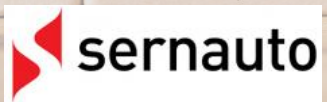


Global Automotive Supplier Study

COVID-19 crisis as a window of
opportunity?

Roland
Berger



March 2021



Contents



A The COVID-19 impact

COVID-19 hit the markets during an economic downturn and put suppliers under enormous pressure



B The Winners framework

2008/09 shows that an economic crisis can be a strategic chance to set the course for successful, profitable growth



C The next economic cycle

Lower vehicle sales in parallel with technological disruption will be the challenge for suppliers in the coming years



D The way forward

Opportunities for suppliers to course-correct strategies and ensure a sustainable future business model



E The contacts

Roland Berger Automotive team

Contents



A The COVID-19 impact

COVID-19 hit the markets during an economic downturn and put suppliers under enormous pressure



B The Winners framework

2008/09 shows that an economic crisis can be a strategic chance to set the course for successful, profitable growth



C The next economic cycle

Lower vehicle sales in parallel with technological disruption will be the challenge for suppliers in the coming years



D The way forward

Opportunities for suppliers to course-correct strategies and ensure a sustainable future business model

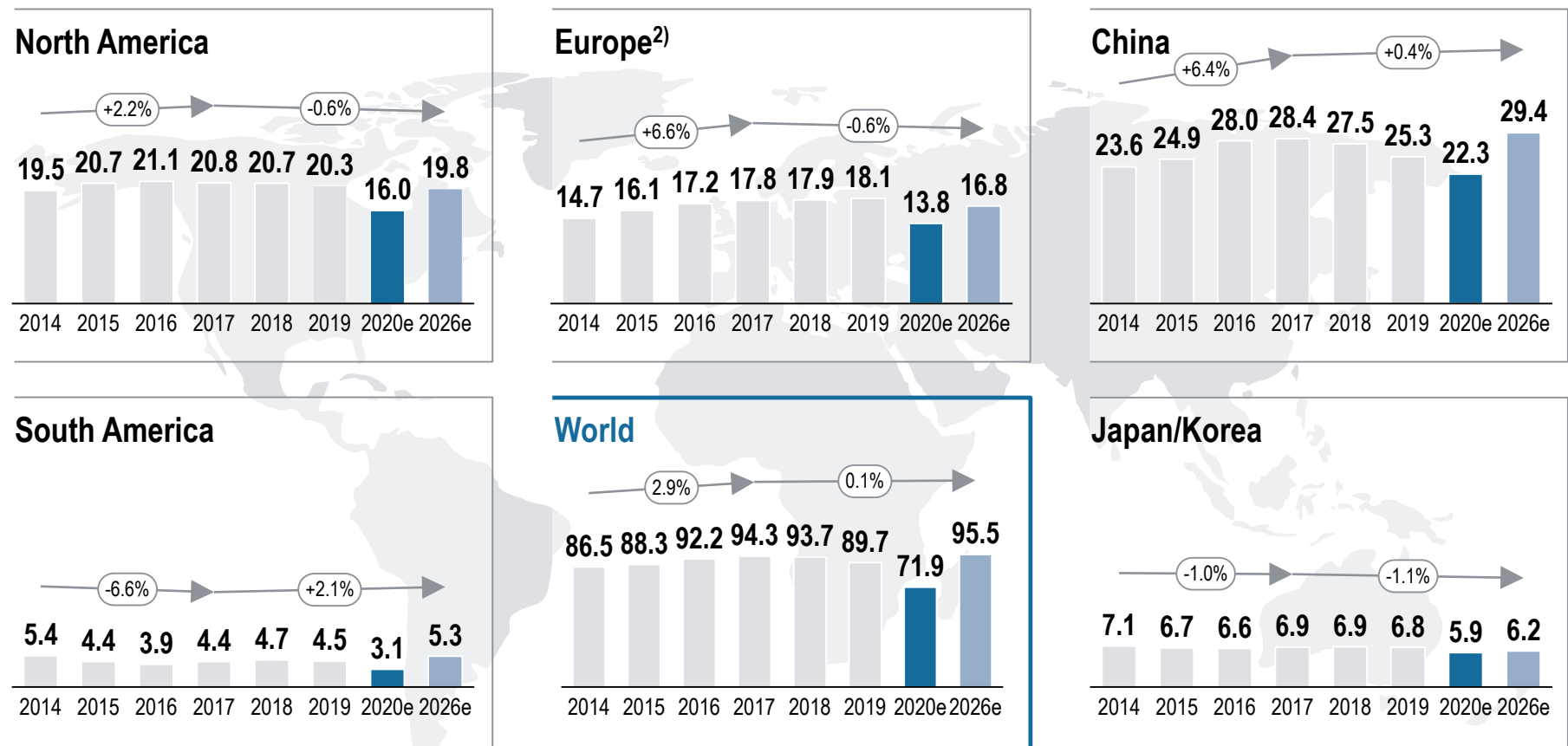


E The contacts

Roland Berger Automotive team

Volume growth within the automotive industry peaked in 2017/18 – Such levels not expected to be surpassed before 2026

Global light vehicle sales volume¹⁾ by region, 2014-2020 and outlook 2026 [m units]



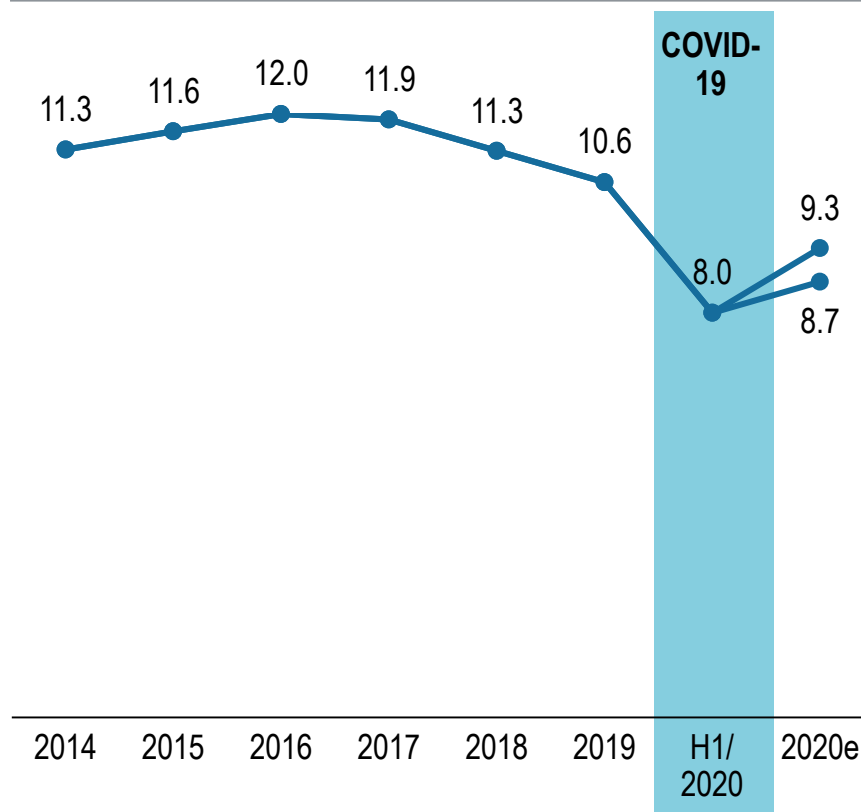
1) Incl. light commercial vehicles; 2) Excluding CIS and Turkey

