



Kendrion N.V. – Capital Markets Day
Amsterdam, 15 August 2018



Agenda

1. Q2 and HY1 2018 results
2. Passenger Cars measures
3. Simplify, Focus, Grow 2016 – 2018
4. Corporate Social Responsibility
5. The road ahead: 2019 – 2023
 - Passenger Cars
 - Robotics
 - China
6. Long-term targets
7. Q&A



Cautionary Note Regarding Forward Looking Statements

Certain statements contained in this presentation constitute forward-looking statements. These statements may include, without limitation, statements concerning future results of operations, the Company's share of new and existing markets, general industry and macro-economic trends and the Company's performance relative thereto and statements preceded by, followed by or including the words "believes", "expects", "anticipates", "will", "may", "could", "should", "intends", "estimate", "plan", "goal", "target", "aim" or similar expressions. These forward-looking statements rely on a number of assumptions concerning future events and are subject to uncertainties and other factors, many of which are outside the Company's control that could cause actual results to differ materially from such statements.

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Key figures - Q2 2018

(x EUR 1 million unless otherwise stated)	Q2 2018 ¹	Q2 2017 ^{2, 3}	Difference in %
Revenue	119.0	117.3	1%
EBITDA	17.4	16.5	5%
EBITA	11.6	10.8	7%
Net profit	7.7	6.8	14%
ROS	9.7%	9.2%	

¹ Normalised for Q2 2018 non-recurring restructuring costs of EUR 4.8 million (after tax EUR 3.4 million).

² Normalised for Q2 2017 non-recurring restructuring costs of EUR 0.8 million (after tax EUR 0.6 million).

³ Restated due to application of IFRS 9, IFRS 15 and IFRS 16 as per 1 January 2018.

- Overall healthy market conditions, except for weakness in European diesel market
- Revenue growth of 1.4% to EUR 119.0 million, 2.4% growth at constant rates of exchange with Industrial (4.4%) and Automotive (1.2%)
- Industrial continued its good performance, especially in Industrial Control Systems
- Automotive did not meet our expectations with some headwind in Passenger Cars due to the decline in diesel sales
- Additional simplification measures in Passenger Cars result in one-off costs of EUR 4.8 million with annualised savings of EUR 3.7 million
- Revenue growth and implemented simplification measures resulting in 7% EBITA growth, higher ROS of 9.7% and 14% rise in normalised net profit

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Key figures - HY1 2018

(x EUR 1 million unless otherwise stated)	HY1 2018 ¹	HY1 2017 ^{2, 3}	Difference in %
Revenue	239.6	235.6	2%
EBITDA	35.1	32.7	7%
EBITA	23.5	21.4	10%
Net profit	15.8	13.7	16%
ROS	9.8%	9.1%	

¹ Normalised for HY1 2018 non-recurring restructuring costs of EUR 5.9 million (after tax EUR 4.2 million).

² Normalised for HY1 2017 non-recurring restructuring costs of EUR 2.0 million (after tax EUR 1.5 million).

³ Restated due to application of IFRS 9, IFRS 15 and IFRS 16 as per 1 January 2018.

- Solid first half 2018 with revenue growth of 1.7%, 3.3% growth at constant rates of exchange with Industrial (6.1%) and Automotive (1.8%)
- Improved profitability with normalised EBITA of EUR 23.5 million, 10% higher than HY1 2017, resulting from higher revenues enhanced by the positive effect of our simplification measures
- One-off restructuring costs of EUR 5.9 million, with annualised savings of EUR 4.2 million
- ROS of 9.8% (9.1% in HY1 2017)
- Normalised net profit in HY1 2018 of EUR 15.8 million (HY1 2017: EUR 13.7 million)

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Industrial - HY1 2018 performance

- Good market conditions in main industrial markets
- Higher activity level of first quarter continued into the second quarter, with increase in HY1 revenue to EUR 85.6 million (+6% at constant rates of exchange). Growth in Q2 of 4% to EUR 42.4 million
- All three business units improved revenue and profitability with strongest contribution from ICS
- ICS saw high demand for power heat controllers and from several customers in the medical segment, that combined with the impact from a leaner organisation resulted into an almost doubling of EBITA
- IDS benefited from continued growth in permanent magnet brakes that more than offset the final ramp down of a large customer project
- IMS growth was broad based but partly offset by the loss of some smaller Swiss customers following last year's production transfer to Germany and a weaker performance with a textile customer
- EBITA increased to EUR 11.7 million (+37%) with EBITA margin increasing to 13.7% (HY1 2017: 10.5%)
- 30% stake acquired in Newton CFV, Inc. entering a strategic partnership in the USA with this new company for the development and manufacturing of innovative constant flow valves for food and beverage industry

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Automotive - HY1 2018 performance

- Good market conditions, except for weakness in European diesel market
- Flat revenue development in HY1 at EUR 154.0 million, but +2% at constant rates of exchange. Q2 increased by a modest 1%
- Passenger Cars continued to benefit from higher revenue from active damping valves. However slower sales of diesel cars, combined with the impact of new WLTP (Worldwide Harmonised Light Vehicles Test Procedures) on several of our customers, resulted in lower than expected revenue and reduced profitability
- Additional measures taken in Passenger Cars to further streamline the R&D organisation and address pockets of inefficiency. One-off costs taken in Q2 of EUR 4.8 million with EUR 3.7 million annualised savings, mainly for PC in Malente. Solid HY1 in Commercial Vehicles with growth in the USA and Czech Republic. Small decrease in revenues due to closure of operations in India and Mexico and certain temporary and customer specific issues
- Automotive posted an EBITA of EUR 11.5 million (HY1 2017: EUR 13.3 million), with an EBITA margin of 7.5% (HY1 2017: 8.6%)

