Welcome to Oerlikon Solar
Cowen and Company Clean Energy Conference

New York: September 10, 2009
Christopher Constantine
Director New Technologies
Disclaimer

This presentation is based on information currently available to management. The forward-looking statements contained herein could be substantially impacted by risks and influences that are not foreseeable at present, so that actual results may vary materially from those anticipated, expected or projected.
Agenda

- OC Oerlikon Overview
- Oerlikon Solar Overview
- Solar Market
- Highlights & Project Update
- Business Snapshot 2009
- Focus on Cents per kWh
- Progress on the Path to Grid Parity
Six areas of high tech competencies
Overview of 2008

Oerlikon Textile
Oerlikon Coating
Oerlikon Solar
Oerlikon Vacuum
Oerlikon Drive Systems
Oerlikon Advanced Technologies

Market pos.
Sales CHF 08 1,690m
Employees (31.12.2008) 7,008

# 1-2
# 1
# 1
# 2
# 1-4
# 1-4

509m
598m
465m
1,204m
598m
1,204m

2,892
598m
1,583
1,204m
868
1,583

284m
805
5,080
805

Total Group: (FY 2008)
• CHF 4.75 billion Sales
• CHF 495 million EBITDA
• CHF 247 million R&D investment / 6,700 living patents / 1,500 engineers
Oerlikon as a provider of Clean-Technology

- Oerlikon Solar: Leading provider of silicon based thin film solar technology
- Oerlikon Coating: Leading coatings in the automotive sector:
  - 10x durability
  - 4% less energy consumption
- Oerlikon Graziano: Transmissions for hybrid cars
- Oerlikon Vacuum: Vacuum solutions for the solar industry
- Oerlikon Fairfield: Loose gears for wind turbines
- Oerlikon Systems: Advanced Nanotechnology for solar cells, thermo-electric generators and batteries
Oerlikon Solar
Overview
Undisputed market thin film silicon leadership further expanded

Orders received (in CHF m)

Sales

Highlights 1HY 09
- Large order from NST and repeat order from HelioSphera, project financing remains difficult; CMC Sunwell 2 de-booked from order backlog
- SOP at Sunwell, Auria, Pramac, and most recently Tianwei
- 50% increase in R&D costs as well as CHF 9m restructuring costs reduce EBIT

Measures & Outlook 1HY 09
- Restructuring measures well underway, >CHF 20m savings potential from >CHF 10m restructuring costs expected
- Maintain market leadership in end-to-end lines
- Orders and Sales expected flat or slightly below 2008

Priorities beyond 1HY 09
- Continue to invest in R&D and achieve results as per 2010 roadmap
- Return to double digit top-line growth
- Strategically position business for sustainable success
- Evaluate opportunities along the value chain

EBIT

0% EBIT margin in 1HY 2009

Orders received

1HY 08 1HY 09

Sales

1HY 08 1HY 09

EBIT

1HY 08 1HY 09

1HY 08 1HY 09

<table>
<thead>
<tr>
<th>1HY 08</th>
<th>1HY 09</th>
</tr>
</thead>
<tbody>
<tr>
<td>Orders received</td>
<td>451</td>
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<tr>
<td>Sales</td>
<td>214</td>
</tr>
<tr>
<td>EBIT</td>
<td>28</td>
</tr>
</tbody>
</table>

+10% +34%
A global footprint and growing

**North America**
- Sales / Business Development
- Strategic Sourcing
- Customer Support

**Europe**
- Oerlikon Solar Headquarters
- Sales
- Operations
- Customer Support & Training
- Advanced R&D / Pilot Line
- Product Development

**Asia**
- Sales
- Sourcing Hub
- Customer Support & Training
TEL and Oerlikon Solar join forces in Asia

TEL becomes the exclusive representative and installation and service provider in parts of Asia, Oceania and Japan.
Oerlikon Solar’s mission is to make solar power economically viable.
Solar Market
Drivers for new energy sources
Fundamentals don’t change

- Increased Energy Demand
- Rising Costs
- Diminishing Fossil Fuel Resources
- Environmental Concerns and Regulations
- National Security
Total electricity production mix
Fast growing global energy demand

World electricity production in 2006 was 19 million GWh total.

