

TOPSIL – A HIGH TECH COMPANY IN THE GLOBAL SEMICONDUCTOR INDUSTRY

Investordagen

17. september 2014

AGENDA

- **Topsil in brief**
 - **Our business**
- Strategy "Executing on Opportunities"
- Questions

DEDICATED TO HIGH QUALITY SILICON MANUFACTURE SINCE 1959

- Highly specialised manufacturer of silicon wafers for advanced electrical components on power market.
- Amongst only a handful of companies worldwide capable of manufacturing ultrapure silicon (float zone).
- Customers: Relatively few large multinational companies in the semiconductor industry & for a minor part, research institutions/universities.
- Substantial investment programme of DKK 300m 2010-2012 in facilities, technology and equipment to strengthen overall position in market.
- New plant in Copenhagen Cleantech Park (Fr.sund), production initiated, transfer from old plant in same area ongoing.
- Subsidiaries in Poland (production, sales) and Japan (sales).
- Listed on NASDAQ OMX Nordic stock exchange since 1986.



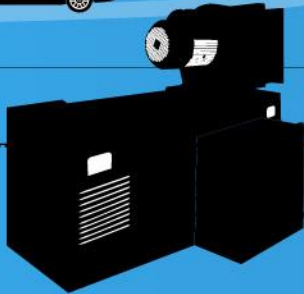
ULTRAPURE SILICON ENABLING THE WORLD OF TOMORROW

WIND TURBINES

Control of turbine,
distribution
of electricity
to grid.

ELECTRIC AND HYBRID CARS

Energy efficient
supply of
electricity,
regulation of
supply.



PRODUCTION MACHINERY

Control and
energy efficient
adjustment of
speed.

ELECTRIC TRAINS

Energy
efficient supply
of electricity,
regulation of
speed.



THE GRID

Conversion of
current, grid
connection,
Smart Grids.



MACRO ECONOMIC DRIVERS ON POWER MARKET

- Growing middle class worldwide, urbanisation. This calls for modern conveniences such as access to stable supply of electricity, well-functioning public transport, cars, white goods, etc.
- Development of green technologies driven by concern of increased levels of pollution, focus on CO2 emissions, price on fossil fuels.
- Political action: Grid improvements and planning of public transport are in essence driven by governments, including size of investments and pace of implementation.



Courtesy of Toyota hybrid



MARKET CHARACTERISTICS

- High entrance barriers to industry
 - Long production cycles
 - Inter-dependency - long term relations in value chain
 - Long and costly qualification processes
- Topsil: Long term agreements with raw material suppliers and main customers
- Customer requirements: Uniform, high quality products, on time delivery, and price
- Step-change in technology opening new opportunities
 - Towards larger size wafers (200mm).

