



Credit Suisse 2015 Global Healthcare Conference

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Risks and uncertainties relating to the proposed transaction with Sigma-Aldrich Corporation (“Sigma-Aldrich”) include, but are not limited to: the risk Sigma-Aldrich’s shareholders do not approve the transaction; uncertainties as to the timing of the transaction; the risk that regulatory or other approvals required for the transaction are not obtained or are obtained subject to conditions that are not anticipated; competitive responses to the transaction; litigation relating to the transaction; uncertainty of the expected financial performance of the combined company following completion of the proposed transaction; the ability of Merck KGaA, Darmstadt, Germany, to achieve the cost-savings and synergies contemplated by the proposed transaction within the expected time frame; the ability of Merck KGaA, Darmstadt, Germany, to promptly and effectively integrate the businesses of Sigma-Aldrich and Merck KGaA, Darmstadt, Germany; the effects of the business combination of Merck KGaA, Darmstadt, Germany, and Sigma-Aldrich, including the combined company’s future financial condition, operating results, strategy and plans; the implications of the proposed transaction on certain employee benefit plans of Merck KGaA, Darmstadt, Germany, and Sigma-Aldrich; and disruption from the proposed transaction making it more difficult to maintain relationships with customers, employees or suppliers.

Additional risks and uncertainties include, but are not limited to: the risks of more restrictive regulatory requirements regarding drug pricing, reimbursement and approval; the risk of stricter regulations for the manufacture, testing and marketing of products; the risk of destabilization of political systems and the establishment of trade barriers; the risk of a changing marketing environment for multiple sclerosis products in the European Union; the risk of greater competitive pressure due to biosimilars; the risks of research and development; the risks of discontinuing development projects and regulatory approval of developed medicines; the risk of a temporary ban on products/production facilities or of non-registration of products due to non-compliance with quality standards; the risk of an import ban on products to the United States due to an FDA warning letter; the risks of dependency on suppliers; risks due to product-related crime and espionage; risks in relation to the use of financial instruments; liquidity risks; counterparty risks; market risks; risks of impairment on balance sheet items; risks from pension obligations; risks from product-related and patent law disputes; risks from antitrust law proceedings; risks from drug pricing by the divested Generics Group; risks in human resources; risks from e-crime and cyber attacks; risks due to failure of business-critical information technology applications or to failure of data center capacity; environmental and safety risks; unanticipated contract or regulatory issues; a potential downgrade in the rating of the indebtedness of Merck KGaA, Darmstadt, Germany, or Sigma-Aldrich; downward pressure on the common stock price of Merck KGaA, Darmstadt, Germany, or Sigma-Aldrich and its impact on goodwill impairment evaluations; the impact of future regulatory or legislative actions; and the risks and uncertainties detailed by Sigma-Aldrich with respect to its business as described in its reports and documents filed with the U.S. Securities and Exchange Commission (the “SEC”).

The foregoing review of important factors should not be construed as exhaustive and should be read in conjunction with the other cautionary statements that are included elsewhere, including the Report on Risks and Opportunities Section of the most recent annual report and quarterly report of Merck KGaA, Darmstadt, Germany, and the Risk Factors section of Sigma-Aldrich’s most recent reports on Form 10-K and Form 10-Q. Any forward-looking statements made in this communication are qualified in their entirety by these cautionary statements, and there can be no assurance that the actual results or developments anticipated by us will be realized or, even if substantially realized, that they will have the expected consequences to, or effects on, us or our business or operations. Except to the extent required by applicable law, we undertake no obligation to update publicly or revise any forward-looking statement, whether as a result of new information, future developments or otherwise.

Important Additional Information

This communication may be deemed to be solicitation material in respect of the proposed acquisition of Sigma-Aldrich by Merck KGaA, Darmstadt, Germany. The proposed acquisition will be submitted to the stockholders of Sigma-Aldrich for their consideration. In connection therewith, on November 3, 2014, Sigma-Aldrich filed a definitive proxy statement with the SEC. Sigma-Aldrich will also begin mailing the definitive proxy statement on November 3, 2014, to its stockholders of record as of the close of business on October 29, 2014. BEFORE MAKING ANY VOTING OR ANY INVESTMENT DECISION, INVESTORS AND STOCKHOLDERS ARE URGED TO READ THE DEFINITIVE PROXY STATEMENT REGARDING THE PROPOSED TRANSACTION AND ANY OTHER RELEVANT DOCUMENTS FILED OR TO BE FILED WITH THE SEC CAREFULLY AND IN THEIR ENTIRETY WHEN THEY BECOME AVAILABLE BECAUSE THEY WILL CONTAIN IMPORTANT INFORMATION ABOUT THE PROPOSED TRANSACTION. Investors and stockholders may obtain free copies of the proxy statement, any amendments or supplements thereto and other documents containing important information about Sigma-Aldrich, once such documents are filed with the SEC, through the website maintained by the SEC at www.sec.gov. Copies of the documents filed with the SEC by Sigma-Aldrich will be available free of charge on Sigma-Aldrich’s website at <http://investor.sigmaaldrich.com> under the heading “Financial Information—SEC Filings”. Stockholders of Sigma-Aldrich may also obtain a free copy of the definitive proxy statement by contacting Sigma-Aldrich’s Investor Relations Department at (314) 898-4643.

Sigma-Aldrich and certain of its directors, executive officers and other members of management and employees may be deemed to be participants in the solicitation of proxies in connection with the proposed transaction. Information about the directors and executive officers of Sigma-Aldrich is set forth in its proxy statement for its 2014 annual meeting of stockholders, which was filed with the SEC on March 21, 2014, its annual report on Form 10-K for the fiscal year ended December 31, 2013, which was filed with the SEC on February 6, 2014, and in subsequent documents filed with the SEC, each of which can be obtained free of charge from the sources indicated above. Other information regarding the participants in the proxy solicitation of the stockholders of Sigma-Aldrich and a description of their direct and indirect interests, by share holdings or otherwise, is contained in the definitive proxy statement and other relevant materials filed with the SEC.

Agenda

Business overview

Transforming the company

Financial review and guidance

A balanced portfolio of four divisions

The Group

Biopharmaceuticals



Leading in certain specialty pharma markets

- Life cycle management
- Biologics
- Emerging markets

Consumer Health



Present in OTC niche markets

- Vitamins
- Supplements
- Strong presence in Latin America and Europe

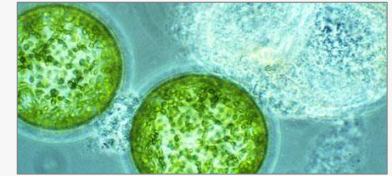
Performance Materials



No. 1 in display materials

- Customer intimacy
- Innovation power
- Cost and technology leadership

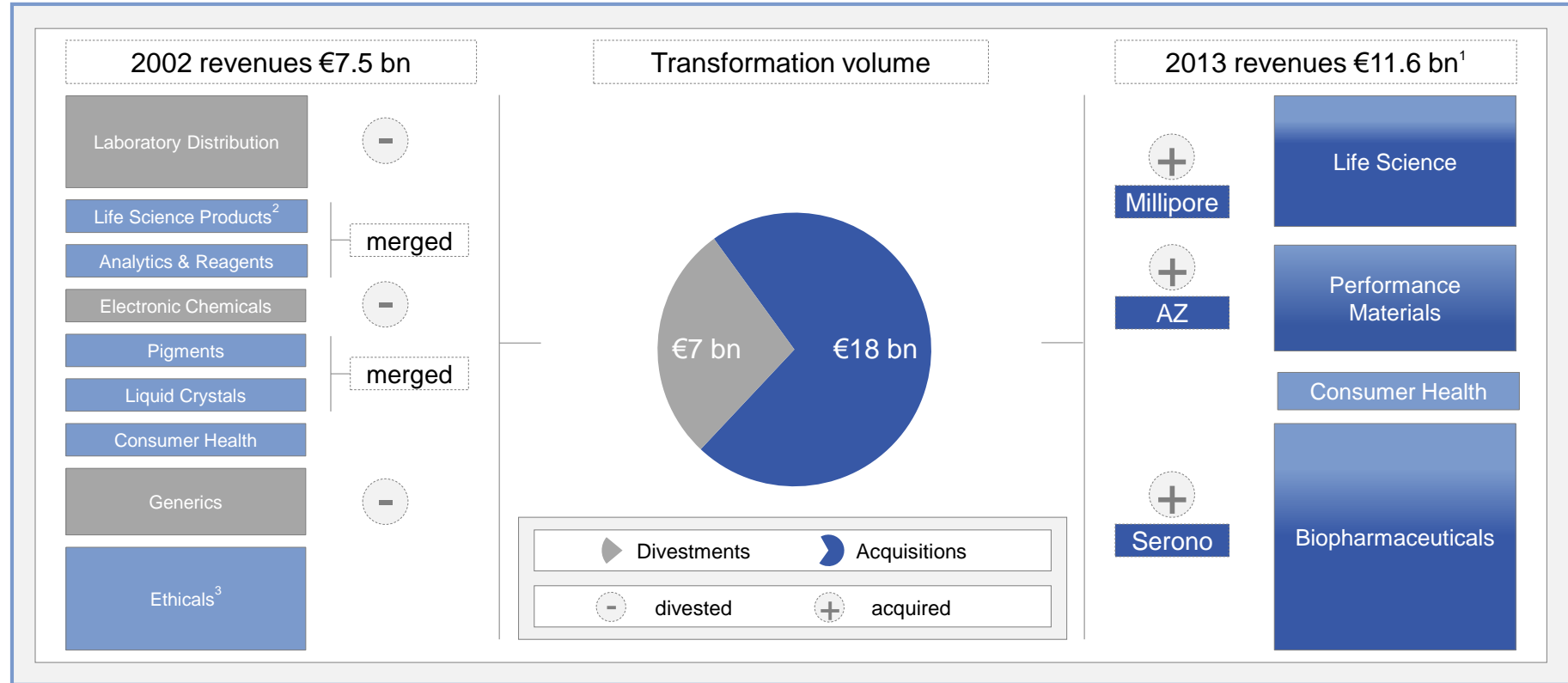
Life Science



Top 3 in life science tools

- Global presence
- Innovation
- End-to-end solutions for pharma industry

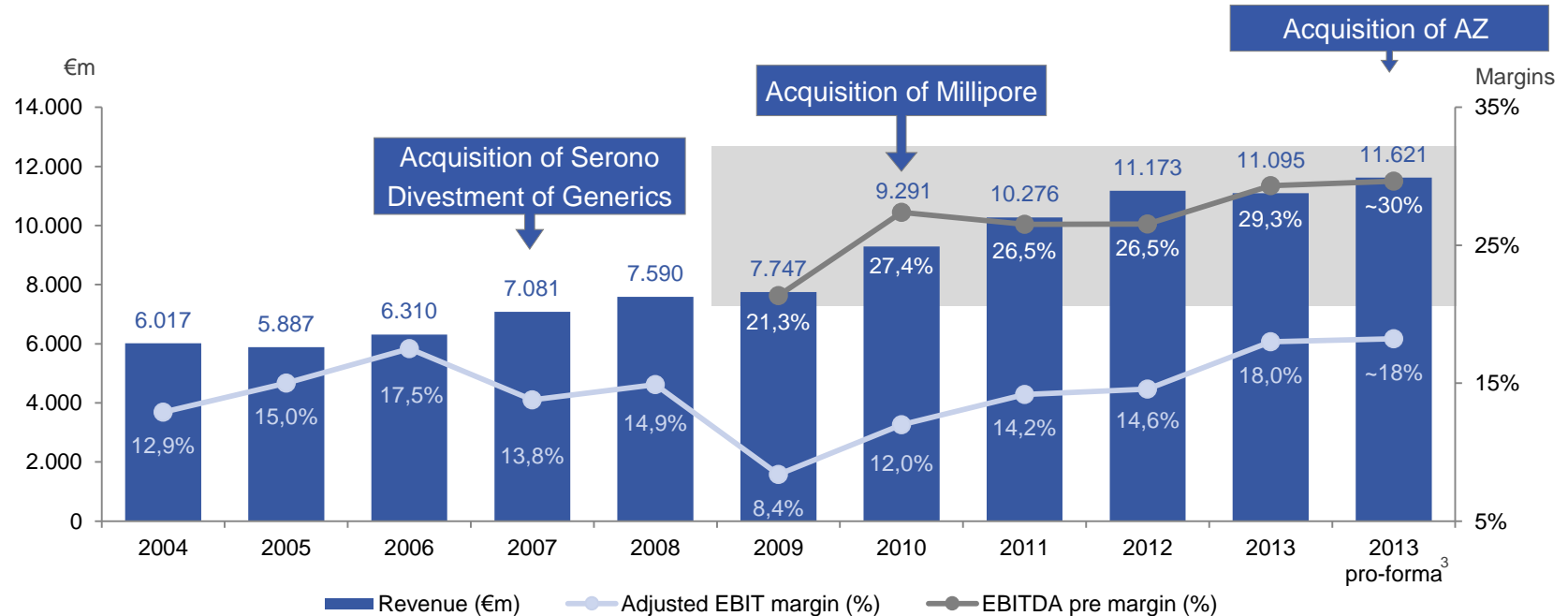
We have added scale while strengthening the attractiveness of its portfolio



¹Proforma figure including FY 2013 sales of AZ Electronic Materials acquired as of 2 May 2014; ²Excluding "Crop Bioscience", which was divested; ³Excluding "Theramex", which was divested