Source: EIA
Electricity market update
Fundamentals: global electricity generation market growth

Global energy generation mix forecast

- Renewables grow with a CAGR of 6.5% whereas conventional energy grows with 2.2%
- Due to higher market share of renewables, the market share in the total energy generation mix is increasing to 6% in 2030.

<table>
<thead>
<tr>
<th>Year</th>
<th>Renewable Growth (in%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2006</td>
<td>2.4%</td>
</tr>
<tr>
<td>2010</td>
<td>3.4%</td>
</tr>
<tr>
<td>2015</td>
<td>4.4%</td>
</tr>
<tr>
<td>2020</td>
<td>5.0%</td>
</tr>
<tr>
<td>2025</td>
<td>5.4%</td>
</tr>
<tr>
<td>2030</td>
<td>6.1%</td>
</tr>
</tbody>
</table>

1) Renewables: Wind, Geothermal, Other renewables
Source: EIA International Energy Outlook 2009
Key policy market drivers and trends

**China / Japan**
- Recent announced solar incentives via "Tentative Solar Energy Photo-electricity Construction Application Finance Subsidy Fund"
- New program will pay up to 20 RMB/ watt (US$2.93) for projects of 50 kW and above
- Subsidies only for leading edge technology products
- No details yet on overall size, duration of the plan or installation goals
- Japan added plan for solar panel subsidy in Q2 09

**European Union**
- Feed-in tariff is primary market driver
  - Germany remains stable, though decline in tariff will require lower costs
  - Spain limits MW’s
  - Emerging FiT markets – Italy, Greece, France, Bulgaria, Czech Rep

**USA**
- Federal tax benefit
  - Current stimulus legislation
    - ITC liquidity, manufacturing tax credit, loan guarantees, large scale government procurement
  - Additional legislation expected
    - National renewable energy requirements, carbon cap and trade system

**State level policies**
- California
  - Renewable Portfolio Standard, expect feed-in tariff policy for 1-20MW projects
- Florida, Texas, NY
  - Incentives being debated

**Recent positive market developments worldwide.**

- Germany Goal (BEE) – 47% RE (incl. 7% PV) by 2020
- EPIA Goal – 12% PV electricity by 2020

---

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- Current stimulus legislation
  - ITC liquidity, manufacturing tax credit, loan guarantees, large scale government procurement
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**European RE and PV targets – reality or posturing?**
- EPIA Goal – 12% PV electricity by 2020
- Germany Goal (BEE) – 47% RE (incl. 7% PV) by 2020
Growth in the PV market
Thin-Film to grow faster than the rest of the solar market

**Annual PV module demand**

![Graph showing annual PV module demand with data from 2008 to 2013, including module demand (MWp) and accumulated installed capacity (GWp).]

**Accumulated Installed Capacity**

![Graph showing accumulated installed capacity with data from 2008 to 2013, including c-Si and Thin-Film segments.]

Source: Oerlikon Solar

Thin-Film expected to increase strongly in the next 5 years, gradually gaining market share.
Why thin-film instead of c-Si?
Absolute lowest cost of electricity!

- Much lower manufacturing cost than c-Si
- Lower efficiency does result in slightly higher BOS cost
- However, overall result is lowest cost of electricity

- Better performance at higher operating temperatures
- Better performance in diffused light, wider range of incidence angles
- Better suited to building integrated applications

- Higher margins in manufacturing
- Higher rates of return on investment for solar projects
Thin film silicon equipment market

Oerlikon Solar has the largest installed base for thin film silicon PV

- Recovery of project finance markets and introduction of several new subsidy programs globally have a strong potential to shift the market forecast from Nominal to Upside scenario

- Demand elasticity will sustain growth through 2013 and beyond
  - TF Grid Parity is a key driver
  - Transition from capacity-based pricing ($/W) to energy-based pricing ($/kWh)

Thin film silicon offers a competitive technology and cost advantage and Oerlikon Solar is ideally positioned to capitalize on its growth potential.
Highlights &
Projects Update
Recent technical highlights

- Oerlikon Solar Receives Micromorph® Master Certificate
- New record Micromorph® module with 151 Watt performance and over 11% efficiency (initial)
- TÜV IEC master certification for Amorph and Micromorph®
- Launched amorph® HIGH PERFORMANCE
- VLSI Research Inc announced the ranking of the top 5 turnkey line suppliers to the PV manufacturing industry for 2008
- Oerlikon Solar KAI 1200 PECVD system wins the Cell Award 2009
Highlights in the first-half year 2009
Customer News