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Financial results - HY1 2018

- Solid second quarter and first half of 2018. Revenue HY1 of EUR 239.6 million (+2%), with good 10% increase in EBITA to EUR 23.5 million and an EBITA margin of 9.8% (HY1 2017: 9.1%)
- Personnel costs before one-off restructuring costs were 2% below last year in spite of higher volumes and wage inflation
- Operating expenses decreased by 17% to EUR 12.5 million with reductions in all business units
- Normalised EBITA increased from EUR 21.4 million to EUR 23.5 million (+10%) in HY1 2018
- Simplification measures taken in HY1 with one-off costs of EUR 5.9 million and annualised savings of EUR 4.2 million
- We now expect one-off costs for the full year of EUR 7.0 million with corresponding annualised savings of EUR 5.5 million, well ahead of the original guidance for the year. Ilmenau closure announced in July 2018
- Net finance costs of EUR 1.5 million, slightly below last year
- Normalised effective tax rate of 23.9% slightly lower than HY1 2017 (24.3%) mainly due to lower US tax rate
- Normalised net profit of EUR 15.8 million (after restructuring costs EUR 11.6 million) compared to EUR 13.7 million last year

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Financial position - HY1 2018

- Investments year-to-date amount to EUR 13.3 million, 17% above depreciation. For full year 2018 investments will, as expected, exceed depreciation, largely due to new automotive projects and capacity extension permanent magnet brakes (IDS)
- Net debt end Q2 at EUR 78.7 million. Excluding the effects of IFRS 16 net debt amounted to EUR 63.6 million (Q2 2017: EUR 62.2 million)
- EUR 5.3 million increase in net debt in Q2, fully due to cash dividend payment (EUR 5.8 million) and the share buyback programme (EUR 6.6 million). Free cash flow in the quarter was EUR 6.3 million
- Strong financial position with solvency of 47% (excluding IFRS 16: 49%) and net debt cover of 1.1
- On 27 July Kendrion entered into a new five-year EUR 150 million finance agreement with a consortium of ING, Deutsche Bank and HSBC, to refinance its existing financing arrangements with sufficient flexibility to achieve its growth objectives while at the same time reducing the overall financing costs

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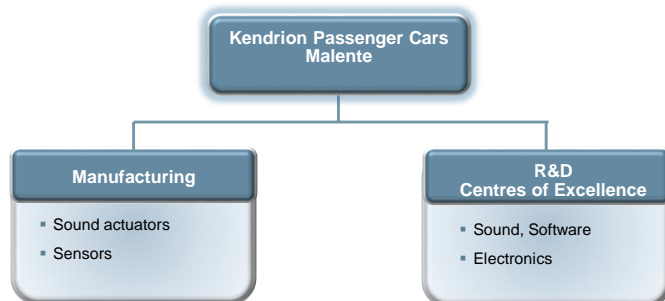


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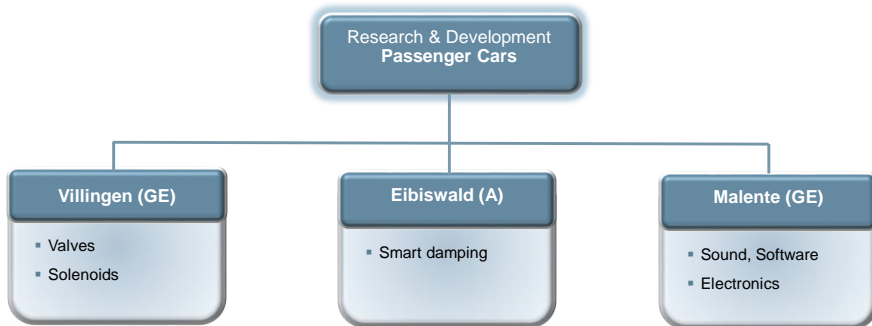


Streamline Passenger Cars Malente





R&D Passenger Cars – Centres of Excellence



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Overall impact additional Passenger Cars measures in 2018

- Impact: approx. 65 FTEs generating savings of EUR 5.0 million, at one-off costs of EUR 6.5 million
- Process expected to be completed by year-end 2018
- Full savings take effect as of 1 January 2019

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SIMPLIFY



FOCUS



GROW

**THREE-YEAR PLAN
2016 – 2017 – 2018**

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- **Organisational structure**

- Industrial Magnetic Systems
- Industrial Control Systems
- Industrial Drive Systems
- Commercial Vehicles
- Passenger Cars

- **Cost reduction**

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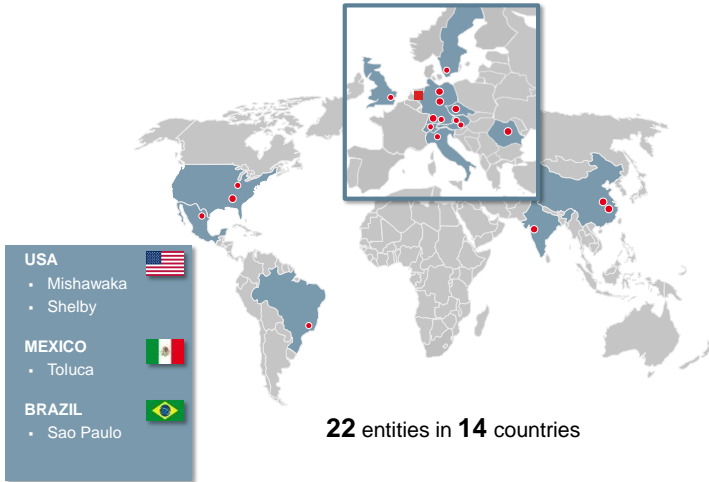
Less management