Polysilicon



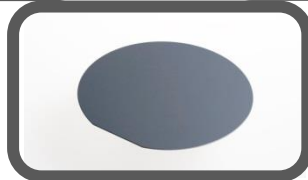
Power component



Final application



Courtesy of Toyota hybrid



Finished wafers



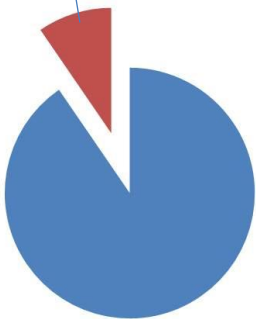
Power module

MAIN MARKET: POWER MARKET, MARKET SIZE 2012 AND STRATEGY PERIOD 2013-2015

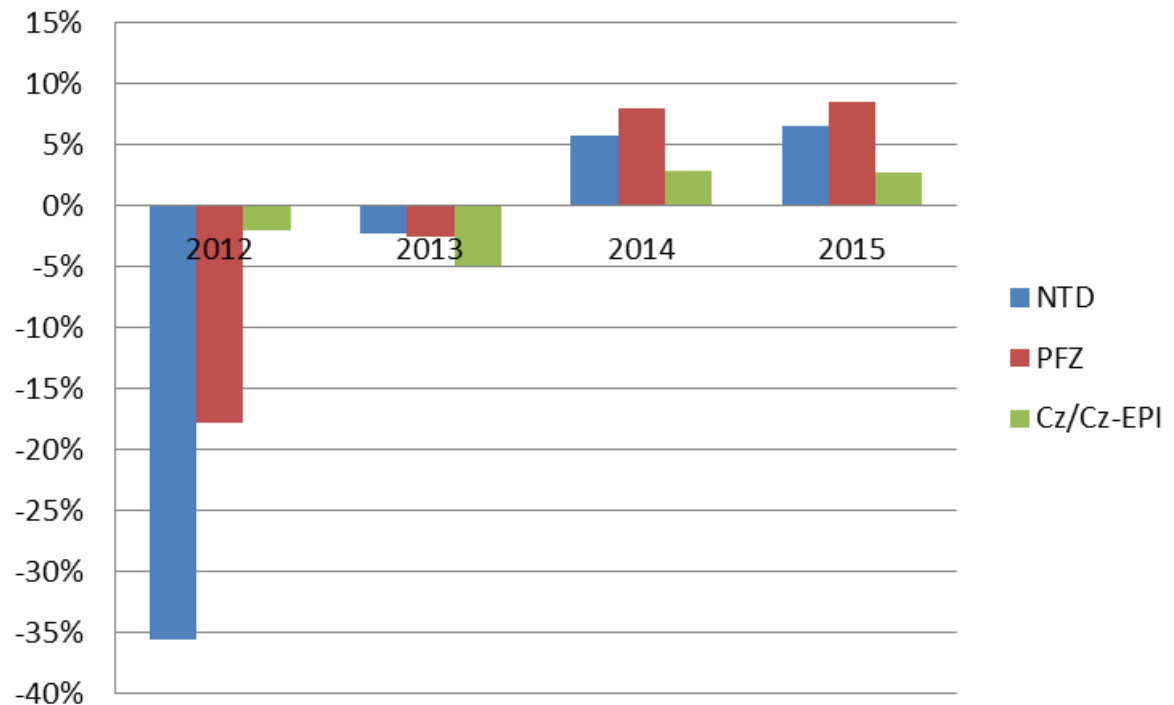
Aggregated silicon market worth around DKK 50 billion in 2013. The power market accounted for about 10% of this market.

Main types of silicon on power market are NTD for very high power, PFZ for high and medium power and CZ/CZ-EPI for medium and low power.

Sources: SEMI, Yole Developpement, Feb. 2014



Estimated market growth power market, YoY, 2012-2015



Source: Yole Developpement, February 2014,.
Growth estimate by value

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BACKGROUND, STRATEGY

TOPSIL, BEGINNING OF 2012

- 2006-2010 strong growth and high profitability
- Focus on many small segments
- European focus
- Market downturn started early 2011, continued 2012
- New top management in 2012
- World class in-house power silicon and float zone competences
- Production yield and efficiency below market standard
- Lack of execution: Historically too many significant delays in key projects:
 - Development and market introduction of next generation silicon (200mm) ✓
 - Construction of state-of-art float zone plant ✓
 - Integration between Topsil and Polish subsidiary, acquired 2008 ✓
 - Implementation of automotive level quality system ✓
 - New improved version of main product ✓

STRATEGY "EXECUTING ON OPPORTUNITIES "

FOCUS ON LARGEST AND MOST PROFITABLE SEGMENT: POWER MARKET, UTILISING INVESTMENTS ALREADY MADE:

- **Strengthen market position** in high and medium power (PFZ and 200 mm), believed to generate highest growth rates in coming years
- Expand position in **Japan and China**, Japan accounts for 1/3 of market for ultrapure silicon
- Increase **cash flow** from operations
- Increase capacity and enhance production **efficiency**



Courtesy of Toyota hybrid



STRATEGY UPDATE, EXECUTING ON OPPORTUNITIES

EXPAND POSITION JAPAN AND CHINA

- Product qualification ongoing at several key customers, 2013 ->
- Subsidiary established in Kyoto, Japan, end of 2013.
- Agreement signed with Japan based E&M to grow Japanese market and strengthen sales of ultrapure silicon, beginning of 2014.
- Framework agreements with two Chinese customers on supply of ultrapure silicon for transport and energy infrastructure purposes in China, 2014-2017, April 2014.

