

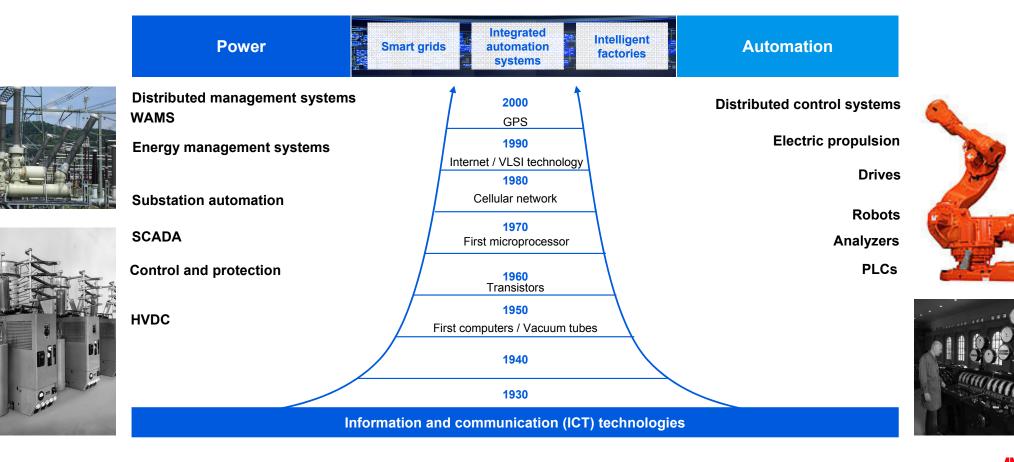
#### Capital Markets Day, Sept. 10, 2010, Zurich, Switzerland

## Growth through convergence Brice Koch Head of Marketing & Customer Solutions

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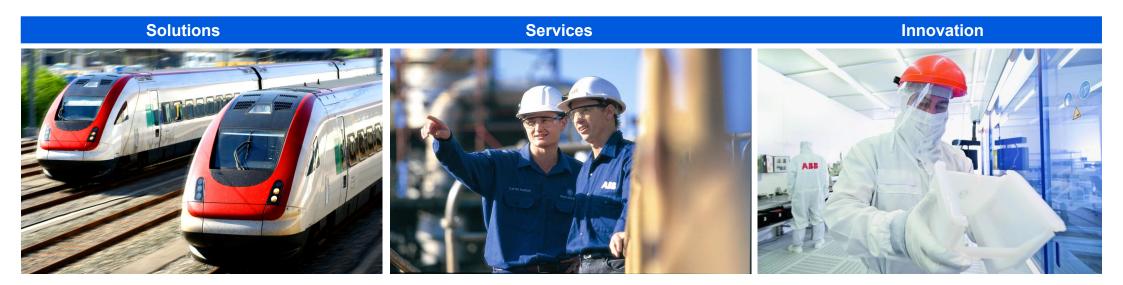


### A quietly astounding evolution Convergence of power and automation





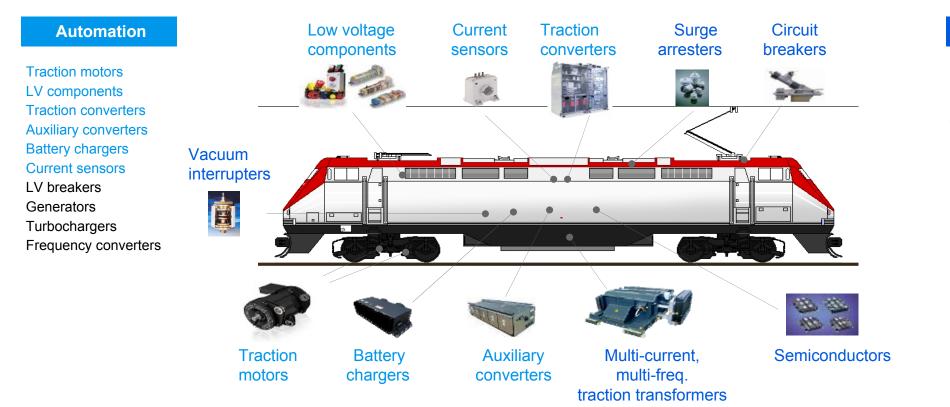
### Targeting new growth beyond the cycle Marketing and Customer Solutions



Use ABB's product and geographic scope to expand our position in markets driven by climate change, emerging economies and energy efficiency

	Rail	Wind	Water	Solar	Shore-to- ship power	Data centers
Market *	\$16 bn	\$7 bn	\$8 - 11 bn	\$3 bn	\$15 bn	\$24 bn
* ABB relevant markets (potential 5-10 years)						

### Market-penetrating rail products and packages Electric locomotive packages (25% of the total value)



### Power

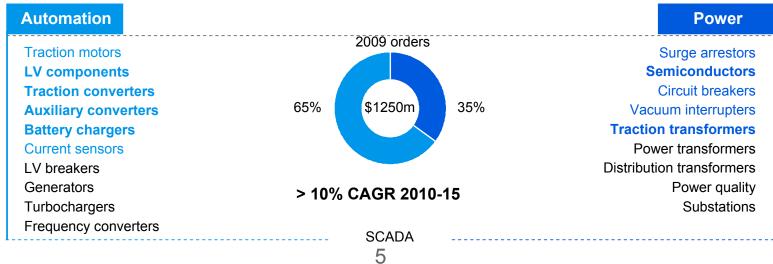
Surge arrestors Semiconductors Circuit breakers Vacuum interrupters Traction transformers Power transformers Distribution transformers Power quality Substations