- Divisional structure removed
 - Reduction from 7 to 5 business units
 - No central marketing
 - Kendrion-wide simplification measures
- Result: almost 15% reduction in FTE from 1,227 ultimo 2015 to an expected 1,055 per 1 January 2019

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Reduction in manufacturing footprint



- USA**
 - Mishawaka
 - Shelby
- MEXICO**
 - Toluca
- BRAZIL**
 - Sao Paulo

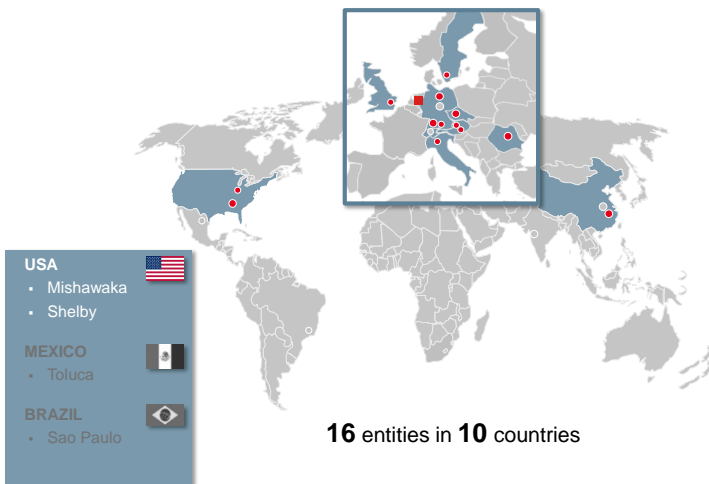
- GERMANY**
 - Aerzen
 - Donaueschingen / Engelswies
 - Malente
 - Markdorf
 - Villingen
 - Ilmenau
- AUSTRIA**
 - Eibiswald
 - Linz
- ROMANIA**
 - Sibiu
- CZECH REPUBLIC**
 - Prostějov
- SWITZERLAND**
 - Hausen am Albis

- NETHERLANDS**
 - Zeist
- GREAT BRITAIN**
 - Bradford
- ITALY**
 - Turin
- SWEDEN**
 - Kristianstad
- CHINA**
 - Suzhou
 - Nanjing
- INDIA**
 - Pune

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Reduction in manufacturing footprint



- USA**
 - Mishawaka
 - Shelby
- MEXICO**
 - Toluca
- BRAZIL**
 - Sao Paulo

- GERMANY**
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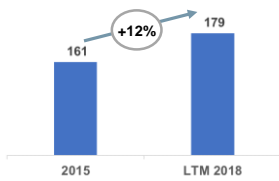
- NETHERLANDS**
 - Zeist
- GREAT BRITAIN**
 - Bradford
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 - Pune

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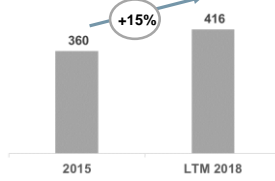


More efficiency

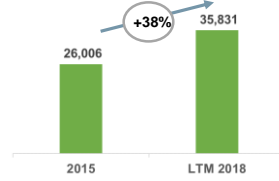
Revenue per FTE ('000 EUR)



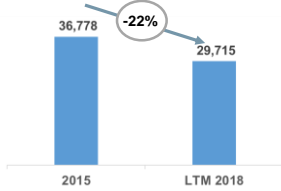
Revenue per indirect FTE ('000 EUR)



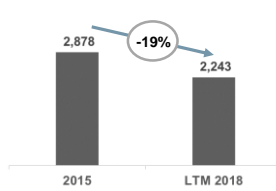
Revenue per production site ('000 EUR)



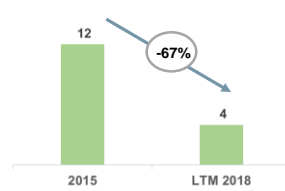
Operating expenses ('000 EUR)



Travel costs ('000 EUR)



Standing meetings

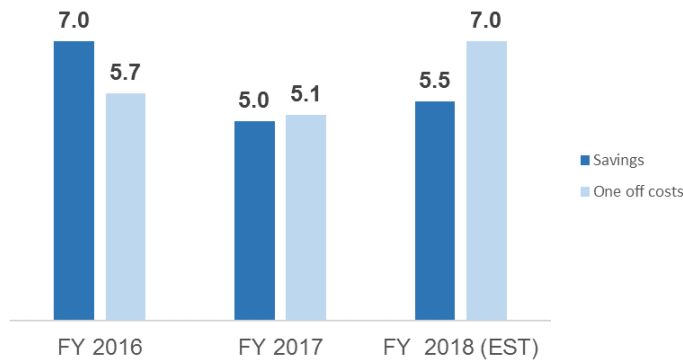


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Less costs

EUR 17.5 million savings at EUR 17.8 million one-off costs



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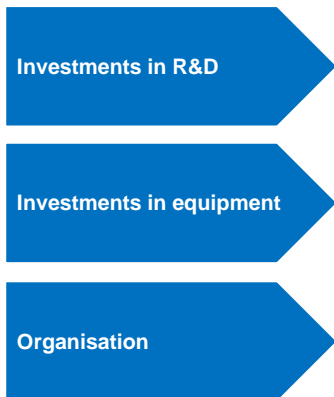


