

# Global Automotive Supplier Study 2020

COVID-19 crisis as a window of  
opportunity?

LAZARD

Roland  
Berger



November 2020



# 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 and Lazard Automotive teams

# Executive Summary

- > Automotive **production volumes fell sharply in H1/2020** due to COVID-19, leading to unexpected **revenue declines of up to >25 percent at suppliers** in the first half of 2020 – China recovered relatively quickly from the COVID-19 shock but this could not compensate for the global volume losses
- > Though the revenue decline caused an **EBIT collapse throughout the industry**, suppliers still generated **positive EBIT margin of almost 2 percent** on average during the first six months of 2020 – As a consequence, **debt leverage levels rose to new highs**, making **access to debt and equity funding more difficult**, especially for smaller suppliers
- > The industry's path towards a **new mobility ecosystem is expected to remain intact**, with governmental efforts further accelerating the shift towards electrification and connectivity – **COVID-19 represents a window of opportunity** for many suppliers to reposition themselves and **emerge from the crisis as winners**
- > Analyzing the **development of suppliers** after the 2008/09 crisis, our 'Winners' framework shows that **success is not primarily determined by product domain or region** – A **holistic strategy**, comprising **market leadership, financial strength** and result-driven **execution** are the **overarching success factors**
- > To **be amongst the future winners**, shaping a successful business model and safeguarding financial flexibility for the new decade, suppliers need to **rethink, realign and potentially renew their business model**
  - In **traditional/shrinking areas**, suppliers have to stringently deploy intelligent harvesting strategies and consider **outphasing/exits more frequently than before**
  - In future growth areas, suppliers have to find **ways to fund investment requirements** – Tight access to equity and debt capital requires **alternative forms of funding**, e.g. through partnership approaches, spin-offs or IPOs/SPACs
  - **The traditional European supply base needs to close the gap on new technologies** compared to North America and China while managing the required restructuring of their legacy businesses in parallel – know-how transformation of their workforce as a key lever
  - **Japan-focused suppliers have to find a way out of** their comfort zone within the **Keiretsu structures** and further open up for international OEMs
  - While technology-focused **North American suppliers have to leverage their headstart in new technologies and digital business models**, **Chinese suppliers** have to **leverage** their **good positioning for electric mobility, and close gaps in other technologies**

# 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 and Lazard Automotive teams

# The COVID-19 impact – Key takeaways



- 📍 Suppliers experienced a drastic and unexpected **revenue decline of up to 25 percent or more** in the first half of 2020 – **Europe took the hardest hit**; China recovered surprisingly fast
- 📍 The revenue decline caused an **EBIT collapse throughout the industry** – immediate government emergency support programs helped to secure a slim, but **still positive EBIT margin of almost 2 percent** across the industry in the first six months
- 📍 **Process-focused suppliers were even more severely affected** than their innovation-focused peers – **scale economies-driven business models left little room to mitigate** the impact of the market collapse
- 📍 Adding to the financing requirements for the industry transformation, suppliers are facing a **serious increase of debt levels** from COVID-19 – **Securing future funding** from the equity as well as debt side **will become more challenging**, especially for smaller and mid-sized, weaker suppliers

# Despite recent signs of recovery, many suppliers announce major restructuring programs to adapt to lower industry demand

## Recent developments in the automotive industry H2/2020



### Automotive headlines

*"Spanish car plants busy again as COVID-19 eases in Europe"*  
WardsAuto – 09/20

*"Germany's car industry struggles with transformation amid coronavirus crisis"*  
Deutsche Welle – 09/20

*"Rebound in China car sales accelerates with pandemic easing"*  
Bloomberg – 09/20

*"Global carmakers bet on China's EV rebound"*  
Financial Times – 09/20

*"German truck maker to cut up to 9,500 jobs to become profitable"*  
Reuters – 09/20

*"China car sales go from strength to strength as virus eases"*  
Auto Finance News – 11/20

*"NEV firms to have more say in sector's future"*  
China Daily – 10/20

*"Car sales return to growth in July amid strong SUV demand"*  
Dow Jones Newswires – 08/20

*"U.S. auto sales pandemic recovery continues as Toyota decline slows"*  
ReutersNews – 08/20

*"New car sales rise in UK after coronavirus lockdown decline "*  
The Guardian – 08/20

*"Supplier better than expected – Signs for recovery in the automotive industry"*  
Dow Jones Newswires – 08/20

*"Brazil's auto output up 73% in July from June"*  
ReutersNews – 08/20

*"Supplier says worst of crisis has passed, but outlook is uncertain"*  
Dow Jones Newswires – 11/20

*"Automakers, suppliers firm up relationships through crisis"*  
Plastic News – 09/20

*"China car sales keep on trucking in pandemic recovery"*  
Wall Street Journal – 11/20

*"UK sales fall 6% in August in setback to virus rebound"*  
Automotive News Europe – 08/20

*"Large supplier deepens cuts with 30,000 jobs at risk"*  
Automotive News Europe – 09/20

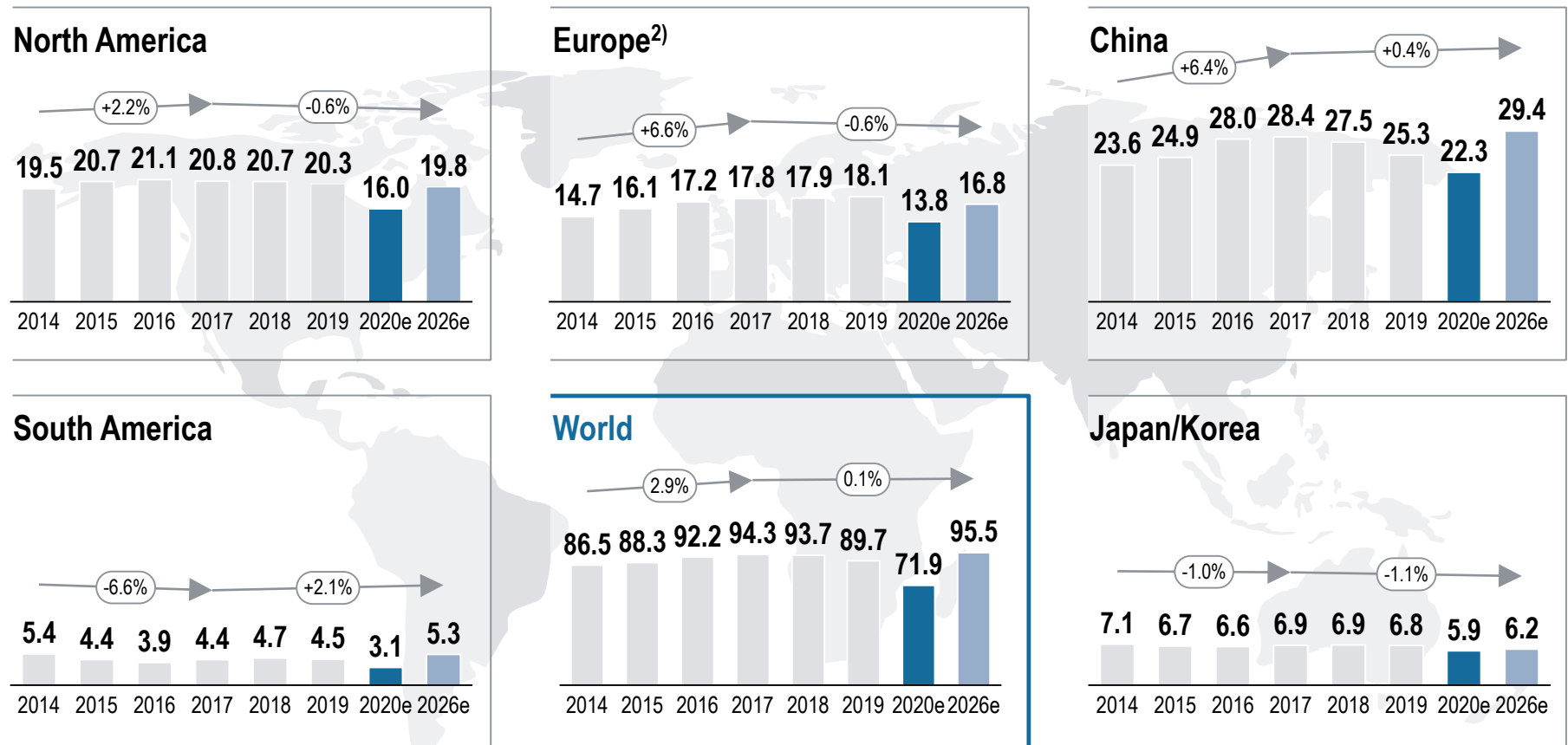
*"French car sales continue to bounce back in August"*  
ReutersNews – 08/20

*"Automotive production resurfaces after 15-month negative streak"*  
CE Noticias Financieras – 11/20

*"German car industry shows initial signs of recovery"*  
ReutersNews – 08/20

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

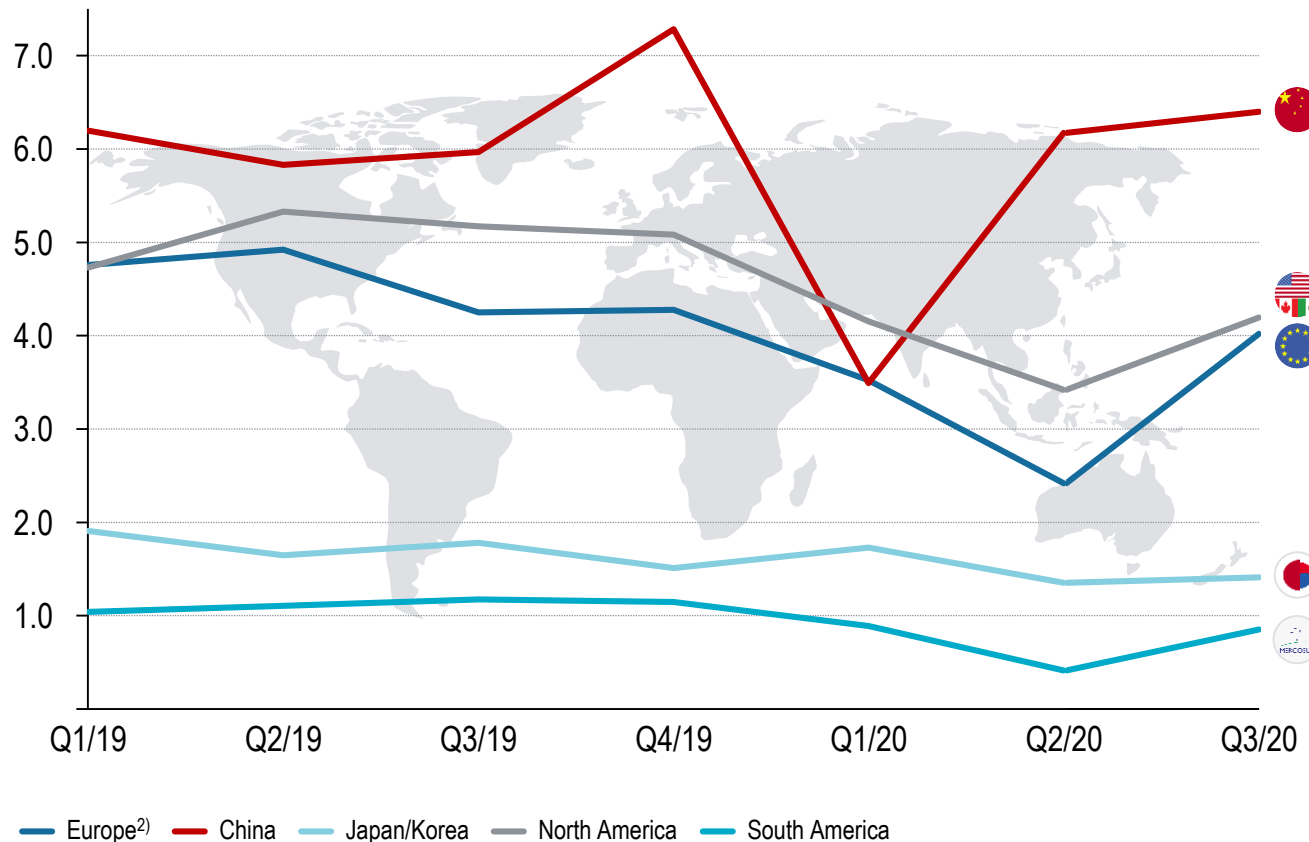
Global light vehicle sales volume<sup>1)</sup> by region, 2014-2020 and outlook 2026 [m units]