Growth initiatives have fundamentally improved profitability

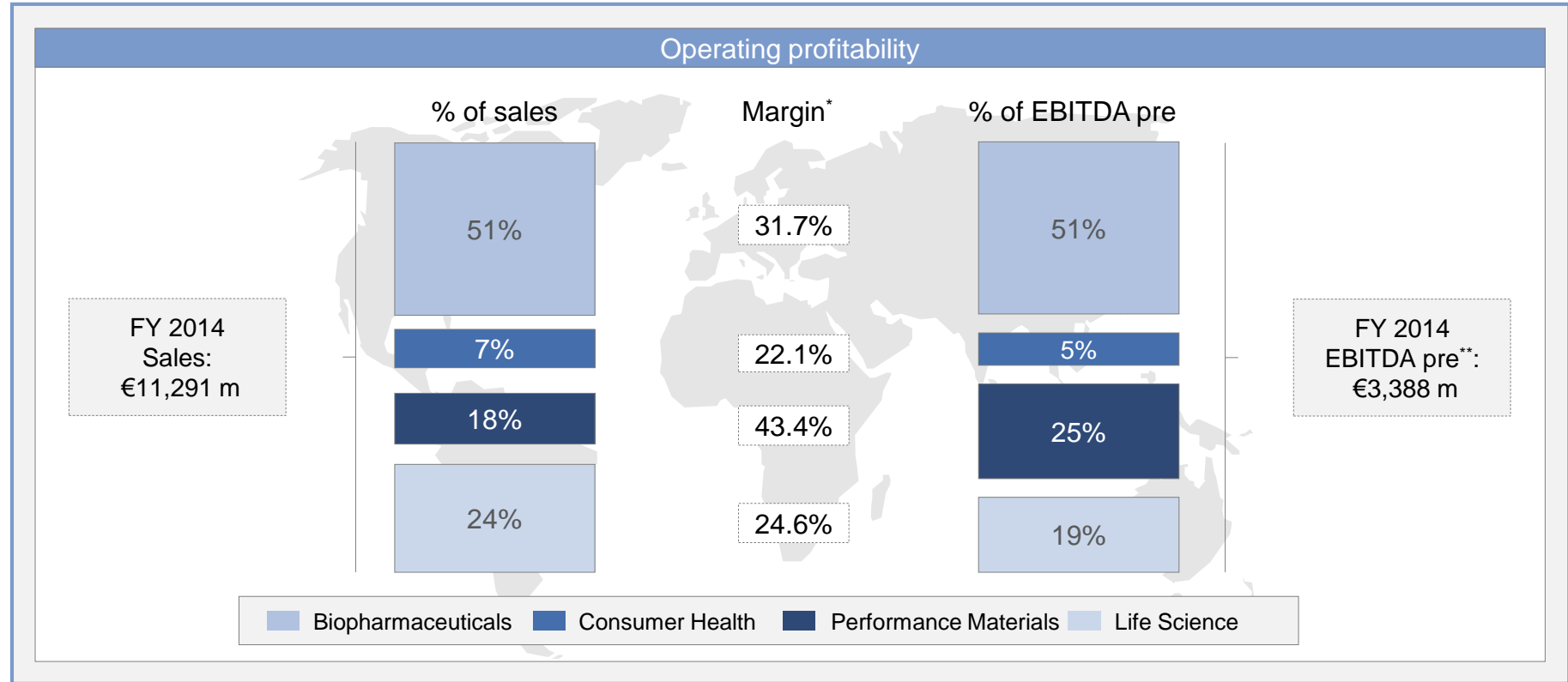
Total revenues and adjusted EBIT and EBITDA pre margins¹ 2004-2013



¹adjusted EBIT² and EBITDA pre divided by total revenues; ²adjusted EBIT is EBIT less exceptional items (e.g. impairments, integration costs, restructuring costs)

³Pro-forma calculation based on published FY 2013 results for Merck KGaA, Darmstadt, Germany (including pro-forma AZ); based on 100% expected synergies; including Corporate & Other

Strong businesses with attractive margins

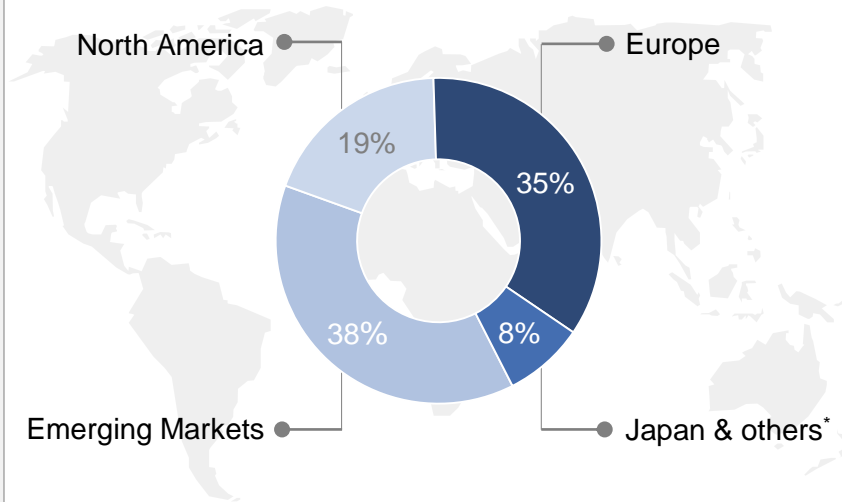


*EBITDA pre margin in % of sales

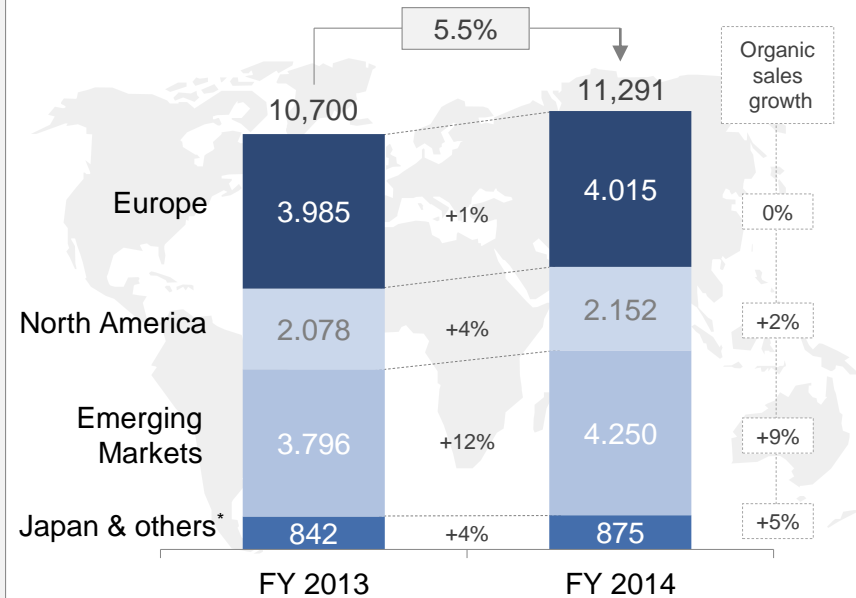
**Including Corporate/Others (-€166 m)

Emerging Markets drive organic growth

Group FY 2014 sales by region



Regional development of sales [€ m]



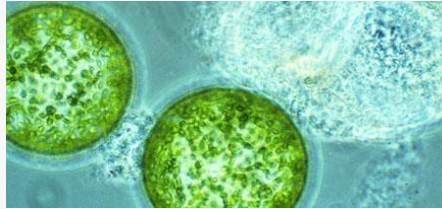
*Australia/Oceania, Africa

The Group going forward – three distinct business sectors support profitable growth

Healthcare*



Life Science



Performance Materials



Strategic requirements

- Diversification
- Attractive markets
- High-margin businesses
- Overlapping core competencies (customer intimacy, innovation, quality, life cycle management)
- Company-specific culture

*Healthcare includes Biopharmaceuticals, Consumer Health, Biosimilars and Allergopharma

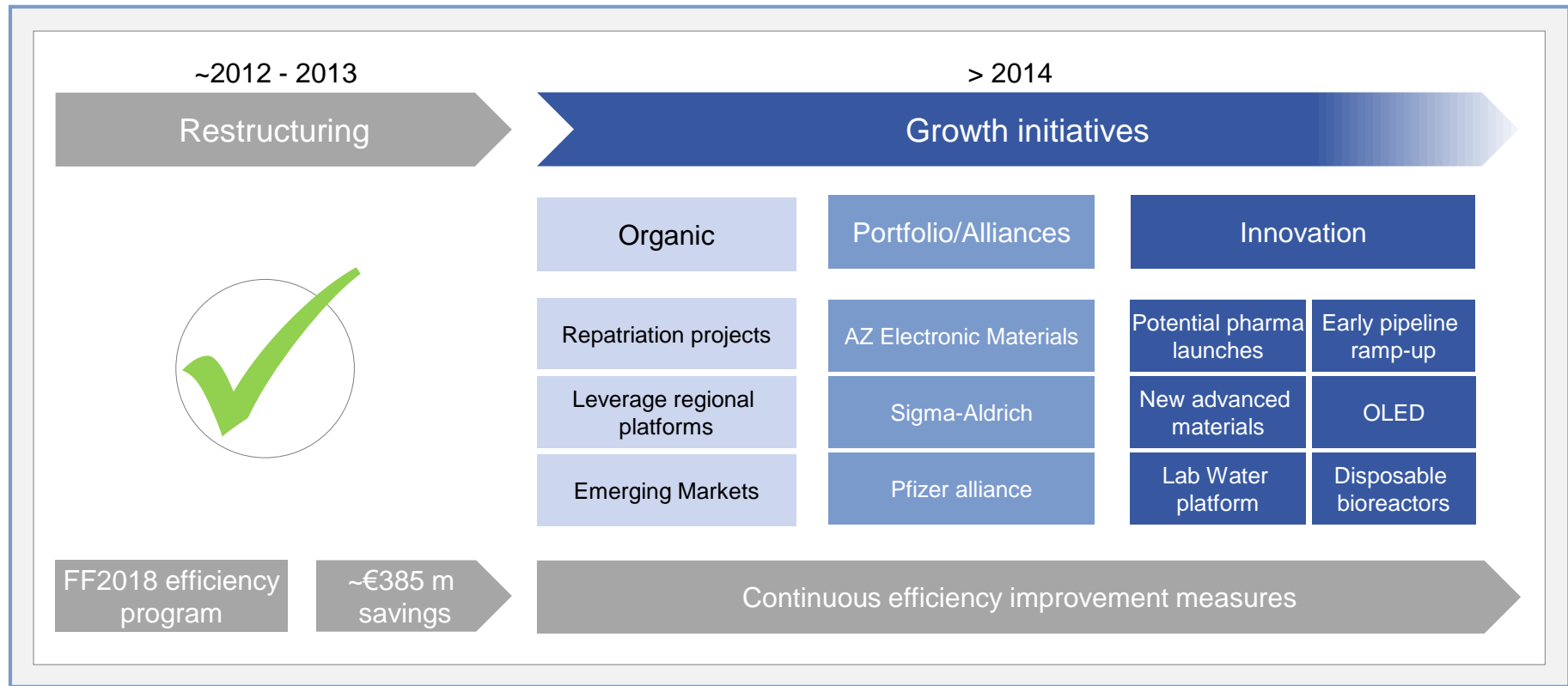
Agenda

Business overview

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Strategic agenda 2018 – milestones achieved



AZ – Complementing Performance Materials, expanding innovation leadership in niche markets

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Healthcare

Life Science

Performance Materials

Merck KGaA
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&



Ongoing development in Liquid Crystals



- Launch of new UB-FFS* mode - enhancing light transmission and reducing energy consumption
- Further advancing future technologies e.g. liquid crystal windows

Research in advanced technologies



EPSON®

- Collaboration with EPSON on OLED progressing well
- Development of new proprietary OLED materials and LED phosphors - launch of a vivid green

R&D projects from AZ



- Si-tech materials for OLED encapsulant
- Graphene-based materials in Separators, Anodes and Cathodes

Successful integration of AZ completed in 2014

*Ultra brightness fringe field switching

Sigma-Aldrich – Next step to enhance Life Science business sector

Merck KGaA
Darmstadt · Germany

Healthcare

Life Science

Performance Materials

Merck KGaA
Darmstadt · Germany



Broad and complementary
product fit in attractive segments



Expanding global reach and scale



Leveraging operational excellence
to deliver superior value to customers



Announcement
(Sept. 22, 2014)

Sigma shareholder approval
(Dec. 5, 2014)

U.S. and other* anti-trust
approvals (U.S. - Dec. 23, 2014)

All relevant anti-trust reviews
on track (January, 2015)

Closing
(Expected mid-year 2015)

*Russia, Serbia, Ukraine and Taiwan

Pfizer collaboration – Acceleration and broadening of immuno-oncology pipeline

Merck KGaA
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Healthcare

Life Science

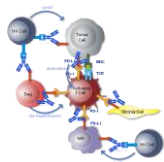
Performance Materials

Merck KGaA
Darmstadt · Germany

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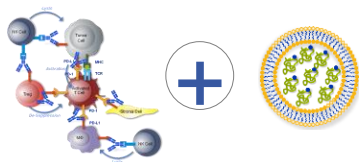


Leverage anti-PD-L1 asset



- Avelumab* with over 700 patients already enrolled in PI/II
- Initiation of several pivotal studies in 2015 e.g.:
 - Lung, bladder, renal, ovarian, gastric

Tackle combination therapies



- Enlarge pool of potential combinations
- Combination studies in 2015 e.g.:
 - Axitinib (Inlyta) in renal cancer
 - Crizotinib (Xalkori) ALK/ROS in lung cancer

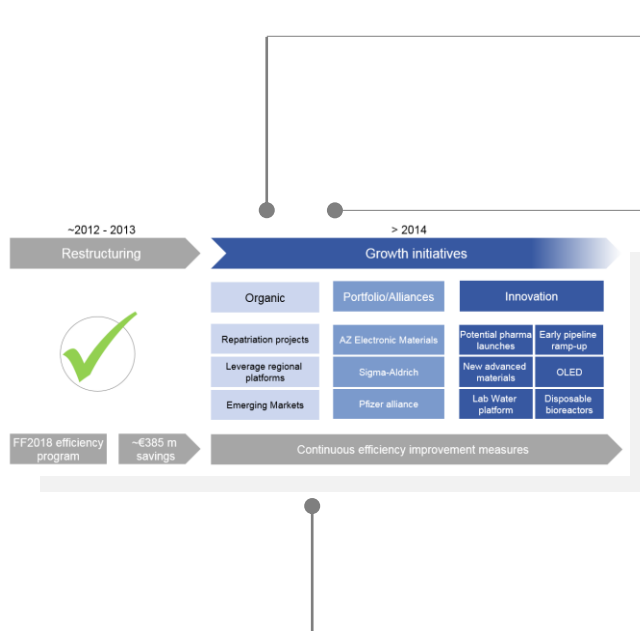
Build commercialization strength



- Co-commercialization of Xalkori in U.S. and other key markets
- Ramp-up of Oncology infrastructure and capabilities in 2015, especially in U.S.