- Passenger Cars
- Permanent Magnet brakes in robotics
- China

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Passenger Cars 2016 - 2018



- 13 engineers added ¹⁾
- 21% higher R&D expenses

- Average capital investments up approx. EUR 3.5 million (35%) per annum
- New production lines a.o. piston cooling valves (Germany), smart damping (Austria and Romania), park lock (China)

- Closure Ilmenau
- Create R&D centres of excellence

1) Including the effect from the Ilmenau closure and approved additions China

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Permanent magnet brakes for robotics 2016 - 2018

Investments in R&D

- Sunset commoditised clutch business (focus on permanent magnet brakes)
- 4 added engineers for permanent magnet (PM) brakes

Investments in equipment

- Additional investments in PM brakes for robotics of EUR 6.5 million
- Automation high volume PM brake line (Germany)
- Production capacity extension PM brake line (Germany)
- New PM brake production line (China)

Organisation

- Dedicated COBOT team defining and developing future robotic brakes
- Simplified the Aerzen facility which is now specialised in small brakes

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China 2016 - 2018

Investments in R&D

- Building a local development team with full capabilities to design, develop and support local projects
- 8 engineers added, with more planned
- Dedicated China support teams in Germany

Investments in equipment

- Additional investments of EUR 4.0 million between 2016 - 2018
- Investments include permanent magnet brake line (IDS) and park lock, water and oil control valve assembly lines (PC)

Organisation

- Organisations Nanjing and Suzhou integrated
- Global purchasing organisation implemented
- Moved to larger building to accommodate growth

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■ **Automotive market**

Fuel systems, engine management, sound systems, fuel cell valves, chassis suspension, human machine interface

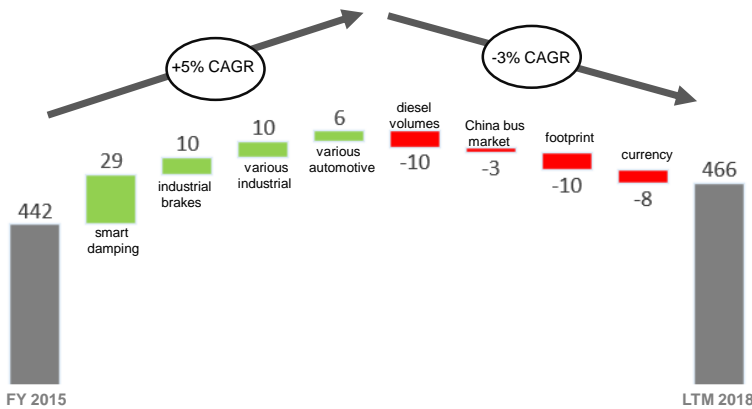
■ **Industrial market**

Drive systems, conveyor systems, energy generation and distribution, elevator systems, door access and control for machinery, oxygen systems

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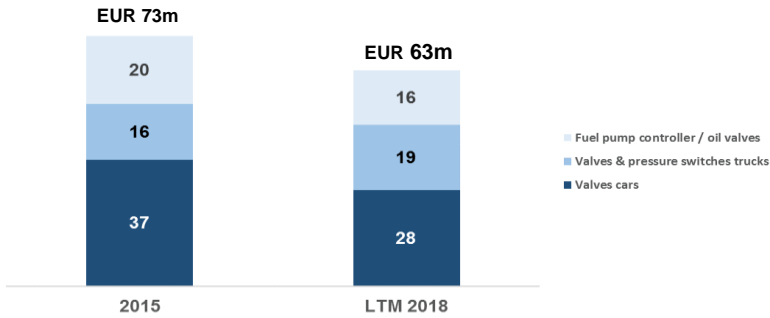
Growth 2016 - LTM 2018



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Diesel revenues ¹⁾

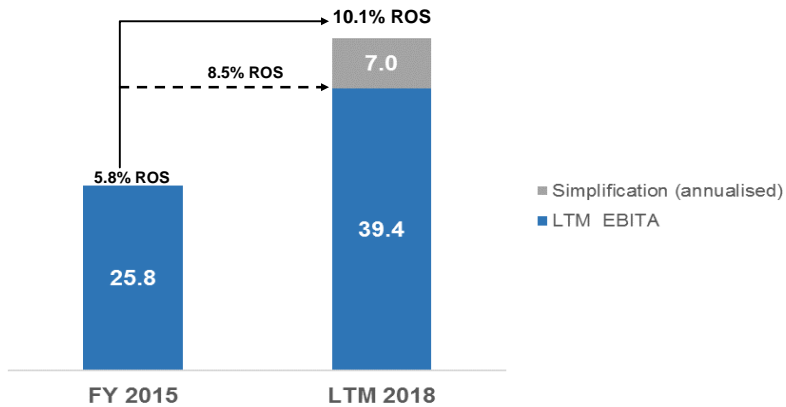


Note 1: revenues from diesel engine specific products

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Expect to reach the 10% EBITA margin as from the end of 2018



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Result - report card

- ROS from 5.8% to 10.0%
- Expected growth average 5% per annum
- Dividend 35-50% of net profit