- The following customers have announced their SOP (start of production) with our end-to-end lines;
  - Tianwei (a-Si; 46 MW)
  - Pramac (μc-Si; 30 MW)
  - Auria Solar (μc-Si; 60 MW)

- Nano Solar Technologies has ordered its first 120 MW Micromorph® end-to-end line

- HelioSphera signed their follow-up order of an additional 30 MW Micromorph® end-to-end line
Customer Examples

Pramac
Florence/Italy
Micromorph®

CSG
Thalheim / Germany
Amorphous
## Project update

<table>
<thead>
<tr>
<th>Customer</th>
<th>Technology</th>
<th>Type</th>
<th>Contract Signed</th>
<th>Move-In On-Time</th>
<th>SOP On-Time</th>
<th>Project MW</th>
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<tr>
<td>Bosch SE</td>
<td>Amorphous</td>
<td>Equipment</td>
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<td>✓</td>
<td>✓</td>
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<tr>
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<td>Amorphous</td>
<td>End-to-End</td>
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<td>✓</td>
<td>✓</td>
<td>50</td>
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<tr>
<td>Inventux</td>
<td>Micromorph®</td>
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<td>✓</td>
<td>✓</td>
<td>30</td>
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<tr>
<td>Auria Solar</td>
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<td>Pramac</td>
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<td>✓</td>
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<td>30</td>
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<td>Tianwei</td>
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<td></td>
<td>120</td>
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</table>

**TOTAL**  | 576 MW  | 456 MW  | 316 MW
Business Snapshot 2009
### Business Snapshot

- Thin Film silicon continues to be the fastest growing sector of the PV market.

- The technology is well positioned to deliver competitive lowest cost per kWh.

- Oerlikon Solar has become a leading player in Thin Film PV.

- All projects delivered on schedule and on performance.

- Close to 500 MW installed capacity by the end of 2010.

- Technology roadmap on schedule for $0.70/Wp by end of 2010.

- Proven ability to scale. World class sales, manufacturing and support partnerships with Flextronics and TEL.
Focus on cents per kWh
Panel price is not the whole story
Driving down energy costs for end customers
Panel price is not the whole story

Oerlikon Solar Micromorph today
Cost of Electricity: $0.14/KWh

Oerlikon Solar Roadmap to end 2010
Cost of Electricity: $0.09/KWh

1) Electricity Calculations for a 10 MW Project in California incl. ITC and Debt/Equity Cap. Structure
2) Equipment Shipment (Module production ramped in 2012)
Cost Roadmap for Oerlikon Solar Micromorph®
On track to deliver $0.70/W by 2010
Short term challenges, long term opportunities
Solutions for a solar powered world

Thin-film is the fastest growing PV segment, creating a USD 45 billion total solar market opportunity by 2012

Oerlikon Solar on track to offer grid parity solutions by the end of 2010

Proven manufacturing solutions
More than 960,000 panels already produced
## Calendar and contact details

### Calendar

<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td>October 22, 2009</td>
<td>Key figures for the 3rd quarter 2009</td>
</tr>
</tbody>
</table>

### Contact details

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Roland Bischofberger  
T: +41 58 360 97 14

F: +41 58 360 91 93

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Thank you for your attention.
Appendix
Proven Thin Film Manufacturing Solutions
Module cost of ownership calculation

Material Cost
- Gas, glass, lamination, foil, consumables, etc.

Investment Cost
- Equipment, line automation, back-end, etc.

Labor Cost
- Operators, technicians, management, etc.