INCREASE FOCUS ON PFZ/ 200mm PRODUCTS

- PFZ sales increased in declining market 2013, revenue up by 27%.
- 200mm samples shipped for customer qualification end of 2013:
 - In Japan, next generation silicon products (200mm) qualified by large, potential customer in the automotive industry, Q2 2014.
 - In China first framework order received on 200mm products to be used for qualification of customer's new production facility, Q2 2014.
- New version of 150mm products released for customer qualification built on the 200mm platform, Q2 2014.

STRATEGY UPDATE, EXECUTING ON OPPORTUNITIES

INCREASE CASH FLOWS FROM OPERATIONS

- Adjustment of raw material agreements.
- Tight control of working capital.
- Investments below level of depreciations.
- Cycle time of production reduced.
- Cash flows from operating activities: inflow of DKK 7.3m, Q2 2014 against an outflow of DKK 9.1m in the year-earlier period.

INCREASE CAPACITY AND ENHANCE PRODUCTION EFFICIENCY

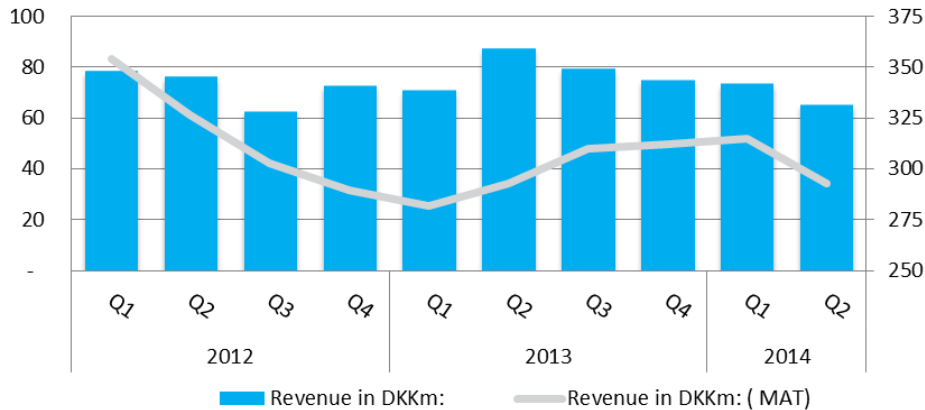
- Efficiency enhancement activities proceeding according to plan. Expected to have favourable impact on product costs for silicon wafers.
- Increased recycling of silicon waste (remelt).
- Increased efficiency of supply chain.
- General cost savings programmes.
- Production of former production facility expectedly to be closed down early Q4 2014, facility vacated by end of year.

CUSTOMER COMPLAINT AFFECTING FINANCIAL RESULTS OF Q2 2014 AND FY EXPECTATIONS

- Q2 performance affected by complaint from major customer. Claim comprises silicon wafers representing an estimated aggregated value of about DKK 20 million. Temporary suspension of all silicon supplies until defect identified and problem solved.
- Technical investigation nearing its completion. Topsil retains its belief that the defect arose in connection with substantial, unapproved process changes introduced by Topsil's sub contractor. The sub contractor has not confirmed this.
- Topsil foresees an obligation to supply a full amount of replacement wafers, prior to reopening ordinary supplies of wafers to this customer. Shipment of replacement wafers to the customer has begun after balance sheet date.
- Topsil's own costs for investigating customer complaint are recognised in other external costs for Q2 2014. No provisions has been made for any compensation that may become payable to the customer, as Topsil maintains that the defect arose at the sub contractor. The questions regarding compensation are pending.

RECENT FINANCIALS, REVENUE AND EBITDA

Revenue in DKKm:



Revenue development

- Q2 2014: DKK 65.3m (down by 25.2%).
- H1 2014: : DKK 138.7m (H12013 DKK 158.0m).