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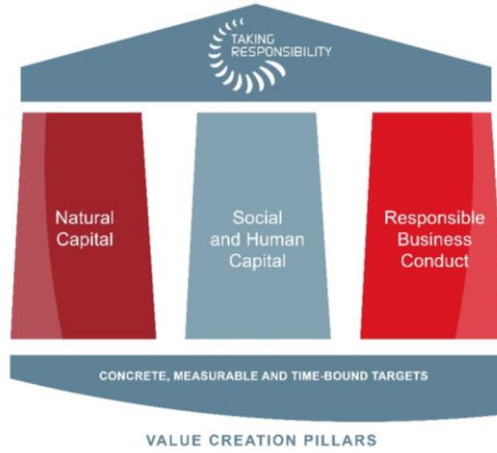
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**Sustainable value for Kendrion and all stakeholders through
3 Pillars of Value Creation 2019 - 2023**



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Natural Capital

1. 15% relative reduction of CO₂ emission
2. 15% relative reduction of energy consumption
3. Implementation of a waste management hierarchy in global waste management practices



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Social and Human Capital

1. Recurring annual improvement of Health & Safety figures
2. Establishment of a Global Diversity Committee
3. Launch global company culture campaign:
"Growth through Innovation and Continuous Improvement"
4. Reward 10 community investment initiatives per year with Together@Kendrion



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Responsible Business Conduct

1. Maintain a responsible product portfolio:
 - Products that keep you safe
 - Products that reduce climate impact
 - Products that improve health
2. Sustainable sourcing: sourcing only from approved suppliers and yearly minimum of 25 implementation audits
3. Continuous improvement and strengthening of the Global Legal Compliance and Governance Framework



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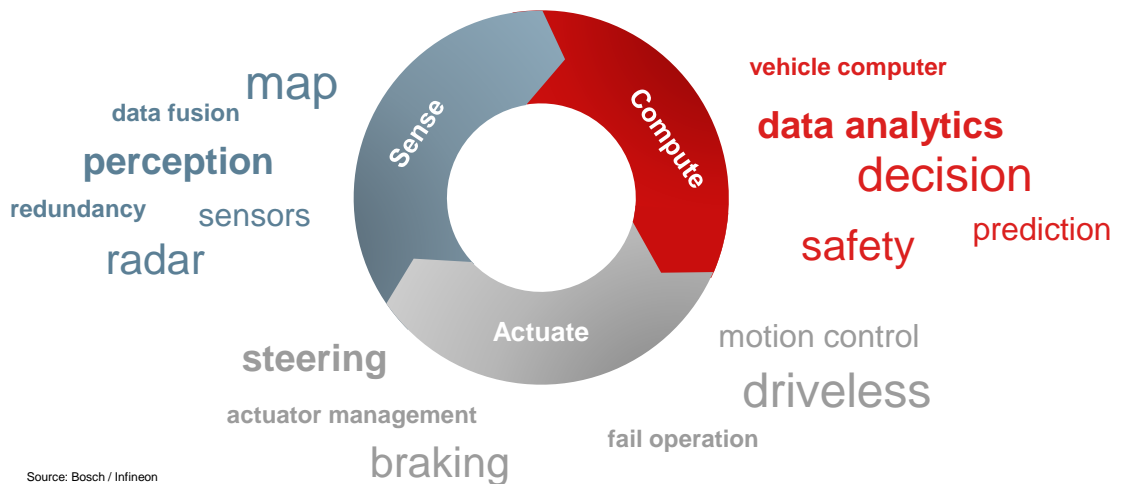
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Future of mobility

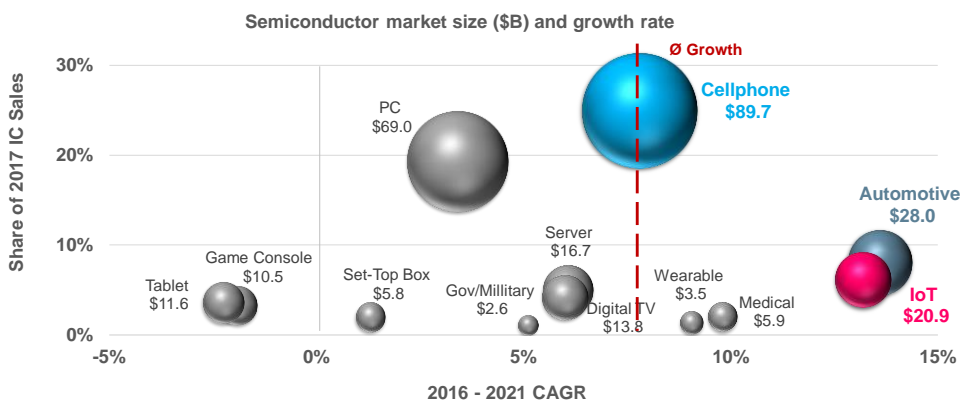


Source: Bosch / Infineon

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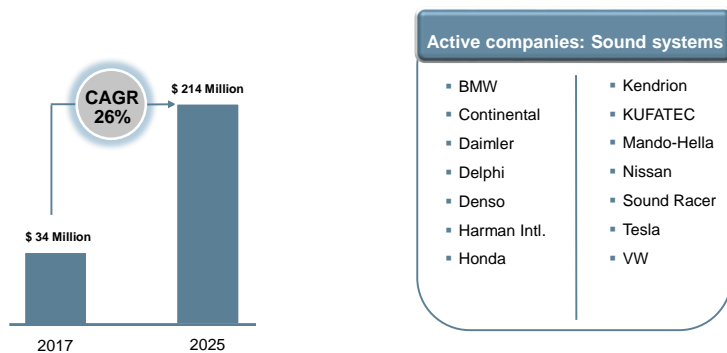
Automotive: the fastest growing semiconductor market