1) Incl. light commercial vehicles; 2) Excluding CIS and Turkey xx% = CAGR

# COVID-19 hit global automotive markets in 2020 with massive sales declines – China surprises with recovery compared to Q2/2019

Global light vehicle sales volume<sup>1)</sup> by region 2019/20 [m units]



- > Despite a steep decrease in vehicle sales from Q4/2019 to Q1/2020, **China quickly recovered** from the COVID-19 shock – Volumes Q2/Q3 back at 2019 levels
- > Vehicle sales in **North America** were continuously **decreasing** in H1/2020 – first **recovery in Q3/2020**
- > **Decline of sales volumes in Europe<sup>2)</sup>** comparable to North America – Signs of **(slow) recovery**
- > **Japan and South America** showed a **weaker impact of the COVID-19 shock**, but dealing anyway with a longer lasting downturn
- > Potential further **COVID-19 waves/lockdowns determine future market recovery**

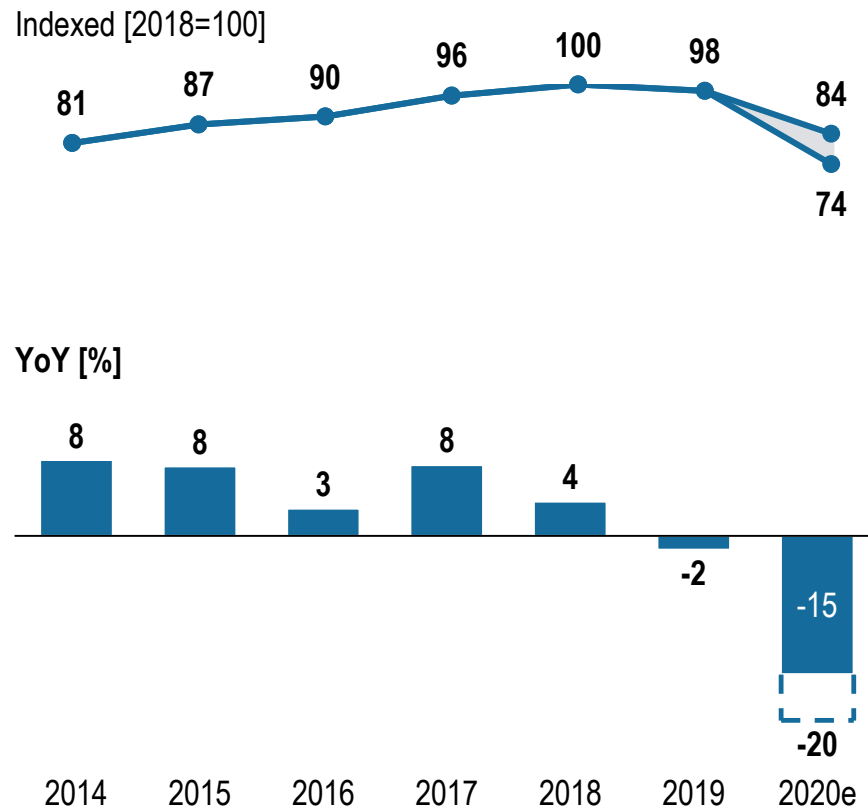
1) Incl. light commercial vehicles; 2) Excluding CIS and Turkey



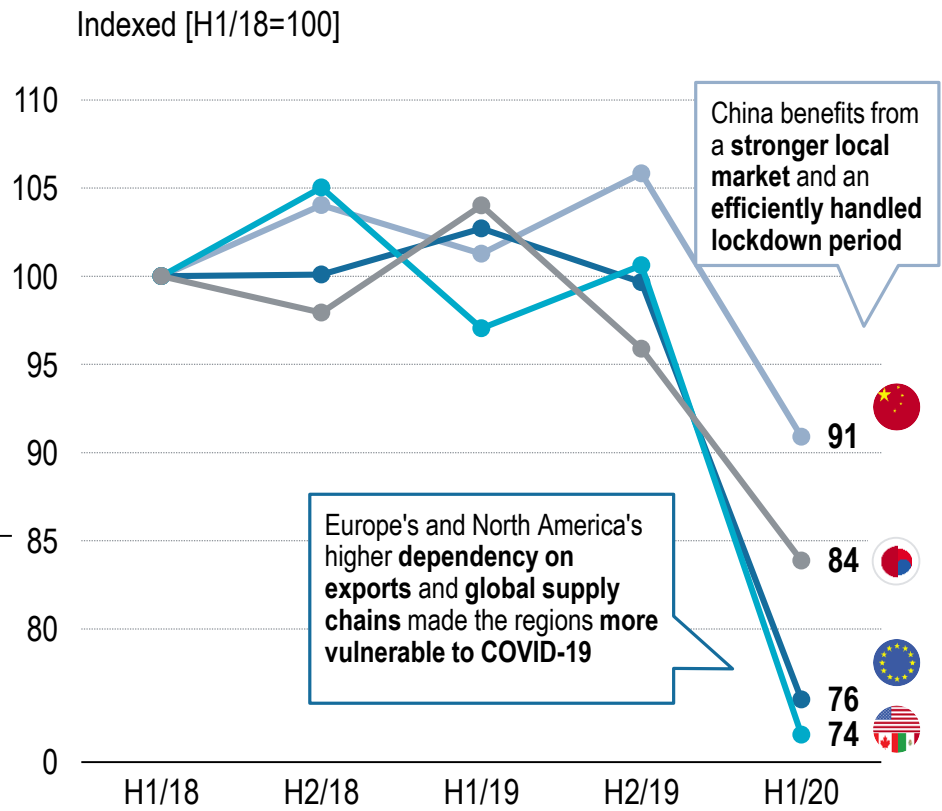
# Globally, suppliers are expected to face a sales slump between -15% to -20% in 2020 – Regional COVID-19 impact differs significantly

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

## Revenue development globally



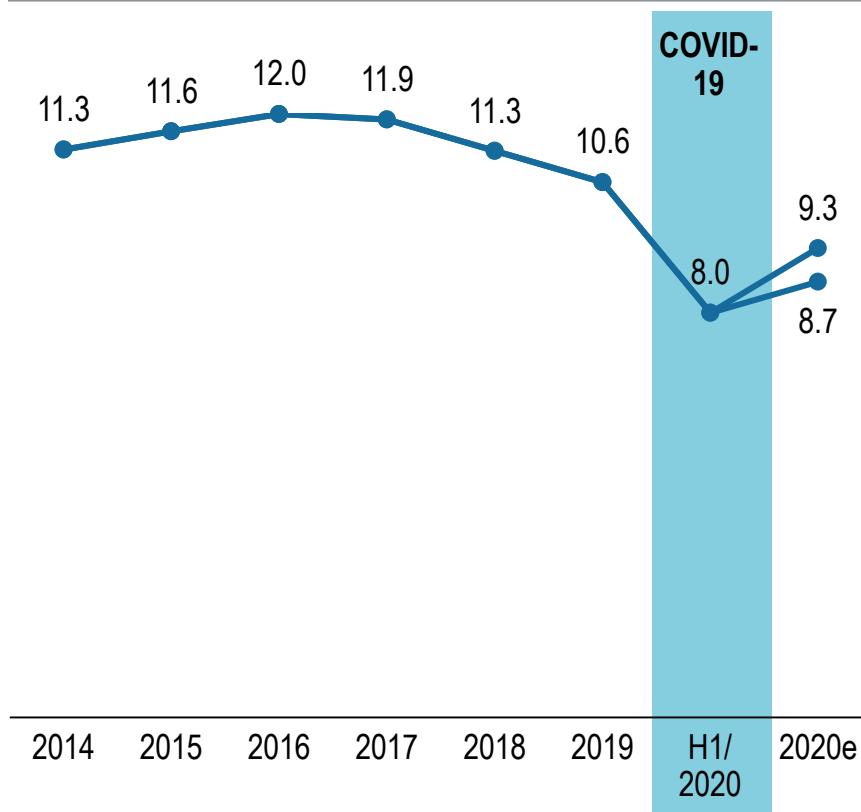
## Revenue development by region H1/18 – H1/20



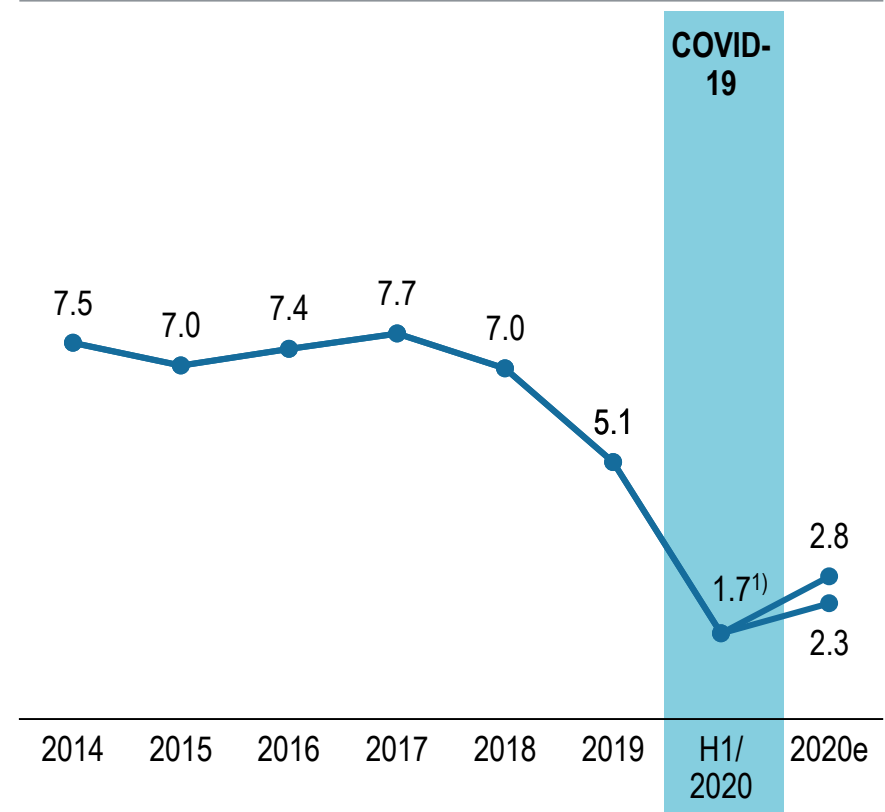
# COVID-19 brought supplier average margin performance to a new low