*Avelumab = proposed International Non-proprietary Name (INN), formerly referred to as Anti-PD-L1 mAb (MSB0010718C)

Strategic agenda 2018 – milestones achieved



▪ Repatriation projects:

- Glucophage and Euthyrox from Takeda in Russia
- Co-promotion agreement with BMS¹ for Glucophage in China
- Transfer of full promotional responsibilities for Erbitux in Japan

▪ Leverage regional platforms:

- Transfer of Neurobion & Floratil to Consumer Health
- Strategic partnership with Lupin to broaden GM² portfolio

▪ Emerging Markets:

- Healthcare focus on strategic markets such as China & Brazil
- Investments in regional sites (Nantong – China)

▪ Portfolio and alliances:

- AZ closed and integrated in 2014
- Proposed Sigma acquisition expected to close mid 2015
- Strategic alliance with Pfizer in immuno-oncology

▪ Innovation:

- Launch of UB-FFS as well as progress in OLED
- New innovation center in corporate HQ

¹Bristol-Myers Squibb; ²General Medicine

Strong progress since 2012 but further room for efficiency improvements

May 2012

Merck Group

Portfolio evolution improved our profitability structure, but further potential remains

Assessment of long-term financial performance relative to peers

	Sales growth	Gross margin	SG&A	R&D productivity
Biopharmaceuticals	●	●	●	●
Consumer Health	●	●	●	●
Performance Materials	●	●	●	●
Life Science	●	●	●	●

● above peers ● in-line with peers ● below peers

November 2014

	Sales growth	Gross margin	SG&A	R&D productivity
Biopharmaceuticals	●	●	●	●
Consumer Health	●	●	●	●
Performance Materials	●	●	●	●
Life Science	●	●	●	●

● Above peers ● In line with peers ● Below peers

Ongoing efficiency initiatives to reduce costs and to support our growth strategy

Structures and processes



- Harmonization of IT systems
- Standardization of processes
- Leverage and upscale shared services



Costs



- Further reduction of operating leverage
- Additional focus on non-headcount-related costs
- Permanent cost control as part of our DNA



Scalable business model enabling swift M&A integration and synergy generation

Agenda

Business overview

Transforming the company

Financial review and guidance

FY 2014: Another year of sound delivery

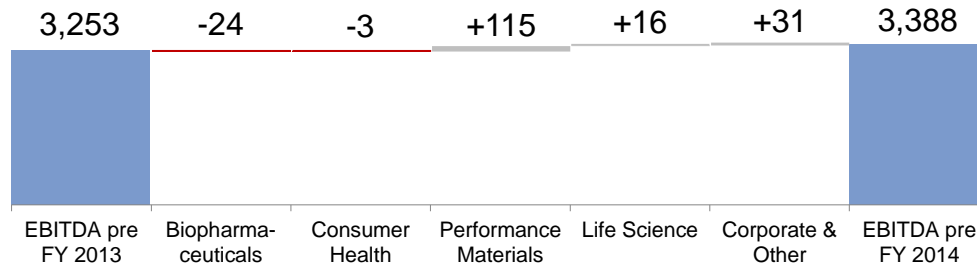
[€ m]	FY 2013	FY 2014	Δ
Sales	10,700	11,291	5.5%
EBITDA pre	3,253	3,388	4.1%
<i>Margin (% of sales)</i>	<i>30.4%</i>	<i>30.0%</i>	
EPS pre [€]	4.39	4.60	4.8%
Operating cash flow	2,226	2,705	21.6%
[€ m]	Dec 31, 2013	Dec. 31, 2014	Δ
Net financial debt	307	559	82.3%
Working capital	2,132	2,356	10.5%
Employees	38,154	39,639	3.9%

FY 2014
<ul style="list-style-type: none"> ▪ Sales, EBITDA pre and EPS pre increase on organic growth and AZ ▪ Operating cash flow benefits from Pfizer upfront payment ▪ Only slight increase in financial debt, AZ acquisition digested within a year ▪ Higher headcount includes employees from AZ

All businesses drive organic growth

FY 2014 YoY sales	Organic	Currency	Portfolio	Total
Biopharmaceuticals	3.6%	-1.9%	0.0%	1.7%
Consumer Health	5.4%	-2.2%	0.0%	3.2%
Performance Materials	4.1%	-1.5%	22.8%	25.4%
Life Science	4.5%	-1.7%	-0.7%	2.1%
Group	4.0%	-1.8%	3.3%	5.5%

FY YoY EBITDA pre contributors [€ m]

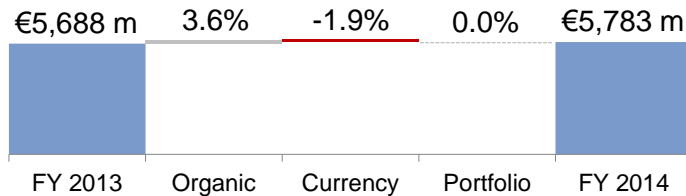


- All Biopharmaceuticals franchises deliver organic growth; Rebif stable
- Volume growth in Liquid Crystals drives Performance Materials
- Life Science benefits from strong demand from biopharma industry
- Biopharmaceuticals affected by royalty income loss and higher production costs
- Performance Materials includes eight months of AZ contribution
- Life Science with solid organic performance
- Corporate contains ~€45 m hedging gains

Biopharmaceuticals: Solid performance supported by all franchises amid royalty income reduction

[€ m]	FY 2013 *	FY 2014
Sales	5,688	5,783
Marketing and selling	-1,814	-1,780
Admin	-202	-220
R&D	-1,178	-1,344
EBIT	793	957
EBITDA	1,787	1,786
EBITDA pre	1,855	1,831
<i>Margin (% of sales)</i>	<i>32.6%</i>	<i>31.7%</i>

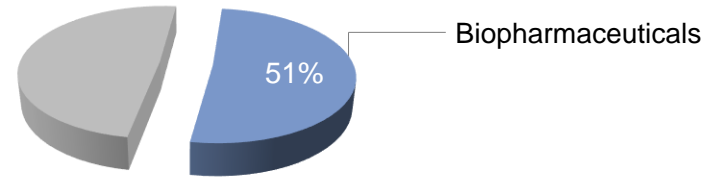
Sales bridge



Comments

- Organic growth partially offset by adverse currency effects
- Rebif organically stable, as U.S. pricing and Q1 wholesaler restocking offset volume declines due to competition from orals
- Solid Erbitux performance driven by growth in Emerging Markets and support from Japan, while Europe is flat
- Strong organic growth of fertility business as a result of good demand for entire portfolio especially from China and U.S.
- R&D reflects pipeline prioritization and Biosimilars initiatives
- Lower profitability owing to royalty decline

FY 2014 share of group sales

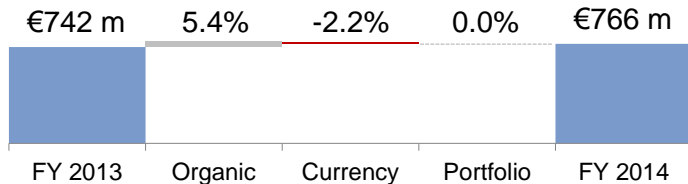


*Restated for product reclassification of Neurobion and Floratil from Biopharmaceuticals to Consumer Health

Consumer Health: Focus on strategic brands in Emerging Markets drives organic performance

[€ m]	FY 2013 *	FY 2014
Sales	742	766
Marketing and selling	-287	-303
Admin	-27	-27
R&D	-22	-22
EBIT	162	150
EBITDA	171	160
EBITDA pre	172	169
<i>Margin (% of sales)</i>	<i>23.2%</i>	<i>22.1%</i>

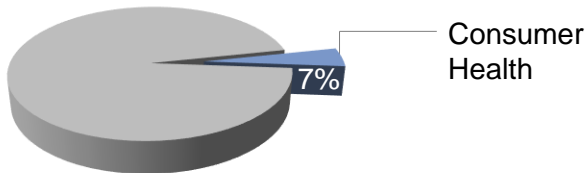
Sales bridge



Comments

- Increase in sales as good organic growth driven by Emerging Markets and Europe is partially offset by FX headwinds
- New strategic brands Neurobion and Floratil drive organic growth mainly from EM supported by consumer focused marketing
- Europe solid with strong demand for Femibion and some local brands especially in Germany
- Marketing and selling increases on global marketing initiatives; shift in promotional spending towards strategic brands continues
- Slight decrease in profitability due to investments in marketing and selling

FY 2014 share of group sales

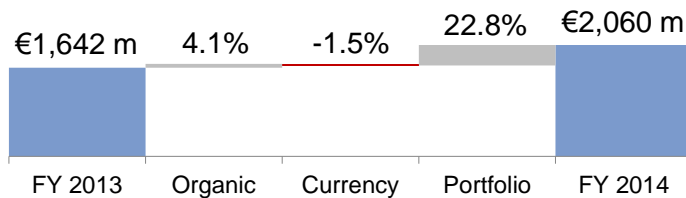


*Restated for product reclassification of Neurobion and Floratil from Biopharmaceuticals to Consumer Health

Performance Materials: Growth fueled by display industry trends

[€ m]	FY 2013	FY 2014
Sales	1,642	2,060
Marketing and selling	-152	-178
Admin	-28	-56
R&D	-145	-171
EBIT	653	611
EBITDA	766	804
EBITDA pre	780	895
<i>Margin (% of sales)</i>	<i>47.5%</i>	<i>43.4%</i>

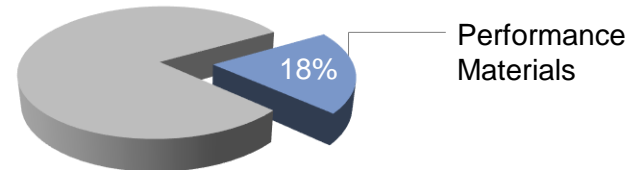
Sales bridge



Comments

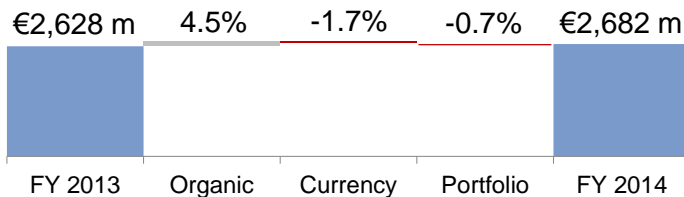
- Sales increase as good organic growth and portfolio effects from AZ are slightly offset by negative FX effects
- Liquid Crystals flagship technologies (IPS & PS-VA) see ongoing good demand
- Pigments with slight organic growth owing to good demand for Xirallic products from coating industry
- Cost base reflects portfolio effects from AZ
- Increase in EBITDA pre contains organic growth and AZ
- EBITDA pre margin reflects mix effect from AZ

FY 2014 share of group sales



[€ m]	FY 2013	FY 2014
Sales	2,628	2,682
Marketing and selling	-835	-844
Admin	-99	-110
R&D	-160	-163
EBIT	262	289
EBITDA	590	599
EBITDA pre	643	659
<i>Margin (% of sales)</i>	<i>24.5%</i>	<i>24.6%</i>