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Global electric vehicles market for sound systems



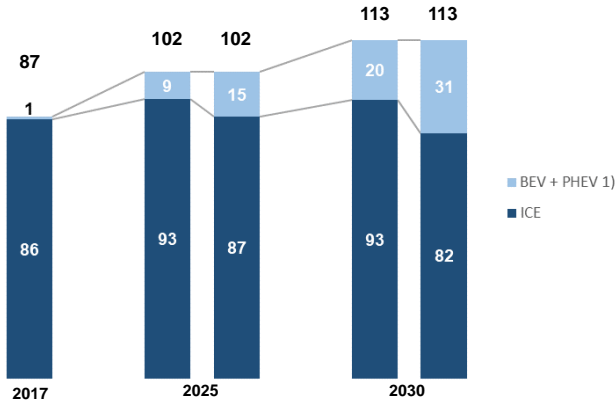
- Active companies: Sound systems
- BMW
 - Continental
 - Daimler
 - Delphi
 - Denso
 - Harman Intl.
 - Honda
 - Kendrion
 - KUFATEC
 - Mando-Hella
 - Nissan
 - Sound Racer
 - Tesla
 - VW

Source: PMR study, "Electric Vehicle Sound Generator Market: Global Industry Analysis (2012-2016) and Forecast (2017-2025)"

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Uptake alternative propulsion



Note 1) BEV is battery electric vehicle, PHEV is plug-in hybrid electric vehicle

Source: International energy agency and Kendrion analysis

- Two different policy scenarios defined by the IEA
- Start decline ICE between 2025 – 2030
- Number of alternative studies predict between 10-30% uptake of alternative engines

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Product portfolio Passenger Cars


	VALVE	SOLENOID	ELECTRONIC & MECHATRONIC	TOTAL
SUNSET	<ul style="list-style-type: none"> ▪ Steering oil pump 	<ul style="list-style-type: none"> ▪ Shift lock ▪ Lighting ▪ Others 	<ul style="list-style-type: none"> ▪ Special electronic 	14 %
CURRENT	<ul style="list-style-type: none"> ▪ Seat massage ▪ Piston cooling ▪ Oil / pneumatic / water / diesel / gasoline 	<ul style="list-style-type: none"> ▪ Acceleration pedal 	<ul style="list-style-type: none"> ▪ Fuel pump ECU ▪ Sensor 	52 %
FUTURE	<ul style="list-style-type: none"> ▪ Active damping ▪ H2 ▪ Sensor cleaning ▪ Otto particle filter 	<ul style="list-style-type: none"> ▪ Park lock 	<ul style="list-style-type: none"> ▪ Sound systems 	34 %
TOTAL	57 %	18 %	25 %	100 %

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New products and developments – examples of nominated business


Suspension valve (normally closed)
 Application: High performance damping
 Lifetime revenue: EUR 70 million
 Category: Future
 SOP: 2019




Piston cooling valve
 Application: Enhanced engine efficiency
 Lifetime revenue: EUR 40 million
 Category: Current
 SOP: 2019




Otto particle filter valve
 Application: Cleaning particle filter
 Lifetime revenue: EUR 90 million
 Category: Future
 SOP: 2021




External sound
 Application: External sound EV's
 Lifetime revenue: EUR 30 million
 Category: Future
 SOP: 2018



High pressure diesel valve
 Application: Common rail diesel
 Lifetime revenue: EUR 25 million
 Category: Current
 SOP: 2020



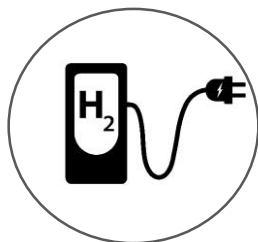
Park lock
 Application: Engage parking lock aut. transmission
 Lifetime revenue: EUR 50 million
 Category: Future
 SOP: 2018



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New products and developments – example future products



Fuel cell valve
 Regulates flow of hydrogen from the tank to the fuel cell system



Multi functional valve
 Regulates air pressure in the oil tank of an e-transmission



Water valve block
 Valve block and control unit for cleaning sensors

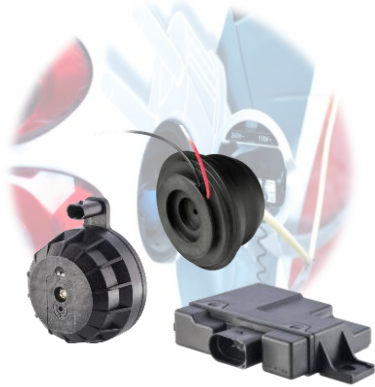


Sound box
 Highly competitive integrated speaker and electronic control unit solution for external sound emittance of electric car

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Products on display



Sound systems
Interior and exterior sound applications

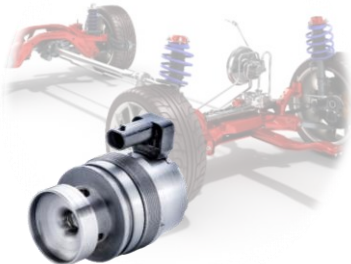


Hydrogen system isolation valve
Alternative drives

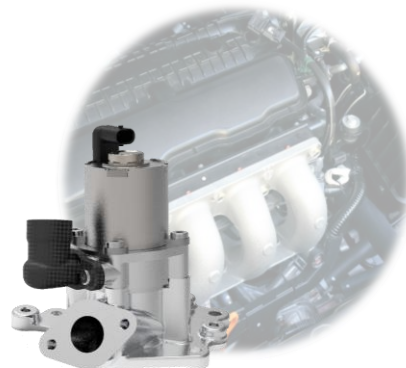
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Products on display



Proportional valve
Active damping systems



Otto particle filter valve
Engine management

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What do we do?