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**



- > 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

- > 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**

- > 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%

- > 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



- > 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

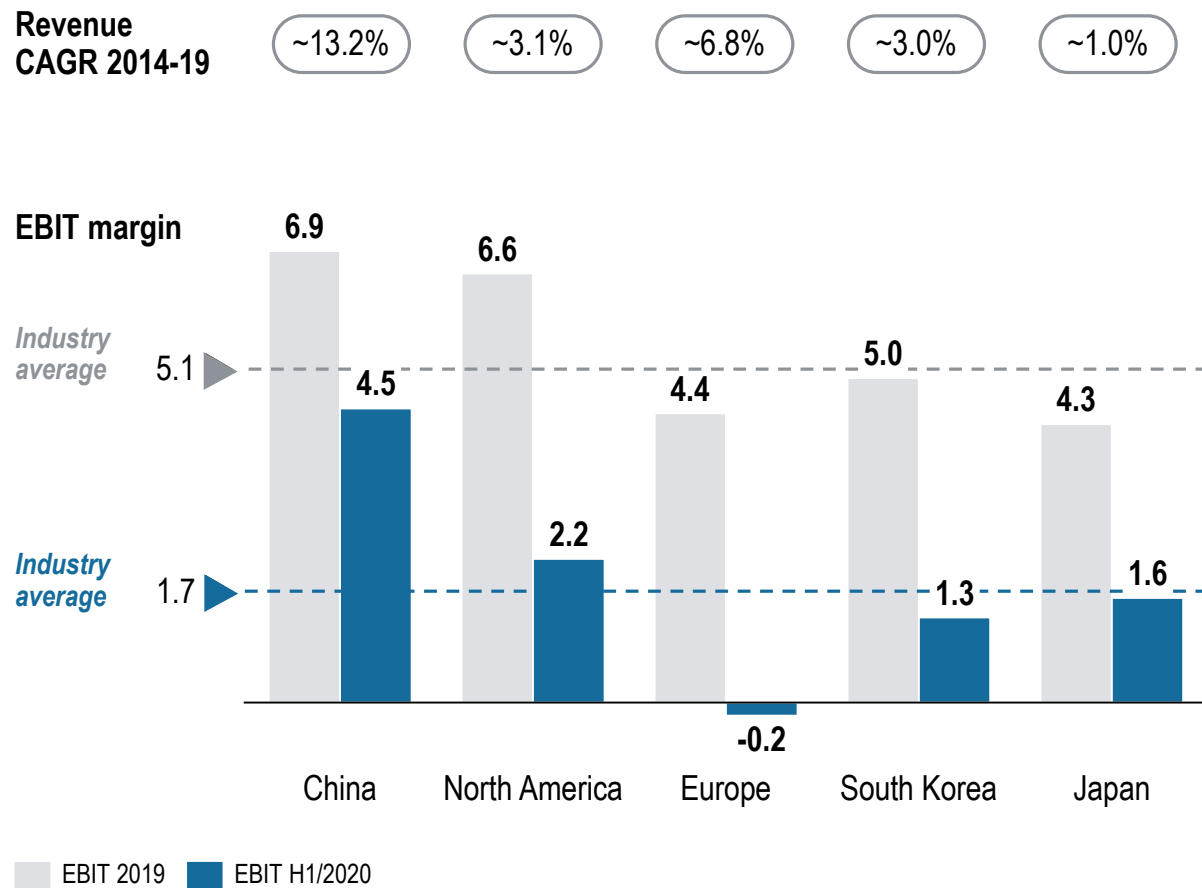
- > In 2019, **companies with less than EUR 0.5 bn in revenues were least profitable** with 3.7% EBIT margin
- > In H1/2020, **large companies** with revenues greater than EUR 10 bn were **least profitable** with only 1.2% EBIT margin, given higher restructuring costs and impairments

- > 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

- > 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 [%]

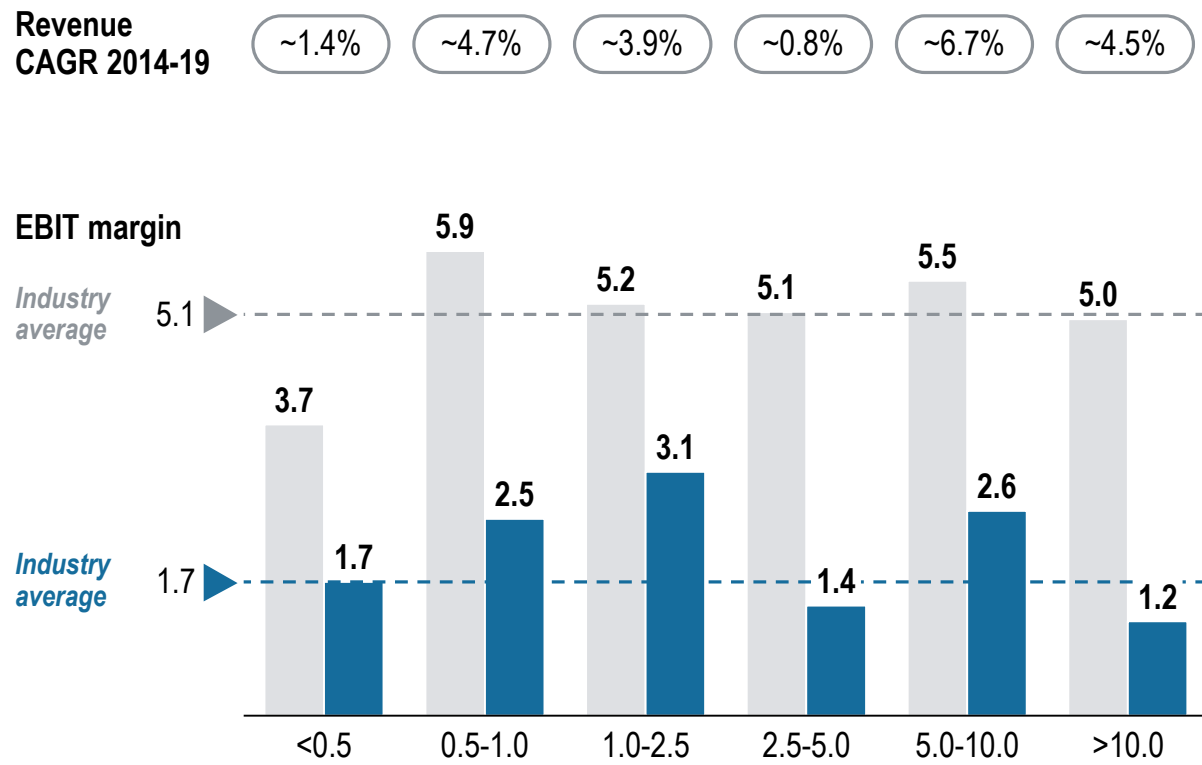


- > **China-based suppliers defended their above-average margins**; COVID-19 lockdown during the Chinese New Year and the comparably **quick post-lockdown recovery** led to significantly **higher H1 results** compared to other regions
- > **North America-based suppliers suffered in H1/2020** due to their 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

Note: H1/2020 EBIT values adjusted

# 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 size<sup>1)</sup> 2019 and H1/2020 [%]



- > **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

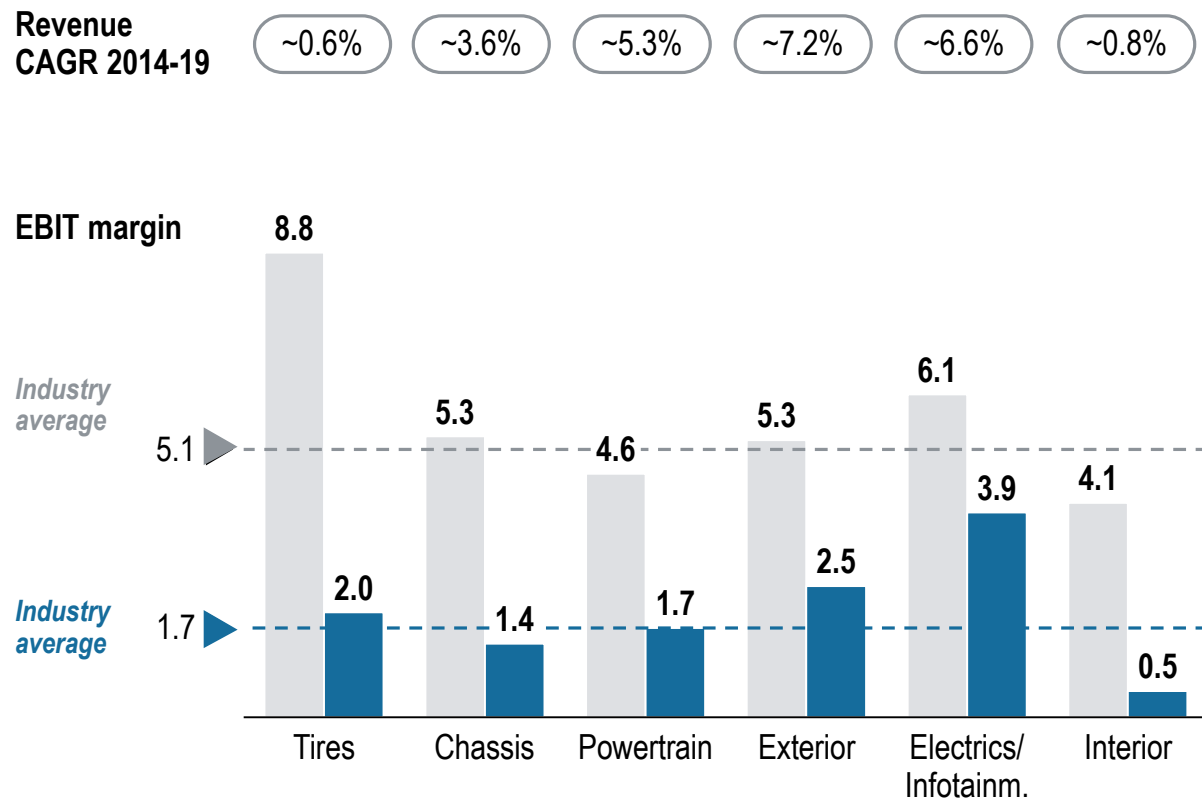
Legend: ■ EBIT 2019 ■ EBIT H1/2020

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 [%]