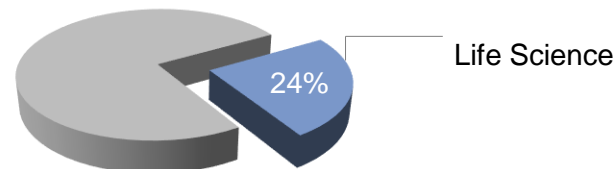
Sales bridge



Comments

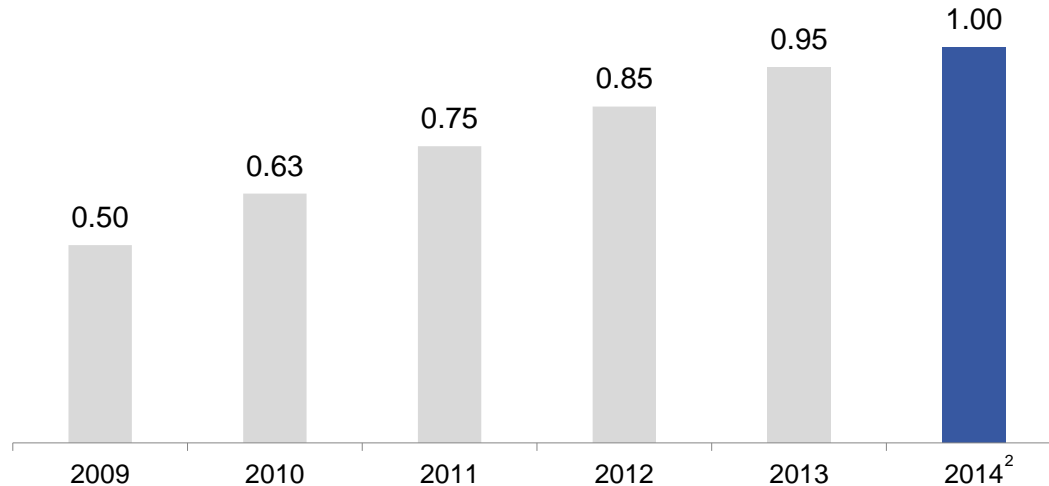
- Sales increase as organic growth overcompensate FX headwinds and portfolio effects*
- Process Solutions growth driven by biopharma demand for filtration and single-use products stemming from all regions
- Bioscience organically flat, as solid demand for separation and preparation products is offset by soft demand for antibodies
- Demand for consumables and water purification solutions in Emerging Markets drives organic growth in Lab Solutions
- Profitability stable due to solid volumes and pricing

FY 2014 share of group sales



Sustainable dividend development

Dividend¹ development 2009-2014²



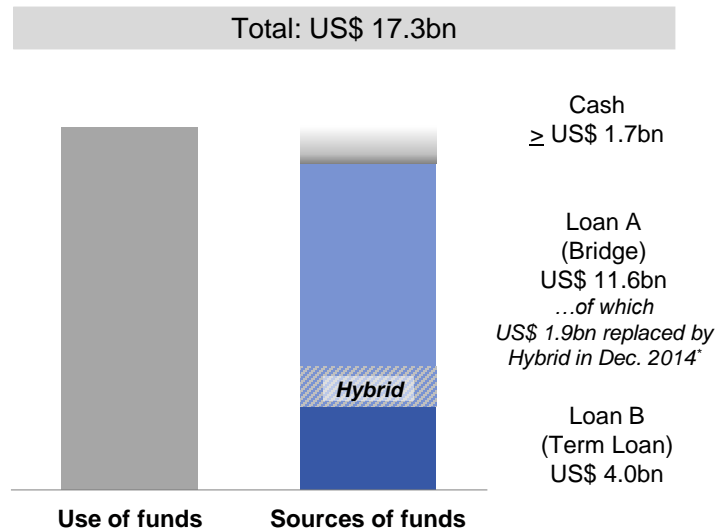
2014 dividend and policy

- Dividend of €1 per share proposed¹ for 2014
- Dividend increase in line with earnings progression – 2014: +5.3% yoy
- Last years' dividend constitutes the minimum level³
- Aiming at corridor of 20-25% of EPS pre

¹Adjusted for share split, which has been effective since June 30, 2014; ²Proposal; final decision subject to Annual General Meeting approval; ³Assuming a stable economic environment

Solid structure to finance transaction

Financing structure



**Total debt
financing
need
US\$15.6 bn**

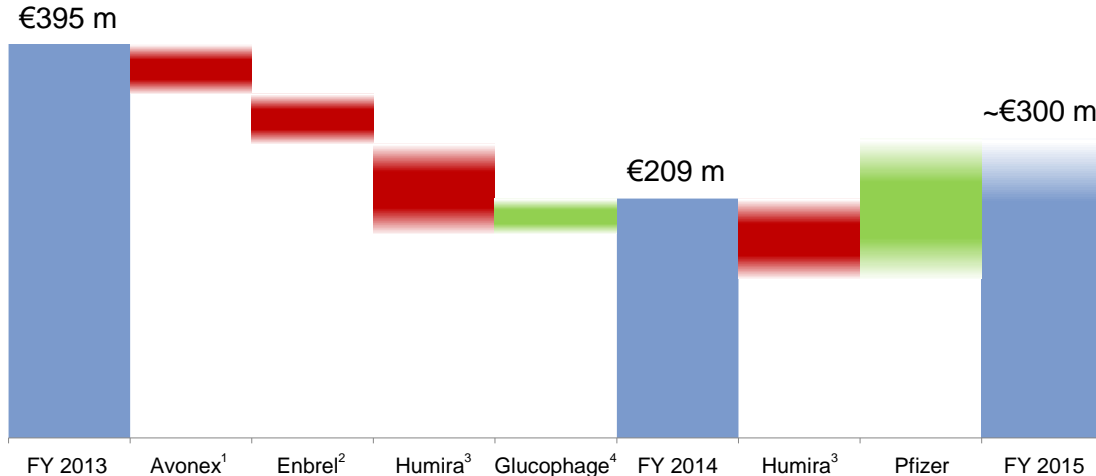
Initial funding structure

- Acquisition 100% cash & debt financed
- US\$15.6 bn credit facility breaks down into US\$4.0 bn term loan & US\$11.6 bn bridge financing
- Intention to replace the bridge until closing of acquisition through various capital markets transactions (€1.5 bn Hybrid in Dec. 2014 included)
- Strong combined cash flows available for rapid deleveraging
- Strong investment grade rating maintained

*FX rate for hybrid bond EUR/USD 1.30 according to financing concept at signing

Food for thought on royalty, license and commission income

Royalty, license and commission income bridge 2013 - 2015



Details and future changes

- Pfizer deal contains release of upfront and Xalkori accruals
- New reporting starting 2015:
 - Net Sales will include commission and profit share income
 - Royalty & license income will be within Other Operating Income
 - Royalty, license and commission expenses will be allocated to individual functional lines

Illustration; ¹Avonex patent expired in May 2013; ²Enbrel patent expired in November 2013; ³Humira royalty income expired June 30, 2014;

⁴Commission income due to co-promotion agreement for Glucophage with BMS in China – shown in net sales in 2015

Group guidance for 2015

Slight organic sales growth

EBITDA pre* slightly higher, at least stable

2015 key influencing factors

- | | |
|---|---|
| - R&D costs from PD-L1 & TH302 buy-up | + 4 months AZ contribution |
| - 6 months loss of Humira royalties | + Currency tailwinds |
| - Strong competitive pressure for Rebif | + Operational performance & org. growth |



*Without potential 2015 portfolio additions

Merck KGaA

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Appendix

Guidance details

Sigma acquisition & pharma update

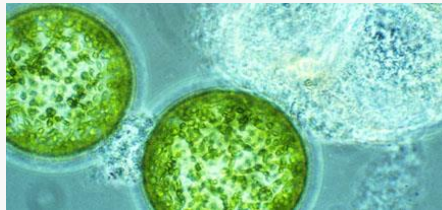
Financial details

Healthcare



- Organically stable top line
- Rebif decline
- Growth in other franchises
- EBITDA pre slightly lower

Life Science



- Moderate organic sales growth
- Process solutions key growth contributor
- Moderate EBITDA pre increase

Performance Materials



- Slight organic growth
- Strong AZ portfolio effect leads to low double-digit EBITDA pre increase

Group 2015: EBITDA pre* slightly higher - at least stable

Slight organic sales growth

Additional financial guidance

Further financial details

Group royalty, license and commission income in 2015	~€300 m
Corporate & Other EBITDA pre	at least -€220 m
Underlying tax rate	~23% to 25%
Capex on PPE and software	~€600 m



Appendix

Guidance details

Sigma acquisition & pharma update

Financial details

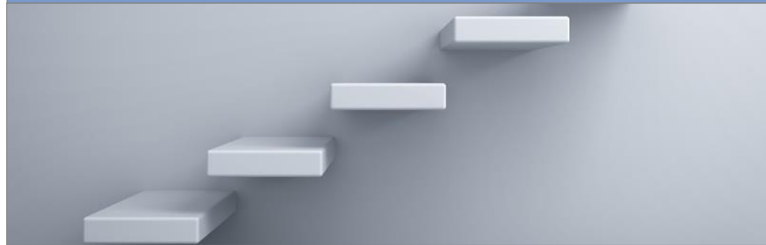
Sigma-Aldrich – Next step to become a leading life sciences company

Attractive life science industry



- Attractive industry driven by sustainable underlying market trends
- Stable growth pattern, offering additional growth opportunities
- Strong companies with healthy margins

Taking life science business to the next level



- Strong track record of delivering profitable growth
- Adding scale with step change acquisition

Sigma Aldrich acquisition – A compelling transaction rationale

Strategic and operational fit

- Increasing scale – expanding position in attractive life science industry
- Enhancing value for our customers
 - Broadens product range and ease of doing business for Laboratories & Academia
 - Complements Process Solutions product offering
- Closing the gap in U.S. – adequate presence in all geographies
- Leveraging existing platforms for global innovation rollout

Financial fit

- Further diversification of revenue stream
- Substantial synergy potential
- Immediately accretive to EPS pre* and EBITDA margin
- Solid investment grade rating will be maintained

*EPS pre one-time items and amortization, especially from purchase price allocation (PPA)

Sigma-Aldrich – A leading life science consumables supplier

Merck KGaA
Darmstadt · Germany

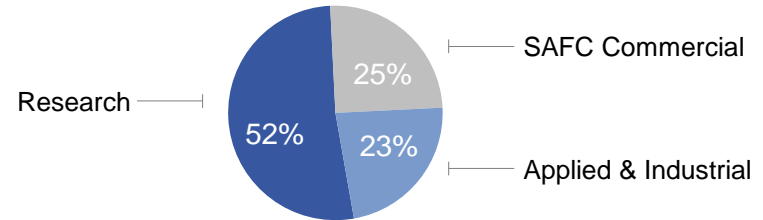
Business

- Total revenues of \$2.7 billion in 2013
- ~9,000 employees including ~3,000 scientists and engineers
- Headquartered in St. Louis, MO
- Chemical and biochemical products, kits and services provider to laboratories and pharma production
- No. 1 eCommerce platform in the industry; ~1,600 sales people

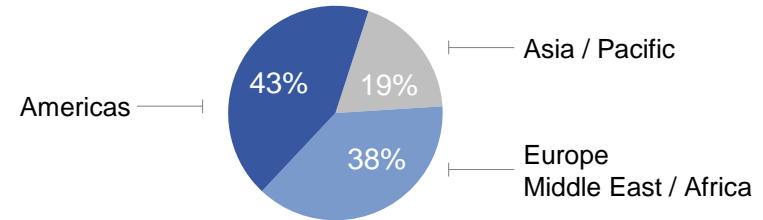
Footprint

- Balanced regional exposure; strength in North America
- Operations in ~40 countries; products available in ~160 countries