### Market-penetrating rail products and packages Solution example: electric locomotive packages



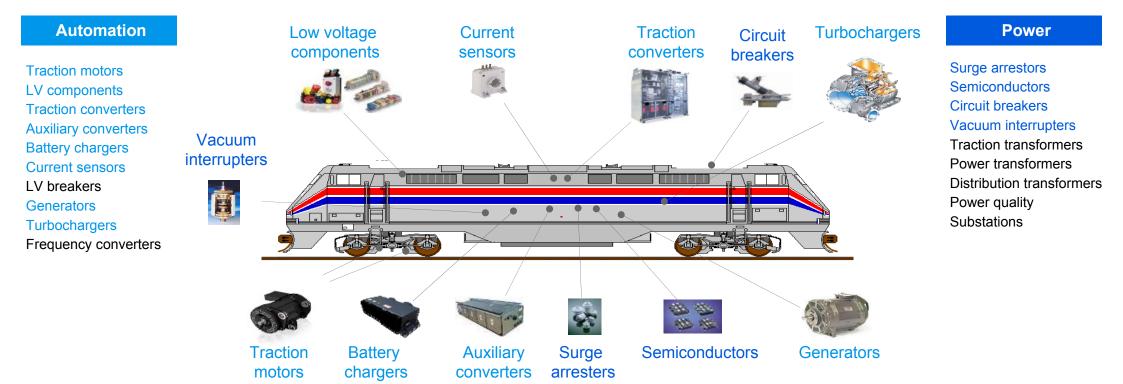
ABB traction packages for Stadler Rail





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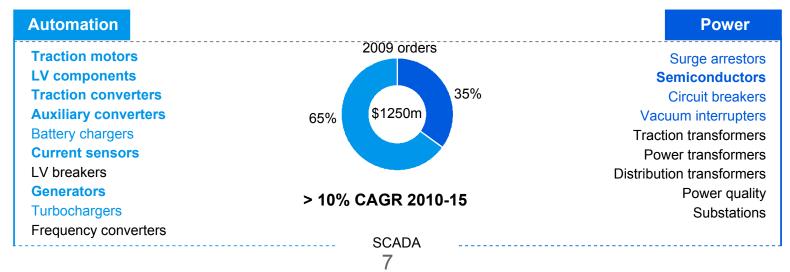
### Market-penetrating rail products and packages Diesel electric locomotive packages (25% of the total value)



### Market-penetrating rail products and packages Solution example: diesel electric packages

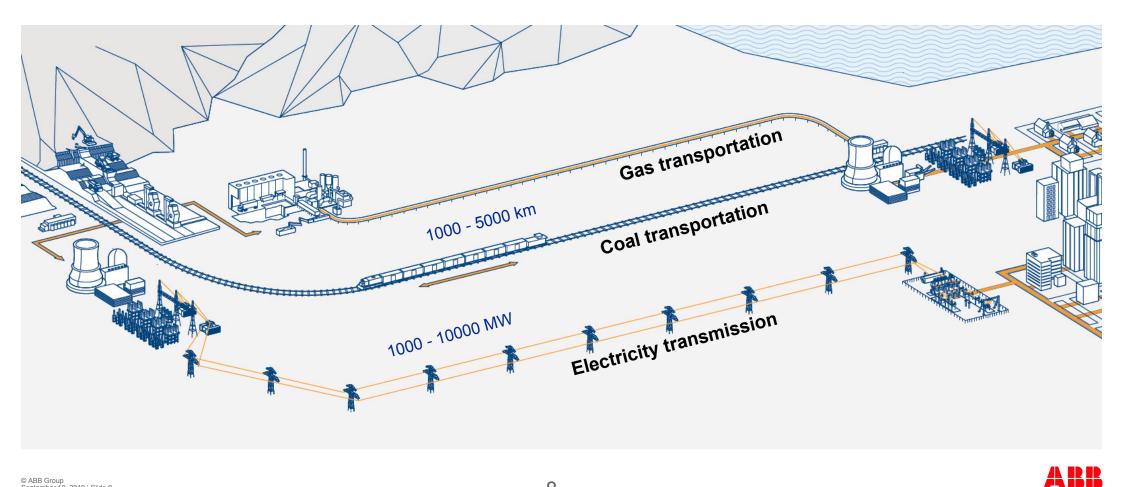


Traction packages for 100 Vossloh EUROLIGHT high speed trains

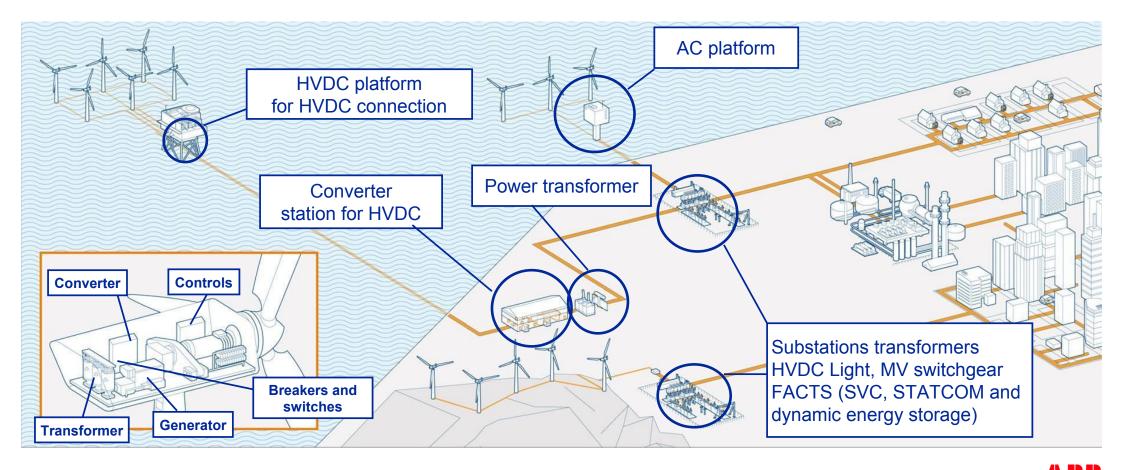




Applying bulk energy economies to energy demand ABB plays a role in all transport and transmit options