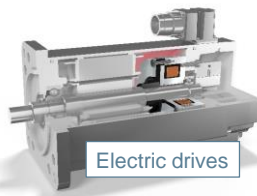
We are in the business of **stopping** and **holding** electrically driven applications (drives)



Wind energy



Conveying systems



Electric drives



Medical applications



Crane technology

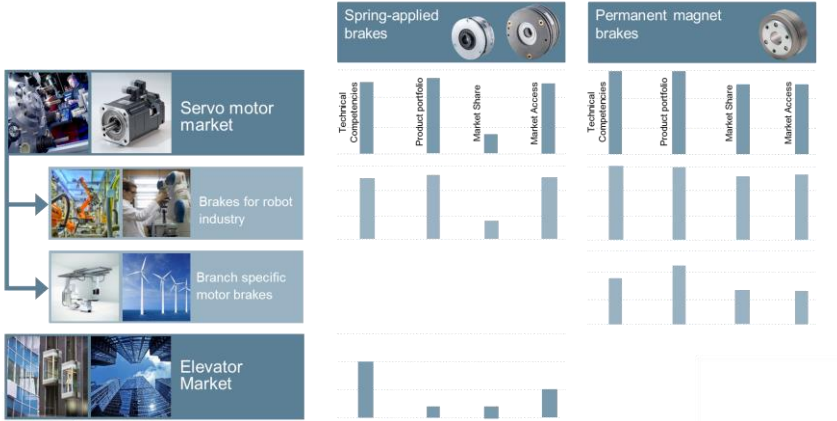


Robotics & Automation

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What capabilities do we have?



Where do we invest?

- In production capabilities (high / low volume production)
- In new regions/markets (local-for-local in China) (focusing on particular markets, e.g. robots)
- In product development for focus industries

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Where are our products used?

Payload ↑ 20kg

High-performance brakes are used in servomotors for robotics

Payload ↓ 20 kg

In lightweight robots brakes are implemented inside the robot arm.

New brake designs are required:

- Hollow-shaft
- Slim design
- Highly-integrated
- Simplified solutions

Pictures not drawn to scale, for illustration purposes

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What are the facts about the robotic market?

Main drivers

- Demographic changes
- Increasing labour costs
- Manpower shortage
- Product individuality
- Applications in handling and assembling
- Human-robot collaboration

Industries

- Largest consumers of robots are the automotive, the metal and electronic industry
- Diversification into adjacent fields of plastic and rubber industries

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How is the market expected to develop?



- Robotics market is expected to grow with around 10% per year from 2015 to 2025
- Growth in China is expected to be higher than rest of the world
- Applications for lightweight robots will grow more than for heavyweight robots

Source: <https://www.bcg.com/de-de/publications/2014/business-unit-strategy-innovation-rise-of-robotics.aspx>

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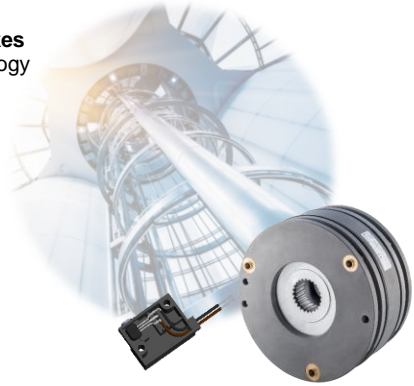


Products on display



Electromagnetic brakes
Permanent magnet technology

Electromagnetic brakes
Spring-applied technology



Elevator brakes
Double-circuit brake & sensor for monitoring

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What future markets do we see for our solutions?



▪ **E-Mobility**

The next future emerging requirement is becoming visible: Electrically powered vehicles require actuators to decouple power transmission from the electrical motor to the wheels or alternative loads. The solution could be an electromagnetic holding brake of IDS.

▪ **Service Robots**

Besides the industrial robots, a much higher growth is expected for service robots. Depending on the application there is a need for brakes (i.e. surgery robots), which have to work absolutely precise and reliable.

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Agenda

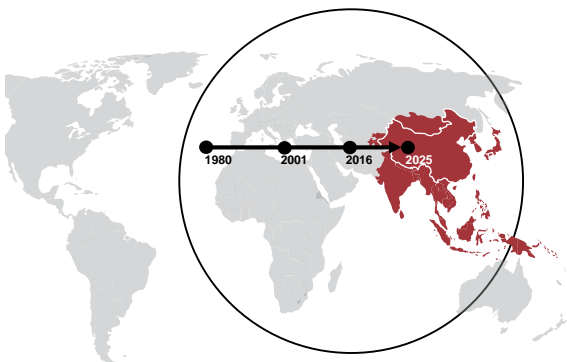
1. Q2 and HY1 2018 results
2. Passenger Cars measures
3. Simplify, Focus, Grow 2016 – 2018
4. Corporate Social Responsibility
5. **The road ahead: 2019 – 2023**
 - Passenger Cars
 - Robotics
 - **China**
6. Long-term targets
7. Q&A

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Asian economic power is growing, shifting the world's economic center of gravity to the East

Global economic center of gravity



	2015	2016	2017
1 Revenue % Kendriion China / Kendriion WW	3.9%	4.2%	4.5%
2 GDP % China / WW	15%	15%	15%
3 Output of WW Passenger Car % China / WW	32%	34%	34%



Lots of growth opportunity!