- > **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

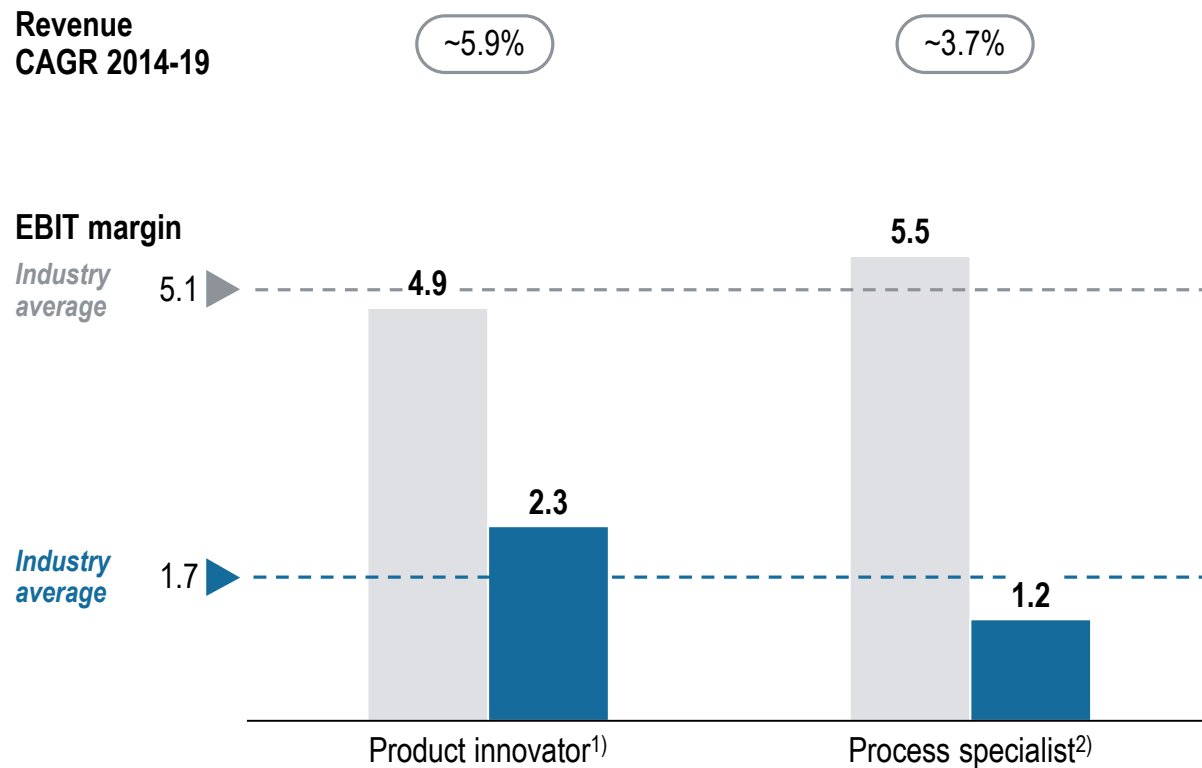
Legend: ■ EBIT 2019 ■ EBIT H1/2020

Note: H1/2020 EBIT values adjusted

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

# In 2019, for the first time process specialists could realize higher margins than product innovators – Picture changed again 2020

## Key supplier performance indicators by business model 2019 [%]



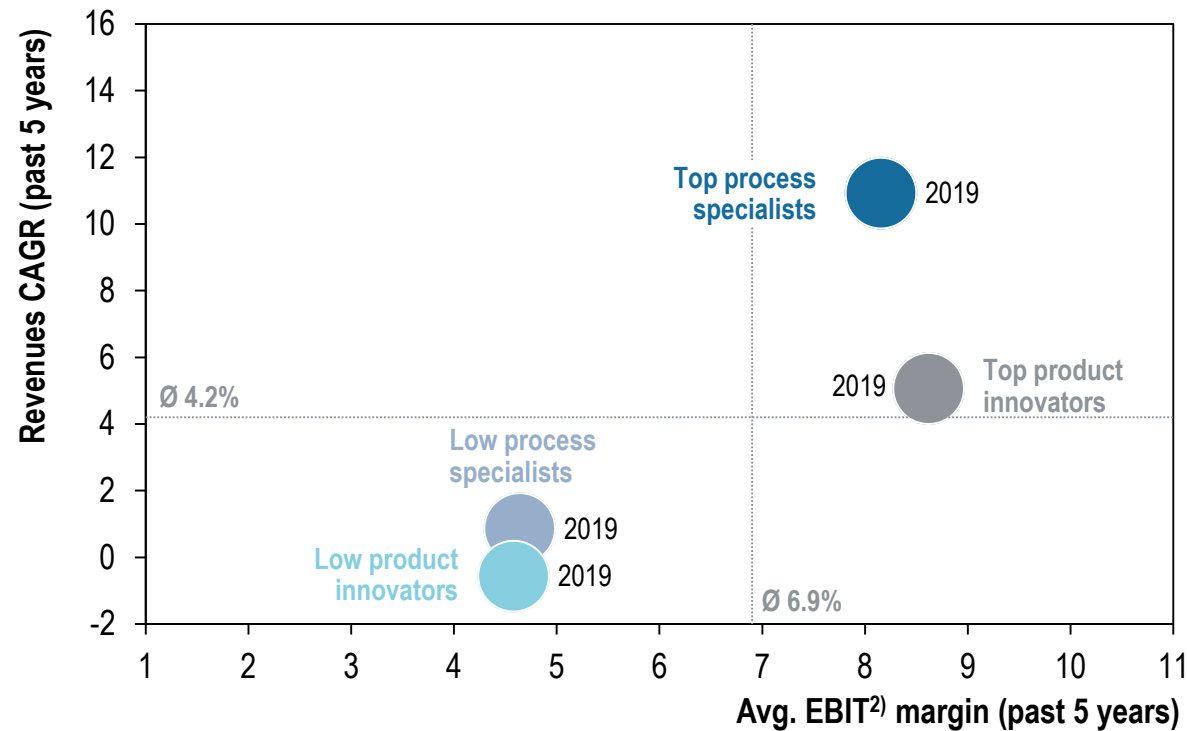
- > While historically product innovator margins exceeded those of process specialists, **in 2019 process specialists achieved higher margins** for the first time
- > As the overall **market slows down, high investments** are affecting the bottom line of **product innovators** – Product innovators have on average invested roughly **three times as much in R&D** compared to process specialists in the past decade
- > However, H1/2020 has shown that the **missing scale in a drastic market downturn** affects **process specialists** more than product innovators, as the **specialist model** requires the leverage of **high volumes** to utilize capacities
- > In addition, the **majority of large restructuring cases** in H1/2020 **affects process specialists**

Legend: ■ EBIT 2019 ■ EBIT H1/2020 ■ Industry average (grey), ■ Industry average (blue)

Note: Analysis excludes tire suppliers.  
 Note: H1/2020 EBIT values adjusted 1) Business model based on innovative products with differentiation potential  
 2) Business model based on process expertise (while product differentiation potential is limited)  
 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 suppliers<sup>1)</sup>



- > **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

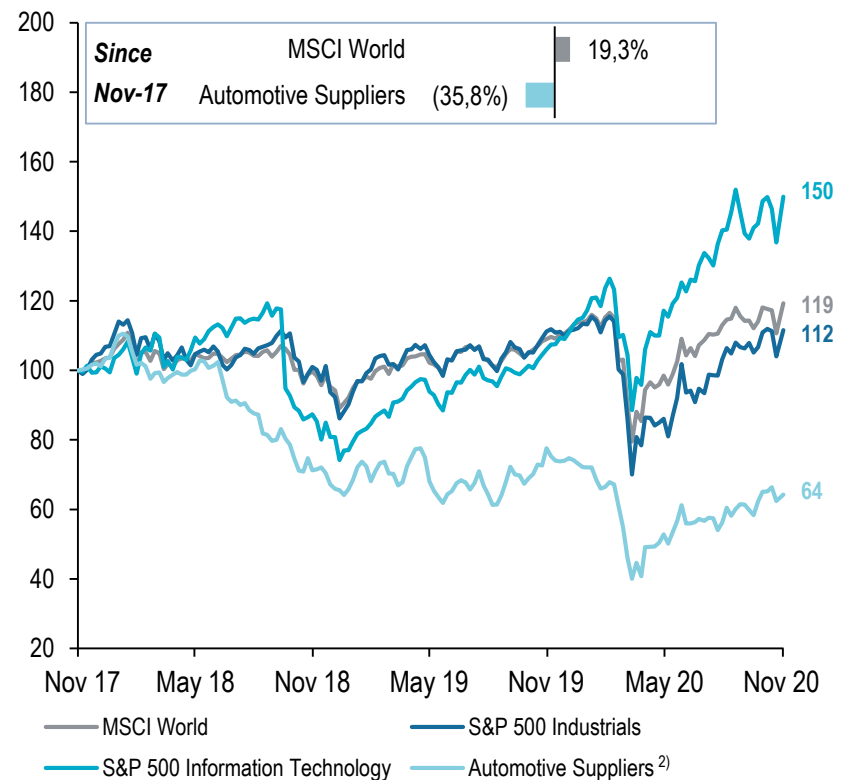
1) Top (low) performance based on above-average (below-average) revenue growth 2014–2019, ROCE 2014–2019 and ROCE 2019; 2) EBIT after restructuring items



# The automotive sector has lost ground versus other industries, making access to capital more challenging and costly

## Overview of market dynamics

Market Cap (index 100)



EV / EBITDA NTM<sup>1)</sup>

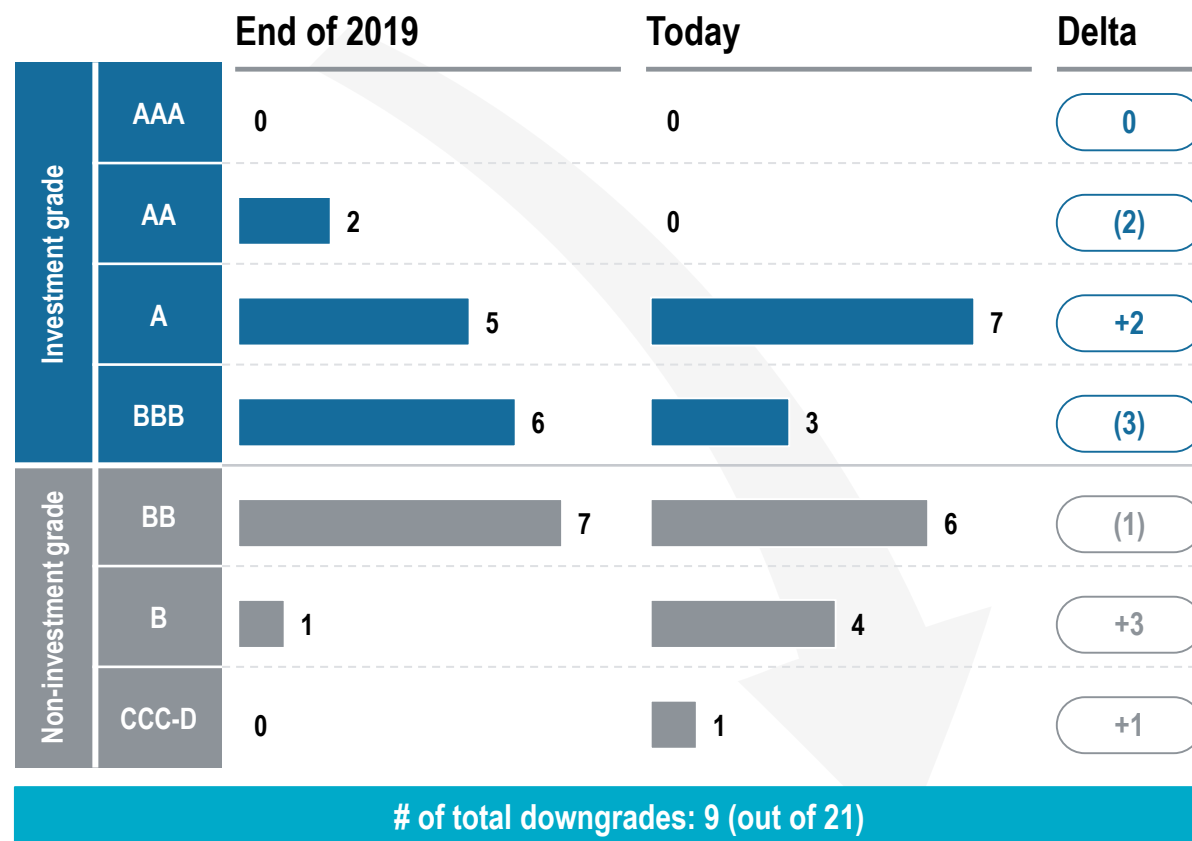


1) NTM = Next twelve months; 2) Selection: American Axle, Autoliv, BorgWarner, Brembo, Continental, Dana, Denso, Faurecia, Gentex, Hella, Leoni, Magna, Schaeffler, Tenneco, Valeo and Visteon