### Addressing opportunities in wind power Grouping technology across business units



### Addressing opportunities in wind power Diverse technologies becoming solutions



Assjo Wind farm, Sweden



### Packaged competence for future smart grid business Concentrate on concrete business opportunities

Focus area
Distribution grid automation
e-mobility
Demand response – Commercial and domestic
Distributed generation integration
Distributed storage (<1MW)
Bulk storage (>1MW)

#### **Automation**

System operation EV charging Home metering Building automation HVAC / PV control Voltage control Smart home solutions Multi-utility communications

#### Power

Network management Shore-to-ship power SCADA Substations Energy storage Renewables integration Grid automation Ring main units



### Packaged competence for future smart grid business Examples of pilot projects

#### Automation

System operation EV charging Home metering Building automation HVAC / PV control Voltage control Smart home solutions Multi-utility communications

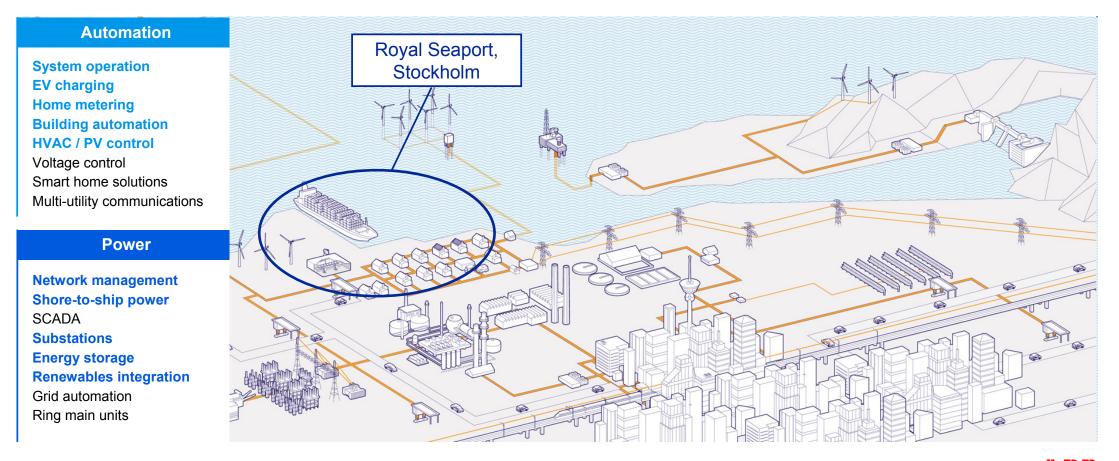
#### Power

Network management Shore-to-ship power SCADA Substations Energy storage Renewables integration Grid automation Ring main units

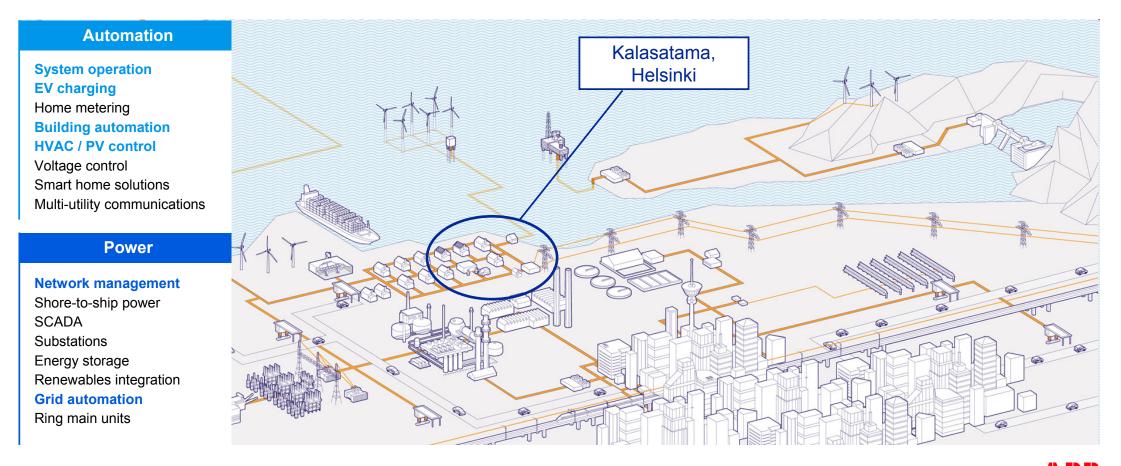


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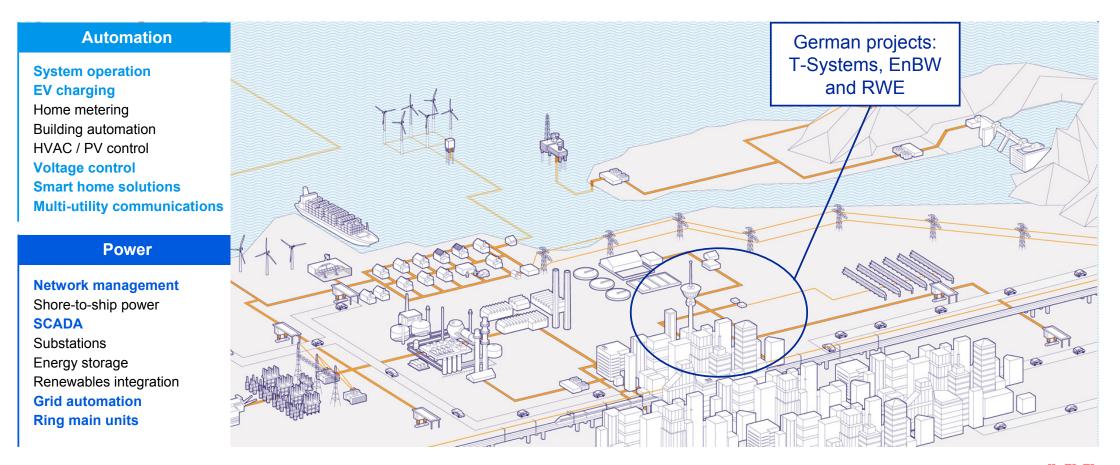
### Packaged competence for future smart grid business Flexible, highly responsive, low emission power for a sustainable city