xx% = CAGR

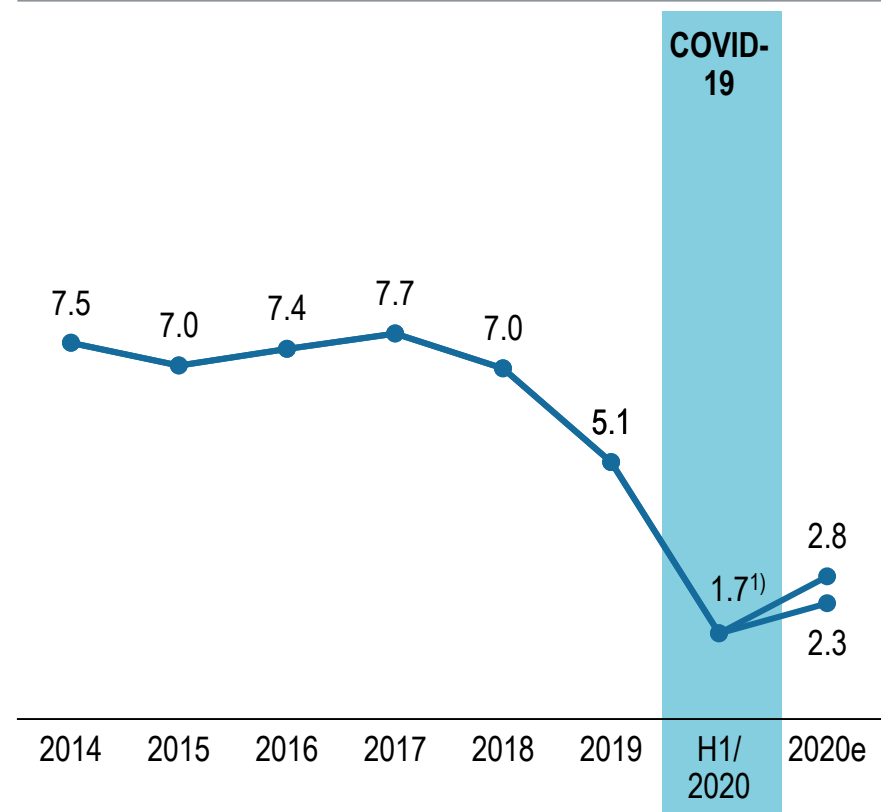
COVID-19 brought supplier average margin performance to a new low

Key supplier performance indicators 2014-2020e (n=~600 suppliers)

EBITDA margin [%]



EBIT margin [%]









Note: 2020e based on assumed full-year revenue decline between -15% and -20%

1) H1/2020 EBIT partially manually adjusted and extrapolated for companies that don't communicate interim results

Source: Company information, Roland Berger/Lazard, Roland Berger/Lazard supplier database

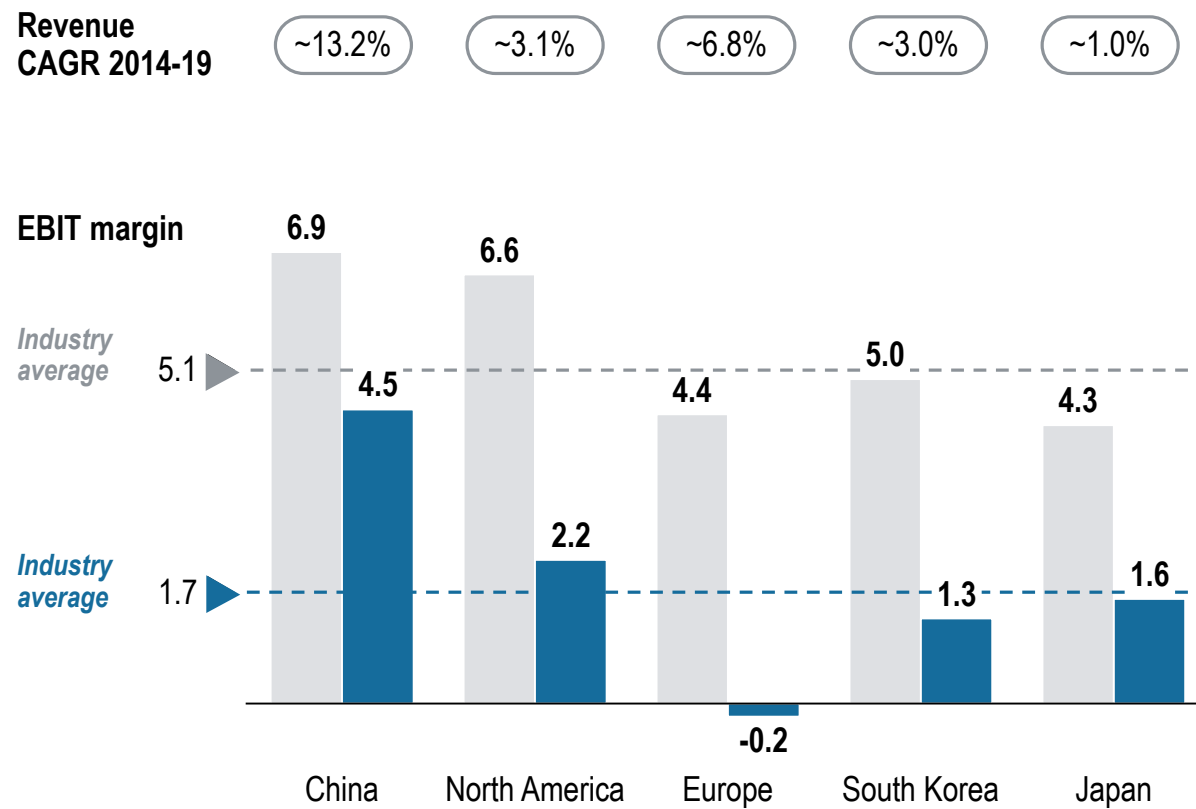
Financial performance of suppliers varied to a certain extent depending on region, size, product focus and business model