Source: Company information, Roland Berger/Lazard, FactSet, Bloomberg

# COVID-19 has caused rating agencies to downgrade many suppliers, making access to debt capital more expensive

## Impact on ratings of automotive suppliers<sup>1)</sup>



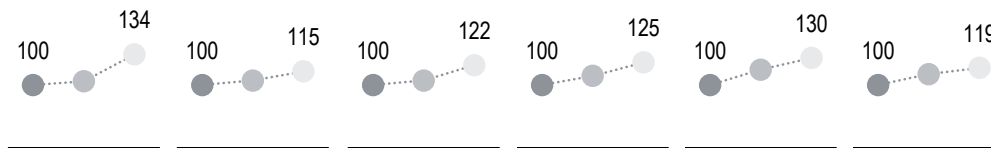
- > From a refinancing perspective, automotive suppliers suffer in comparison to other industries as **equity stories become less attractive for external investors**
- > **Ratings of automotive suppliers are starting to be impacted**, reflecting below-average development of market capitalization, increasing debt leverages and declining margin levels
- > This **development is critical for automotive suppliers**, as capital requirements in the future to finance MADE changes and deal with socioeconomic trends like deglobalizing supply chains remain high

1) Ratings based on Standard & Poor's for the following set of suppliers: AAM, Aisin, Autoliv, BorgWarner, Bosch, Bridgestone, Continental, Cummins, Dana, Denso, Faurecia, Garrett Motion, Gestamp, Goodyear, Grupo Antolin, Magna, Michelin, Schaeffler, Tenneco, Valeo, ZF

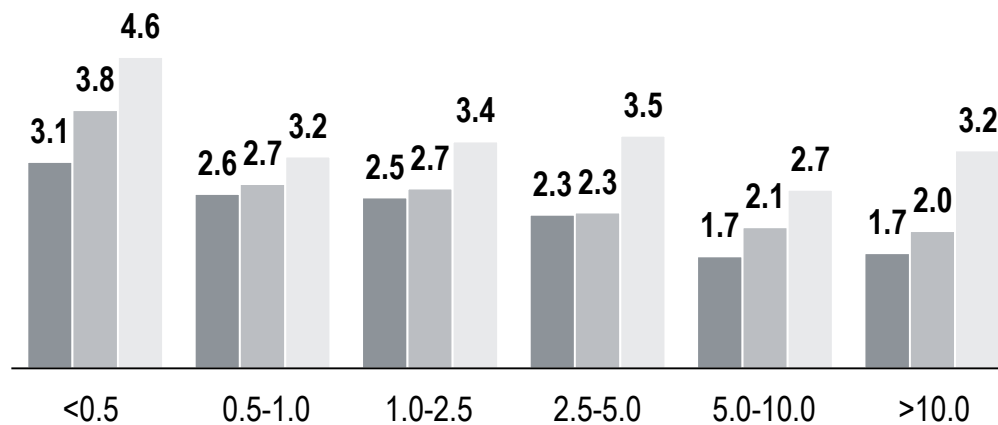
# Net debt levels and leverage ratios have substantially increased, making future funding capabilities a priority for all suppliers

Leverage<sup>1)</sup> of suppliers by company size (EUR bn sales) H1/2020 [%]

Actual net debt (index 100)



Leverage



■ 2018 ■ 2019 ■ 2020e<sup>2)</sup>

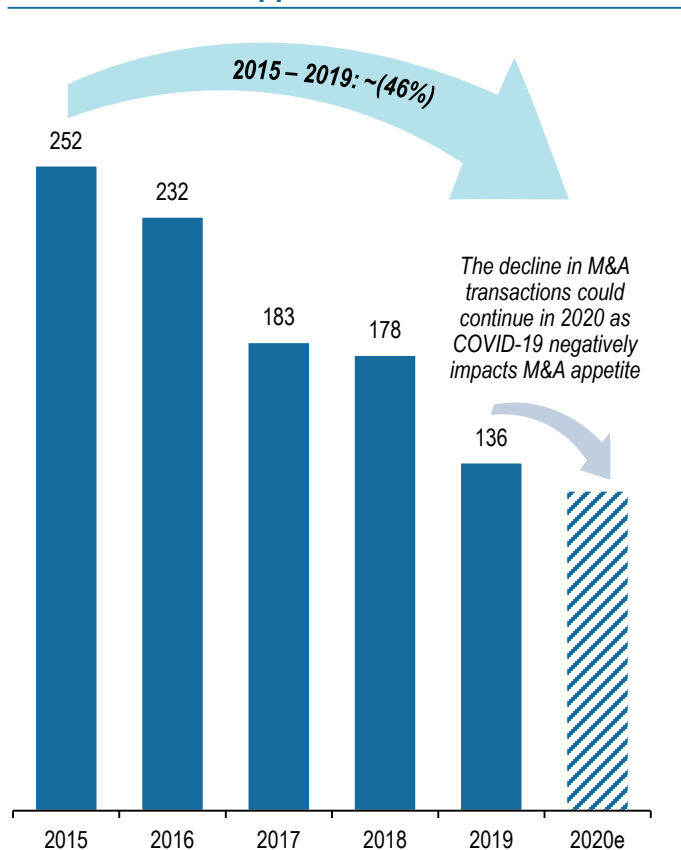
1) Net debt in relation to EBITDA; 2) Based on H1/2020 net debt excluding pensions and FY 2020 EBITDA forecast

- > **Increasing net debt ratios** are driven by **declining business volumes** since 2018 and **upfront investments** required for the **industry transformation**
- > Also, substantial increase in 2020 was driven by **collapsing EBITDA levels**
- > The leverage in the whole supplier industry has reached an unhealthy level, even if stronger markets and some normalization of working capital levels may partially resolve the problem in the future
- > **Many small suppliers** with revenues below EUR 0.5 bn face high debt levels, however, COVID-19 induced increases are in line with the market when compared to the starting base

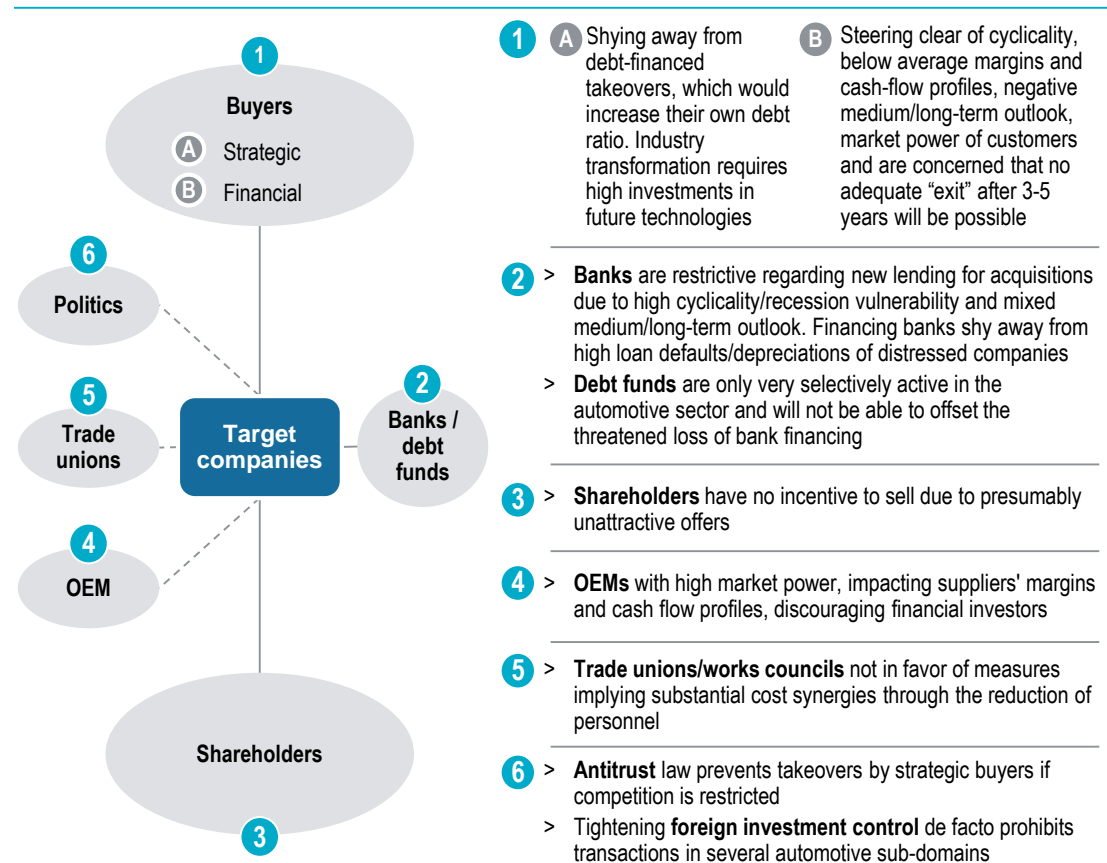
# Necessary consolidation of the industry has slowed down substantially for numerous reasons

## Overview of supplier M&A activity

# of automotive supplier M&A transactions



Involved "stakeholders"



Note: Transactions considered: announced/completed, >75% stake, automotive suppliers, worldwide

# 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 and Lazard Automotive teams

# The Winners framework – Key takeaways



- While the last global crisis in 2008/2009 marked the starting point of a long **period of profitable growth** for the supplier industry overall, **some companies capitalized on it far more than others**
- Despite conventional wisdom, a certain **product or regional focus neither a guarantee of success** nor a shortcoming for suppliers
- Successful suppliers** differentiate from their peers through **four clear patterns** – business leadership, strategic coherence, financial position and the ability to execute
- By succeeding at those patterns, the winners among the supplier universe **grew 5x times faster** and generated almost **3x times higher shareholder returns** over the past decade than the average of the industry

# 2008/09 was a historic crisis for the automotive industry, but markets recovered quickly into one of the most successful periods of growth