Throughput
- Glasses per hour

Yield
- % sellable modules

Uptime
- % of production availability

Power Efficiency
- Module driven by conversion

Calculation

\[
\text{Money} \frac{\text{Wp}}{\text{Power} \times \text{Yield}} = \frac{1}{\text{Material Cost}} + \frac{\text{Investment Cost}}{\text{Throughput} \times \text{Uptime}} + \frac{\text{Labor Cost}}{\text{Time}}
\]
15 years of R&D experience and industrial mass production since 2005

- PV lab at IMT by Prof Arvind Shah
- Light trapping by TCO & intermediate reflector
- Oerlikon founds own R&D lab and enters thin film silicon PV
- Oerlikon displays first functional 1.4 m2 a-Si module
- Oerlikon presents first micromorph® tandem module ~125W
- 40MWp equipment contract with Schott Solar
- Start of first micromorph® production at Inventux
- Champion cell with ~ 13% efficiency for micromorph®
- First micromorph® end-to-end production line contract
- Sun Well ramps first Asian line
- Tianwei SOP for 46 MW
- NST contracts for end-to-end solutions for 120 MW

History:
- 1986
- 1989
- 1995
- 2003
- 2004
- 2005
- 2007
- 2008
- 2009

Opportunity identification
Concept and product
Commercialization
Globalization
Thin Film Solar Modules

Cell Structure

- Glass
- Front Contact
- PV Layers
- Back Contact
- White Reflector
- Lamination
- Glass

Manufacturing
Micromorph® process technology delivers up to 50% more power.
Leading end-to-end production solutions...

Front-End

Line Automation

Back-End

= Oerlikon Solar

= Metrology
...and all critical components for module production...

Laser Scriber (LSS)
Define Cells
- Used for patterning
- Subdivide the continuous thin film layer into individual cells and create serial connections between them

PECVD (KAI)
Deposit PV Material
- Applies the photovoltaic thin films which convert light into electrical energy
- Capacity to produce both amorphous solar modules and micromorph® solar modules

LPCVD (TCO)
Deposit Contacts
- Allows applying transparent conducting front and back contacts
- Base electrode (cathode) is deposited followed by the application of the anode
…with demonstrated rapid ramp-up

### Ramp-up phase

<table>
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<th>Weeks since SOP</th>
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</thead>
<tbody>
<tr>
<td>1</td>
</tr>
<tr>
<td>FAB - A</td>
</tr>
</tbody>
</table>

200% improvement of production levels at week 21.

### Module power distribution ramps

- First 25,000 panels
- Module power

- Second 25,000 panels
- Module power

- Third 25,000 panels
- Module power

### Ramp-up yield

<table>
<thead>
<tr>
<th>Weeks after SOP</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
</tr>
<tr>
<td>FAB - A</td>
</tr>
</tbody>
</table>

- Target yields achieved after four weeks
- Yield much stable compared to earlier project
End-to-End Solutions

5. TÜV Master Certificate for fastest time to market with quality and lifetime
4. Oerlikon Solar technology for lowest cost, highest output and long lifetime
3. PV expert knowledge, metrology and automated process control for highest line yield and narrow power distribution
2. In-house simulation of line concept to get best utilization and throughput match
1. All critical tools and processes are Oerlikon Solar proprietary to guarantee best layer match and highest module efficiency
Group Financials & Segment Overview
Results of the first half year 2009

**Highlights 1HY 09**
- Further progress in portfolio enhancement
- Stringent execution of efficiency improvement measures
- Vacuum, Coating, Solar maintain break-even, Solar wins 2 large contracts
- First steps to solidify balance sheet

**Outlook**
- Global economic recession is deeper and recovery takes longer; visibility in key markets (e.g. Solar, Textile) only slightly improved, still first encouraging signs in selected markets
- Restructuring costs expected of ~CHF 130m in the next 2 years with recurring savings of up to CHF 400m
- Further improvements expected from NWC and CAPEX

**Priorities**
- Deleveraging the balance sheet through
  - disposal of assets
  - equity transaction
- Enhance operational performance through rigorous restructuring
- Return to profitability by 2010
Key financials 1HY 2009 reflect challenging environment

(in CHF m)

<table>
<thead>
<tr>
<th>Orders received</th>
<th>Orders on hand</th>
<th>Sales</th>
<th>Net Profit</th>
</tr>
</thead>
<tbody>
<tr>
<td>1HY 08: 2,604</td>
<td>1HY 09: 1,585</td>
<td>1HY 08: 2,382</td>
<td>1HY 08: -313*</td>
</tr>
<tr>
<td>YE 08: 1,149</td>
<td>1HY 09: 1,145</td>
<td>1HY 09: 1,428</td>
<td>1HY 09: -99</td>
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</tbody>
</table>