Profitability trends in the global automotive supplier industry 2019 and H1/2020

Region	1	Company size	2	Product focus	3	Business model	4
							
	<ul style="list-style-type: none"> > In 2019, China showed highest profitability, followed by North America amongst the major regions > In H1/2020, China was still most profitable, supported by an efficiently handled lockdown period and a strong local market recovery 	<ul style="list-style-type: none"> > In 2019, companies with revenues from EUR 0.5-1.0 bn were most profitable with an EBIT margin of 5.9% > In H1/2020, slightly larger companies with revenues of EUR 1.0-2.5 bn came slightly better through the crisis 	<ul style="list-style-type: none"> > In 2019, tires were by far most profitable with an EBIT margin of 8.8% followed by electronics/infotainment, chassis and exterior > In H1/2020, Electrics and Infotainment companies were most resilient to the COVID-19 shock with an EBIT of 3.9% 	<ul style="list-style-type: none"> > In 2019, process specialists achieved a higher EBIT margin than product innovators for the first time > In H1/2020, product innovators showed significantly higher resilience and higher margin stability than process specialists 			
	<ul style="list-style-type: none"> > In 2019, Europe and South Korea were least profitable > Despite a better performance in China, all regions were severely impacted by COVID-19 in H1/2020 with margins in Europe turning near zero 	<ul style="list-style-type: none"> > In 2019, companies with less than EUR 0.5 bn in revenues were least profitable with 3.7% EBIT margin > In H1/2020, large companies with revenues greater than EUR 10 bn were least profitable with only 1.2% EBIT margin, given higher restructuring costs and impairments 	<ul style="list-style-type: none"> > In 2019, interior was least profitable, indicating structural problems in the segment that were further accelerated by COVID-19 > In H1/2020, interior suppliers were least profitable – Nevertheless, all domains were hit hard 	<ul style="list-style-type: none"> > In 2019, product innovators' profitability suffered from higher R&D expenses during the market slowdown > In H1/2020, process specialist results collapsed down to an EBIT margin of just 1.2% 			

With a relatively low COVID-19 impact on vehicle sales and a quick recovery, China-based suppliers suffered less

Key supplier performance indicators by region 2019 and H1/2020 [%]



- > **China-based suppliers defended their above-average margins**; COVID-19 lockdown during the Chinese New Year and the comparably **quick post-lockdown recovery** led to significantly **higher H1 results** compared to other regions
- > **North America-based suppliers suffered in H1/2020** due to their high dependency on global supply chains – A few relatively profitable suppliers kept the average result higher than in most other regions
- > Beside the general volume impact, **Europe-based supplier margins are affected by a number of restructuring cases** in addition to the COVID-19 crisis
- > **Japanese and Korean suppliers remained profitable** under COVID-19, as the market decline was lower compared to the other regions

■ EBIT 2019 ■ EBIT H1/2020

Note: H1/2020 EBIT values adjusted

Source: Company information, Roland Berger/Lazard, Roland Berger/Lazard supplier database

Suppliers are evenly hit by the COVID-19 shock with larger restructuring cases amongst medium and very large suppliers

Key supplier performance indicators by company size¹⁾ 2019 and H1/2020 [%]

Revenue
CAGR 2014-19

~1.4%

~4.7%

~3.9%

~0.8%

~6.7%

~4.5%

> **Small suppliers** (EUR 0.5 bn to 1.0 bn) **benefit from flexibility** in their cost structures and **lean overhead**

> **Large multinational suppliers** (above EUR 10 bn revenues) are affected by a number of larger restructuring cases (partly due to structural issues independent of COVID-19), causing in combination with COVID-19 the **largest decrease in EBIT** compared to 2019

> **As an additional crisis impact**, the profit of a **large number of suppliers is affected by impairments** (non-cash effective though) as a result of the **collapse in demand**, an effect which is visible especially with medium and large multinational suppliers

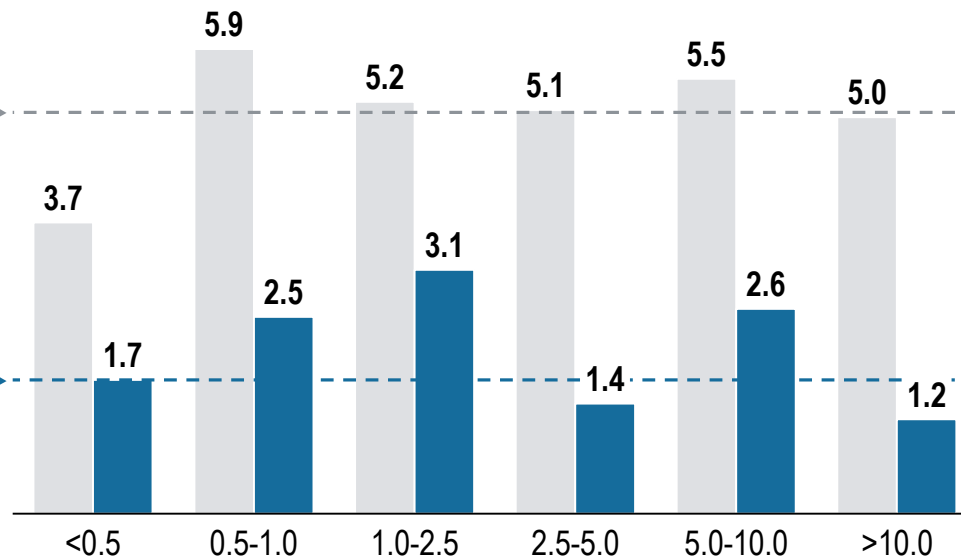
EBIT margin

Industry
average

5.1

Industry
average

1.7



EBIT 2019 EBIT H1/2020

Note: H1/2020 EBIT values adjusted 1) Size based on EUR bn of sales

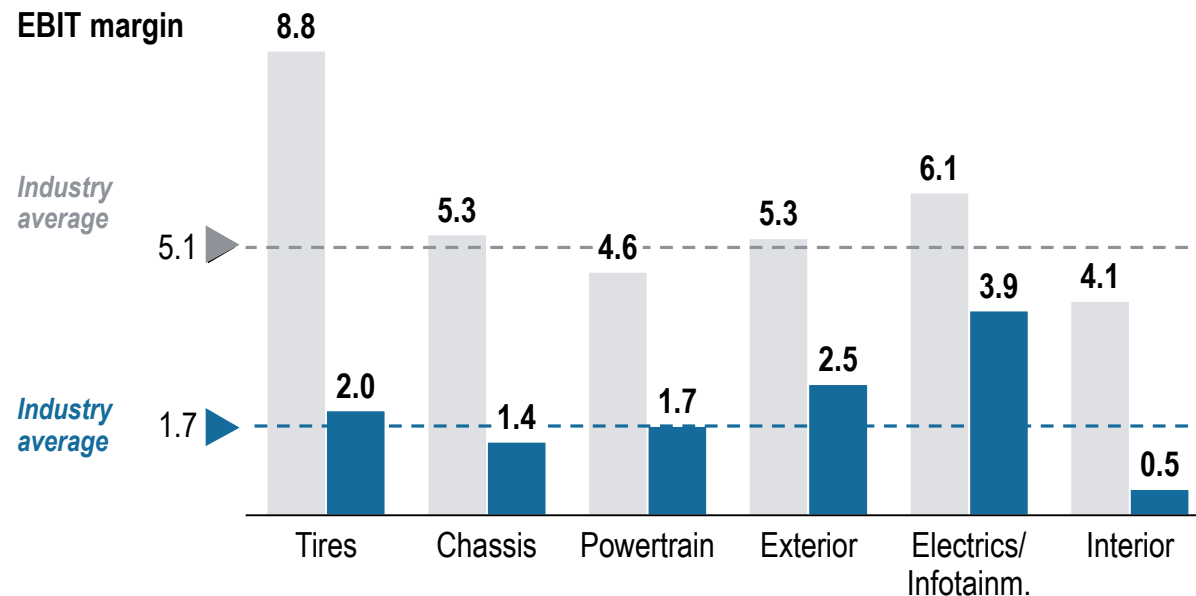
Source: Company information, Roland Berger/Lazard, Roland Berger/Lazard supplier database

