UK. By 2020, Smart Meters will be rolled out as standard across the country as part of a government initiative.

Landis+Gyr – Solution

Smart Grid Terminal S650 to

- Control and monitor utility's street lighting infrastructure
- Monitor Distribution transformers

Benefit

- Smart controlling of street lighting reduces energy consumption, and alarm functionality reduces downtimes
- Accurate information on transformer status and improved awareness on LV network status

“As a win-win situation was created with benefits immediately visible during the initial installation phase, Stedin decided to proceed with the combined installation. Landis+Gyr's technology allows us to balance load especially at substation levels.”



Henk Fidler,
Expert Asset Management, Stedin

Landis+Gyr – Solution

- Smart residential meters, Smart Grid terminals and data concentrators
- Gridstream™ HES Smart Metering software
- PLC communication technology complemented with 2G/3G technology
- Project implementation and integration by Ericsson Eesti

Benefit

- Hourly consumption data, helping all consumers in Estonia to actively manage their energy consumption
- Elektrilevi receives real-time information about power quality and network status, which improves the reliability of power supply

“We can improve the quality of work and increase customer satisfaction as our service is now based on real-time consumption data. The enhanced service motivates our customers to reduce their energy consumption.”



Mait Rahi,
Head of Smart Metering Program, Elektrilevi

Landis+Gyr – Solution

- Majority of British Gas' 16 million Smart Meters for electricity and gas
- In-Home Displays, ZigBee communications for HAN

Benefit

- The technology will provide awareness of the energy usage for British Gas customers, and could lead to savings in energy bills
- British Gas has consistently seen higher satisfaction among Smart Meter customers than amongst those without Smart Meters

“Our GBP 600-million investment in Landis+Gyr's Smart Metering solutions means we can provide Smart Meters cost-effectively to our customers, and bring them the benefits of this innovative technology. Meanwhile we can meet our energy efficiency goals.”



Chris Weston,
Managing Director, British Gas

Asia Pacific

The market environment in the Asia Pacific region is promising, although the market is highly fragmented and developing at different speeds in different market maturities.

- Two of the more advanced countries in terms of Smart Grids and Smart Community projects are New Zealand and Australia.
- Given the high levels of electricity consumption and a changing model for generation, the Japanese government is rolling out Advanced Metering Infrastructure to 80 % of the country's households to enable increased energy efficiency.
- The economic growth in Southeast Asia is leading to increasing electrification and grid integration.
- Both China and India are experiencing high economic growth, but their energy infrastructure is not yet fully developed. India has set the goal of delivering electricity to 400 million of its inhabitants, making simple electrification the target.



2.5 Million

In Australia, smart electricity meters for 2.5 million households were installed by 2014.



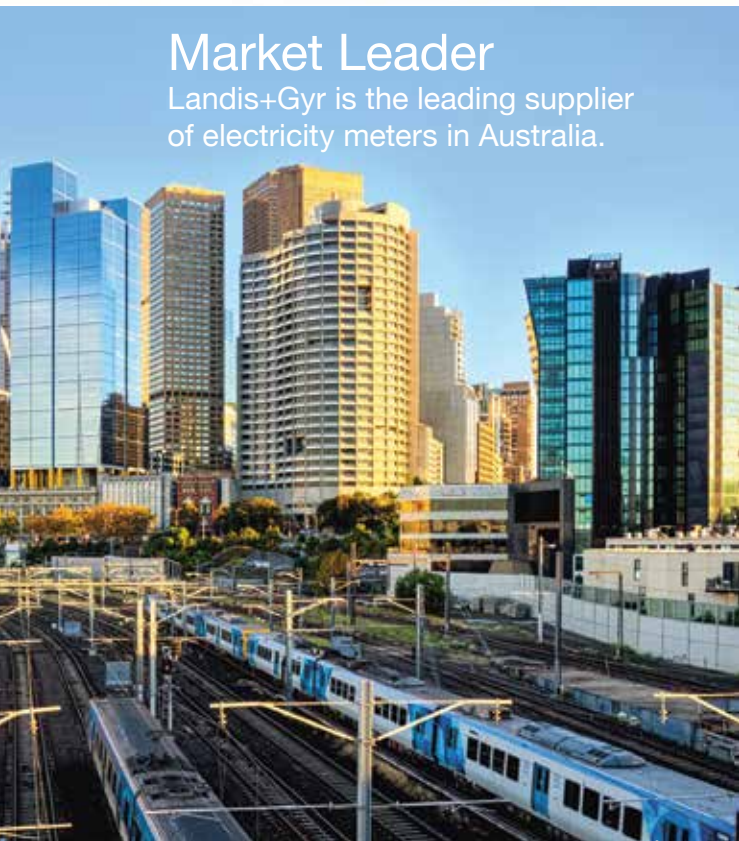
Pilot Project

India is deploying an Advanced Metering Infrastructure pilot project with Landis+Gyr.



150 Million

India has set a target of rolling out 150 million smart electricity meters between 2013 and 2025.



Market Leader

Landis+Gyr is the leading supplier of electricity meters in Australia.



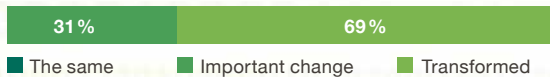
Expected Future Grid Transformation

Expectations and viewpoints of 53 utilities worldwide about the future developments of energy grids

Business Model Changes

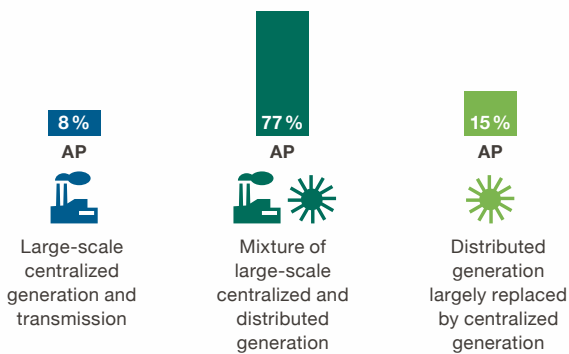
Level of business model changes compared with today

AP (Asia Pacific)



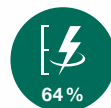
Expected Future Market

Direction of energy generation transformation



Top Technological Impact

By region



AP
Energy efficiency measures



AP
Deployment of Demand Side Management technology

Landis+Gyr Accelerates Grid Modernization

Some countries in the Asia Pacific region are quickly adopting new technologies while other countries are still working to secure a basic supply of energy for their citizens.

- With State of Victoria in Australia approaching 100% Smart Meter penetration we are starting to see new innovative consumer products and network analytics that enhance energy security and reliability. New Zealand Smart Meter deployment started very early and will see most homes with Smart Meters by 2015.
- In China, demand for heat meters is strong as geothermal energy is an important energy source.
- In India, Landis+Gyr holds a strong position in solid state meters. Market is making progress toward Smart Meters with key pilots.
- In Japan, where energy efficiency has high priority in the light of the country's immense energy demand on the one side, and the debated exit from nuclear energy after the Fukushima incident on the other, state-of-the-art communications network, such as currently developed for Tepco, bears the potential to become a standard also in other Asian markets.



Tepco (Japan)

Tepco is Japan's biggest utility with 28.88 million customer agreements. The utility sold 266,700 GWh of electricity in 2013. Tepco plans to link 27 million customers with Smart Meters, energy controls, multiple communications and open standards. It is focusing on the three aspects of meter networks: meters, devices in the home and commercial/business sectors.



Energex (Australia)

Energex is a leading Australian energy company managing sophisticated energy distribution networks. Energex provides distribution services to almost 1.4 million domestic and business connections. The company plans to roll out up to 5,000 remotely controlled reclosers, sectionalizers and load break switches over ten to fifteen years under its reliability improvement program.