## Recap of the automotive crisis 2008/2009

"Motor City: From Motown to no-hope town" – Independent – 11/08

"Worst Crisis since World War II: German Auto Industry Facing the Abyss" – Spiegel Online – 11/08

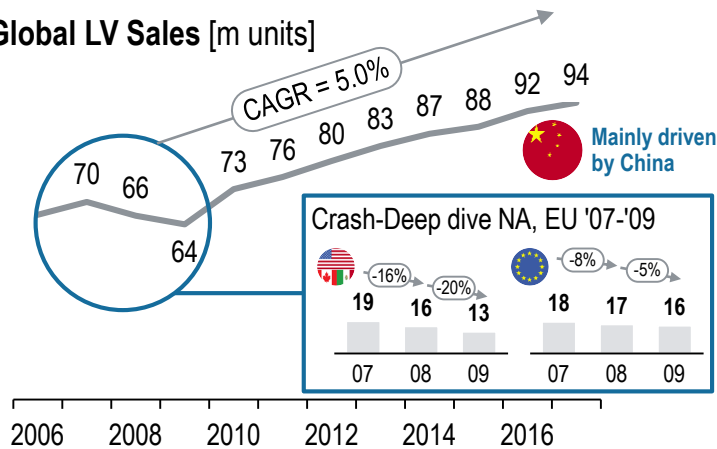
"Auto industry in crisis" – Reuters – 05/09

"Financial Aid for Ailing Firms: List of German Companies Needing Help Grows Longer" – Spiegel Online – 04/09

### Challenges in the last crisis

- > **Strong volume decline** in all regions except China in short period of time – Strongest hit were **North America and Europe**
- > **Banking crisis** led to liquidity shortage from banking institutions – **OEMs and suppliers** most hit by the declining markets experienced **severe cash shortages**
- > **OEMs and suppliers** were required to act fast and **adjust their cost structures** – Restructuring was the focus of the years following the crash

### Global LV Sales [m units]



### Path to recovery

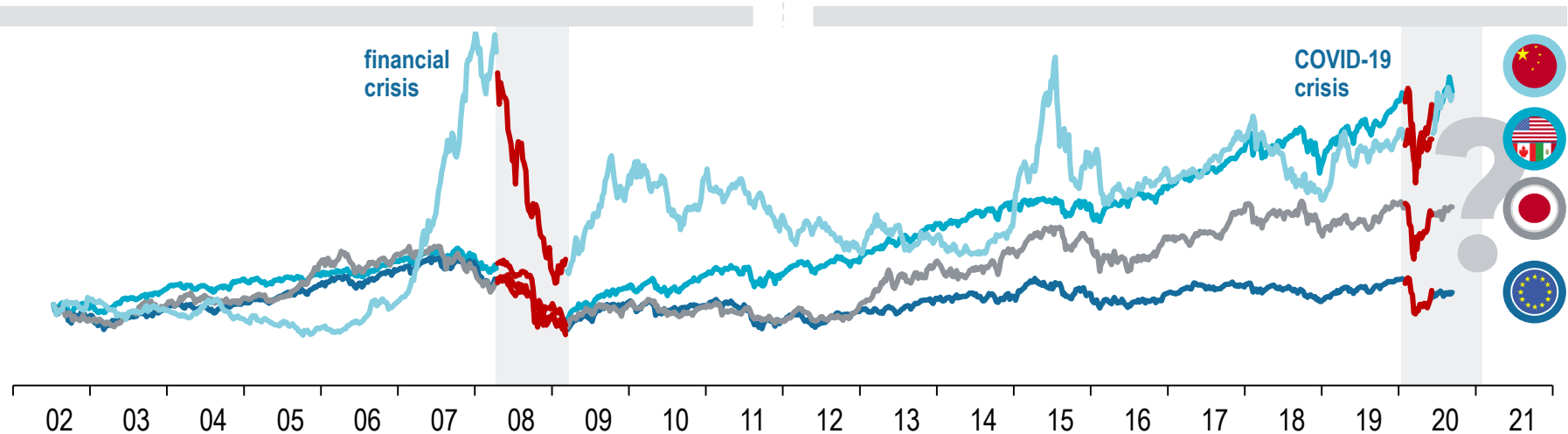
- > **Full recovery** of the global light vehicle volumes achieved already one year later in **2010**
- > Average growth between 2009-2017 of 5.0% p.a. followed the crash – One of the **most successful periods** in automotive history, **first of all driven by the Chinese market**
- > **Europe and North America itself had a longer recovery period** but Western suppliers often benefitted from the success of their key OEM clients in the Chinese market

# In contrast to 2008/09, the impact of the COVID-19 crisis on the markets and the speed of recovery is expected to be different

## Stock indices<sup>1)</sup> and impact of the crisis

- > **Financial crisis** as starting point, spillover on real economy
- > **Trust based crisis** with widespread fear of bank insolvencies and money shortages
- > **Trust came back** relatively fast through **large-scale rescue packages** and economic recovery
- > **Loss of reputation** of banking institutions and finance industry employees but meltdown of financial system avoided
- > Structural **growth post crisis** not questioned

- > **Pandemic**, affecting the real economy in all regions worldwide
- > Holistic government support packages, but **uneven recovery paths across regions**
- > **Physical jeopardy**, quarantine regulations, entry bans and border closures, **no countermeasures available yet**
- > **Unclear balance** of health protection measures and actions to stimulate the economy
- > Impact of **potential further COVID-19 waves/lockdowns** and timing of benefits from vaccine still unclear
- > Question marks about **mid-/long-term structural car production growth** (sharing mobility) and future profit pools



1) S&P500 as proxy for North America, Euro Stoxx 50 for Europe, Nikkei for Japan, CSI 300 for China; Weekly closing prices taken from Bloomberg as of Sept. 16, 2020, indexed at 100 on 07/2002



# We have analyzed automotive suppliers with respect to their past financial and shareholder value performance to find "best practices"

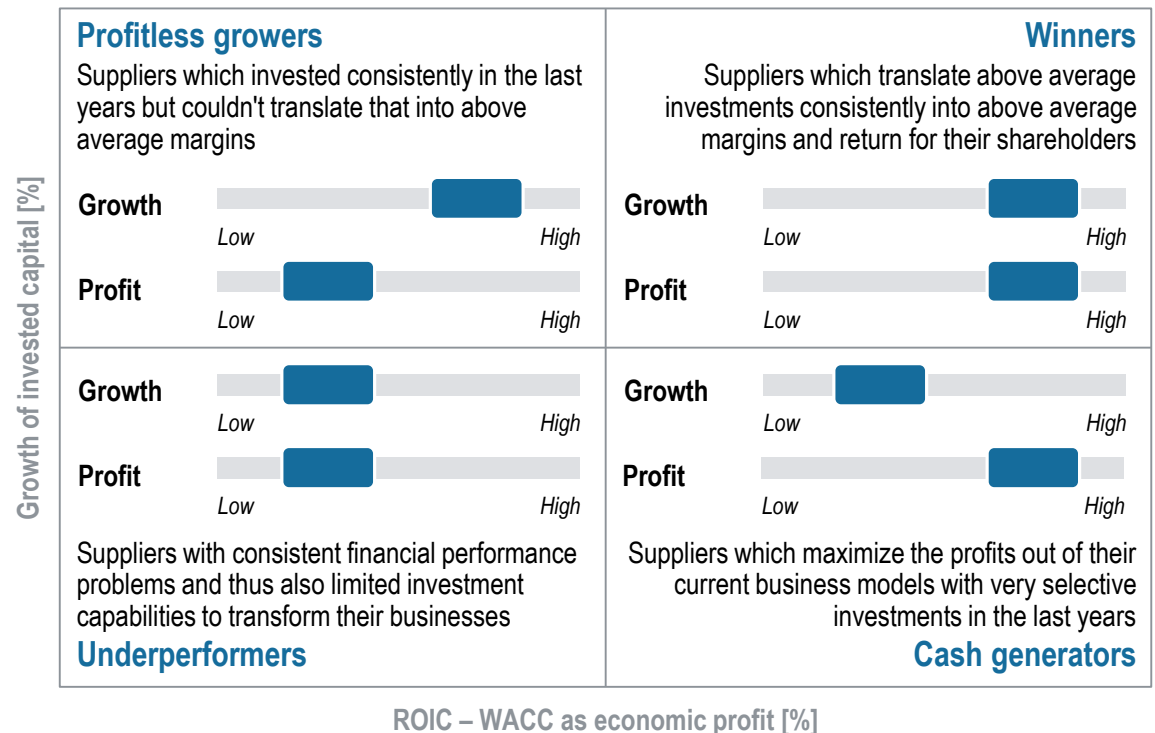
## Winners methodology – Financial performance assessment

### Input parameters



- > Financial data from **>300 suppliers across all major automotive regions** from 2009-2019
- > As analysis-KPI's, **Invested Capital<sup>1)</sup>**, **Return on invested capital (ROIC<sup>2)</sup>** and **Weighted cost of capital (WACC<sup>3)</sup>** for each supplier have been used
- > The combination of the KPI's allows to **tie strategic decisions** (Invested Capital<sup>1)</sup>) to the **financial and shareholder value performance** (ROIC<sup>2)/WACC<sup>3)</sup>) of the suppliers over the last 10 years</sup>
- > To understand product related correlations, all suppliers have been **labeled with their main product segment** (Tires, Chassis, Powertrain, Exterior, Electronics/Infotainment, Interior)

### Analysis scheme<sup>4)</sup>



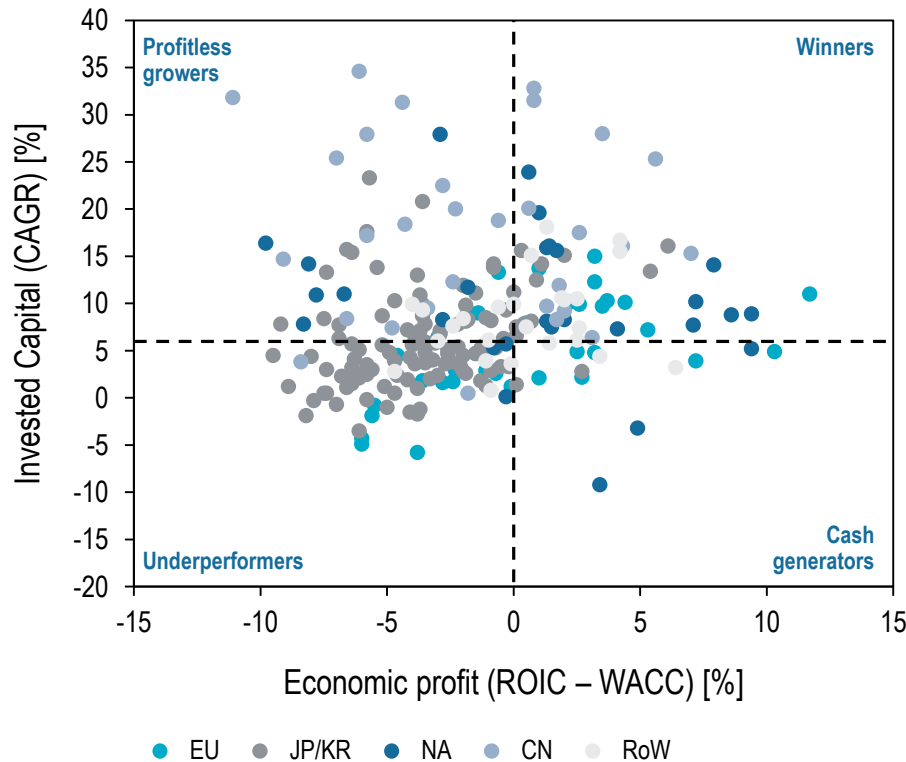
1) Invested capital = total debt + total equity 2) ROIC = Net operating profit after tax / invested capital 3) Weighted average cost of equity and after-tax cost of debt