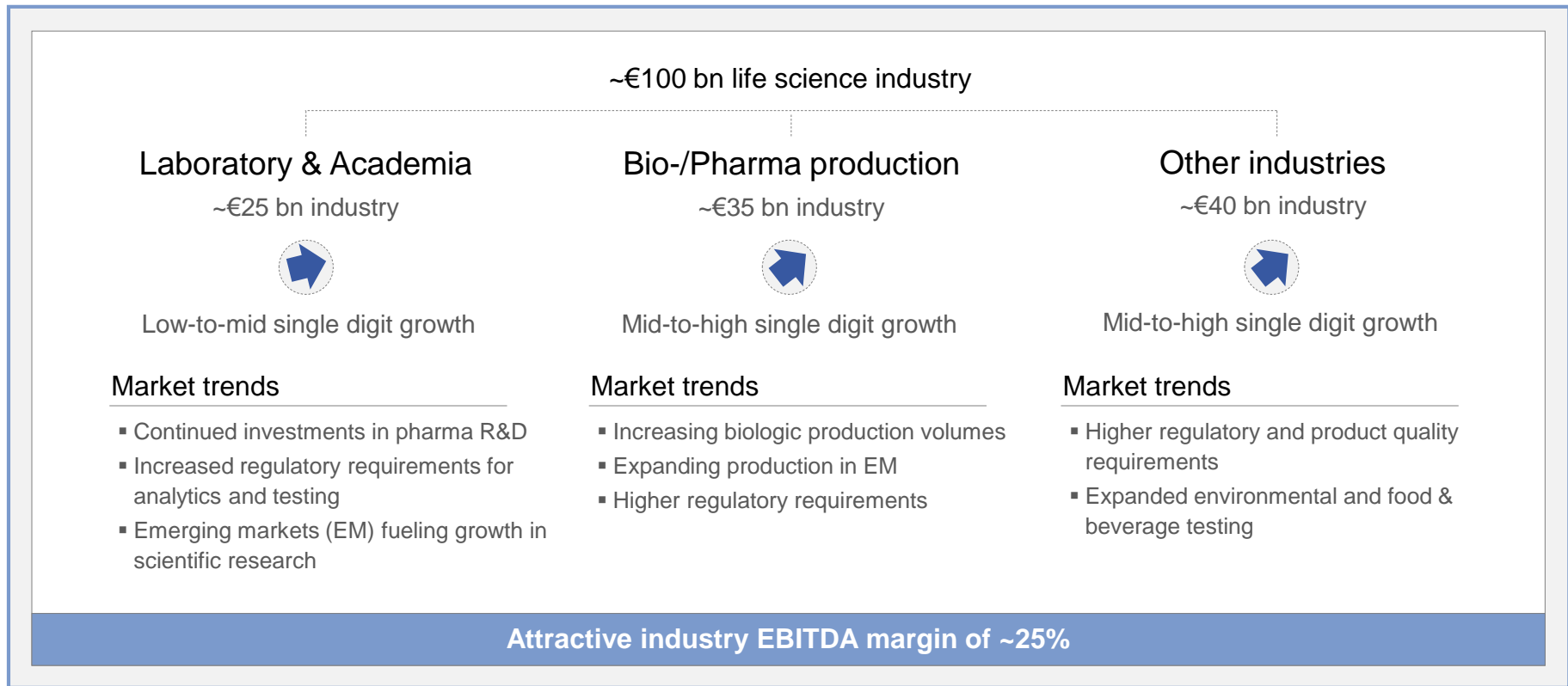
Sales by division FY 2013*



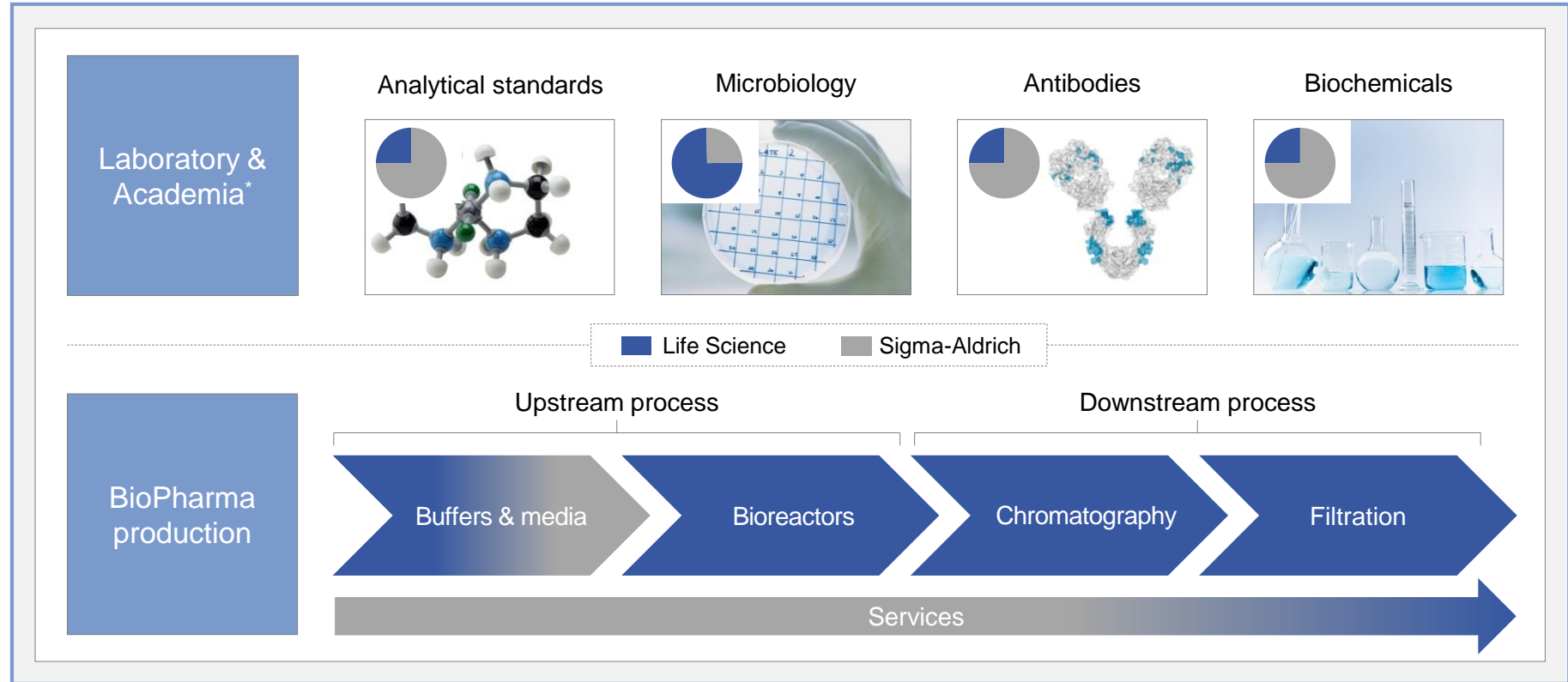
Sales by region FY 2013*



Together serving the attractive €100bn life science industry



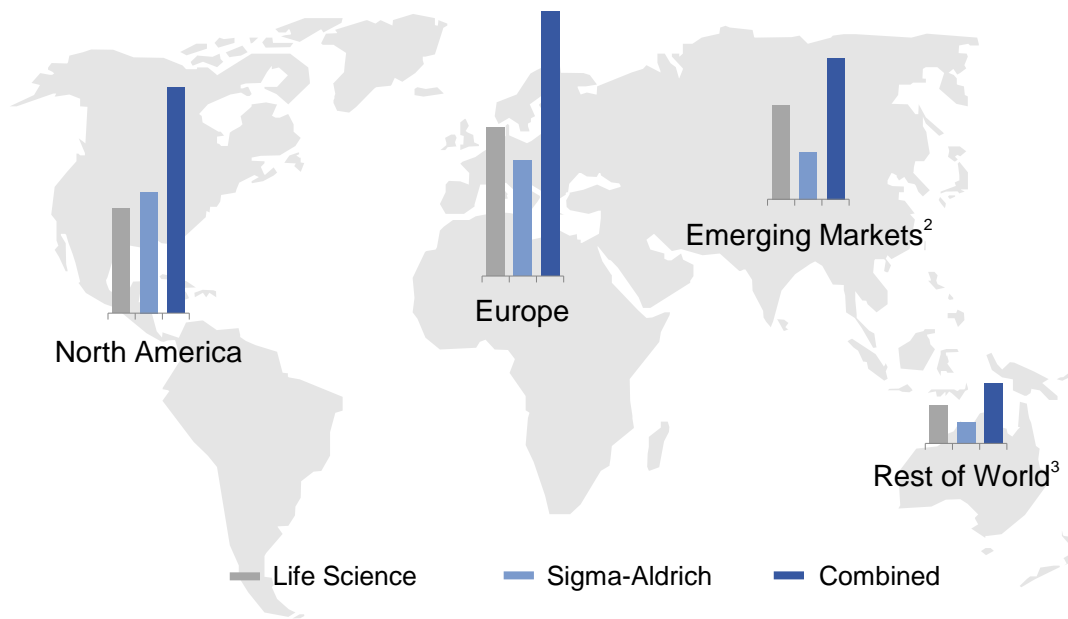
Broad and complementary product fit in attractive segments



*Key laboratory and academia areas illustrated

Expanding global reach and scale

Global sales¹ footprint of both businesses



Increased presence in North America

- Benefiting from a leading position in U.S. Laboratory sector
- Increased access to U.S. academia

Exposure to fast-growing Asia

- Accelerating growth momentum
- Opportunity to leverage eCommerce platform

¹Based on FY 2013 data in €m; ²Latin America, Asia w/o Japan; ³Japan, Australia/Oceania, Africa

Leveraging operational excellence to deliver superior value to customers

Merck KGaA
Darmstadt · Germany

Product innovation

- Delivering innovative workflow solutions to increase customers' efficiency
- Broad technology and platforms
- Recurring winners of renowned innovation awards



Process innovation

- Efficient supply chain for >300,000 products
- Best in class customer experience; e.g. 24 hour delivery in major markets
- Top-notch customer interface supported by eCommerce platform



Efficient work flow solutions and unique customer experience

Sigma-Aldrich – Business and transaction financials Merck KGaA Darmstadt · Germany

Overview of financial data¹

US\$ m	2012	2013	2014E ⁴
Revenue	2,623	2,704	2,796
% YoY at constant FX	+3%	+3%	n.a.
EBITDA (adjusted)	809	821	852
% of sales	31%	30%	30%
D&A	136	138	132
% of sales	5%	5%	5%
Net financial debt (period end)	-41	-357	-466 ⁵
No. of shares (diluted, m)	122	121	n.a.

Proposed transaction details²

- Equity value ~US\$17 bn (€13.1 bn)
- Enterprise value (EV) ~€12.7 bn including net cash ~€360 m
- Financing through cash and debt; no equity
- Assumed synergies: ~€260m
- In line with core acquisition criteria
 - Immediately accretive to EPS pre
 - Solid investment grade rating will be maintained

Implied forward transaction multiples³

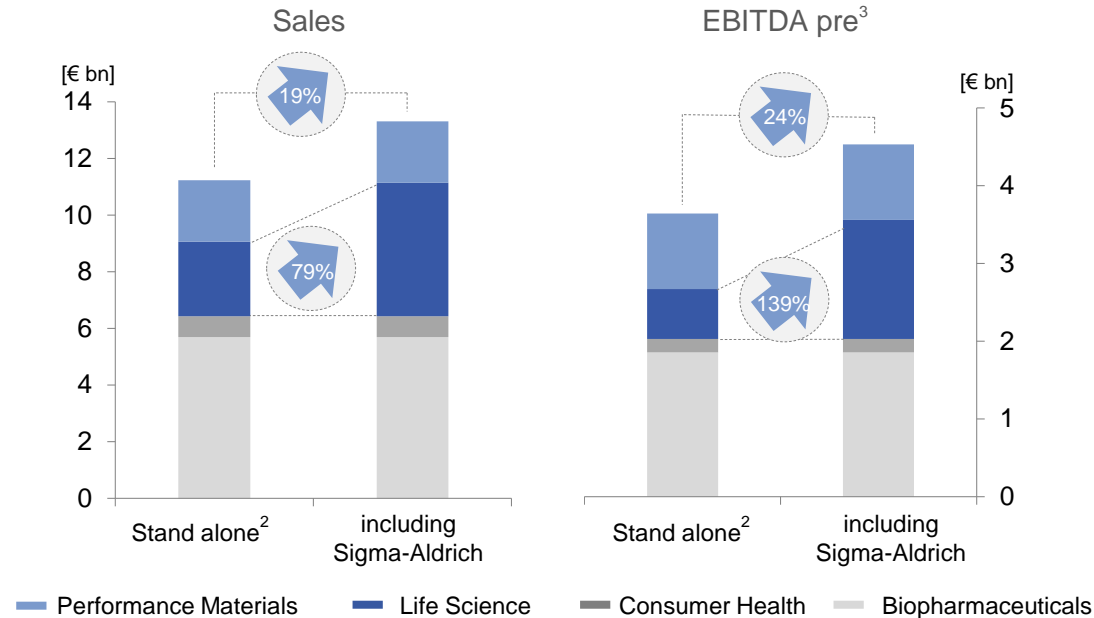
	2013	2014E ⁴
EV/Sales	6.1x	5.9x
EV/EBITDA	20.1x	19.4x
EV/EBITDA pro-forma incl. synergies ³	14.3x	13.9x

¹Source: Company reports; ²FX conversion: EUR/USD 1.30; ³"Pro-forma" calculation based on 100% expected synergies;

⁴Median consensus estimates from latest broker reports; ⁵Last reported as per H1 2014 report (June 30, 2014)

Transaction enhances financial profile

Group - Pro-forma 2013¹



Pro-forma financial impacts

- Group sales¹ increase by ~19%
- Group EBITDA pre³ rises by ~24% with margin⁴ expansion from ~30% to ~33%
- Synergies: ~€260m p.a. fully implemented in 3rd full year after closing
- Expected PPA impact: Mid triple-digit €m p.a.
- Immediately EPS pre accretive

¹Pro-forma calculation based on published sales for FY 2013 for Merck KGaA, Darmstadt, Germany (including pro-forma AZ Electronic Materials) and Sigma-Aldrich; ²Pro-forma calculation based on published sales for FY 2013 for Merck KGaA, Darmstadt, Germany (including pro-forma AZ Electronic Materials); ³Pro-forma calculation based on 100% expected synergies; excluding Corporate & Other; ⁴Including Corporate & Other

Support from meaningful synergies

Our experience



- Significant restructuring and integration experience
- Deep knowledge and understanding of the life science industry



Source of synergies



- Consolidate manufacturing footprint
- Increase conversion to eCommerce channels
- Optimize sales & marketing
- Streamline admin functions and infrastructure
- Save U.S. public company costs
- Optimize R&D portfolio