Note: Discontinued operations not included except Net Profit
* Including CHF 343m goodwill impairment
## Key figures by Segment – H1 2009
### Continued operations

<table>
<thead>
<tr>
<th>Segment</th>
<th>Textile (in CHF m)</th>
<th>Coating (in CHF m)</th>
<th>Solar (in CHF m)</th>
<th>Vacuum (in CHF m)</th>
<th>Drive Systems (in CHF m)</th>
<th>Advanced Techn. (in CHF m)</th>
<th>Group (in CHF m)</th>
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</thead>
<tbody>
<tr>
<td>Orders received</td>
<td>476</td>
<td>158</td>
<td>497</td>
<td>145</td>
<td>277</td>
<td>32</td>
<td>1,585</td>
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<tr>
<td>Change vs. previous year</td>
<td>-47%</td>
<td>-41%</td>
<td>+10%</td>
<td>-43%</td>
<td>-56%</td>
<td>-64%</td>
<td>-39%</td>
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<tr>
<td>Orders on hand</td>
<td>501</td>
<td>-</td>
<td>466</td>
<td>65</td>
<td>92</td>
<td>21</td>
<td>1,145</td>
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<tr>
<td>Change vs. previous year</td>
<td>-31%</td>
<td>-</td>
<td>-33%</td>
<td>-29%</td>
<td>-58%</td>
<td>-70%</td>
<td>-36%</td>
</tr>
<tr>
<td>Sales</td>
<td>430</td>
<td>158</td>
<td>286</td>
<td>149</td>
<td>377</td>
<td>28</td>
<td>1,428</td>
</tr>
<tr>
<td>Change vs. previous year</td>
<td>-55%</td>
<td>-41%</td>
<td>34%</td>
<td>-38%</td>
<td>-40%</td>
<td>-59%</td>
<td>-40%</td>
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<tr>
<td>EBITDA</td>
<td>-86</td>
<td>21</td>
<td>13</td>
<td>9</td>
<td>11</td>
<td>-8</td>
<td>-41</td>
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<tr>
<td>in % of sales</td>
<td>-20%</td>
<td>13%</td>
<td>5%</td>
<td>6%</td>
<td>3%</td>
<td>-29%</td>
<td>-3%</td>
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<tr>
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<td>-6</td>
<td>0</td>
<td>2</td>
<td>-20</td>
<td>-12</td>
<td>-164</td>
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<tr>
<td>in % of sales</td>
<td>-27%</td>
<td>-4%</td>
<td>0%</td>
<td>1%</td>
<td>-5%</td>
<td>-43%</td>
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<tr>
<td>Net assets</td>
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<td>353</td>
<td>61</td>
<td>1,086</td>
<td>72</td>
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<tr>
<td>Employees</td>
<td>6,330</td>
<td>2,629</td>
<td>876</td>
<td>1,523</td>
<td>4,694</td>
<td>226</td>
<td>16,492</td>
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</table>
Textile: First signs of market recovery

(in CHF m)

<table>
<thead>
<tr>
<th>Orders received</th>
<th>Sales</th>
</tr>
</thead>
<tbody>
<tr>
<td>904</td>
<td>966</td>
</tr>
<tr>
<td>1HY 08</td>
<td>1HY 09</td>
</tr>
<tr>
<td>476</td>
<td>430</td>
</tr>
<tr>
<td>-47% EBIT</td>
<td>-55%</td>
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<tr>
<td>EBIT</td>
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</table>

-27% EBIT margin in 1HY 2009

Highlights 1HY 09
- Strategy shift to individual business unit performance
- Restructurings well progressed: Schlafhorst ahead of schedule, 2 other BUs basically completed
- Book/Bill > 1; chemical fiber market activities returned strongly
- NWC significantly reduced

Measures & Outlook FY 09
- Consequent implementation of further restructuring measures
- Leverage first positive market momentum to improve profitability in 2H 09
- Further optimize NWC efficiency
- Only selected recovery expected in 2H 09, sales to be CHF 1.2bn or lower

Priorities beyond FY 09
- Continue focused product innovation to maintain technology leadership
- Achieve turnaround in 2010
- Evaluate new ownership of parts or whole of Textile
- Confirm sustainability of partnership to customers