Margins across all product categories deteriorated – Tire suppliers witnessed the largest drop due to aftermarket exposure

Key supplier performance indicators by product focus 2019 [%]

Revenue CAGR 2014-19

Tires	Chassis	Powertrain	Exterior	Electrics/Infotainm.	Interior
~0.6%	~3.6%	~5.3%	~7.2%	~6.6%	~0.8%



- > **Tire suppliers** suffered from **lower aftermarket demand** during the COVID-19 lockdowns
- > **COVID-19** has **accelerated structural problems** of some **chassis** suppliers driven by the **ongoing product commoditization**
- > **Interior suppliers** also show a strong negative impact from COVID-19, **mostly originating from Europe**, with margins turning negative

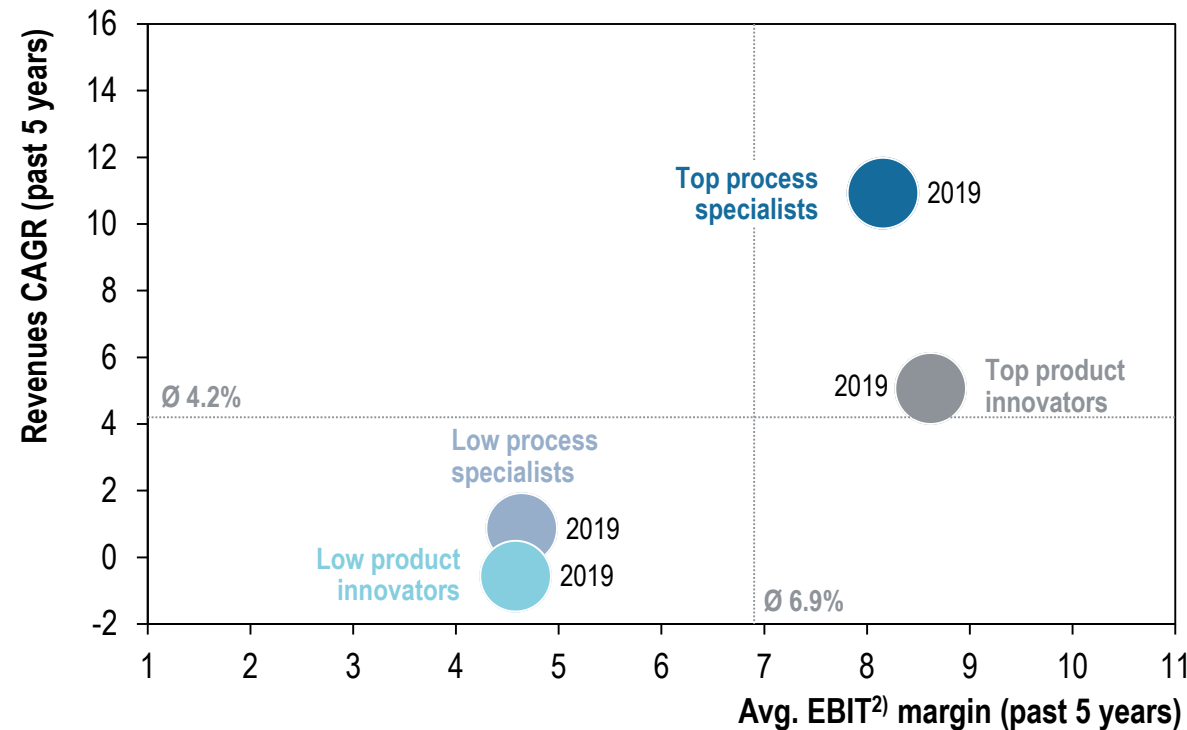
EBIT 2019 EBIT H1/2020

Note: H1/2020 EBIT values adjusted

Source: Company information, Roland Berger/Lazard, Roland Berger/Lazard supplier database

Across the past five years, top performing companies could further increase their profitability lead

Key performance indicators of top vs. low-performing suppliers¹⁾



- > **Product innovators** historically outperformed process specialists in terms of **average profitability** – However, the gap was almost closed in the past years
- > **Top process specialist growth** was partly **accelerated by M&A** activities of several players in the past
- > Large **difference in growth rates as well as profitability** between top and low-performing process specialists indicate the **relevance of economies of scale**
- > **Process specialists** focused on the **segments with higher competitive pressure**, thus, facing low margins

1) Top (low) performance based on above-average (below-average) revenue growth 2014–2019, ROCE 2014–2019 and ROCE 2019; 2) EBIT after restructuring items

Contents



A The COVID-19 impact

COVID-19 hit the markets during an economic downturn and put suppliers under enormous pressure



B The Winners framework

2008/09 shows that an economic crisis can be a strategic chance to set the course for successful, profitable growth



C The next economic cycle

Lower vehicle sales in parallel with technological disruption will be the challenge for suppliers in the coming years



D The way forward

Opportunities for suppliers to course-correct strategies and ensure a sustainable future business model