SmartCo (New Zealand)

SmartCo, a consortium of New Zealand electricity transmission companies including Alpine Energy, Counties Power, Electricity Invercargill, Network Tasman, The Power Company, and WEL Networks, serves more than 250,000 urban and rural consumers across New Zealand. Bringing together New Zealand's electricity distributors and retailers requires greater operational efficiency.

Landis+Gyr – Solution

Networking over 27 million customers with Gridstream™ including:

- Supplying the Head-End System (HES)
- RF communications modules
- Large-scale product deployment experience and the Meter Data Management System (MDMS)

Benefit

- Foundation for a Smart Metering communications system and associated Meter Data Management System (MDMS)
- Link meters, utility enterprise platforms and smart devices in homes and businesses

“Development is making smooth progress. Even if the target for completion is in 2020, it can be accelerated, provided the customer needs are strong.”



Hiroshi Yamaguchi,
Executive Vice President, Tepco

Landis+Gyr – Solution

- Network of intelligent radios that provides high reliability communication between the SCADA system and field devices

Benefit

- Provides remote operation of network devices that has resulted in:
- Reduced outage times to customers during network faults
 - Improved reliability statistics

“The innovative solution from Landis+Gyr provides Energex with a reliable, flexible, and field-proven communications pathway to extend intelligent control over electrical power grid functions to Distribution Automation.”



David Wise,
Future Technologies Development Manager, Energex

Landis+Gyr – Solution

- E350 Smart Meter
- Load Control state machine allowing relay settings to be independent of billing
- Under-frequency Load Control and ripple functionality
- Load side voltage tamper detection
- PredicTemp™

Benefit

- Benefits from enhanced Smart Metering technology include:
- Remote reading of electricity consumption
 - Real-time notification of outage and power quality data
 - Advanced management of Load Control solutions to all stakeholders including energy retailers and consumers

“The Advanced Metering technology from Landis+Gyr will greatly benefit our members by providing them with more timely information. It includes functionalities such as PredicTemp™ for monitoring installation faults and Load Management controls.”



Gavin Lennox,
General Manager, SmartCo



The Smart Grid Paves the Way for Smart Communities

Smart Community concepts address upcoming challenges such as growing populations and growing energy demand in the wake of economic and social developments as well as the gradual replacement of certain fossil energy with renewables.

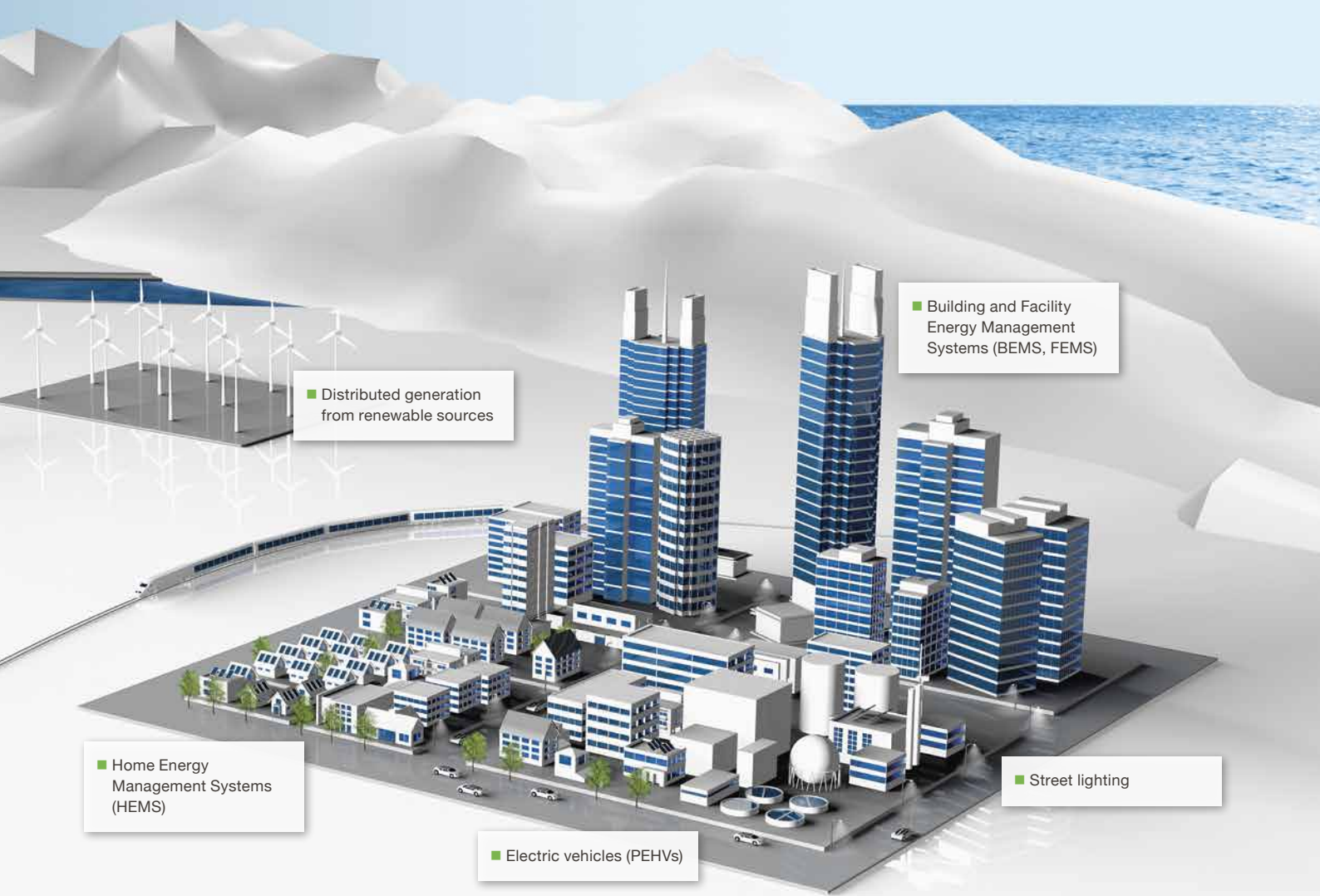
By implementing modern infrastructure enabling “smart” and “intelligent” solutions and technologies, Smart Communities address the upcoming challenges in the cities of tomorrow. A number of smart products that are equipped with intelligent sensing technology and connected to Internet technologies allow communication in a changing environment. This leads to optimal operations and improvement in efficiency. A Smart City includes several basic parameters, for example smart buildings, smart energy infrastructure, smart technology, and smart mobility, while technologies such as Smart Metering, wireless sensor networks, open platforms, high-speed broadband, the so-called Internet of Things and Cloud services represent key building blocks.

Technology-driven improvements in Energy Management will be critical in future Smart Communities. Toshiba and Landis+Gyr, the world’s first one-stop Smart Community solution provider, are combining their knowledge and expertise to create the corresponding smart innovations. This is evident in a number of pilot projects the two companies are working on in the North America, EMEA, and Asia Pacific regions.



Los Alamos (New Mexico)

Los Alamos County Department of Public Utilities (DPU) is a not-for-profit, publically owned utility. It has set up a USA–Japan Demonstration Smart Grid Project with a microgrid electric distribution system. The system includes Smart Home capability, a 1-MW-photovoltaic system with 8.2-MWh battery storage capacity, and a Micro Energy Management System with forecasting and scheduling abilities to balance energy delivery and stored capacity in batteries. This enables the monitoring of demand-side usage patterns by providing real-time information to the Micro Energy Management System and absorbing fluctuating PV output, smoothing out peak loads when there are constraints.