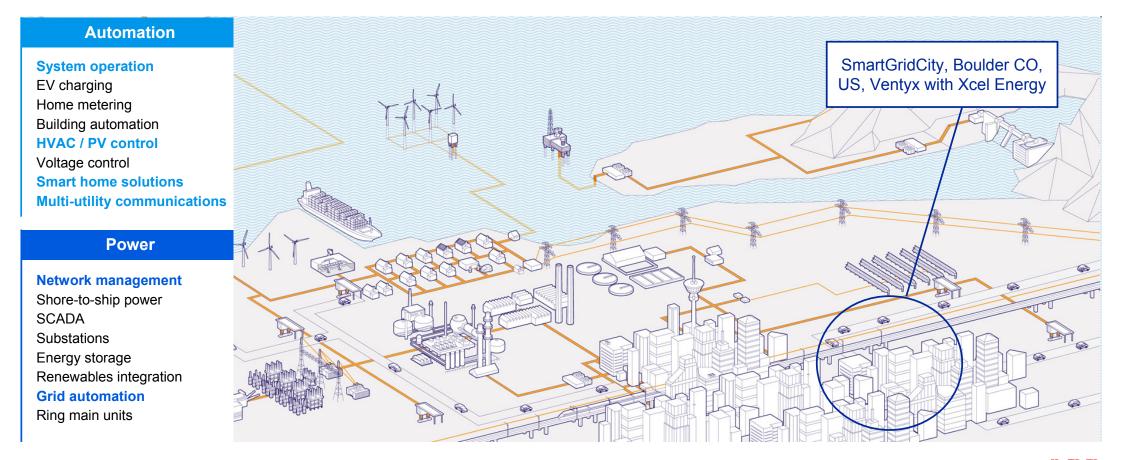
### Packaged competence for future smart grid business Distributed and renewable energy sources for a carbon-neutral district



### Packaged competence for future smart grid business Existing communications infrastructure to merge electricity/data networks



### Packaged competence for future smart grid business Meter-level data aggregation for system-level energy consumption control



### Convergence at work Helping solve the port emissions problem



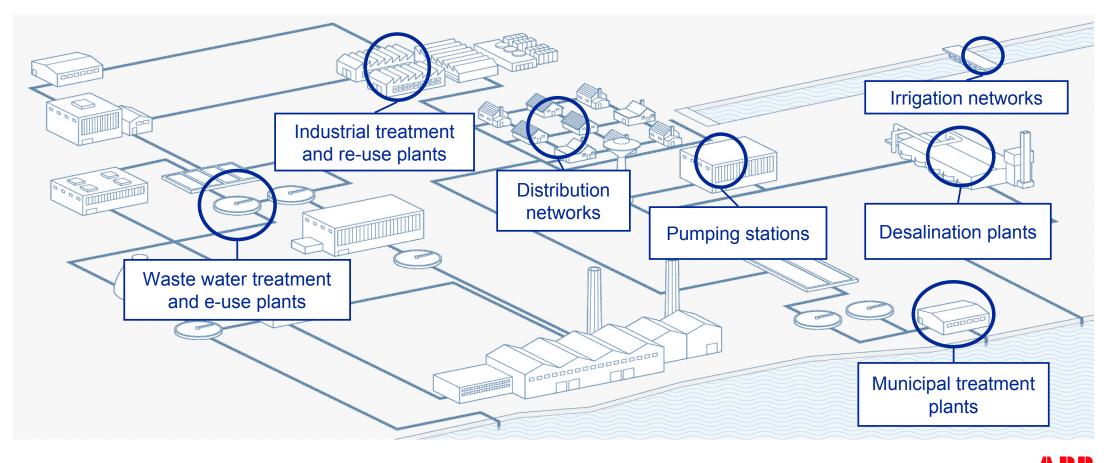


- NOx and SOx emissions from international shipping will surpass those from land-based generation by 2020
- As of 2010, EU requires ships in harbor to use low-sulfur fuel or power-from-shore
- Shore-to-ship power reduces emissions to average >200t per ship/year
- Substantial global market potential \$15 bn (5-10 years)
  - \$10 bn/ships
    (5% annual growth rate)
  - \$5 bn/ports