EBIT

-214
1HY 08 1HY 09
-118
Coating: Accelerated shift to Asia

- Significant drop in demand from Tooling and Automotive, Asia started recovery
- Operative break even result despite 41% drop in volume, EBITDA at CHF 21m.
- 7 coating centers operational in China, consolidation of 7 sites in EU & AM
- Supplier Award from Audi Hungary

Highlights 1HY 09

- Remain ahead of plan on contingency measures, 5% HC reduction in 2H 09
- Further optimization of Coating Center network (consolidation Germany, further closures in RoE under review, Inauguration of 1st center in Russia
- Further improvements in Auto and Asia support increased earnings in 2H 09

Measures & Outlook FY 09

- Leverage additional optimization potential from internal benchmarking, focus on business process standardization
- Seek additional organic growth opportunities in components market
- Optimize asset utilization and NWC

Priorities beyond FY 09

(in CHF m)

<table>
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<tr>
<th></th>
<th>Orders received</th>
<th>Sales</th>
<th>EBIT</th>
</tr>
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<td>269</td>
<td>269</td>
<td>52</td>
</tr>
<tr>
<td>1HY 09</td>
<td>158</td>
<td>158</td>
<td>-6</td>
</tr>
</tbody>
</table>

-41% EBIT margin in 1HY 2009
Solar: Undisputed market thin film silicon leadership further expanded

Highlights 1HY 09
- Large order from NST and repeat order from Heliosphera, project financing remains difficult; CMC Sunwell 2 de-booked from order backlog
- SOP at Sunwell, Auria, Pramac, and most recently Tianwei
- 50% increase in R&D costs as well as CHF 9m restructuring costs reduce EBIT

Measures & Outlook FY 09
- Restructuring measures well underway, >20m savings potential from >CHF 10m restructuring costs expected
- Maintain market leadership in end-to-end lines
- Orders and Sales expected flat or slightly below 2008

Priorities beyond FY 09
- Continue to invest in R&D and achieve results as per 2010 roadmap
- Return to double digit top-line growth
- Strategically position business for sustainable success
- Evaluate opportunities along the value chain

(in CHF m)

Orders received

<table>
<thead>
<tr>
<th></th>
<th>1HY 08</th>
<th>1HY 09</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sales</td>
<td>451</td>
<td>497</td>
</tr>
<tr>
<td>Sales</td>
<td>214</td>
<td>286</td>
</tr>
</tbody>
</table>

EBIT

<table>
<thead>
<tr>
<th></th>
<th>1HY 08</th>
<th>1HY 09</th>
</tr>
</thead>
<tbody>
<tr>
<td>0% EBIT margin in 1HY 2009</td>
<td>28</td>
<td>0</td>
</tr>
</tbody>
</table>

EBIT margin in 1HY 2009
Vacuum: Reshaping for sustainable profitability

Drastic market slowdown across all market segments, Coating/Solar and Europe most affected

- Contingency plans consequently implemented, positive EBIT maintained despite significant drop in volume
- Market launch RUVAC WH roots pump

Continued execution of streamlining program improving value proposition across segment with sustainable impact on profitability and cash flow

- Successfully introduce new RUVAC and TRIVAC NT pumps to the market
- Add. slight recoveries in main markets expected to improve op. results in 2H 09

Streamline processes and organization (digitalization, automation)

- Enhance offering, especially in high vacuum and solutions
- Leverage growth opportunities in power transmission and R&D markets
- Further improve lead times and NWC

1HY 08 1HY 09
Orders received
256 145
-43%

Sales
239 149
-38%

EBIT
26 2

+1% EBIT margin in 1HY 2009

1HY 08 1HY 09

Highlights 1HY 09

Measures & Outlook FY 09

Priorities beyond FY 09
Vacuum: Key technology for Solar

**Crystalline Silicon**
- Production of Silicon
- Ingots & Wafers Production
- Coating of Wafers

**Thin Film Technology**
- Cleaning of Glass
- Generation of TCO & Photo Electric Layers

Production of Modules incl. Lamination
Installation of Modules

Vacuum required
Drive Systems: Further sharp market contraction

(in CHF m)