E The contacts

Roland Berger Automotive team

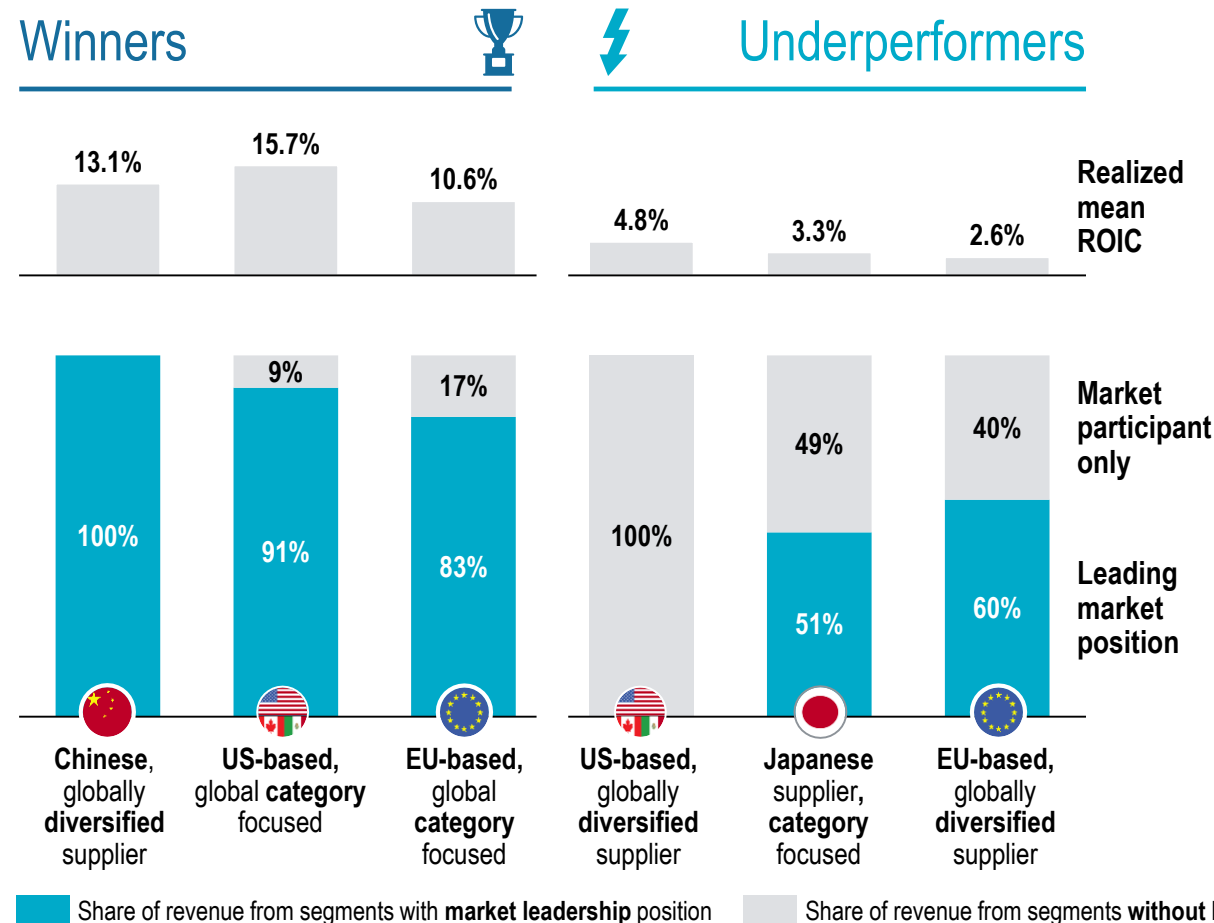
Overall, we have identified four general strategic characteristics that Winners have in common

Shared characteristics of Winners

1	2	3	4
Business Leadership	Strategic Coherence	Size and financial position	Proven ability to execute
Can your businesses set the agenda in their areas of market participation?	Do you have a consistent strategic rationale across your portfolio?	Are you relevant in the marketplace in terms of size, financial success or technology with the ability to efficiently attract capital ?	Can you deliver results on a sustainable basis?
Technology leadership Know-how leadership	Similar requirements Similar value proposition	Trusted capital market partner Convincing equity story	Short reaction times Performance-driven culture

A leading market position per product leads to higher total shareholder return and capital growth, indicating business leadership

Performance based on revenue per product group [exemplary suppliers]



- > The Winners framework shows a correlation between the market position of business divisions/companies and their financial and shareholder value performance – **Winners have consistently leading market positions**
- > When in a **leading position** or when having a high **revenue consolidation** on certain products, suppliers were able to achieve a **higher total shareholder return** over the past years and achieved **higher capital growth**
- > **Suppliers from Japan** are **struggling** to translate their technical capabilities **into a leading market positioning** due to the local Keiretsu structures, lack of truly global organizations and customer access

Winners show a higher strategic coherence, which correlates closely with management tenure

Strategic coherence

Portfolio synergies

Ability of a company to leverage synergies among products in its portfolio

Active portfolio management

Number of M&A transactions (investments and divestments) related to the market capitalization