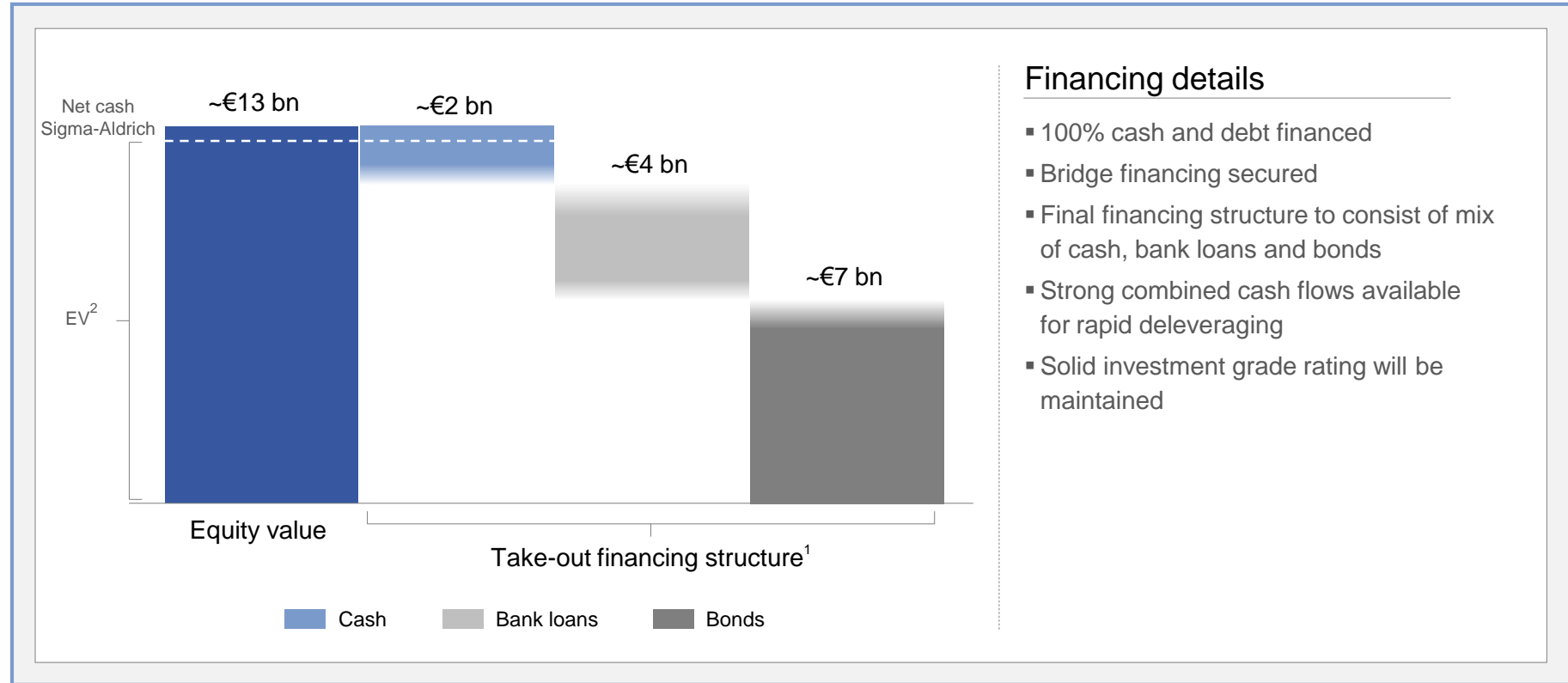


Planned delivery



- Synergies: ~€260 m, i.e. ~12% of Sigma-Aldrich sales
- Fully implemented in third full year after closing
- Expected integration costs: ~€400 m; spread over 2015-2018

Sigma-Aldrich acquisition – Financing secured



¹Indicative only; ²Enterprise value

Merck KGaA, Darmstadt, Germany and Pfizer – two strong players combining forces in oncology

Merck KGaA
Darmstadt · Germany

Merck KGaA

Darmstadt · Germany

R&D capabilities

- Anti PD-L1 compound with over 550 patients treated in Phase I study across multiple tumor types
- Interim analysis of expansion cohorts confirms promising risk/benefit on 2nd line NSCLC and heavily pre-treated ovarian cancer patients
- On-going Phase II study in m-Merkel cell carcinoma

Commercial strength

- Well positioned in Europe and Emerging markets



R&D capabilities

- Track record in drug development: 3 oncology product launches in 2011/2012
- Multiple immuno-oncology and oncology assets with potential for combination therapies

Commercial strength

- Substantial footprint in the U.S.
- Global oncology drugs already marketed
- Strong financial position to fully leverage potential of the Anti-PD-L1 compound

Compound and R&D expertise

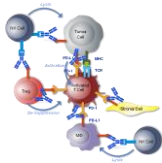


Regulatory & Commercial track record

Strong commitment to immuno-oncology

Three strategic drivers for collaboration

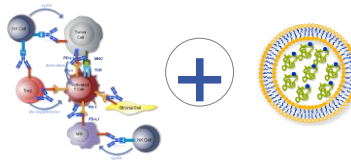
Leverage Anti PD-L 1 asset



- Combine our R&D and Pfizer's commercialization capabilities
- Speed up overall development process through joint R&D efforts
- Combine financial resources of two global pharma players
- Share development risk



Tackle combination therapies



- Enlarge pool of potential combinations through use of Pfizer's pipeline assets and existing products of Pfizer
- Leverage scientific expertise through joint research efforts
- Increase momentum to bring combinations to the market



Build new commercialization strength



- Co-commercialization of Xalkori in major markets
- Build up Oncology infrastructure and capabilities, especially in North America
- Broaden experience and knowledge base in advance of potential Anti-PD-L1 launch
- Additional income stream to drive R&D activities



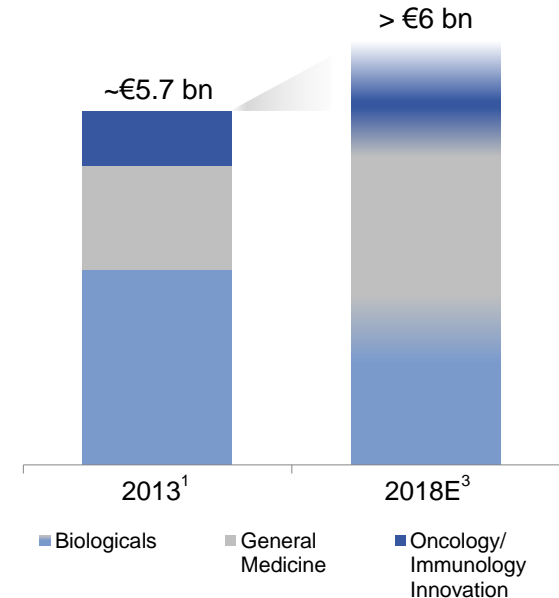
Financial implications of the deal with Pfizer

- ▶ \$850 m upfront cash payment, accrual to be released over several years
- ▶ ~50:50 R&D Cost split for drug development
- ▶ Milestone payments of up to \$2.0 bn based on filing/approval and commercialization of the compound across various indications & markets
- ▶ Co-commercialization of Xalkori – 2015 reimbursement for ramping up infrastructure and capabilities; followed by profit sharing agreement
- ▶ Following regulatory approval, first potential sales of Anti PD-L1 compound



Biopharmaceuticals has three different business models with specific strengths and requirements

Biopharmaceuticals proforma sales¹



1. Raise focus, scale and flexibility
2. Improve customer proximity
3. Develop into attractive growth platforms
4. Tailor innovation models to specific needs

Biologicals

- Rebif
- Fertility
- Endocrinology
- Biosimilars²
- Allergopharma

General Medicine

- GM/CMC
- Thyroids

Oncology/Immunology Innovation

- Erbitux
- Other Oncology

¹Source: Proforma re-calculation based on 2013 data for Biopharmaceuticals; excluding Consumer Health; ²Gradual sales ramp-up expected from 2017 onwards

³Excluding contributions from R&D pipeline

The road to maximizing our existing franchises is clear



Continue to drive front-line mCRC share by increasing patient testing and expanding head and neck coverage



Capitalize on strong efficacy and new smart devices to maximize differentiation and defend franchise



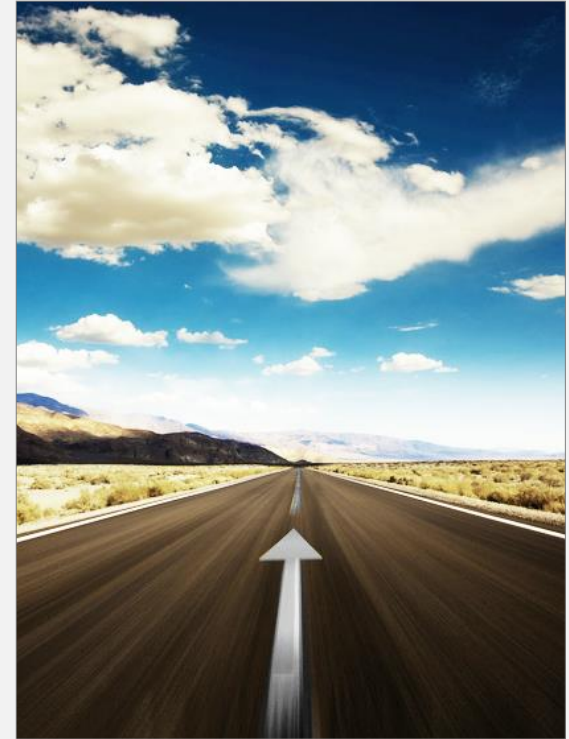
Build on No.1 position and ART¹ channel access with embryo diagnostics and other innovative technologies



Harness strengths of existing business and build a new focus area driven by innovative devices and services for patients



Build on existing track record in Emerging Markets, drive brand and life-cycle management and expand business including asset repatriation



¹ART = Assisted Reproductive Technology

Portfolio management: Differentiating across diverse business models

Merck KGaA
Darmstadt · Germany

General Medicine portfolio



- Limited risk with high cash generation
- Sustainable steady growth fueled by Emerging Markets



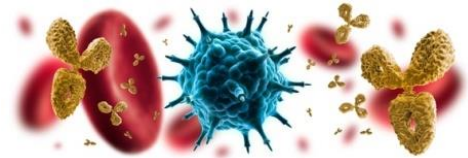
Biologicals portfolio



- Moderate risk and reward profile
- Economies of scale due to state-of-the-art production capabilities
- Emerging Markets gain importance



Oncology & Immunology innovation portfolio



- High reward at high risk
- Innovation key success factor – high R&D spend
- Promising pipeline projects



Mid-term, all parts of the portfolio need to earn their cost of capital

Appendix

Guidance details

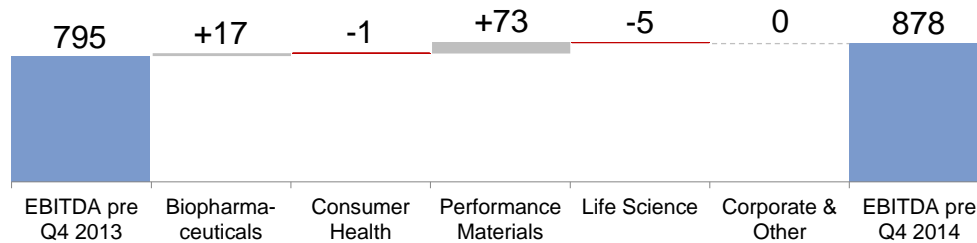
Sigma acquisition & pharma update

Financial details

All divisions post organic growth, currency headwinds soften

Q4 YoY sales	Organic	Currency	Portfolio	Total
Biopharmaceuticals	2.8%	2.7%	0.0%	5.5%
Consumer Health	6.5%	2.7%	0.0%	9.2%
Performance Materials	6.9%	5.8%	37.5%	50.2%
Life Science	5.9%	3.4%	-1.2%	8.1%
Group	4.4%	3.3%	5.2%	12.9%

Q4 YoY EBITDA pre contributors [€ m]



- Portfolio reflects the acquisition of AZ Electronic Materials
- Currency tailwinds mainly driven by EUR/USD development

- Performance Materials includes strong organic performance and AZ
- Hedging gains this quarter are leveled out by higher gains last year ($\Delta \sim -\text{€}6\text{m}$)

Q4 2014: Strong year-end performance

[€ m]	Q4 2013	Q4 2014	Δ
Sales	2,636	2,976	12.9%
EBITDA pre	795	878	10.5%
<i>Margin (% of sales)</i>	<i>30.2%</i>	<i>29.5%</i>	
EPS pre [€]	1.06	1.14	7.5%
Operating cash flow	440	1,141	>100%
[€ m]	Dec 31, 2013	Dec 31, 2014	Δ
Net financial debt	307	559	82.3%
Working capital	2,132	2,356	10.5%
Employees	38,154	39,639	3.9%

Q4 2014
<ul style="list-style-type: none"> ▪ Organic growth, portfolio effects as well as currency tailwinds drive sales ▪ EBITDA pre and EPS pre improve on solid organic performance and AZ despite loss of royalty income ▪ Operating cash flow includes Pfizer upfront payment ▪ Jump in working capital reflects consolidation of AZ ▪ Only slight increase in financial debt, AZ acquisition digested within a year

Reported EPS impacted acquisition hedging effects

[€ m]	Q4 2013	Q4 2014	Δ
EBIT	264	424	60.4%
Financial result	-63	-63	-0.4%
Profit before tax	201	361	79.5%
Income tax	80	-79	n.m.
<i>Tax rate (%)</i>	-39.9%	21.9%	
Net income	281	280	-0.2%
EPS (€)	0.65	0.64	-1.5%

Reported results

- EBIT up due to lower one-time costs and organic growth
- Last years' tax rate impacted by one-time change in applicable tax rates
- Net income and EPS almost stable as higher EBIT is canceled out by higher income tax

Reported EPS burdened by normalization of tax rate

[€ m]	FY 2013	FY 2014	Δ
EBIT	1,611	1,762	9.4%
Financial result	-222	-205	-7.7%
Profit before tax	1,389	1,557	12.1%
Income tax	-180	-392	>100%
<i>Tax rate (%)</i>	<i>12.9%</i>	<i>25.2%</i>	
Net income	1,202	1,157	-3.7%
EPS (€)	2.77	2.66	-4.0%

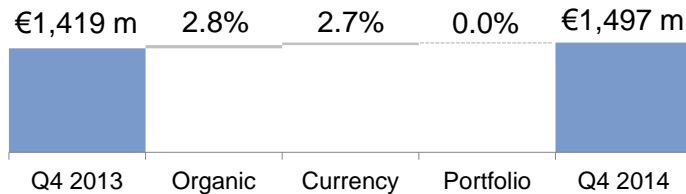
Reported results

- EBIT increases due to operational performance and lower impairments
- Financial result improved mainly from decreasing interest expenses after bond repayment last year
- Tax rate 2013 was impacted by beneficial tax rulings

Q4 - Biopharmaceuticals: Emerging Markets drive organic growth

[€ m]	Q4 2013 ¹	Q4 2014
Sales	1,419	1,497
Marketing and selling	-449	-459
Admin	-53	-56
R&D	-265	-323
EBIT	116	244
EBITDA	455	478
EBITDA pre	475	492
<i>Margin (% of sales)</i>	33.5%	32.9%