### Convergence at work Helping solve the port emissions problem

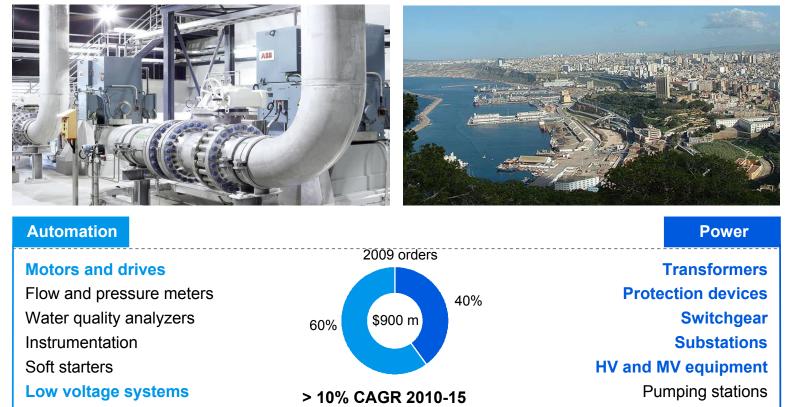


### A focused water portfolio Selective market approach and the right mix



## A focused water portfolio Selective market approach and the right mix

Magtaa desalination plant, Algeria



SCADA

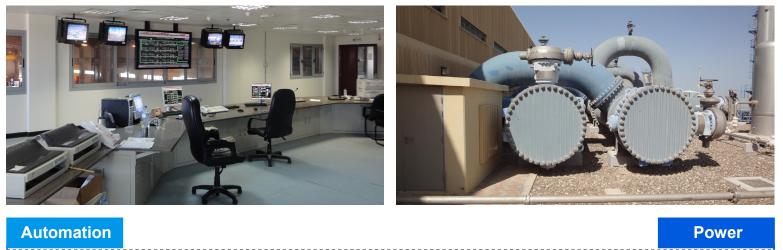
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Project includes design, engineering, erection and commissioning of the electrical system

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## A focused water portfolio Selective market approach and the right mix

Shuweihat Water Transmission Scheme, UAE



Project includes complete erection and commissioning of electrical and mechanical works

Automation		Power
Motors and drives Flow and pressure meters	2009 orders	Transformers Protection devices
Water quality analyzers	60% \$900 m	Switchgear
Instrumentation Soft starters		Substations HV and MV equipment
Low voltage systems		Pumping stations
Controls	SCADA and DCS systems	

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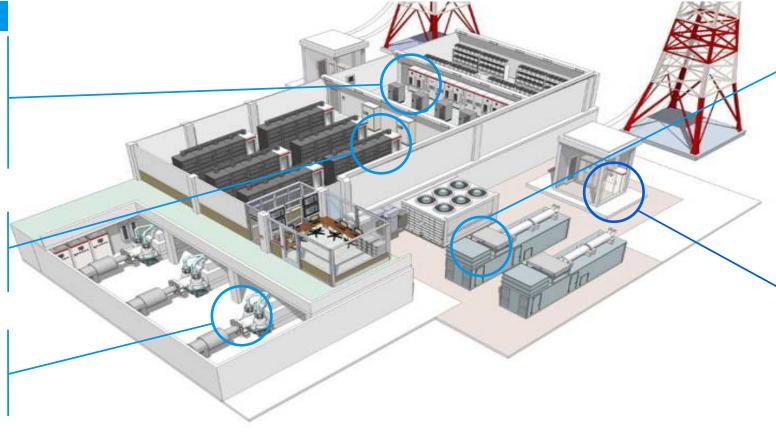
### Broad value proposition for data centers Combining technologies to feed an energy-hungry segment



LV power distribution LV switchgear and MCCs Intelligent PDUs Active filters Power factor correction Network analyzer Data communication

Building automation RPPs (remote power panels) Power measurement Bus systems Data communication

HVAC solutions High efficiency motors VSD (variable speed drive) Components for control panels PLCs Data communication



Uninterruptible power systems Static and rotary ups Diesel generators Batteries Service contracts

#### Power

MV power distribution MV switchgear and MCCs Protection relays Distribution transformers AVC (active voltage conditioning) Network management SCADA Data communication



### Market evolution drives new service offerings New service offerings enable transformation of installed base



Expanding market opportunity

Growing installed base and new segment opportunities plus customer outsourcing \$60 bn+ market Comprehensive offerings, evolving business models

Convergent upgrade and retrofit packages, preventative maintenance, Full Service<sup>®</sup> and contracted services all focused on total lifecycle Increasing people and R&D resources

Customer service organizations in more than 60 countries servicing the entire portfolio. Product development roadmap now in place

### Goal to take service share of ABB revenues to 20 – 25% by 2015



### Summary Bringing power and automation technologies together for the future

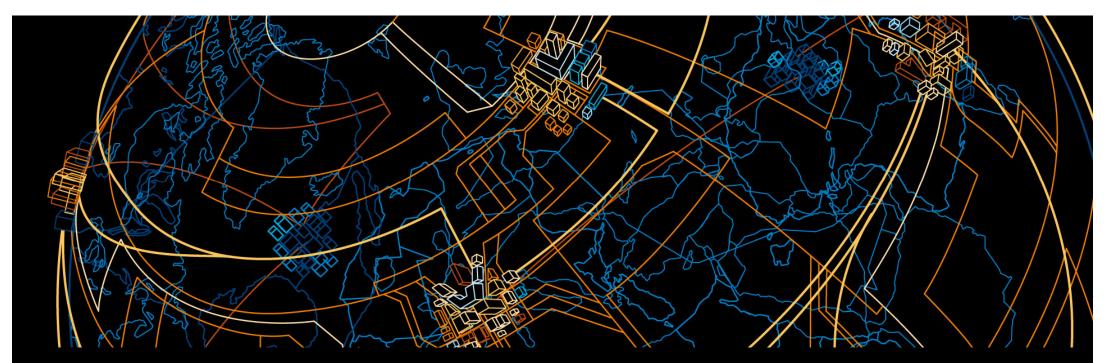
- Customers are seeking solutions more than products and systems
- Efficiency is the key to a sustainable energy future
- Integration of renewables and better reliability is getting increasingly important
- Managing and optimizing two-way flow of power and information becomes vital
- Technology will remain a key differentiator to address the market opportunities

ABB has the portfolio, domain expertise and footprint to deliver the needed solutions