R&D intensity

Average R&D expenses in relation to total sales over the past five years

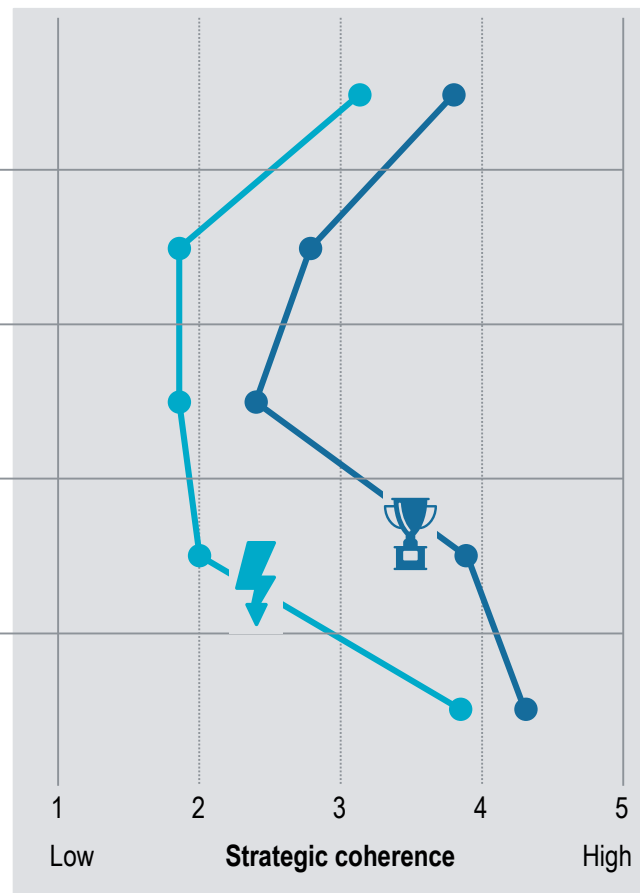
Management tenure

Average tenure of the current CEO and CFO of a company in the selected sample

Client and market concentration

Exposure to single markets or customers – Share of the largest customers

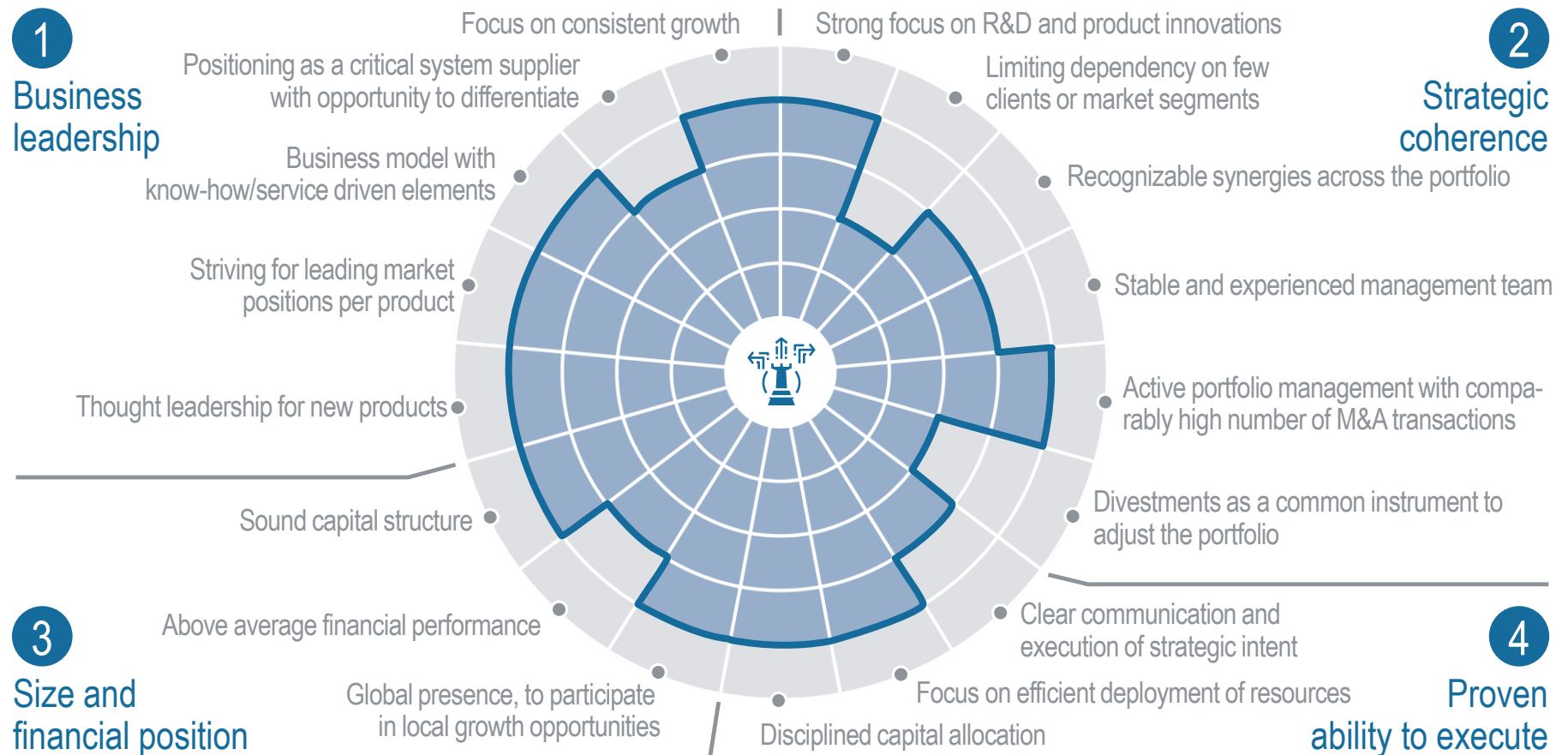
— 'Winner' company sample
— 'Underperformer' company sample



- > We evaluated **strategic coherence** along **five specific criteria** reflecting the mid- to long-term of a company's agenda
- > A **higher M&A activity** indicates a more actively engaged **portfolio management**
- > Winners **invest consistently more in R&D**, indicating the ambition to **retain a leading technological position**
- > Our analysis shows that a **stable management team correlates** with a high **strategic coherence**
- > The only criteria without a major difference between Winners and Underperformers is **client and market concentration**, with **high dependency** on product portfolio and business model
- > Considering the **combined impact** of the analyzed **criteria**, **Winners display a higher strategic coherence** than Underperformers

Despite different company settings, certain patterns emerge of what Winners do differently than the average automotive supplier

Strategic options for automotive suppliers – Summary



Contents



A The COVID-19 impact

COVID-19 hit the markets during an economic downturn and put suppliers under enormous pressure



B The Winners framework

2008/09 shows that an economic crisis can be a strategic chance to set the course for successful, profitable growth



C The next economic cycle

Lower vehicle sales in parallel with technological disruption will be the challenge for suppliers in the coming years



D The way forward

Opportunities for suppliers to course-correct strategies and ensure a sustainable future business model