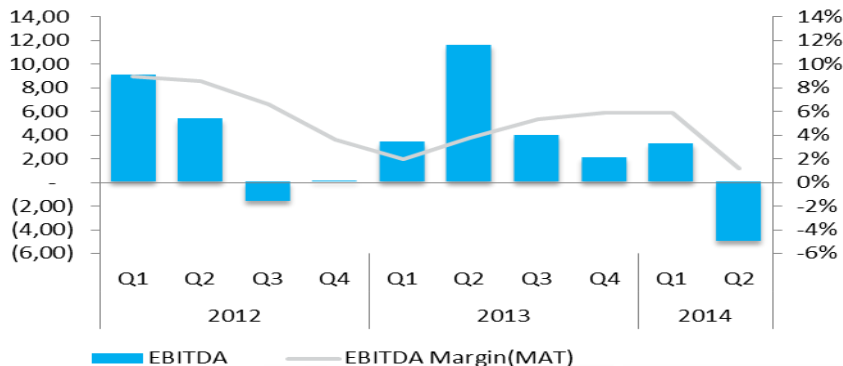
Revenue negatively impacted by customer claim.

Q2 2013 positively affected by number of one-off projects

Consolidated Q2 EBITDA of DKK (5.0)m (Q2 2013 DKK 11.6m)

- EBITDA-margin of (7.7)% (Q2 2013: 13.3%)
- H1 EBITDA of DKK (1.8)m (H1 2013 DKK 15.0m)

EBITDA



EXPECTATIONS FOR 2014

Unchanged guidance from profit warning 3 July 2014: Revenue in the range of DKK 270-290 million and EBITDA in the range of DKK 0-10 million.

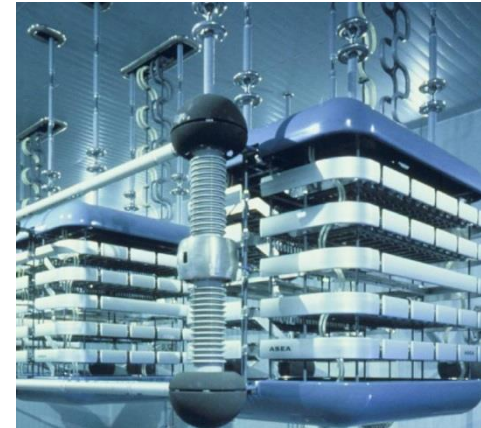
The guidance includes temporary costs of operating at two locations in Denmark and one-off costs related to the planned move of all production to the new plant and closure of the old plant. These costs are estimated to be in the region of DKK 5 million. The guidance does not include potential customer compensation costs related to the complaint.

The updated guidance for the full year is subject to significantly greater uncertainty than would normally be the case. The technical analyses in connection with the customer complaint have not yet been completed, and the issue of compensation has not been clarified with the sub contractor. Moreover, there is as yet no full clarity with respect to the total costs relating to the complaint, when normal sales to the customer can be resumed, or other risks related to the matter.

The guidance is based on exchange rates of DKK 550/USD 100 and DKK 180/PLN 100..

OUR BUSINESS CASE IN SHORT

- Currently the power market is in a downturn
 - Over capacity
 - Price pressure
- Attractive market mid- to long term
 - Favourable mega trends
 - High entrance barriers to industry
- Improved business platform
 - State-of-art plant and equipment
 - Next generation products started in customer qualification
 - Quality level lifted to automotive industry level
- Focused strategy
 - Sales expansion possibilities
 - Efficiency gains



DISCLAIMER: This presentation includes forward-looking statements reflecting management's current expectations for certain future events and financial performance. Forward-looking statements are inherently subject to uncertainties, and results may differ significant from expectations. Factors that may cause the actual results to differ from expectations includes, but are not limited to, developments in the economy and financial markets, changes in the silicon market, market acceptance of new products and the introduction of competing products. Topsil is only obliged to update and adjust the expectations if so required by Danish legislation and the Danish law on securities trading, etc.

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