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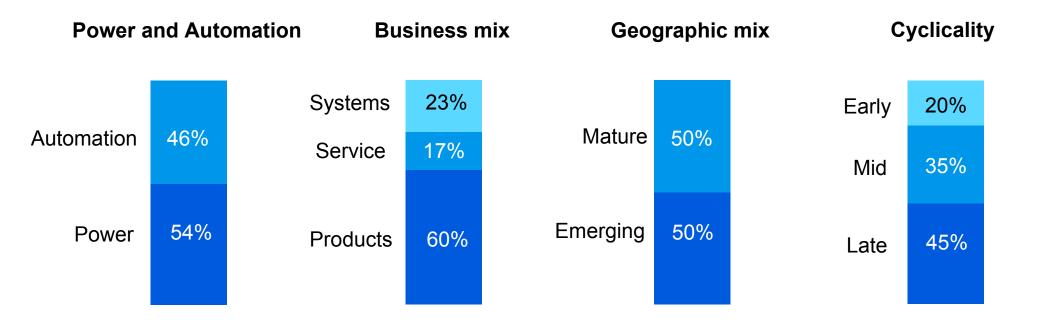
## ABB's financial strength Michel Demaré, CFO & Head of Global Markets

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## A dynamic, multi-dimensional portfolio Re-focused to address today's opportunities and challenges

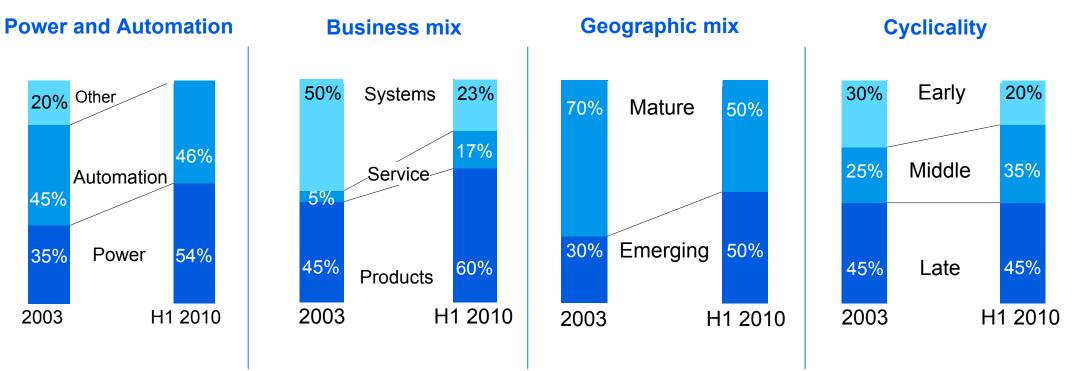
### Share of revenues H1 2010





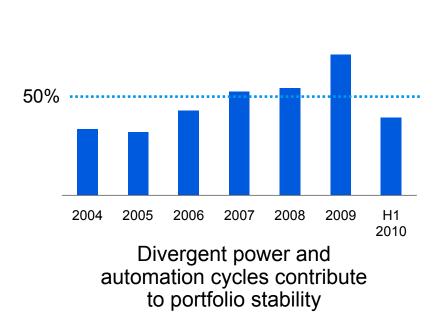
### A dynamic, multi-dimensional portfolio Mitigates against market cycles

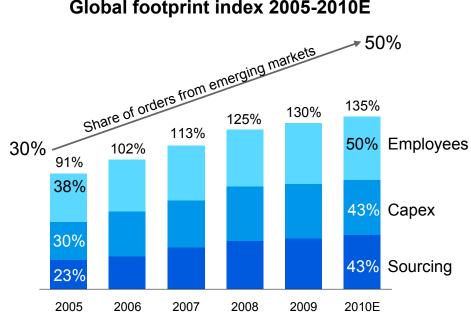
### Share of revenues 2003 vs H1 2010



### A dynamic, multi-dimensional portfolio Adjusts quickly to changing environment

Contribution of power businesses to ABB EBIT



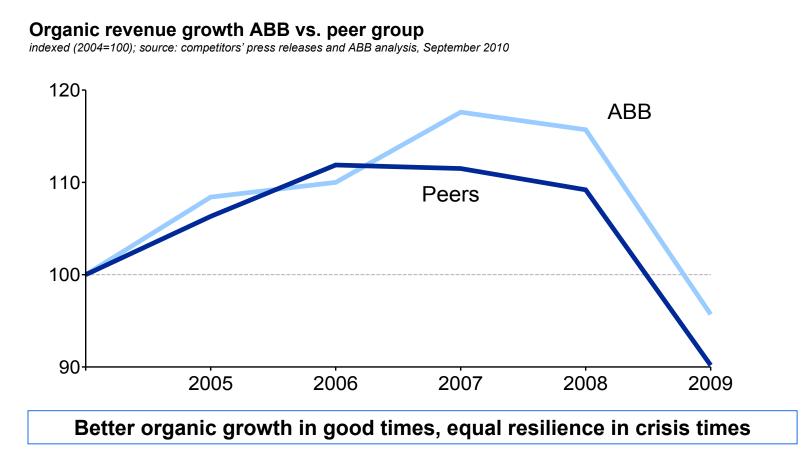


Dynamic pursuit of growth markets backed up by aggressive footprint changes

### Global footprint index 2005-2010E

2004-09

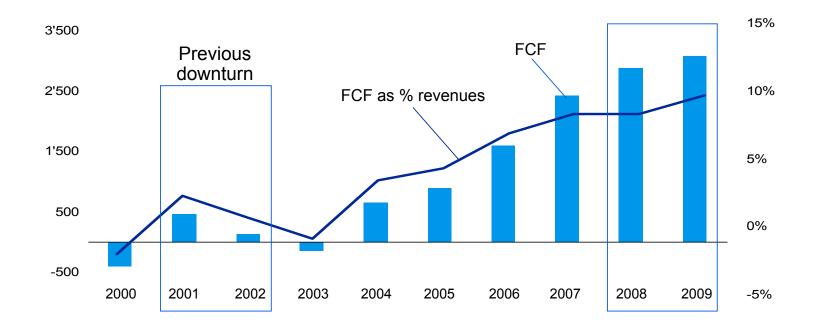
### Portfolio diversity has provided a competitive advantage Organic revenue growth ABB vs peers 2004-2009