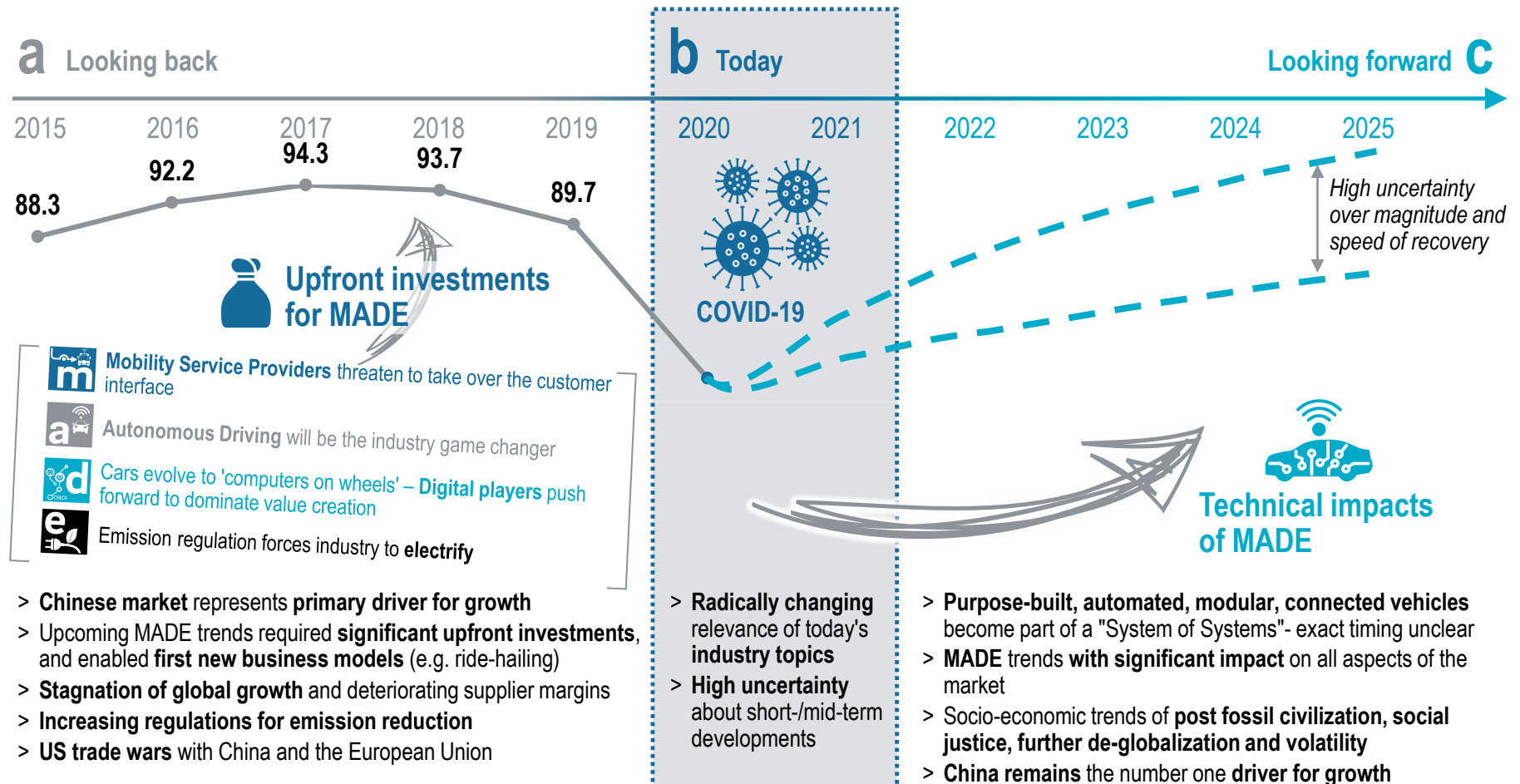


E The contacts

Roland Berger Automotive team

COVID-19 comes on top of radical changes in managing financing and business model transformation

Global light vehicle sales, 2015-2025 [m vehicles]



Apart from the coronavirus pandemic, four socio-economic megatrends have evolved that strongly impact the automotive industry

Socio-economic megatrends shaping this decade

Post fossil civilization



-  Aug '18 – Greta Thunberg starts 'Fridays for Future' movement – Growing into the largest environmental protest across 185 countries in Sep '19
-  Dec '19 – 'European Green Deal' presented with an est. EUR 260 bn of investments needed until 2030
-  Jan '20 – BlackRock announces it will focus investments on sustainability as the world's largest asset manager with USD 6.5 tn assets under management
-  Sep '20 – China vows to hit peak emissions before 2030 and reach carbon neutrality before 2060

Social justice



-  May '19 – The US House of Representatives passed the Equality Act to protect LGBT rights, but it remains un-addressed by the Senate over 1 year later
-  May '20 – The UN, France and Mexico launch the Generation Equality Forum
-  May '20 – The Black Lives Matter movement gains public attention with over 450 major protests across the US, questioning the fairness of treatment by US police departments

De-globalization



-  Dec '18 – Donald Trump implements 'America first' policy and withdraws from large multilateral agreements, e.g. CPTPP¹⁾
-  2019 – Tensions between the US and China escalate with reciprocal tariff rises
-  Dec '19 – WTO trade restrictions reach a historic high, covering 7.5% of global imports
-  Jan '20 – The United Kingdom leaves the European Union (Brexit)
-  Jan '20 – Global dissatisfaction with democracy hits an all-time high at ~60% of the population

Volatility



-  Dec '19 – Global Economic Policy Uncertainty Index averages 270 in 2019 – 3.2 times higher than its pre financial crisis average
-  Dec '19 – The economic & stock market developments are drifting apart: US GPD +42% vs. S&P 500 +179% between 2010 and '19
-  2020 – COVID-19 sends the world economy into an unprecedented recession with -5% to -10% GDP vs. 2020 forecast globally
-  May '20 – China returns to y-o-y growth in LV sales

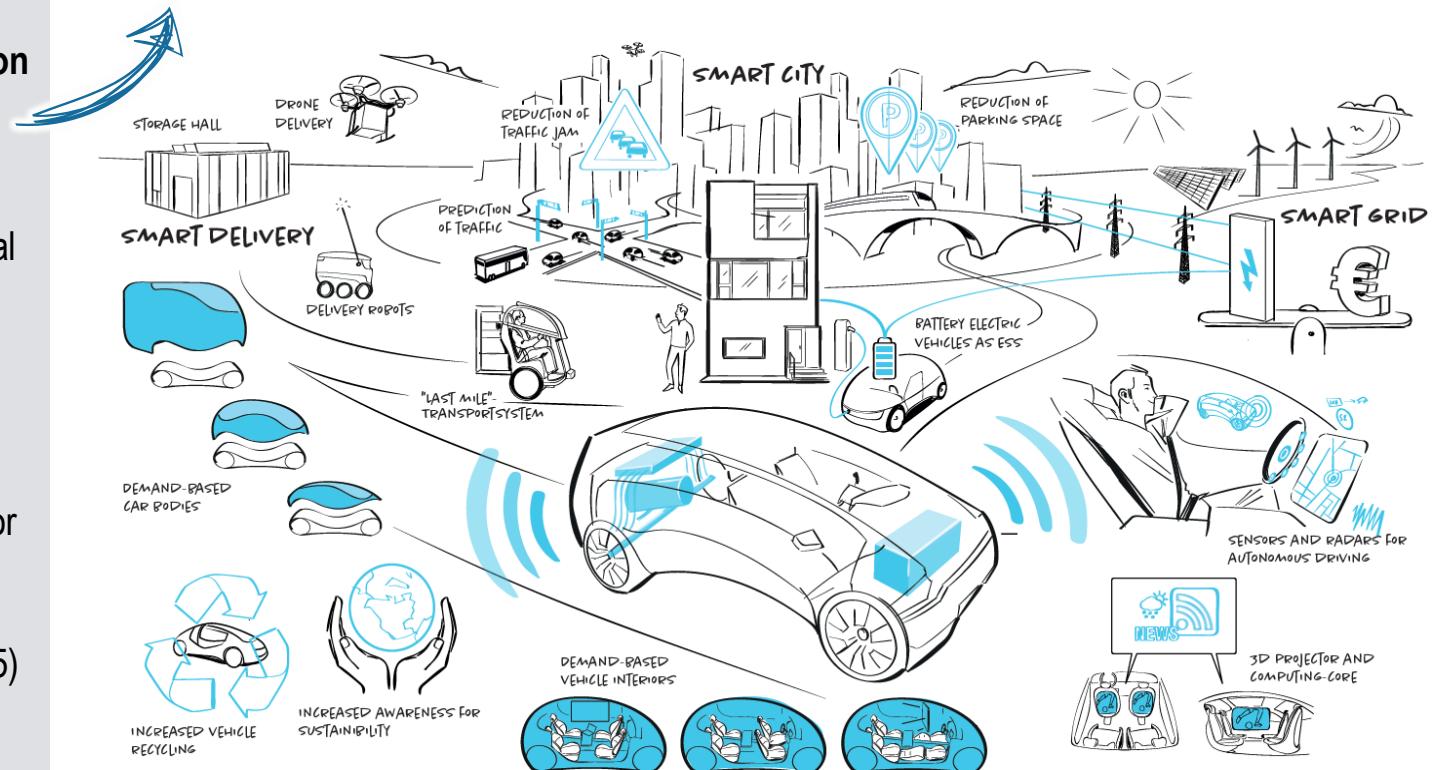
1) CPTPP: Comprehensive and Progressive Trans-Pacific Partnership, which was created as a replacement for TPP after the US withdrawal