<table>
<thead>
<tr>
<th></th>
<th>Orders received</th>
<th>Sales</th>
</tr>
</thead>
<tbody>
<tr>
<td>1HY 08</td>
<td>636</td>
<td>377</td>
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<tr>
<td>1HY 09</td>
<td>277</td>
<td>39</td>
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<tr>
<td>EBIT</td>
<td></td>
<td>-56%</td>
</tr>
<tr>
<td>1HY 08</td>
<td>39</td>
<td>-20</td>
</tr>
<tr>
<td>1HY 09</td>
<td>626</td>
<td>377</td>
</tr>
<tr>
<td>EBIT</td>
<td></td>
<td>-40%</td>
</tr>
</tbody>
</table>

Highlights 1HY 09

- Sharp decline and de-stocking in construction, agriculture and automotive
- Restructuring programs widely implemented; rationalization of European production footprint progressing (CZ, ITL)
- Major orders from energy and mining customers

Measures & Outlook FY 09

- Further temporary plant shut-downs and capacity adjustments to match market environment
- Continue consolidation of European footprint and shift of manufacturing to Asia (IND, CHN)
- No further decline in sales and operational performance expected

Priorities beyond FY 09

- Seek growth opportunities in Wind, Automotive (Zero Emission Vehicles, Hybrid) and Infrastructure (Asia)
- Continue localization of final assemblies in Asia
- Further increase customer value-add by focusing on engineered solutions
Drive Systems: Clean technology opportunities

Wind Power
Forming alliances with major wind energy providers
Become the customer’s wind gear “arm”
- Preferred choice for quality and precision
- Producing gear components
- Drive systems
Foster a “partner” relationship as opposed to competitive relationship
Major program with Winergy developed in late 2007, currently starting high – volume production

Zero Emissions
Utilize years of direct electric drive technology & know – how and apply to:
- Specialty automotive opportunities
- Mass transportation
- Mobile utility vehicles
Do not pursue “ultra – high volume” automotive hybrid business (passenger car, etc.)
Advanced Technology: Systems - the Oerlikon “Incubator”

(in CHF m)

<table>
<thead>
<tr>
<th>Orders received</th>
<th>Sales</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1HY 08</strong></td>
<td><strong>1HY 09</strong></td>
</tr>
<tr>
<td><strong>88</strong></td>
<td><strong>32</strong></td>
</tr>
<tr>
<td>-64%</td>
<td>-59%</td>
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**EBIT**

<table>
<thead>
<tr>
<th><strong>1HY 08</strong></th>
<th><strong>1HY 09</strong></th>
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<tbody>
<tr>
<td>-68</td>
<td>-12</td>
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</tbody>
</table>

**Highlights 1HY 09**

- Closing of Esec, Space and Etch, conclusion of Oerlikon Optics sale
- Market launch SOLARIS
- Better sale of equipment for Opt. Discs
- Weak demand and low visibility in Semiconductor, low after sales business due to weak fab. capacity utilization

**Measures & Outlook FY 09**

- Conclude reorganization of Asian Sales force and service network
- Establish SOLARIS in crystalline silicon PV market
- Secure Semiconductor key accounts
- Trend reversal of Semi Cap Equipment spending expected for 2HY 09

**Priorities beyond FY 09**

- Establish additional market applications in Advanced Nanotechnology
- Keep lading position in selected Semiconductor and Optical Disc markets
- Expand incubator function of Systems for the Group

**Note:** discontinued operations not included
## Summary of half year 2009 announcement

| Operations       | Unsatisfactory results due to significant market decline in all Segments; early cycle businesses show first signs of recovery  
|                  | Solar, Coating and Vacuum with positive operative results, other businesses continued to burden earnings  
|                  | Solar regaining momentum with CHF 0.5bn orders received |
| Restructuring & Contingency | Efficiency improvement measures successfully implemented and further extended, focus on Textile, Drive Systems and Vacuum  
|                  | Total >700 measures identified; ~CHF 160m restructuring charges to generate up to CHF 400m savings |
| Cash Flow & Refinancing | Successful amendment of Syndicated Loan  
|                  | Capex significantly reduced below depreciation, net working capital, initiative gaining traction  
|                  | Measures to strengthen equity base under review |
| Portfolio & Innovation | Divestment Esec, Space and Optics concluded with positive impact on net profit and equity  
|                  | Continuous focused investments into R&D, further expansion of “Clean Tech” offering with SOLARIS |