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### This portfolio is a proven cash generator, even through the downturn

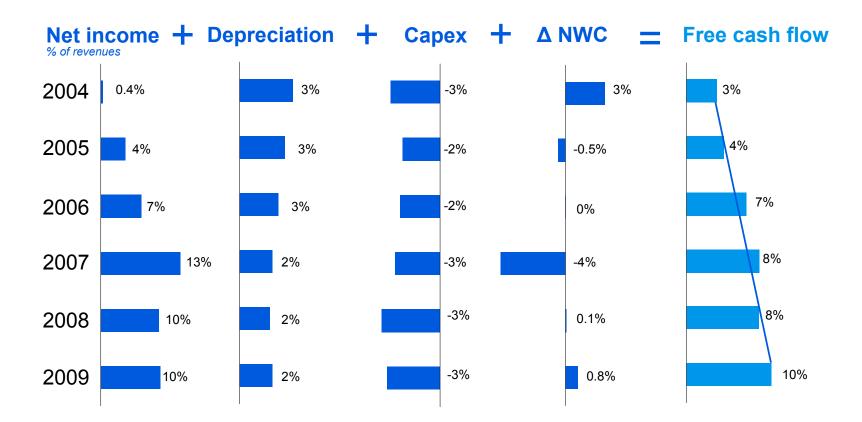
Free cash flow and as % revenues 2000-2009



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## Disciplined net working capital management

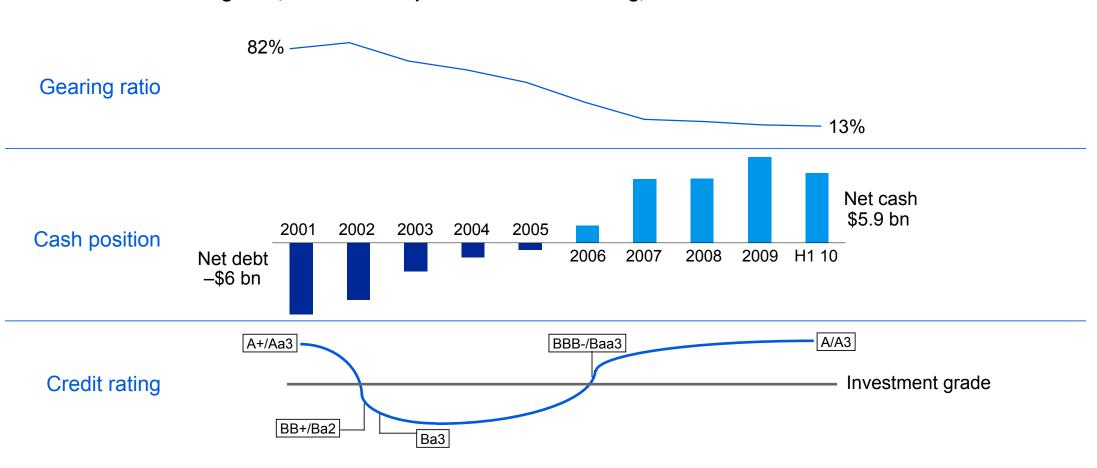
Tight capex control helped by effective emerging markets' investments



In the top league for free cash flow generation



### Portfolio focus and cash flow discipline for the sector's best balance sheet



Gearing ratio, net debt/cash position and credit rating, 2001-H1 2010

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## Organic growth Capex aimed at emerging markets, strategic products



Motors plant Aleksandrów Lódzki Poland

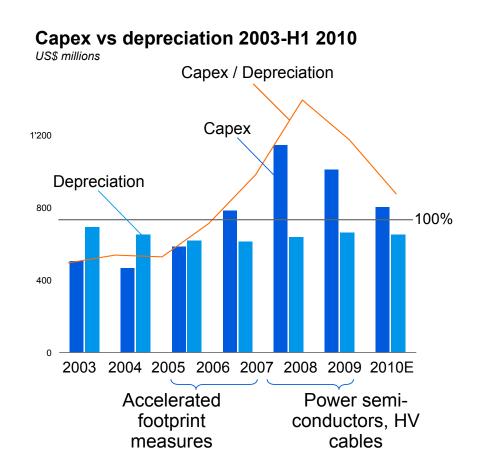


Wind generator plant, Vadadora, India

- Capex boosted 2007-09 to lift capacity, adjust footprint
- Strategic investments >\$200 mill in HVDC cables, power semiconductors
- 50-50 maintenance vs new capacity
- Capacity focus on EMs (\$400 mill in 2009)
  = higher output per \$ invested
- Capex 2010 ~\$800 mill (115% depreciation)

### Looking ahead

- EM focus will intensify further
- New product designs for local markets
- New strategic investments, e.g.
  - HVDC cables (U.S.)
  - GIS (India)
  - Azipod (China)



### Inorganic growth Our financial framework



- Acquisition to provide cash returns at or above WACC within 3 years, incl. synergies
  - Synergies for target and ABB



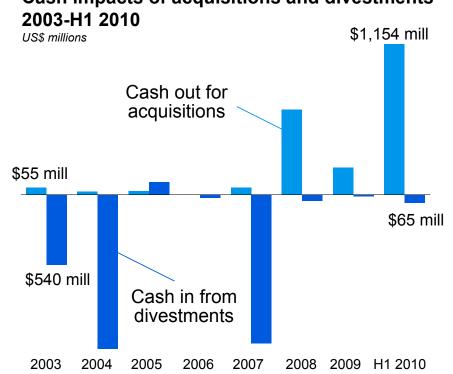
 Acquisition must be NPV positive, discounting cash flows at WACC +/additional hurdles, e.g.