The current pandemic doesn't change the future automotive and mobility ecosystem – R&D remains key to ensure long-term success

Industry transformation 2030 and beyond

- > **High share of electric vehicles** (30-50% w/o ICE)
- > **AI-based optimization of "super-systems"** (e.g. traffic flow plus grid load)
- > **Low share of individual car ownership**
- > **MaaS** using purpose-built mobility vehicles (PMV's):
 - Modular
 - Electric (BEV and/or FC)
 - Connected
 - Autonomous (L4/L5)

In the future mobility ecosystem, purpose-built, automated, modular, connected vehicles become part of a "System of Systems"



Contents



A The COVID-19 impact

COVID-19 hit the markets during an economic downturn and put suppliers under enormous pressure



B The Winners framework

2008/09 shows that an economic crisis can be a strategic chance to set the course for successful, profitable growth



C The next economic cycle

Lower vehicle sales in parallel with technological disruption will be the challenge for suppliers in the coming years



D The way forward

Opportunities for suppliers to course-correct strategies and ensure a sustainable future business model



E The contacts

Roland Berger Automotive team

To navigate through these challenging times of COVID-19 and the industry transformation, we propose thinking along three dimensions

Triple Transformation Framework

Position

Course-correct your
MADE+ strategy

Rethink

What opportunities and risks arise and how can you deal with them in the long run?

Perform

Ensure competitive
performance

Realign

How can you optimize performance in the current market environment?

Progress

Develop into a good
corporate citizen

Renew

How can you meet customers', employees', and society's expectations?



The Triple Transformation Framework helps to address today's challenges, enabling managers to re-align and ensure profitability in the next decade

Suppliers from all regions have to re-align in specific aspects of the business – Japanese suppliers have the highest need to act

Triple Transformation – Position

Strategic tasks

Specific actions and recommendations

Regional relevance

Reassessment of market development

- > Cross-check of developments per product/business division in the last years including expectations for the upcoming years
- > Assessment also on regional level to ensure participation in local opportunities



Adjustment of product portfolio

- > Assessment to which extent current portfolios reflect the technical changes which are triggered by the industry transformation
- > Evaluation of suitable opportunities for portfolio changes, e.g. M&A, organic growth, extensions to foster USP's



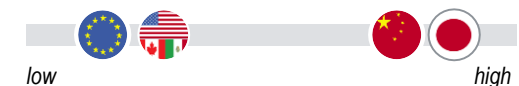
Adjustment of target clients

- > Assessment of opportunities with clients from other regions or with another brand image, e.g. mass-market OEMs
- > Phasing out of business with clients where projects regularly do not translate into sufficient margin levels



Adjustment regional presence

- > Alignment of footprint and regional client portfolio
- > Broadening of local presence as a consequence of COVID-19
- > Extension of low cost country activities to set the base for further growth outside the triad



Financial and operational performance remains a core criterion for suppliers to successfully manage the transition

Triple Transformation – Perform

Strategic tasks

Specific actions and recommendations

Regional relevance

Performance improvement

- > Operational performance improvement to increase manufacturing efficiency and reduce CAPEX throughout plants
- > Especially for Japanese suppliers, a reorientation from the known Kaizen concept towards innovation and the necessity of performance improvement is highly required
- > Stringent direct and indirect material cost reduction programs
- > Consistent streamlining of overhead structures



Restructuring of legacy business

- > Divestment of consistently underperforming products or business units through M&A or termination/out-phasing
- > Collaboration models with other suppliers to be assessed as option to resolve limited scale effects in underperforming areas



Adjustment of core-competencies

- > Active Make-or-Buy assessment for current product portfolio and current level of vertical integration
- > Identification of future core-competencies from an operational perspective and as basis for active CAPEX management



Adjustment of employee skill-sets

- > Match of employee skills with future R&D and future manufacturing requirements
- > Preparation for the 'war for talent' with well-known multi-national companies



Partnerships and decentralized structures will be key success factors in the upcoming years for automotive suppliers

Triple Transformation – Progress

Strategic tasks

Specific actions and recommendations

Regional relevance

Adjustment of business model

- > Re-thinking of current offerings and incorporation of especially service and engineering related elements to generate differentiation potential
- > Realization of potential outside of the traditional fields
- > Collaboration with players outside of the automotive industry



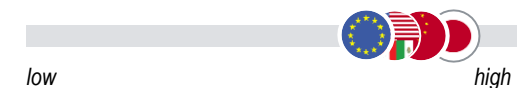
Adjustment of target operating model (robust organization)

- > Assurance that the overall organization and the governance reflect today's requirements in terms of agility and flexibility
- > Decentralization of decisions into the regions to ensure sufficient local independence within the new normal



Partnership/Collaboration with clients and suppliers

- > Consideration of new collaboration models, e.g. within R&D topics with the sole aim of sharing financial burdens
- > Consideration of minority IPO's as alternative to full divestments
- > Consideration of subsidiary IPO's to form consolidation platforms



Sustainability strategy

- > Implement supply chain traceability standards and ensure sustainable raw material sources
- > Re-thinking of brand positioning including social engagement to master the upcoming socio-economic challenges
- > Attracting of talent by state-of-the art diversity standards and a multi-cultural working environment



Contents



A The COVID-19 impact

COVID-19 hit the markets during an economic downturn and put suppliers under enormous pressure



B The Winners framework

2008/09 shows that an economic crisis can be a strategic chance to set the course for successful, profitable growth



C The next economic cycle

Lower vehicle sales in parallel with technological disruption will be the challenge for suppliers in the coming years



D The way forward

Opportunities for suppliers to course-correct strategies and ensure a sustainable future business model



E The contacts

Roland Berger Automotive team

Please contact us for further information

Your contacts



Alexander Brenner
Senior Partner
 Automotive Competence
 Center, Vehicle
 Downstream including
 Aftermarket



+49 40 37631-4318



alexander.brenner@rolandberger.com



www.rolandberger.com



Cristobal Colon
Partner
 Automotive
 Competence Center,
 Suppliers, Aftermarket



+34 685 495 902



cristobal.colon@rolandberger.com



www.rolandberger.com

Roland
Berger