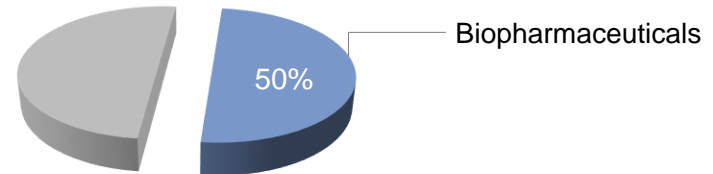
Sales bridge



Comments

- Rebif organically lower as European and U.S. volume losses to competition from oral therapies outweigh U.S. pricing initiatives
- Erbitux with good organic performance driven by commercial initiatives in Emerging Markets
- Strong demand for entire Fertility portfolio in all regions
- Continued pipeline prioritization (pimasertib, Sym004) increase R&D expenses
- EBITDA pre increases due to organic growth; litigation settlement balances one-time R&D expenses and higher LTIP² provisions

Q4 2014 share of group sales

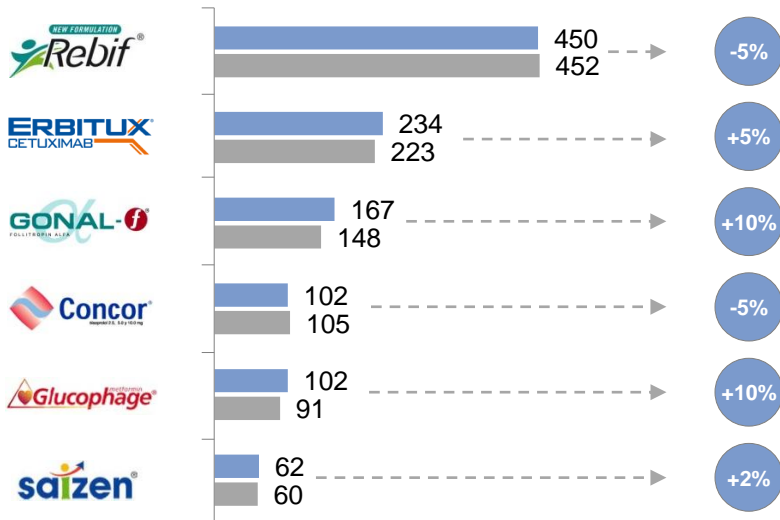


¹Restated for product reclassification of Neurobion and Floratil from Biopharmaceuticals to Consumer Health; ²Long Term Incentive Plan

Biopharmaceuticals organic growth by product

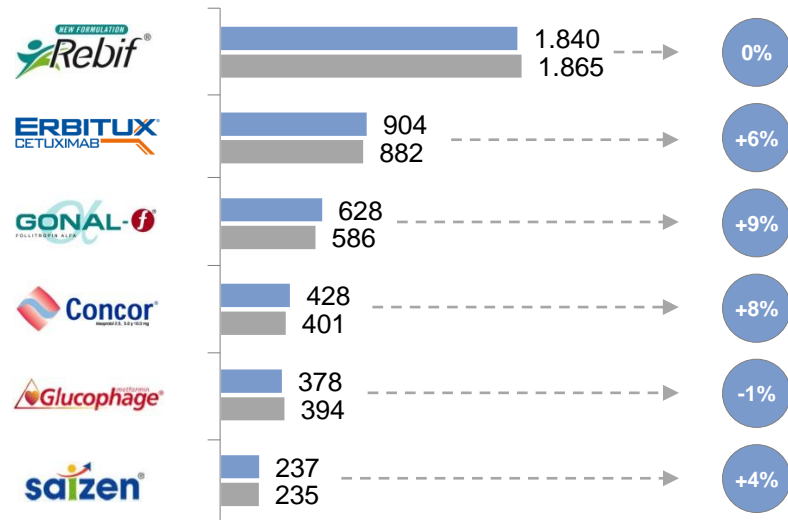
Merck KGaA
Darmstadt · Germany

Q4 2014 organic sales growth [%] by key product [€ m]



■ Q4 2014 ■ Q4 2013

FY 2014 organic sales growth [%] by key product [€ m]



■ FY 2014 ■ FY 2013

Rebif – defending the franchise; competitive pressure in the U.S. and Europe

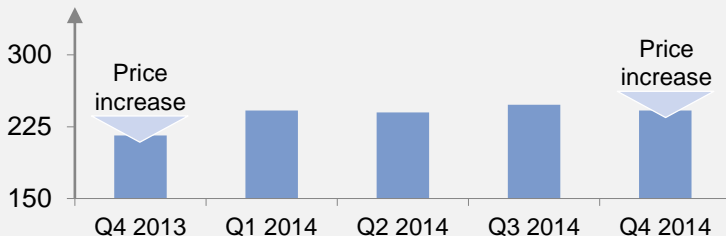


- Regional sales evolution [€ m]

Trend

North America

Q4 drivers



+2.1% org.



Price



Volume

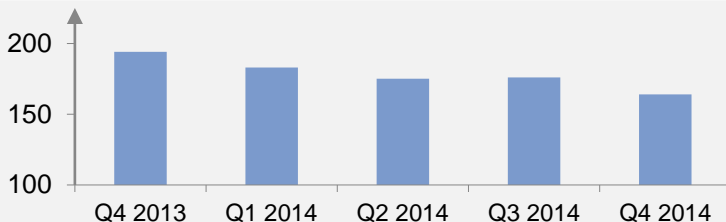


FX

Trend

Europe

Q4 drivers



-15.8% org.



Price



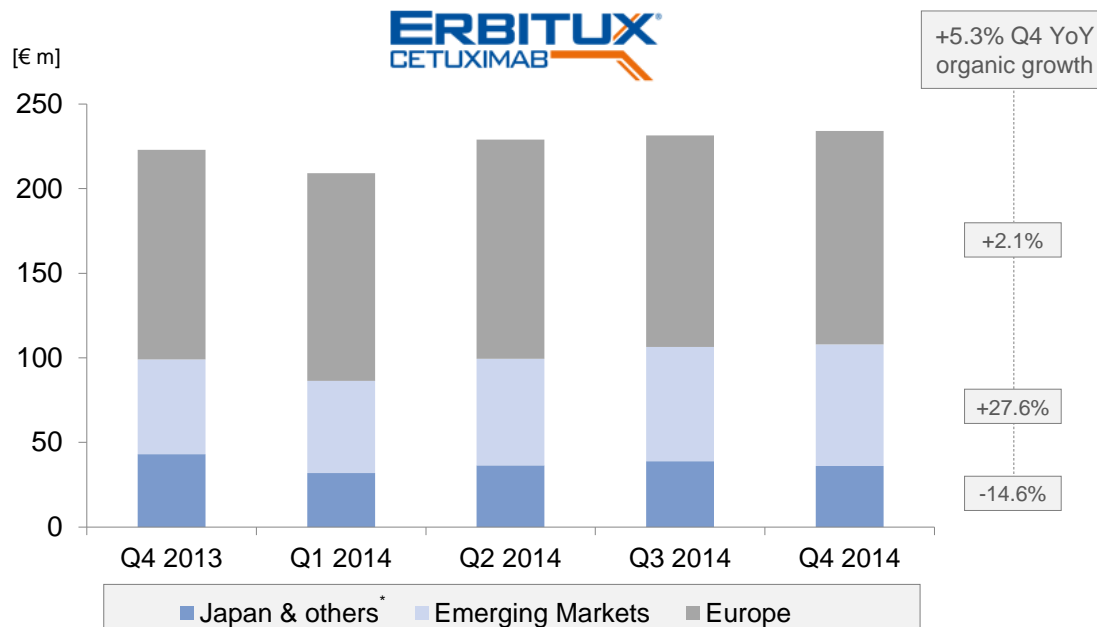
Volume

Rebif performance

- Rebif sales of €450 m in Q4
- Organic decline of -4.7% is driven by lower volumes mitigated by pricing
- Competition from orals main factor of U.S. and European volume decline
- October price increase supported U.S. performance in Q4
- European performance driven by volume losses to orals; last year's high base included tender in Russia

Erbitux – Emerging Markets strength

Erbitux sales by region

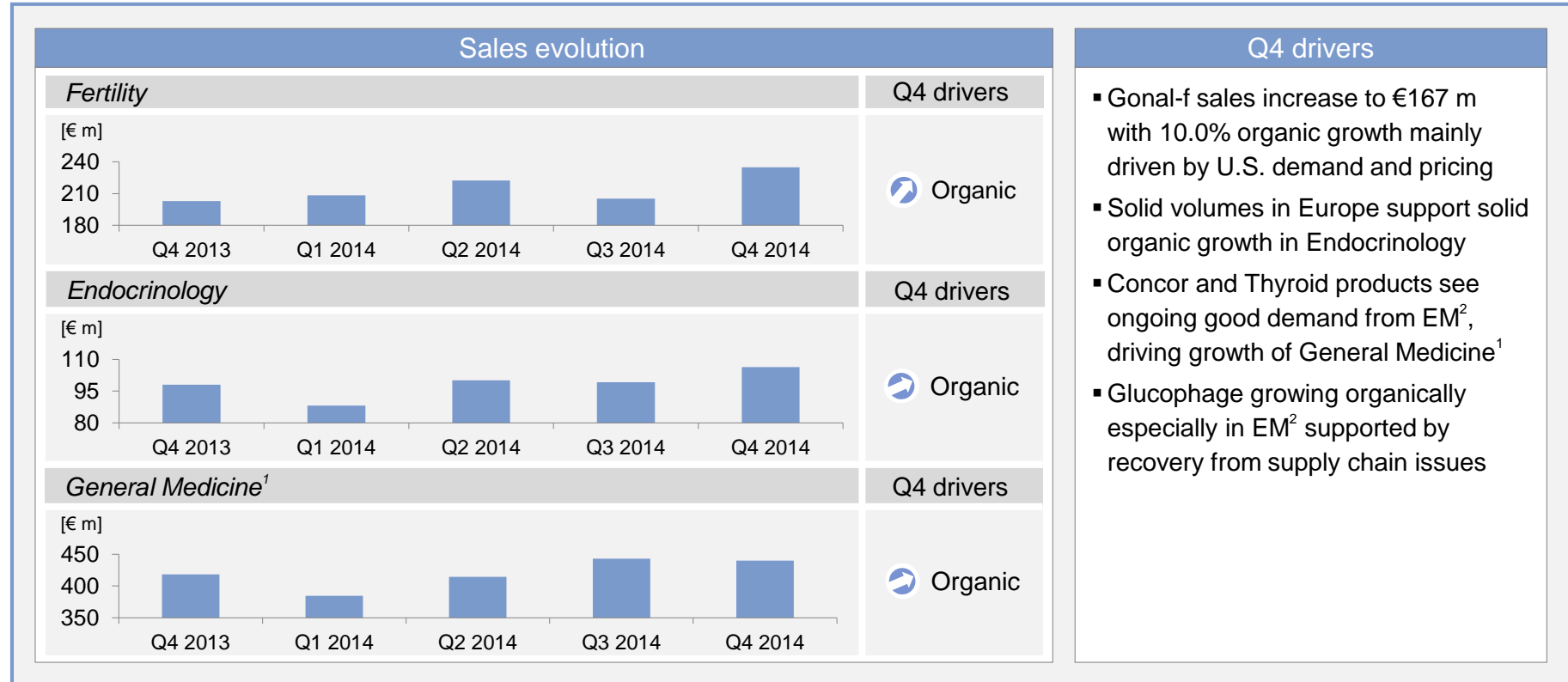


Erbitux performance

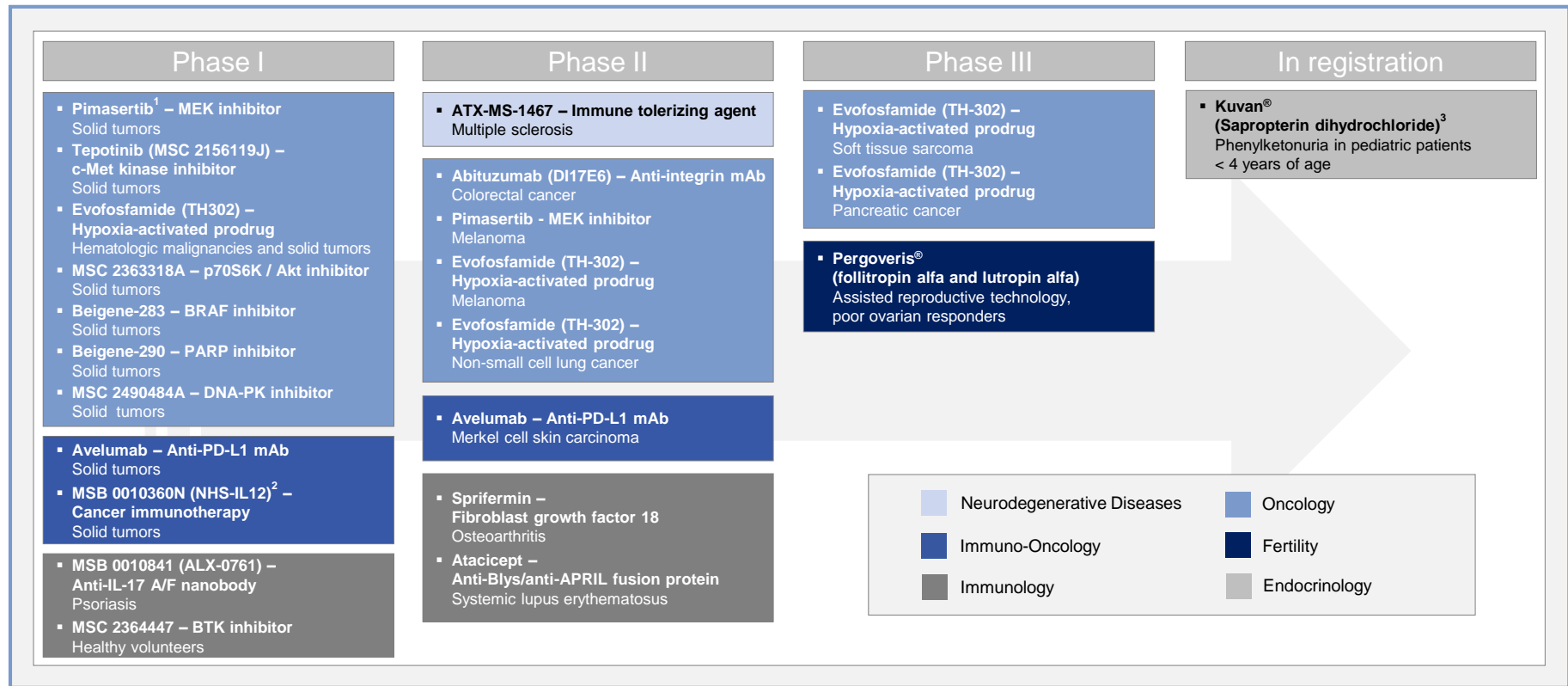
- Sales increase to €234 m as volume gains outweigh negative price effects
- Europe with slight organic growth mainly driven by reimbursement approval in Turkey
- Strong growth in China as well as in Latin American markets leads to Emerging Markets uptake
- Japan compares to very high base, overall business remains healthy
- FY performance of 6% organic growth mainly driven by Emerging Markets is partially offset by -3.4% FX