- country risk premium, system vs product risk, cash flow stability
- Financing in line with our investment grade ambition



- Committed to Single A rating
- Implies conservative Net Debt/EBITDA and gearing ratios



## Cash impacts of acquisitions and divestments

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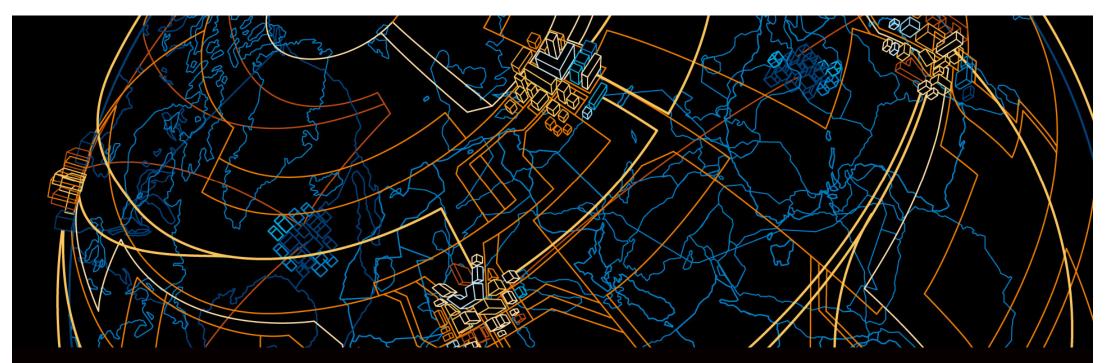
## Current trading update

- Trading pattern not fundamentally different from Q2
  - Short-cycle businesses continue to recover, growing fast in some regions
  - Infrastructure businesses still facing headwinds in terms of pricing, project award delays
- Cost savings delivery well on track, despite some supply chain challenges
- Expect the usual EBIT margin seasonality
  - Q3 operating margins usually lower than Q2 on negative seasonal mix
- Q3 2010 local currency revenues and operating margin expected above Q3 2009



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# The power of the portfolio - Summary Joe Hogan, CEO



## How is ABB changing? Changes driven by outside-in view



### **External Focus**

- Organization better aligned with markets, competition and growth
- Strong external look at markets and industries, e.g. Ventyx
- Bets on technology developed outside of ABB, e.g. Trilliant
  Leverage One ABB
- Much stronger focus on ABB solutions, services and systems
  Accountability
- Inorganic growth driven by divisions, not HQ
- Compliance responsibility at business level, not legal function
  Value Creation
- Mid-market rewire in key emerging markets China, India, MEA, Brazil
- Acceleration of emerging markets footprint and engineering



Big questions about ABB in the room Will ABB do something surprising?

- How will you use your balance sheet?
- How strong are your risk mitigation processes?
- How well are you positioned in China?
- Why the quarter-to-quarter beat-and-miss rhythm?

### Looking ahead: Short-term outlook Slow recovery in mature economies, good growth in emerging markets

- Slow recovery in Europe, US
- Emerging markets with above-average industrial growth
- Continued price pressure in PP, PS
- Easing price pressure in early-cycle
- Governments continue to push for controls on CO<sub>2</sub> emissions
  - Energy efficiency
  - Renewable energy
- Commodity prices steady to higher

Low risk of double dip, continued slow recovery in most advanced economies, good emerging markets growth

### **Real GDP growth**

Source: Global Insight (August 2010)

	2010	2011	2012
Emerging markets	6.6%	6.2%	6.1%
Mature markets	2.4%	2.0%	2.4%





### Summary The power of the portfolio

- ABB is a leader in markets with growth well above global GDP
- Solid long-term growth drivers: climate change, emerging markets and energy efficiency
- Best-in-class emerging market footprint positions us to meet future competitors
- Early action on cost take-out gives us a great foundation to benefit from recovery
- Driving next-generation technologies to maintain our competitive advantage
- Management team with good mix of industry know-how and operational strength
- New automation organization increases transparency, spurs innovation and growth

New targets to come at 2011 CMD



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### Safe harbor statement

This presentation includes forward-looking information and statements including other statements concerning the outlook for our third guarter revenues and EBIT margin. These statements are based on current expectations, estimates and projections about the factors that may affect our future performance, including global economic conditions, the economic conditions of the regions and industries that are major markets for ABB Ltd. These expectations, estimates and projections are generally identifiable by statements containing words such as "expects," "believes," "estimates," "targets," "plans" or similar expressions. However, there are many risks and uncertainties, many of which are beyond our control, that could cause our actual results to differ materially from the forward-looking information and statements made in this press release and which could affect our ability to achieve any or all of our stated targets. The important factors that could cause such differences include, among others, business risks associated with the weakened global economy and political conditions, costs associated with compliance activities, raw materials availability and prices, changes in governmental regulations and currency exchange rates and such other factors as may be discussed from time to time in ABB Ltd's filings with the U.S. Securities and Exchange Commission, including its Annual Reports on Form 20-F. Although ABB Ltd believes that its expectations reflected in any such forward-looking statement are based upon reasonable assumptions, it can give no assurance that those expectations will be achieved.

## For more information, call ABB Investor Relations or visit our website at www.abb.com/investorrelations

	Telephone	e-mail
Michel Gerber, Head of Investor Relations (Zurich)	+41 43 317 3808	michel.gerber@ch.abb.com
John Chironna (Norwalk, CT)	+1 203 750 7743	john.g.chironna@us.abb.com
John Fox (Zurich)	+41 43 317 3812	john.fox@ch.abb.com
Karen Himmelsbach (Zurich)	+41 43 317 3832	karen.himmelsbach@ch.abb.com
Astrid Bodmer, Assistant (Zurich)	+41 43 317 3808	astrid.bodmer@ch.abb.com