■ Distributed generation from renewable sources

■ Building and Facility Energy Management Systems (BEMS, FEMS)

■ Home Energy Management Systems (HEMS)

■ Street lighting

■ Electric vehicles (PEHVs)



Energie Baden-Württemberg (Germany)

Utility Energie Baden-Württemberg (EnBW) is one of the largest energy supply companies in Europe piloting a state-of-the-art Smart Metering system that meets Germany’s high data protection and end-consumer security requirements. Landis+Gyr provided its newly developed end-to-end security system, a “gateway,” fulfilling the guidelines of the German Federal Office for Information Security. The new system enables utilities to better balance decentralized energy generation and demand, provides more transparency with regard to energy consumption, and tests the suitability of Smart Metering for the mass market, as well as its compatibility potential.



Colorado Springs (USA)

Colorado Springs Utilities is a community-owned utility. An advanced Load Management program was developed to reduce load during peak power consumption and to protect transformers and other distribution equipment. 1,900 smart thermostats equipped with Gridstream™ communications technology and software applications enable load shedding on specific feeder circuits. During peak power events, the software can determine the number of customer thermostats to control. If a customer opts out of a control period, the software automatically adjusts to find replacement load curtailment to ensure load shedding requirements are met. Using this technology, the utility expects to save more than USD 117 million through the year 2025.

Forward-Thinking People

Landis+Gyr is committed to helping energy suppliers, energy consumers and society manage energy better. Landis+Gyr's employees are therefore thinking beyond today's business and developing solutions for smarter, more efficient energy delivery systems. The portrayed employees represent the essential contributions Landis+Gyr's people make to drive the Smart Grid toward Smart Communities.



“Promoting the use of renewable energies, integrated management, and optimized controls for reliable infrastructure is a vital contribution to Smart Communities.”

Hans Sonder,
Director Technology Management & Process Excellence,
Group Headquarters

“Our Virtual Peak Plant (VPP) enables personal Energy Management for customers while utilities can measure and control loads in real time.”

David Shaw,
CTO Consert, North America



“We see interoperability and state-of-the-art communication networks as the backbone of future Smart Grids.”

Gary High,
Senior Vice President Sales, North America



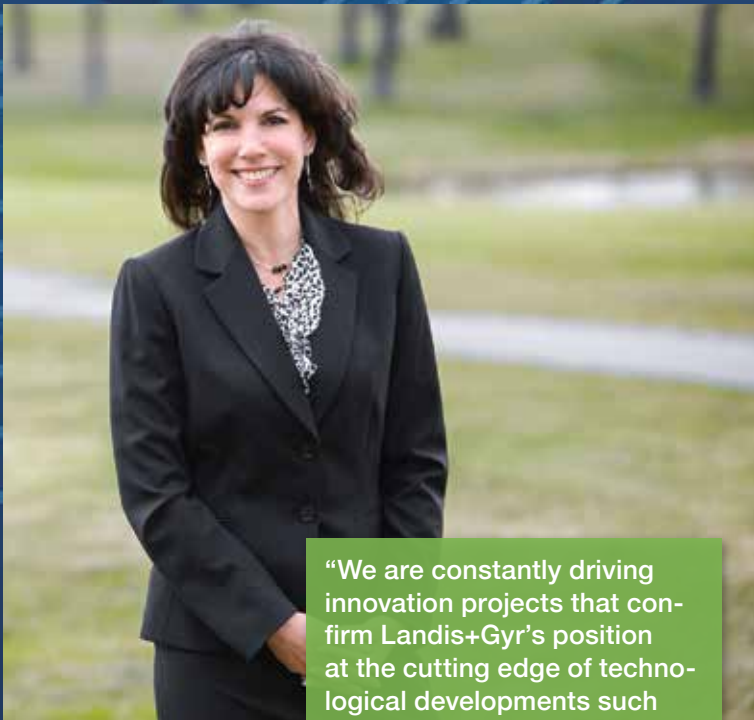
“Landis+Gyr’s heat metering business offers Energy Management technology that meets the particular needs of communal heating systems and multi-energy utilities.”

Stefan Fischer,
Head of Product Management Heat, EMEA



“We are constantly driving innovation projects that confirm Landis+Gyr’s position at the cutting edge of technological developments such as IPv6 – for the so-called Internet of Things.”

Gina Garner,
Director Strategic Initiatives, North America





Andreas Umbach
President and Chief Executive Officer

Energy Efficiency and Sustainability

Global sustainability and environmental considerations are key focus areas for Landis+Gyr. The Company contributes to preserving natural resources for society by constantly aiming to reduce emissions along the entire design and production process.

Commitment to Sustainability

- Avoiding the use of harmful materials, thereby minimizing pollution
- Integration of life cycle and recycling aspects as an integral factor of the product design process
- Reduction of waste to a minimum
- Compliance with relevant health, safety and environmental regulations and standards, among them ISO 9001, ISO 14001, BS 18001

Carbon Footprint

Manage energy better is the Company's ambition it is measured against. Since 2007 Landis+Gyr records its carbon footprint by engaging an independent company to support the process and validate the greenhouse gas (GHG) emissions. Progress is monitored by collecting detailed emission data and by constantly analyzing this data and identifying potential improvement.

The GHG Protocol provides the three "scopes" (scope 1, scope 2 and scope 3) in order to help delineate direct and indirect emission sources, improve transparency and provide data supporting different types of organizations to implement their climate policies and business goals. The carbon footprint is expressed in CO₂ equivalents (CO₂e). The unit of measurement is metric tons, and all GHG emissions are converted to metric tons of CO₂e, using appropriate GWP (Global Warming Potential) factors as published by the Intergovernmental Panel on Climate Change (IPCC). This allows for the aggregation of all GHG emissions in one single indicator, expressed as the carbon footprint.

Slight Increase per USD 100 Turnover as Temporal Effect

In the financial year 2013/14, overall CO₂ emissions slightly increased from 1.7 kg to 1.8 kg per USD 100 turnover, exclusively due to intensive travel activities resulting from joint business development projects with Toshiba for Tepco. This caused the first year-over-year increase in CO₂ generated based on sales after six consecutive years of improvement. Nevertheless, on a per-unit-of-production basis, the continuous downward trend of emissions remained intact, reaching a new low of 1.63 kg per device, a 33 % decrease since the program's inception in 2007.

Total CO₂e emissions within the Landis+Gyr Group amounted to 34,600 tons CO₂e in 2013/14, up by 2.0% compared to 33,900 tons CO₂e in 2012/13.