4) Growth = CAGR of Invested Capital; Profit = ROIC – WACC (economic profit)

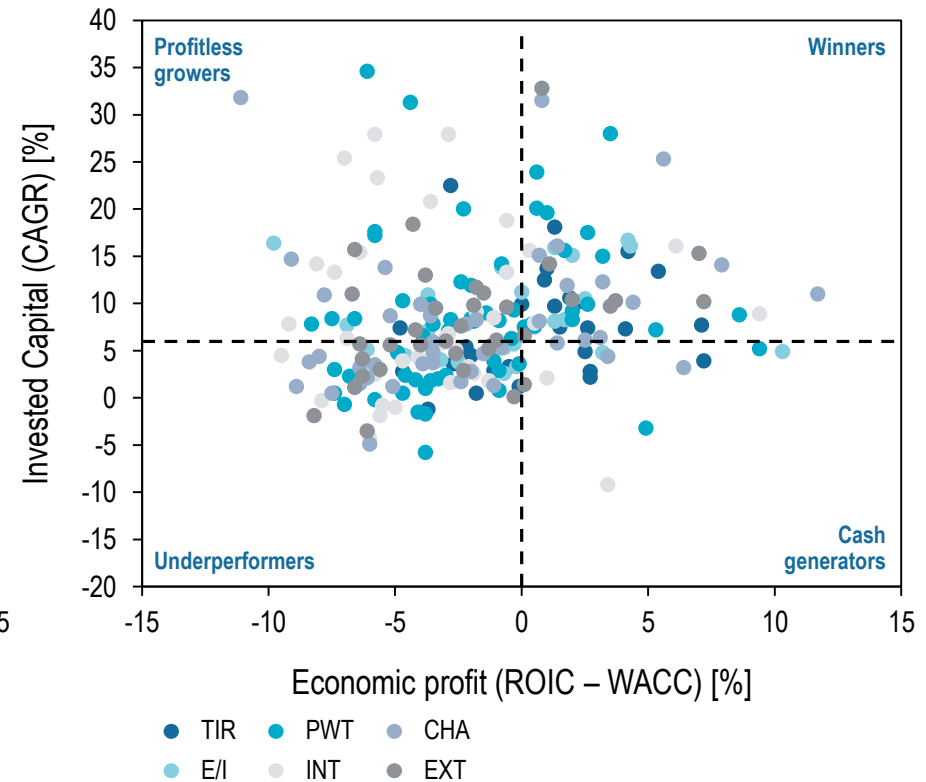
There are winners from all product domains and regions represented  
 – Only Japanese suppliers show a weaker performance in general

Financial performance matrix [2009–2019]

Clustered by region



Clustered by product segment



Note: TIR = Tires E/I = Electronics/Infotainment PWT = Powertrain INT = Interior CHA = Chassis EXT = Exterior Ø = Sample average (X-axis/Y-axis)

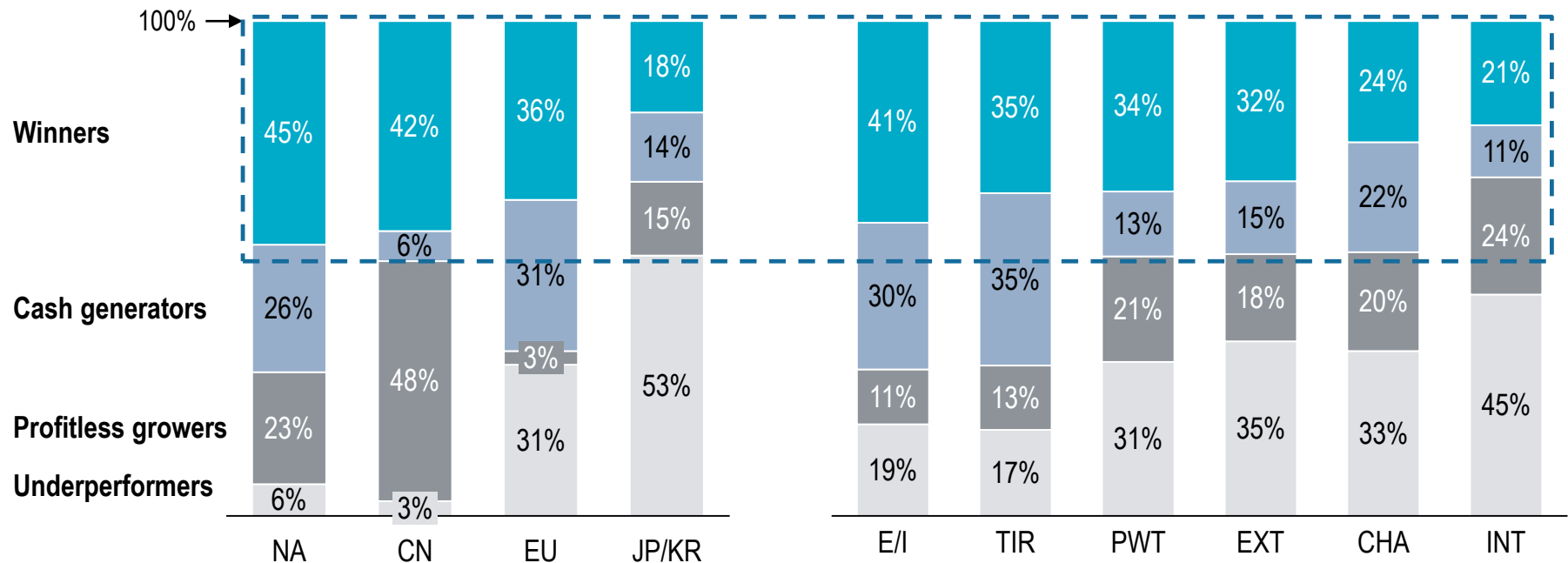
Source: CapIQ, Roland Berger/Lazard

# Chinese and North American suppliers outperformed their peers but winners or cash-generators can come from all regions and domains

Financial performance per region and segment [2009–2019]

Clustered by region 

Clustered by product segment 



Note: TIR = Tires E/I = Electronics/Infotainment PWT = Powertrain INT = Interior CHA = Chassis EXT = Exterior

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

## Shared characteristics of Winners



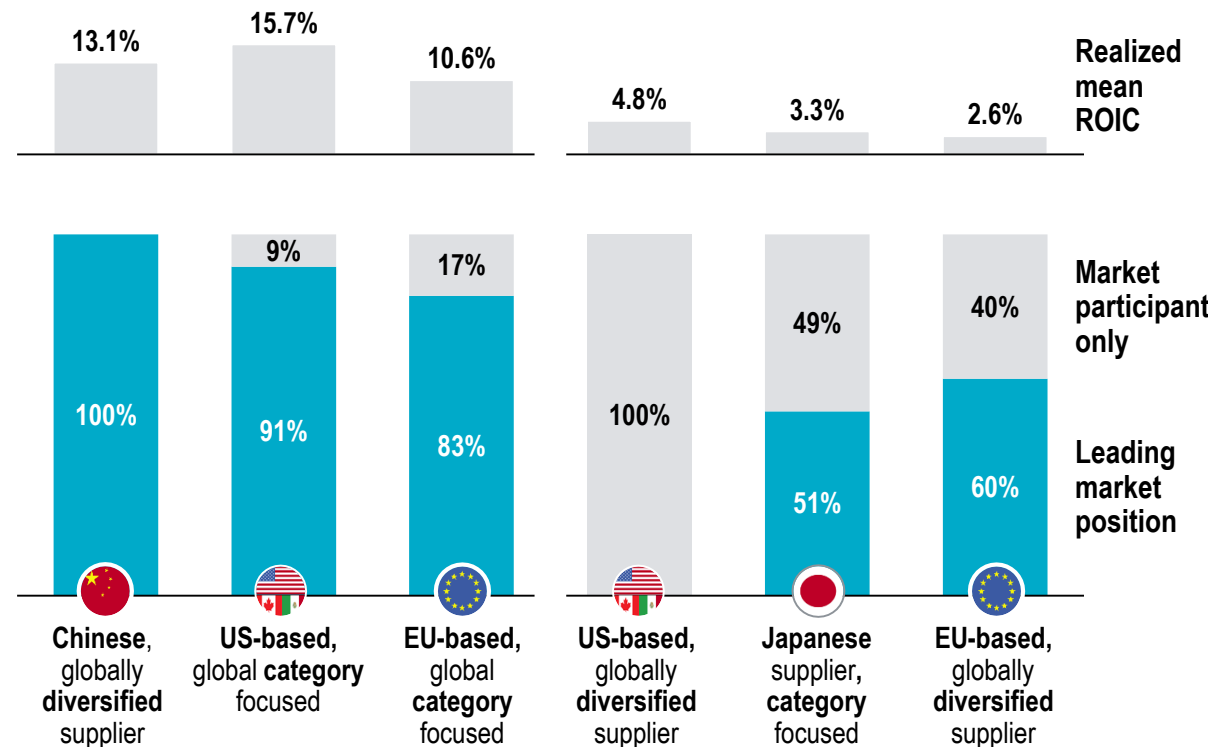
# A leading market position per product leads to higher total shareholder return and capital growth, indicating business leadership

Performance based on revenue per product group [exemplary suppliers]

## Winners



## Underperformers



- > 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

■ Share of revenue from segments with **market leadership** position    ■ Share of revenue from segments **without leading position**