Source: National Bureau of Statistics of China / China Association of Automobile Manufacturers

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Strategic plan in China



5 fingers to 1 fist,
5 BUs to 1 China
organisation



Integrate business / management synergy and material purchasing power of five business units, to maximise Kendrion value in China/Asia

Combined strength Germany + China

- Leading technology & SPEC
- Reliable quality
- Confidence / Trust
- Aggressive business expansion
- Fast response & lead time
- Competitive costs

2016

2017

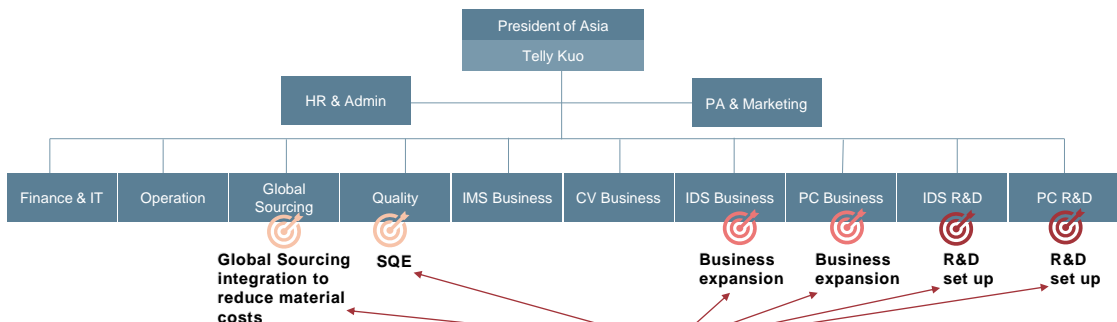
2018

2019

2023



Single organisation & further investment in China



Achieve 37% sales growth with same headcount

Investments for growth

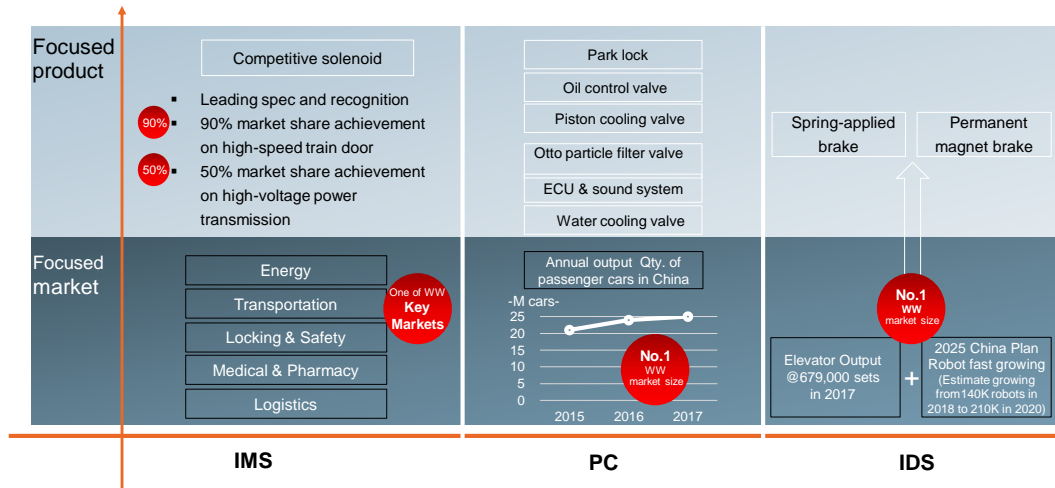
2016 - 2018

2019 - 2023





Focused market and product in China



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Growth strategy



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New projects overview: nominations in 2017 - 2018

Market	Application	Product	Possible new revenue expected (Euro million)
Automotive	Engine emission treatment	Otto particle filter valve	90
Industrial	Robot	Permanent magnet brake	40
Automotive	Sound system	Electronic control unit	30
Automotive	Shifter	Park lock & oil control valve	30
Industrial	Elevator	Spring-applied brake	20
Automotive	Shifter	Park lock & oil control valve	20
Automotive	Engine management	Piston cooling valve	10
Subtotal of top 7 new nominations (up to date)			240

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Agenda

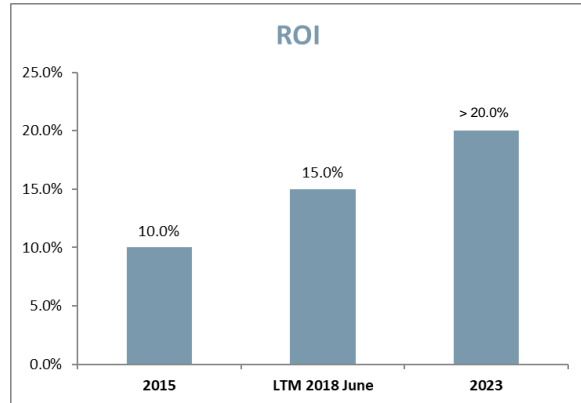
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Long-term targets - 2023

- ROI* 2023: > 20.0%
- EBITDA 2023: > 15%
- Dividend policy: unchanged



* Before potential acquisitions

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Q & A



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