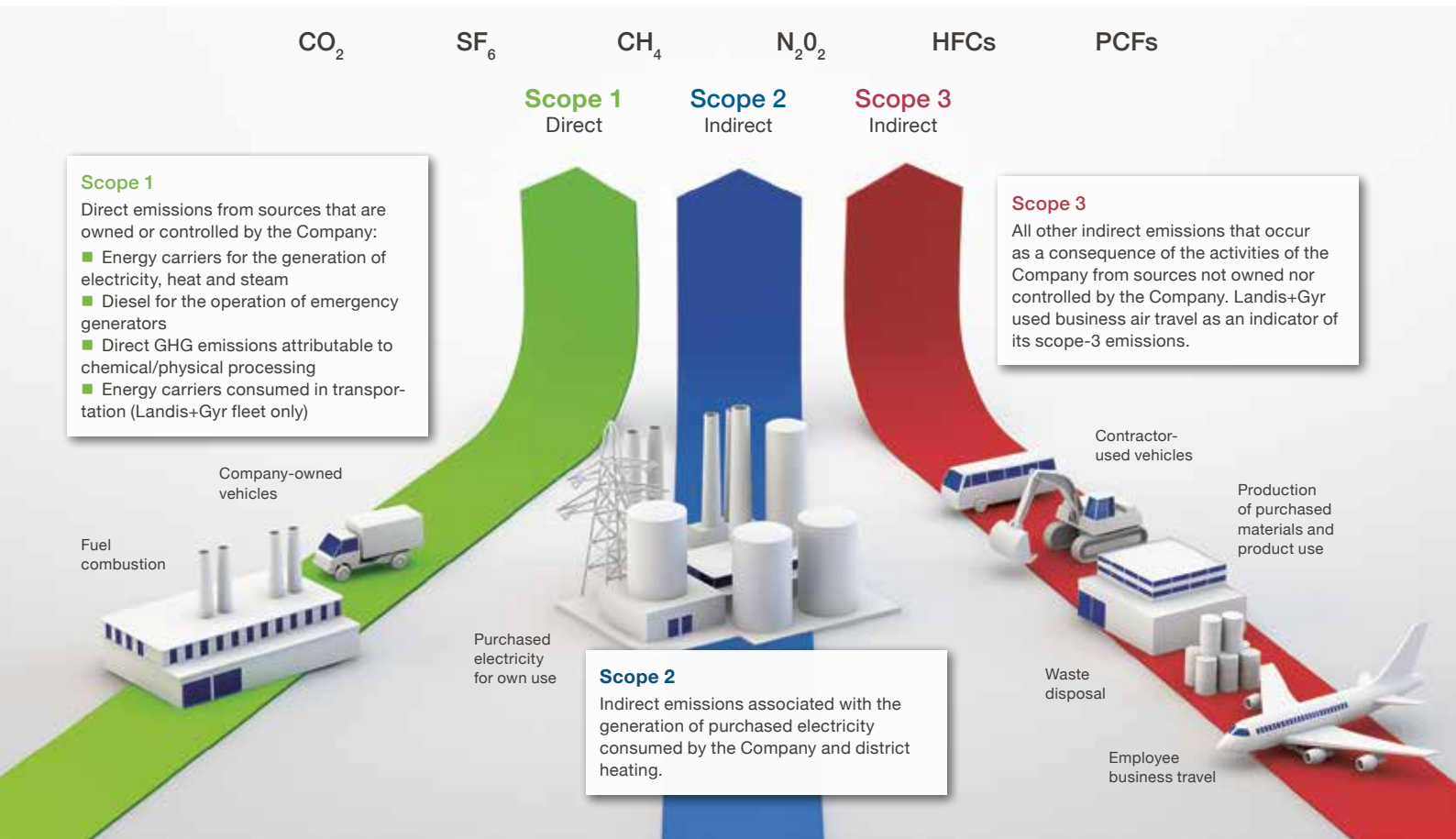
“Since 2008, we constantly reduced the greenhouse emissions per unit. Reaching a new low of 1.63 kg per device, emissions decreased 33 % since the program’s inception in 2007.”

Andreas Umbach,
President and Chief Executive Officer

In contrast, emissions per product improved from 1.65 kg to 1.63 kg, confirming the positive trend since 2007. The increase of the overall emissions can mainly be attributed to Scope 3 (up from 5,400 tons CO₂e to 6,200 tons CO₂e) and

was related to increased travel activities caused by the intensive joint business development projects with Toshiba. Scope 2 decreased by 1.7 % compared to the 2012/13 level thanks to production process improvements in the production sites. With 22,500 tons CO₂e it represented the largest component in 2013/14. Scope 1 went up by 5.8%, with 5,900 tons CO₂e amounting for a small proportion of overall emissions. The higher emissions were caused by the increased use of emergency power generators in India and the extension of production capacity in South Africa.

In 2013/14, Landis+Gyr expanded the data recording from its level-1 to its level-2 sites (all 26 major sites), accounting for 85 % of all employees, to water, waste and the use of chemicals. In the financial year, total use of chemicals amounted to 21 tons and total waste to 3,131 tons. In prior years, exclusively level-1 sites had been tracked, generating the main share of environmental exposure. A year-over-year comparison is therefore restricted to level-1 data. Equaling a reduction of 10 %, level-1 sites in 2013/14 decreased the use of chemicals from 23.2 tons CO₂e to 21.0 tons CO₂e compared to the prior year. Accordingly, the generation of waste went down by 1 %, from 2,441 to 2,421 tons CO₂e. Data recording of water use had been expanded to all production levels (1–3) in the year before. The volume increase of 4 % (from 132,709 to 135,395 m³) was primarily caused by very dry climatic conditions in Greece and Brazil.



Forward-Thinking People



“We create real value add by turning Smart Meter data into valuable business information allowing utility stake holders to make smart decisions.”

Doug Jeademann,
Director Technology Delivery Consulting Services,
North America



“At Landis+Gyr, we base all our business activities on four basic principles: customer focus, innovative spirit, commitment to quality, trusted partnership.”

Patricia Szall,
Vice President Human Resources,
North America

“Building Smart Grids is a top-priority undertaking in China. We are proud to support this effort by providing state-of-the-art Smart Metering solutions for electricity and heat.”

David Lu,
CEO China, Asia Pacific



“Supplying the majority of British Gas’ 16 million Smart Meters, we are enabling households to track their current energy consumption on in-home displays, leading to estimated savings of 5%.”

Thierry Doriath,
Head of Operations SES, EMEA



“Through every interaction we prove to our customers that we are committed to building long-term relationships.”

Shane Quinn,
General Manager Australia & New Zealand,
Asia Pacific



Gridstream™ – Innovative Solution

State-of-the-art technologies build the base for our future-proof products and solutions. At Landis+Gyr, we help energy utilities with our Gridstream™ solution portfolio to master the challenges of a changing market and to create value for their customers and for society by making the energy system smart.

Landis+Gyr's Gridstream™ solution marks a cornerstone in building Smart Grids. The end-to-end Smart Grid solution combines metering, communications, network management, software, grid and consumer applications and complementary services in a single secure and integrated platform. Designed to streamline business processes, the Gridstream™ solution offers distinct benefits to utilities, energy consumers and the environment. Thanks to customization of each component within the solution architecture, physical network and communications technology, both local and individual needs of each utility can be satisfied.

Services



For some utilities, the smart choice is to contract out the management and maintenance of their Advanced Metering network. Landis+Gyr offers the experience and know-how that comes from operating the largest Advanced Metering network in the world.



Smart Grid Applications

Tools and services allowing for smart Demand/Supply Side Management to bundle, aggregate and manage infrastructure, assets, processes, tariffs and costs.



Smart Metering Solutions

A comprehensive suite of devices, communications technologies and software for efficient and effective distribution network management, Demand/Supply Side Management and capacity balancing.



Energy Meters

From stand-alone devices to end-to-end solutions including Cloud-based applications and managed services which can be tailored to specific customer needs.

Smart Grid Applications



- Data management software and data analytics tools delivering real-time information needed for outage management and distributed energy resource management
- Advanced Load Management and Direct Load Control solutions securing a sustainable balance between demand and supply side

Hardware and software for Virtual Power Plant operations and services tools and applications to monitor and manage assets as well as demand and supply more sustainably and efficiently.

Personal Energy Management



- Intelligent tools and interfaces allowing for sustainable and efficient use of energy
- Hardware and software to monitor and manage applications, including microgeneration, power storage and the charging of electric vehicles

Real-time transparency regarding consumption, cost and environmental impact of a consumer's energy behavior. Load-shedding devices and Load Management solutions to manage Demand Response and energy cost.