* Australia/Oceania, Africa

Strong growth in Fertility and General Medicine



¹includes "Cardiometabolic Care & General Medicine and Others"; ²Emerging Markets



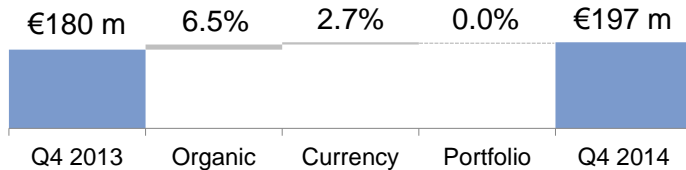
Pipeline as of February 28, 2015; ¹Combined with hDM2 inhibitor (SAR405838) from Sanofi, conducted under the responsibility of Sanofi;

²Sponsored by the National Cancer Institute (USA); ³Post-approval request by the European Medicines Agency

Q4 - Consumer Health: Strong volumes amid investments in marketing and selling

[€ m]	Q4 2013*	Q4 2014
Sales	180	197
Marketing and selling	-72	-86
Admin	-9	-7
R&D	-5	-7
EBIT	36	34
EBITDA	38	37
EBITDA pre	39	38
<i>Margin (% of sales)</i>	<i>21.9%</i>	<i>19.4%</i>

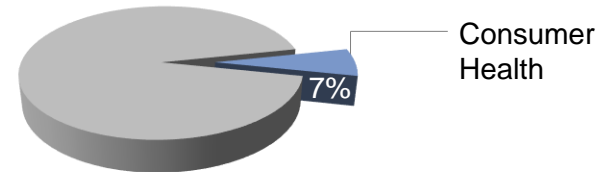
Sales bridge



Comments

- Sound organic sales growth supported by currency tailwinds
- Investments in global marketing initiatives drive growth in Emerging Markets, especially Neurobion and Floratil in Brazil
- Good performance of cough and cold products in Europe
- Femibion reaches record market share in Germany
- EBITDA pre almost stable as organic growth is offset by higher marketing and selling costs

Q4 2014 share of group sales

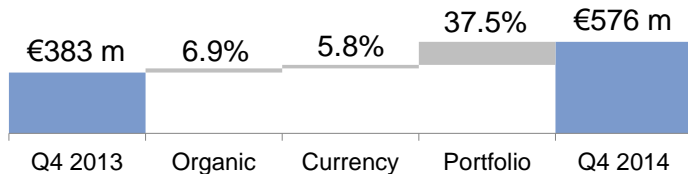


*Restated for product reclassification of Neurobion and Floratil from Biopharmaceuticals to Consumer Health

Q4 - Performance Materials: A strong quarter

[€ m]	Q4 2013	Q4 2014
Sales	383	576
Marketing and selling	-36	-50
Admin	-6	-15
R&D	-37	-48
EBIT	134	170
EBITDA	155	229
EBITDA pre	167	239
<i>Margin (% of sales)</i>	<i>43.5%</i>	<i>41.6%</i>

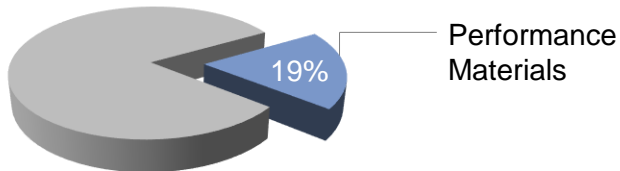
Sales bridge



Comments

- Sales jump on portfolio effect, strong organic growth & FX tailwinds
- Volume growth in Liquid Crystals remains largest contributor to organic performance
- Strong demand for ultra-high-definition TV's (PS-VA) and mobile devices (IPS & UB-FFS) key success factor
- Significant EBITDA pre increase driven by AZ and strong organic growth
- EBITDA pre margin reflects mix effect from AZ

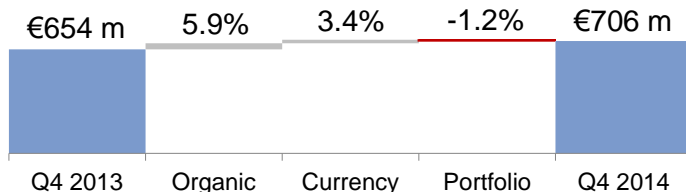
Q4 2014 share of group sales



Q4 – Life Science: Process Solutions drives growth

[€ m]	Q4 2013	Q4 2014
Sales	654	706
Marketing and selling	-206	-231
Admin	-25	-30
R&D	-38	-43
EBIT	51	55
EBITDA	145	135
EBITDA pre	168	163
<i>Margin (% of sales)</i>	<i>25.7%</i>	<i>23.0%</i>

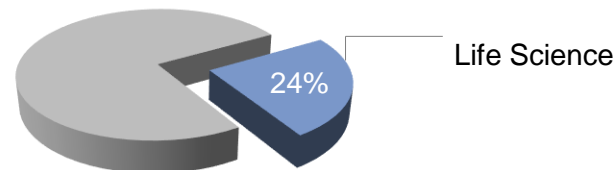
Sales bridge



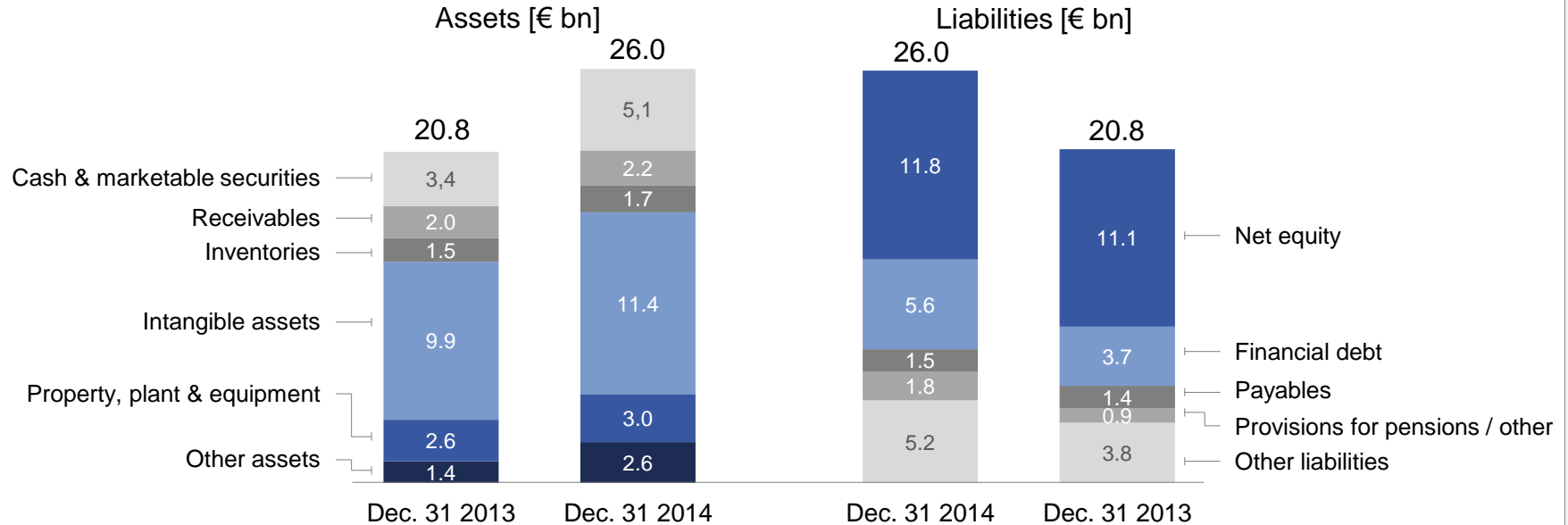
Comments

- Good organic growth and FX, slightly offset by portfolio changes
- Strong demand from biopharma industry for single-use equipment and purification consumables drives growth at Process Solutions
- Lab Solutions with good performance from price and volume uptakes especially in lab water consumables
- Bioscience almost flat as good development of separation and preparation products is offset by low demand for antibodies
- EBITDA pre affected by investments in marketing and selling, higher LTIP* provisions and unfavorable product mix

Q4 2014 share of group sales



Balance sheet: Reflecting strategic M&A moves



- Balance sheet reflects AZ acquisition and Pfizer collaboration
- Issuance of hybrid bond impacts cash and debt

- Provisions for pensions up due to lower interest rates
- FX development accounts for ~€1 bn total balance sheet increase

Underlying cash flow strength

[€ m]	Q4 2013	Q4 2014	Δ
Profit after tax	281	282	1
D&A	462	380	-81
Changes in provisions	-238	-342	-104
Changes in other assets / liabilities	-205	604	809
Other operating activities	44	17	-27
Changes in working capital	97	200	103
Operating cash flow	440	1,141	701
Investing cash flow	-263	-1,144	-881
thereof Capex*	-172	-211	-39
Financing cash flow	-106	1,519	1,625

Cash flow drivers

- Higher impairments last year lead to lower D&A in 2014
- Changes in provisions mainly impacted by release for litigation settlement
- Increase in changes in other assets and liabilities reflects Pfizer upfront
- Changes in working capital increase due to higher business activity
- Investments in short-term assets impact investing cash flow
- Financing cash flow mainly reflects cash in from hybrid issuance in December

*Only PPE, not including software
Totals may not add up due to rounding

Operating cash flow increase driven by Pfizer

[€ m]	FY 2013	FY 2014	Δ
Profit after tax	1,209	1,165	-44
D&A	1,458	1,361	-97
Changes in provisions	-203	-342	-139
Changes in other assets / liabilities	-260	471	731
Other operating activities	-3	9	12
Changes in working capital	25	41	16
Operating cash flow	2,226	2,705	479
Investing cash flow	-875	-1,641	-766
thereof Capex*	-407	-481	-74
Financing cash flow	-1,073	761	1,834

Cash flow drivers

- Decrease in D&A YoY due to 2013 impairments
- Changes in provisions reflect release from litigation settlement
- Changes in other assets/liabilities increase from Pfizer upfront payment
- Investing cash flow reflects payment for AZ and cash investments in short term assets
- Capex increases mainly due to investment in new plant in China
- Financing cash flow positive mainly driven by cash in from hybrid bond; last year reflects bond repayment

*Only PPE, not including software
Totals may not add up due to rounding

One-time items in Q4 2014

One-time items in EBIT				
[€ m]	Q4 2013		Q4 2014	
	One-time items	thereof D&A	One-time items	thereof D&A
Biopharmaceuticals	164	144	15	1
Consumer Health	1	0	1	0
Performance Materials	7	-4	10	0
Life Science	40	17	28	0
Corporate & Other	14	0	23	1
Total	226	157	76	2

Totals may not add up due to rounding

One-time items in FY 2014

One-time items in EBIT				
[€ m]	FY 2013		FY 2014	
	One-time items	thereof D&A	One-time items	thereof D&A
Biopharmaceuticals	258	189	50	5
Consumer Health	1	0	9	0
Performance Materials	10	-4	91	0
Life Science	70	17	60	0
Corporate & Other	47	0	65	5
Total	387	203	275	10

Totals may not add up due to rounding

New allocation of royalty, license and commission income and expenses

2014 P&L structure

Sales

Royalty, license and commission income
Commission income
Royalty & license income

Revenues

Cost of Sales

Gross profit

Marketing & selling expenses

Royalty, license and commission expenses
--

Commission expenses

Royalty & license expenses

Administration expenses

Other operating expenses/income

Research & development expenses

EBIT

New 2015 P&L structure

Net sales

Royalty, license and commission income
Commission income
Royalty & license income

Revenues

Cost of Sales

Gross profit

Marketing & selling expenses

Royalty, license and commission expenses

Commission expenses

Royalty & license expenses

Administration expenses

Other operating expenses/income

Research & development expenses

EBIT

Date	Event
April 17, 2015	Annual General Meeting 2015
May 19, 2015	Q1 2015 Earnings release
August 06, 2015	Q2 2015 Earnings release
November 12, 2015	Q3 2015 Earnings release
March 08, 2016	Q4 2015 Earnings release



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