Communications



- PLC
- RF Mesh
- GSM/GPRS
- Ethernet
- IPv6
- WiMax and ZigBee

Communication modules, devices and solutions linking to HAN, NAN and WAN networks to ensure reliable integration of metering points into Advanced Metering Infrastructure, allowing for enhanced services and fact-based operations.

Head-End Software and MDM



- Head-End Systems and Meter Data Management (MDM) solutions for meter data acquisition, validation and processing
- Analysis tools for operations, planning and billing
- Personal Energy Management tools

Head-End Systems and MDM solutions for the acquisition, evaluation and processing of metering data including hardware, software, turnkey projects and ASP services.

Energy Meters



- Meters for electricity, heat, gas and water
- Sensors and devices to switch loads and control consumption in homes and at substation levels

Electricity, heat and gas meters with and without modular or integrated communication units for all applications, including prepayment functionality. Smart Grid devices and intelligent hardware for efficient load shedding and Energy Management.

Sensors, Switches, Interfaces



- Innovative technology for distributed Load Control and Management
- Monitoring and control of renewables integration, storage and consumption in family homes

Sensors and controls for distribution grid management and analytics making the Smart Grid vision a reality by linking Demand Response options, Time-of-Use and critical peak pricing with Load Control, disconnect and customer notification technology to reduce peak demand and save money.

The Segments We Are Serving

Centralized Large-Scale Generation

- Measurement
- Forecasting
- Billing
- Power quality

Energy Utilities

- Planning and forecasting
- Network operations
- Infrastructure protection, management and restoration
- Demand Response
- Virtual Peak Plant
- Energy services and Advanced Metering Management
- Billing

Distributed Generation From Renewable Energy Sources

- Measurement
- Power quality
- Demand supply balancing
- Micro Energy Management System including storage

Plug-in Hybrid Vehicles (PHEVs)

- Distributed Load Control (charging and feed-in cycle)
- Billing

Large Industrial Consumers

- Energy metering
- Load management and scheduling
- Tariff management and simulation
- Power quality
- Billing

Microgeneration From Renewables

- Demand supply balancing
- Transformer monitoring and control
- Micro Energy Management solutions
- Storage
- Billing

Big Buildings

- Energy metering
- Billing
- Power quality and power factor
- Energy services
- Micro Energy Management solutions including storage
- Virtual Peak Plant solutions



Peak Generation

- Forecasting and load shedding
- Demand supply balancing
- Virtual Peak Plant and other types of storage
- Infrastructure monitoring and management
- Capacity response and supply response
- Billing

Smart Grids allow the integration of a multitude of power sources into the energy system. This new opportunity is challenging energy utilities to intelligently control and manage production and to set incentives for consumers to secure stable energy supply and maximum use of green energy. Landis+Gyr's products and services, including its groundbreaking Gridstream™ solution, offer state-of-the-art technology covering a broad range of utility needs.



Commercial Energy Consumers

- Metering devices for electricity, heat and gas
- Load Management and scheduling
- Tariff management and simulation
- Energy consulting and services
- Virtual Peak Plant services



Residential Energy Consumers

- Metering devices for Time-of-Use/dynamic pricing
- Demand Response/load shedding
- Management and control of micro-generation
- Personal Energy Management tools
- Smart Home applications
- Virtual Peak Plant solutions
- Energy services
- Billing of electricity, heat and gas



Transmission and Distribution Networks

- Distribution Automation
- Meters, sensors and other devices for infrastructure monitoring and control
- Load Management and scheduling
- Power quality
- Outage management and restoration
- Demand Response and capacity response
- Micro Energy Management and storage



Microgrid

- Metering devices for Time-of-Use/dynamic pricing
- Demand Response
- Load shedding
- Virtual Peak Plant and storage
- Management and control of microgeneration
- Personal Energy Management and Smart Home applications
- Energy services
- Billing



Street Lighting

- Controls and switches
- Management

State-of-the-Art Technologies

As technology leader in the industry we support our customers in overcoming the challenges of a changing environment, making their operations more efficient by creating additional added value for them and their customers. Many of these solutions build on new technologies offering new opportunities for utilities and consumers.

Designed as a “one-way road,” the traditional energy systems no longer hold up to the challenges of today’s and tomorrow’s requirements to manage the rapidly growing “two-way traffic” of energy flows. Utilities need to invest in metering technology, sensors, ICT networks and end-to-end solutions to keep power systems stable and prevent blackouts while balancing fluctuating energy sources with increasing demand. The need for Smart Grids is becoming ever more pressing. As the global industry leader in energy measurement solutions and Advanced Meter Management, Landis+Gyr is playing a pioneering role in developing groundbreaking technologies to build future-ready Smart Grids. Driving innovation in all business fields and ensuring interoperability along the value chain, Landis+Gyr offers the utility industry a unique portfolio of products and services. The Group is committed to delivering visionary end-to-end Advanced Metering solutions suited for the future needs of reliable, secure, efficient and energy-conserving power grids, and in doing so paving the way to Smart Cities and Smart Communities.

Smart Grid Applications

Today: Smart Meters combined with Head-End Systems and intelligent data management provide utilities with a broad range of capabilities for grid applications, such as Demand Response or the integration of renewable sources.

Tomorrow: The need for grid resilience, reliability and renewables integration will drive demand for intelligent data management and analytics. Applications for distribution grid management, Direct Load Control, outage management, Demand Response and others will become key in making the grid smart.

Smart Metering Solutions

Today: Smart Meters play an important role in helping utilities plan for and manage energy distribution. The information provided by the grid devices enables utilities to monitor and protect infrastructure, while improving reliability.

Tomorrow: Smart Metering solutions support efficient utility operations and enable the flow of information between the utility and the consumer, allowing both to make smarter decisions and reduce energy consumption and costs.

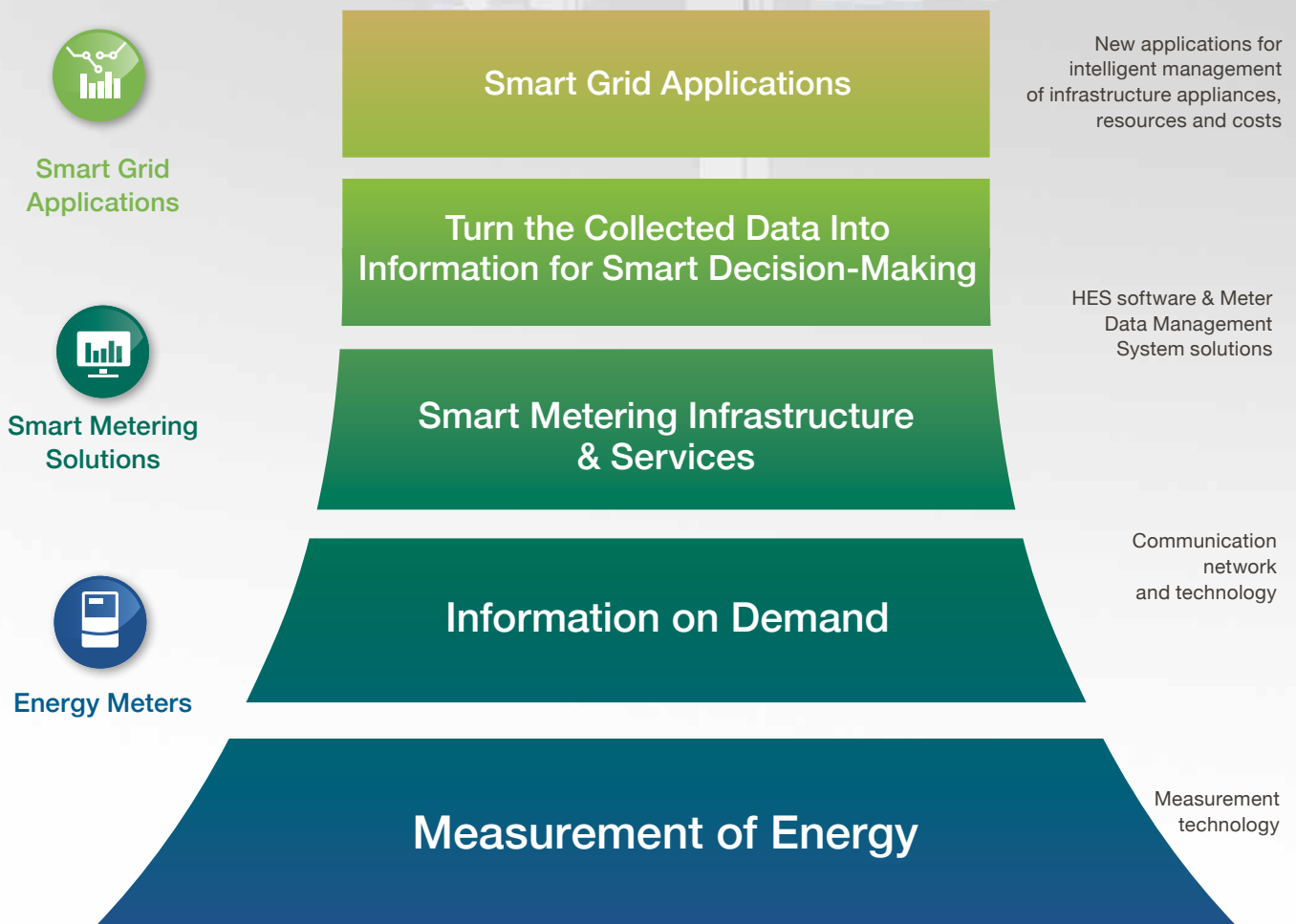
Energy Meters

Today: The meters support the distribution of energy and record consumption for monitoring and billing purposes. As a stand-alone design, they focus on either electricity, gas or heat.

Tomorrow: To ensure efficient and secure energy distribution and to provide utilities and end users with the greatest flexibility, entirely interoperable meters will integrate additional technologies and combine electricity, gas and heat metering into one platform.



Smart Community



“Our leadership position is based on our people. Their expertise, know-how, creativity and commitment are essential to continuously providing solutions that pave the way to Smart Grids and Smart Communities.”

Patricia Freiberg,
Senior Vice President Human Resources Group



Forward-Thinking People

“We deliver extended functionality and highest precision metering accuracy plus the flexibility of modular communication to our customers.”

Ian McNut,
Head of Research & Development CISG, EMEA



“We are proud to offer the broadest portfolio in the industry tailored to helping our customers in the Asia Pacific region and everywhere make energy systems smarter.”

Milan Vrkic,
General Manager Marketing & Strategy, Asia Pacific



“Full two-way communication capabilities allow for Advanced Metering, Distribution Automation and in-home network applications all in one network.”

Connel Ngcukana,
CEO and Country Head South Africa



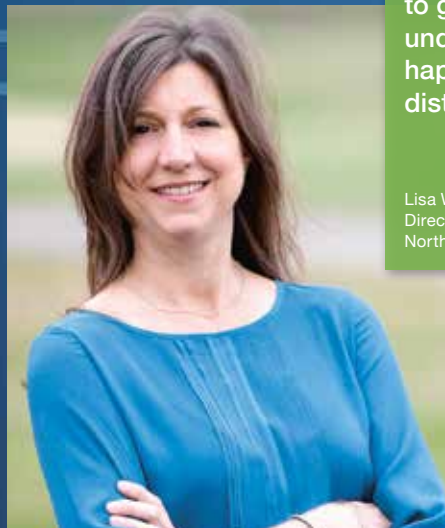
“Landis+Gyr’s SGP+M solution was specifically developed to counter energy theft. The reduction of nontechnical losses from 60 % down to 10 % was immense.”

Alexandre Vidal,
R&D Manager Smart Metering Solutions,
South America



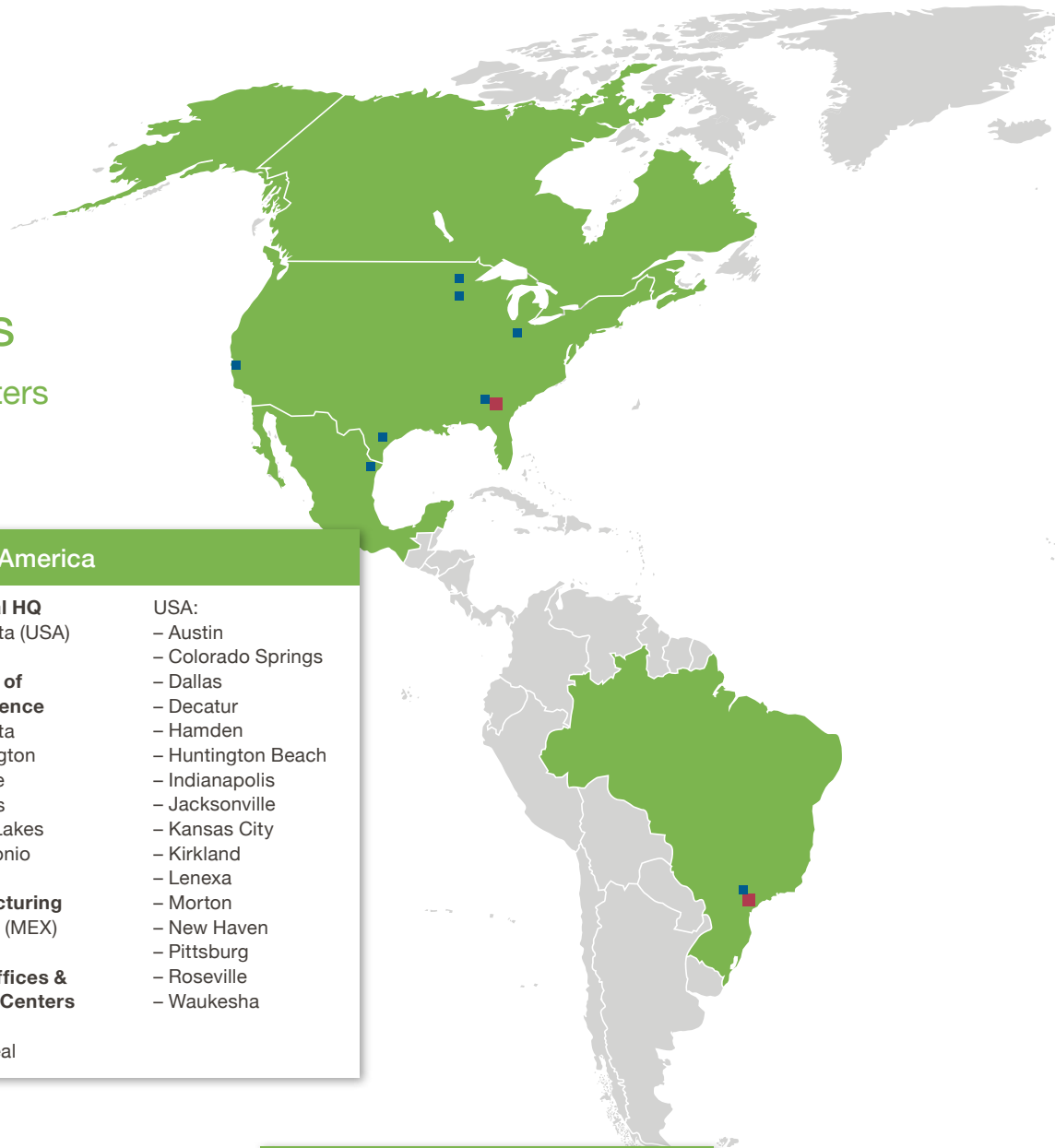
“Our technology, products and solutions are designed to give utilities a better understanding of what is happening within the distribution grid.”

Lisa Washburn,
Director Product Management,
North America



Group Companies

Group Headquarters
 Zug, Switzerland



North America

Regional HQ

Alpharetta (USA)

Centers of Competence

Alpharetta
 Bloomington
 Lafayette
 Los Altos
 Pequot Lakes
 San Antonio

Manufacturing

Reynosa (MEX)

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South America

Regional HQ

Curitiba (BRA)

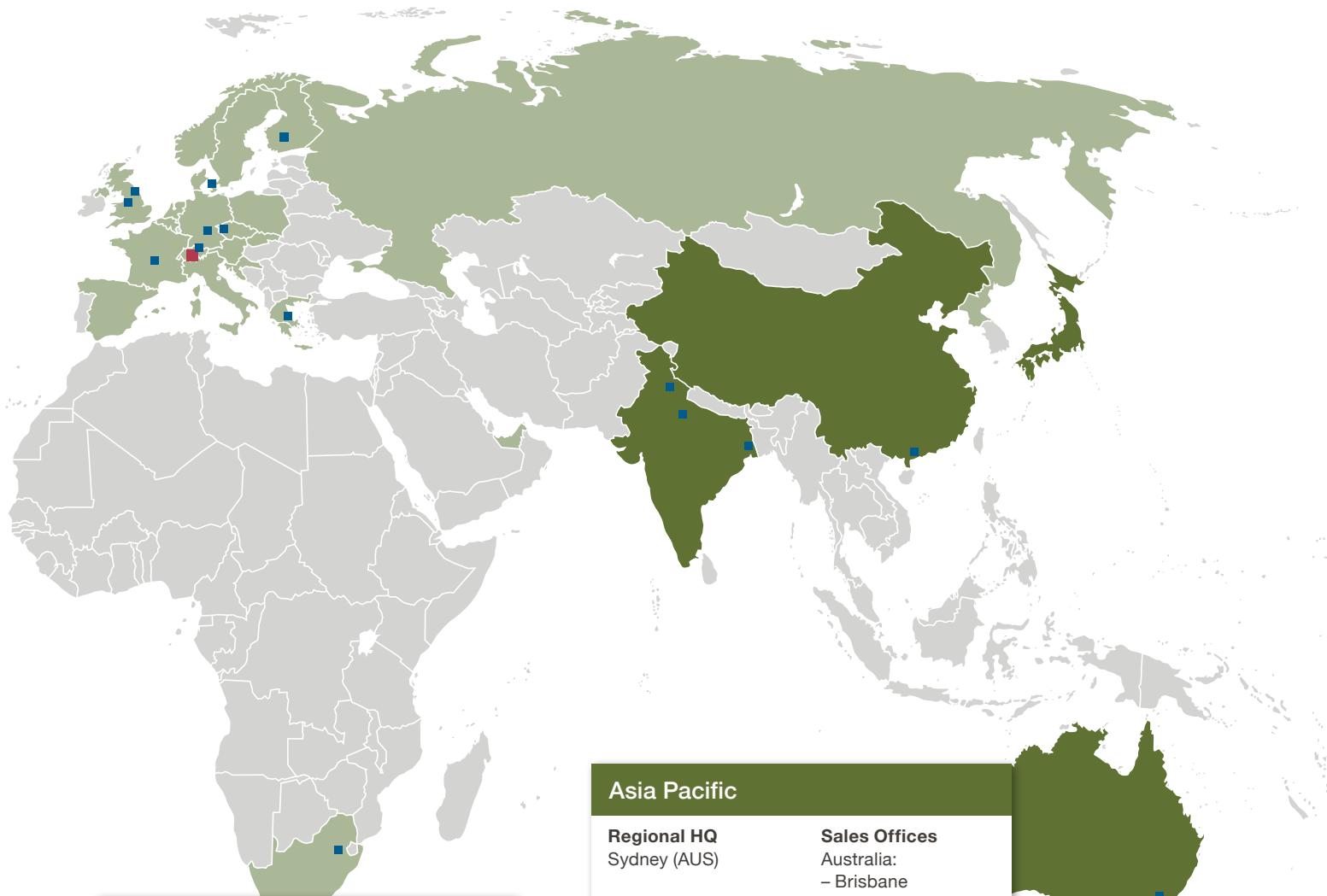
Center of Competence & Manufacturing

Curitiba (BRA)

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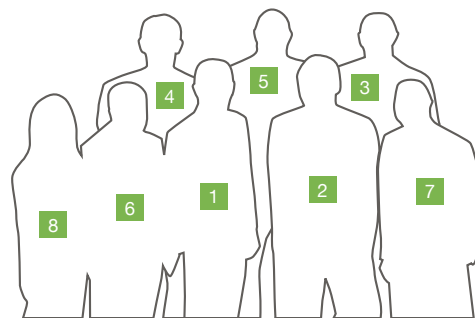
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Centers of Competence & Manufacturing Corinth (GRE) Holte (DAN) Isando (RSA) Jyskä (FIN) Montluçon (FRA) Northfields (GBR) Nuremberg (GER) Prague (CZE) Stockport (GBR) Zug (SUI)	
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Executive Management

Utilities around the globe strive for new functionality and intelligence for their distribution network. This is reflected in our growing R&D investments, but also in a further globalization of our management and portfolio approach.

Landis+Gyr has strengthened its global leadership team to best address the future growth and technological sophistication confronting its customers. This led to the creation of new roles and some executive changes. Richard Mora was promoted to the newly created position of Chief Operating Officer based in Zug. A second new Zug-based executive position, Chief Strategy Officer, was also created and has been filled by Roger Amhof. For the Americas region, Prasanna Venkatesan was appointed Executive Vice President replacing Richard Mora. Oliver Iltisberger moves as Executive Vice President to the EMEA region, handing over the management responsibility in the Asia Pacific region to Ellie Doyle.

1 Andreas Umbach

President and Chief Executive Officer

- Appointed in 2000; Swiss and German
- Various executive positions within Siemens
- Master's degree in Mechanical Engineering, TU Berlin; MBA University of Texas, Austin

2 Richard Mora

Executive Vice President and Chief Operating Officer

- Appointed in 2014; American
- 2000–2013 Executive Vice President Landis+Gyr Americas; previously various management positions within Siemens and GE Capital
- BA in Economics, Stanford University

3 Roger Amhof

Executive Vice President and Chief Strategy Officer

- Appointed in 2014; Swiss
- Formerly Senior Partner of Ernst & Young (EY) Switzerland (since 2004) and Global Client Service Partner for selected major key accounts of EY Global
- Master in Economics, University of Fribourg, Switzerland

4 Jonathan Elmer

Executive Vice President and Chief Financial Officer

- Appointed in 2012; British
- Formerly CFO of Landis+Gyr EMEA and CEO of AMPY Metering
- Degree in Economics and Politics, University of Exeter; Member of the Institute of Chartered Accountants in England and Wales

5 Dieter Hecht

Executive Vice President and Chief Procurement Officer

- Appointed in 2003; German
- Former Executive Board Member E.ON (Sales, Power Trade) and GE ITS Europe
- Degree in Marketing and HR, University of Applied Sciences Munich; Executive Program at GE University

6 Prasanna Venkatesan

Executive Vice President Americas

- Appointed in 2014; American
- Previously Senior Vice President & General Manager for Landis+Gyr North America and various senior management positions with Cellnet and Schlumberger
- Master of Science in Industrial Engineering from University of Oklahoma, Norman

7 Oliver Iltisberger

Executive Vice President EMEA

- Appointed in 2014; German
- Most recently Executive Vice President Asia Pacific and various management positions within Landis+Gyr and Siemens
- Joint Master's degree in Mechanical Engineering and Business Administration, TU Darmstadt

8 Ellie Doyle

Executive Vice President Asia Pacific

- Appointed in 2014; American
- Most recently Senior Vice President for Strategy and Growth Landis+Gyr Americas, following 15 years of various management positions within Landis+Gyr and Siemens
- JD from University of Virginia School of Law



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Glossary

by Landis+Gyr

Advanced Distribution Automation

Describes the extension of intelligent control over electrical power grid functions to the distribution level and beyond. It is related to Distribution Automation that can be enabled via the Smart Grid.

Advanced Metering

Technology which enables an automated bidirectional communication between the energy meter and the utility. The communication is not limited to meter data alone but can also include information about consumption, tariffs, alerts and complementary services.

AMI (Advanced Metering Infrastructure)

An infrastructure for metering, data collection (either direct communication with a central system or via a concentrator) and data management. Date- and time-stamped (e.g. hourly) meter reads are collected remotely and transmitted (daily) to a utility's control computer and, via in-house displays (IHDs), back to the energy consumer.

AMM

Advanced Meter Management.

BEMS

Building Energy Management System. Controls the energy inside a building and reduce building-wide energy consumption.

Cloud

Using software or data storage over a network, where a program or application may run on many connected computers at the same time. The software is no longer downloaded on the user's computer but on a provider's server and can be accessed and used via the Internet.

Demand Response

Commercial arrangements between utilities and their customers in which customers agree to reduce their loads when the electricity system – either the network or generation – is constrained.

Demand Side / Supply Side Management (DSM/SSM)

This is a means to control energy consumption and to optimize network usage via tariff control and/or Load Control. Both can be controlled via ripple control signals (PLC) and radio signals. DSM encourages consumers to modify patterns of electricity usage, including the timing and level of electricity demand.

Direct Load Control (DLC)

Activities performed by the utility that can interrupt load at the time of peak demand by interrupting power supply on customer premises. Load Control is usually applied to residential consumers, but can also control distributed loads such as street lights, charging stations for electric vehicles and others.

Distribution Automation

The ability to control and monitor the performance of a utility's distribution network and infrastructure.

DLMS COSEM

An international meter language used for viewing the functionality of meters.

Forecasting

The process of calculating or estimating something in advance, e.g. predicting tomorrow's power consumption based on historical and actual demand and the impact weather and temperature might have.

Gateway

A communication device interfacing bidirectional data flow between the energy supplier's Head-End System with appliances installed at an end customer's premises.

GPRS

General Packet Radio Service. GPRS is a mobile data service available to users of GSM mobile phones. It provides data transfer by using unused channels in the GSM network.

Grid meters

High-precision electricity meters for the highest metrology characteristics, usually placed at generation stations or key interconnections, with several communication interfaces for e.g. GPRS/GSM or TCP/IP. These meters provide flexible communication with several central stations, making all relevant data accessible to all partners.

HAN

Home Area Network. A data communications system that can connect devices in the premises to the meter or to a gateway between the meter and home devices.

HES

Head-End System. The software core of an Advanced Metering Infrastructure network system. It receives the meter data via a Smart Meter and manages the data for other systems such as operations, billing, planning, forecasting or other purposes.

D

A

F

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H

C

HEMS

Home Energy Management System. Controls the power consumption of all the devices in a home, including the battery charger for electronic vehicles and home appliances such as televisions, refrigerators, microwave ovens, heaters and air conditioners.

Internet of Things (IoT)

The Internet of Things refers to uniquely identifiable objects and their virtual representations in an Internet-like structure. IoT denotes advanced connectivity of devices, systems and services that goes beyond the traditional M2M and covers a variety of protocols, domains and applications.

IP

Internet Protocol.

IPv6

Internet Protocol version 6 is the latest version of the Internet Protocol (IP), the communications protocol that provides an identification and location system for computers on networks and routes traffic across the Internet.

LAN

Local Area Network, most often used for large buildings or small neighborhoods. A data communications system that lies within a limited geographic area connecting meters to collection points.

Load Management

Utility activities designed to influence the timing and amount of electricity that customers may use.

MDMS

Meter Data Management System. Performs long-term data storage and management for the vast quantities of data delivered by Smart Metering systems. A MDMS typically imports the data, then validates, cleanses and processes it before making it available for billing and analysis.

Mesh network

Every node – meters with specific communication modules or repeaters – in e.g. a Smart Metering network has a circuit connecting it to every other node of the network. Messages are hopping from one node to the next one until they arrive at the Head-End System.

Micro Energy Management System (μEMS)

A system for monitoring and controlling grids. μEMS monitors the volume of demand for electricity in real time and forecasts demand so that an appropriate volume of power can be supplied from solar generators or fuel cells. The system maintains a balance between supply and demand to reduce the amount of energy consumed by effectively balancing and using renewable energy and optimizing power consumption.

Multi-fuel

A Smart Metering solution for multi-fuels, mainly electricity, gas and/or water. Often the data from gas and water meters are collected by the electricity meter and then transmitted to a multi-energy utility's Head-End System.

PLC

Power Line Communication.

Prosumer

Prosumer contracts producer with the word consumer. It is used for consumers of electricity with own generation capacity which – at times – can be added to the distribution network.

Renewables integration

The integration of fluctuating energy from renewable sources. The difficulty of predicting the timing and amount of renewable energy the sources will generate forces distribution network operators to closely monitor supply and demand in order to balance Demand Response and the corresponding infrastructure in real time.

RF

Radio Frequency.

SCADA

Supervisory Control and Data Acquisition. A large-scale, distributed measurement and control system. SCADA systems are used to monitor or to control electric power generation, transmission and distribution.

Smart Meter

A Smart Meter is an electronic device that records consumption of electric energy in intervals of an hour or less and communicates that information at least daily back to the utility for monitoring and billing purposes. Smart Meters enable two-way communication between the meter and the central system. Unlike home energy monitors, Smart Meters can gather data for remote reporting.

Smart Grid

A Smart Grid is a modernized electrical grid that uses information and communications technology to gather and act on information, such as information about the behaviors of suppliers and consumers, in an automated fashion to improve the efficiency, reliability, economics, and sustainability of the production and distribution of electricity.

Substation automation

Substation automation improves reliability with real-time monitoring and intelligent control.

ToU rates

The pricing of electricity based on the estimated cost of electricity during a particular time block. Time-of-Use rates are usually divided into three or four time blocks per 24-h period (on-peak, mid-peak, off-peak and sometimes super off-peak) and by seasons of the year.

Virtual Peak Plant

Converting electric consumption in homes and small businesses into cost-effective alternative sources of capacity and energy reserves for utilities. Networking hundreds and thousands of homes and small businesses, connecting air conditioners, water heaters, pool pumps and other major loads in real-time, two-way communication to allow utilities or service providers to manage peak demand and improve operations while helping consumers reduce costs and their carbon footprint.

Virtual Power Plant

A Virtual Power Plant is a cluster of distributed generation installations (such as microCHP, wind turbines, small hydro, back-up gensets, etc.) which are collectively run by a central control entity.

WAN

Wide Area Network, also known as backhaul.

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V

P

W

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