# 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

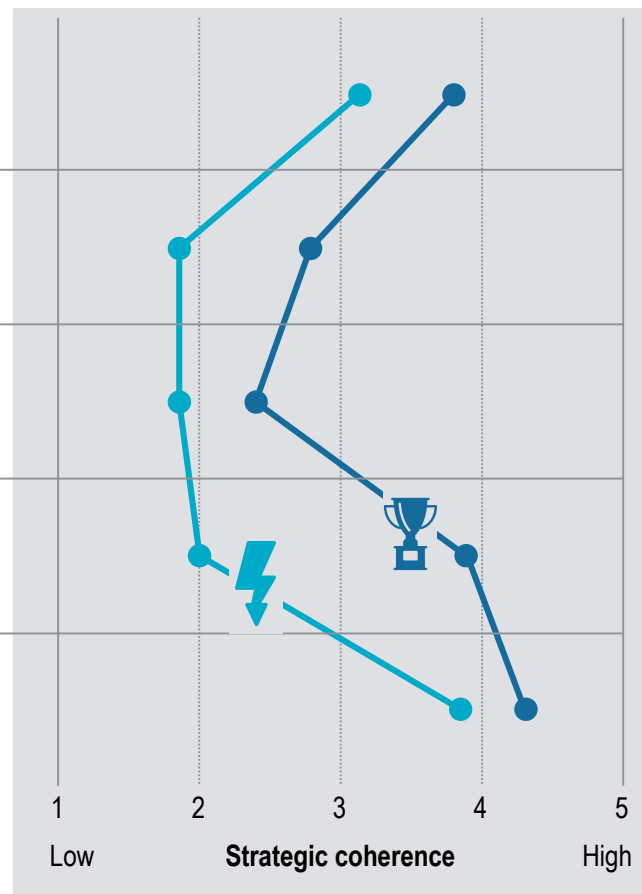
### Management tenure

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

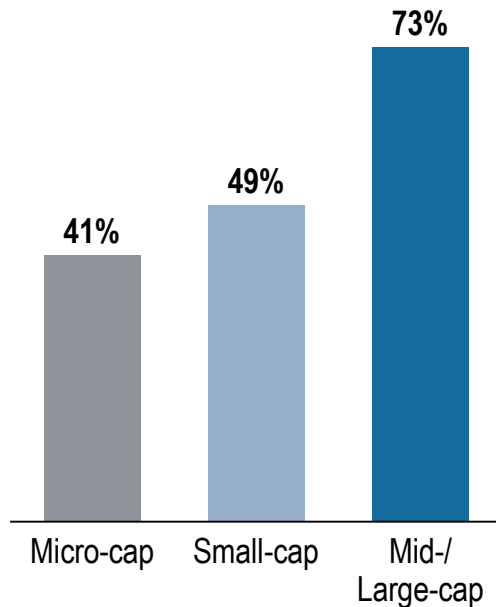


- > We evaluated **strategic coherence** along **five specific criteria** reflecting the mid- to long-term of a company's agenda
- > A **higher M&A activity** indicates a more actively engaged **portfolio management**
- > Winners **invest consistently more in R&D**, indicating the ambition to **retain 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

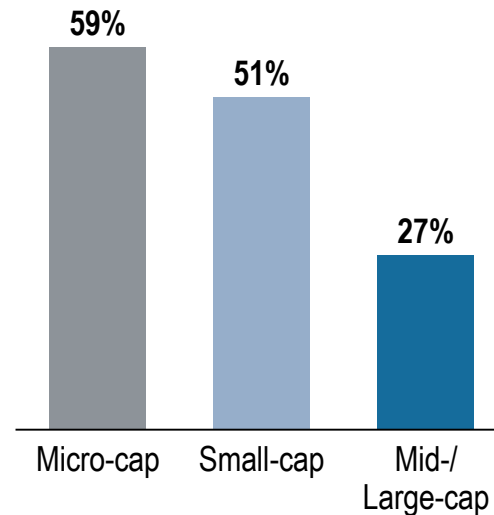
# With increasing size, suppliers demonstrate an ability to leverage their balance sheet and scale to achieve higher shareholder returns

Distribution of suppliers by market capitalization<sup>1)</sup>

## Winners and Cash generators



## Profitless growers and Underperformers



- > Historically (1.5x – 2.4x), as well as during the COVID-19 crisis (3.2x – 3.5x), the **net debt leverage of large- and Mid-cap suppliers is lower than in smaller companies**, especially than in Micro-Caps where the leverage is currently 4.6x as per H1/2020
- > Also, **Large- and Mid-cap suppliers very often have a lower WACC** and thus a **lower financing risk for investors**
- > Both aspects are leading to **better access to capital** and better financing conditions for these companies
- > In consequence, **suppliers with large market capitalization can translate their system relevance into higher investor returns** and realize more opportunities for future growth

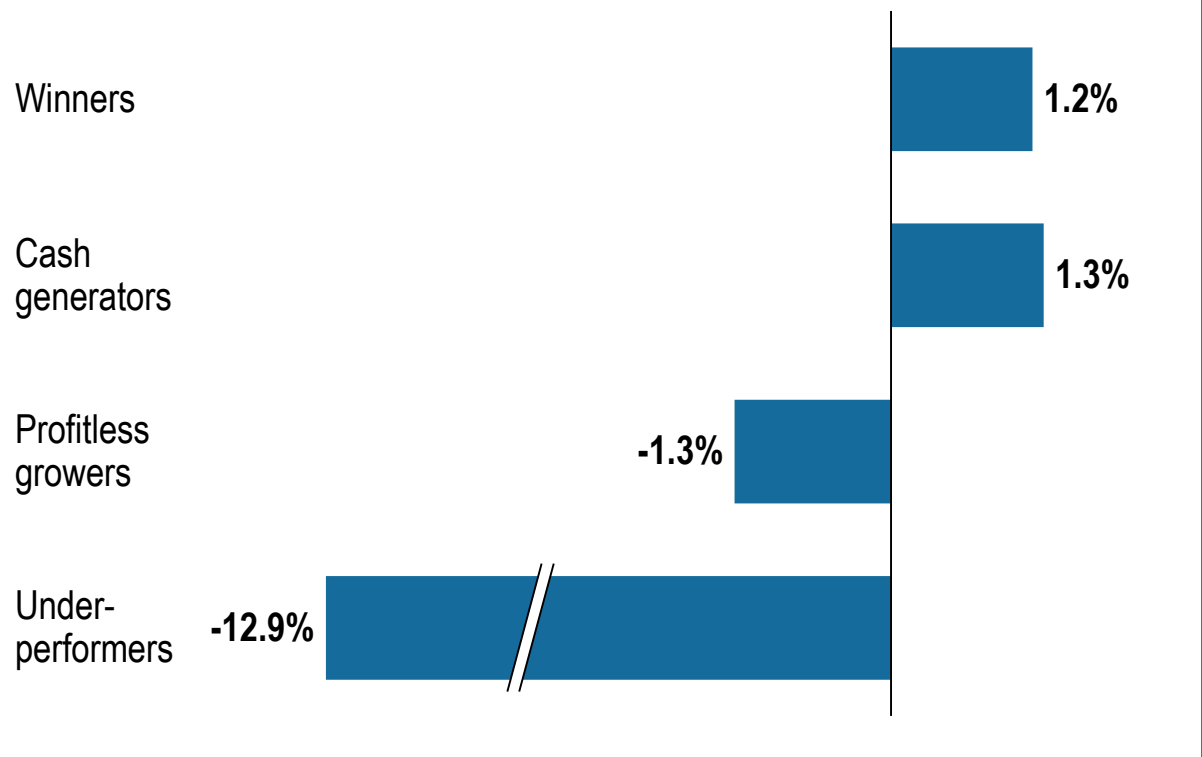
Large-cap: >USD 10 bn; Mid-cap: USD 2.5-10 bn; Small cap: USD 0.3-2.5 bn; Micro-cap: <USD 0.3 bn

1) Based on 2010 total capitalization: Public firms = (Market value of equity) + (Market value of debt); Private firms = (Book value of equity) + (Debt)

# Winners demonstrate their 'ability to execute' by consistently overperforming on investor expectations

Performance analysis 2009-2019

Median average difference between actual earnings and consensus estimate<sup>1)</sup>



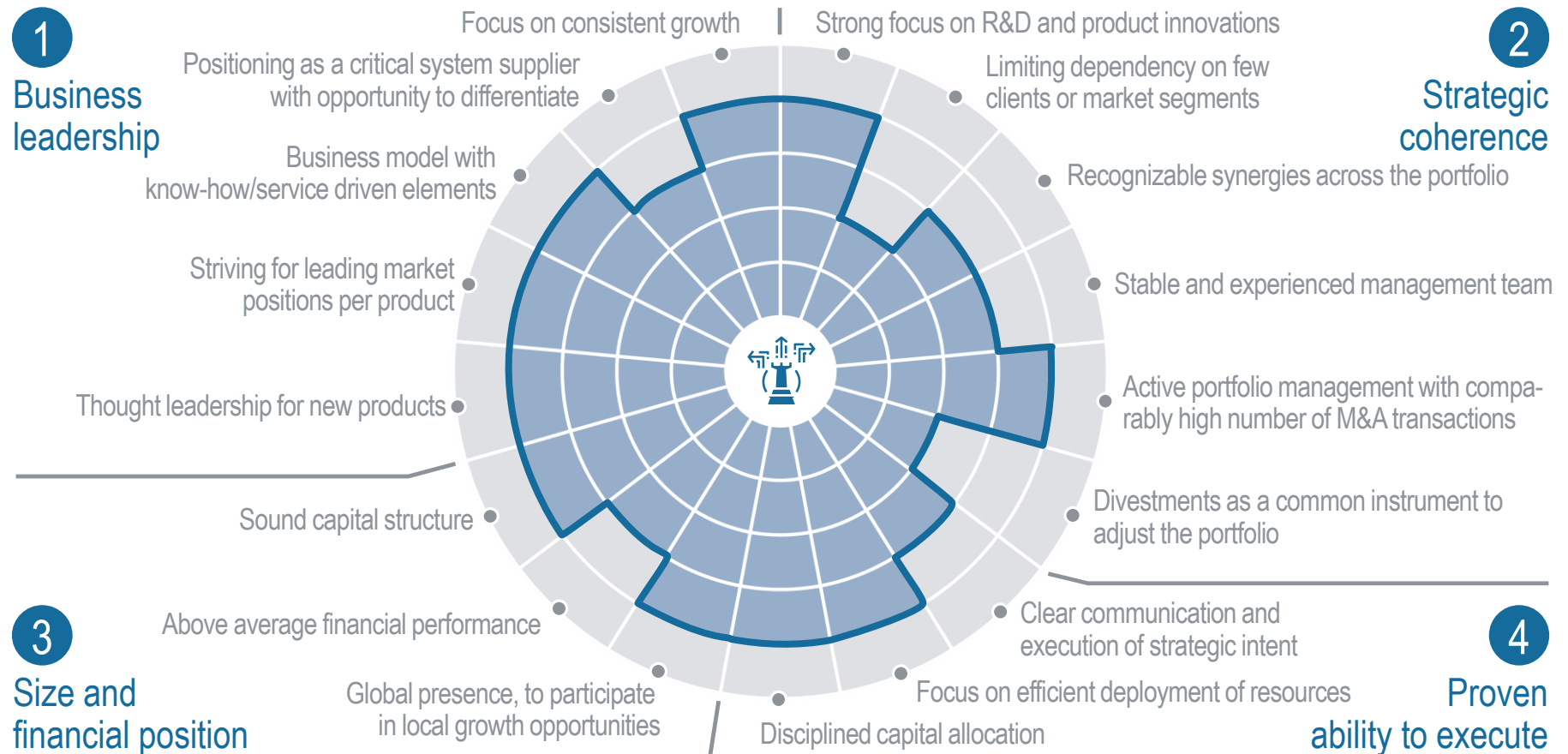
- > Winners and Cash-generators **consistently beating investors expectations** in terms of profitability
- > Companies are seeing this manifested in the ability to **better focus their available capital** into growth opportunities or performance improvement measures
- > If necessary, winners and cash-generators have the **courage to course-correct** and participate in the new technologies
- > **Investment decisions**, e.g. M&A measures, **follow a clear strategic intent** to take the company into a predefined direction
- > By doing that, they secure business leadership and keep their strategic coherence, making them **successful on a sustainable basis**

1) Defined as percentage difference between actual earnings per share and consensus broker estimate prior to earnings announcement



# 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 and Lazard Automotive teams

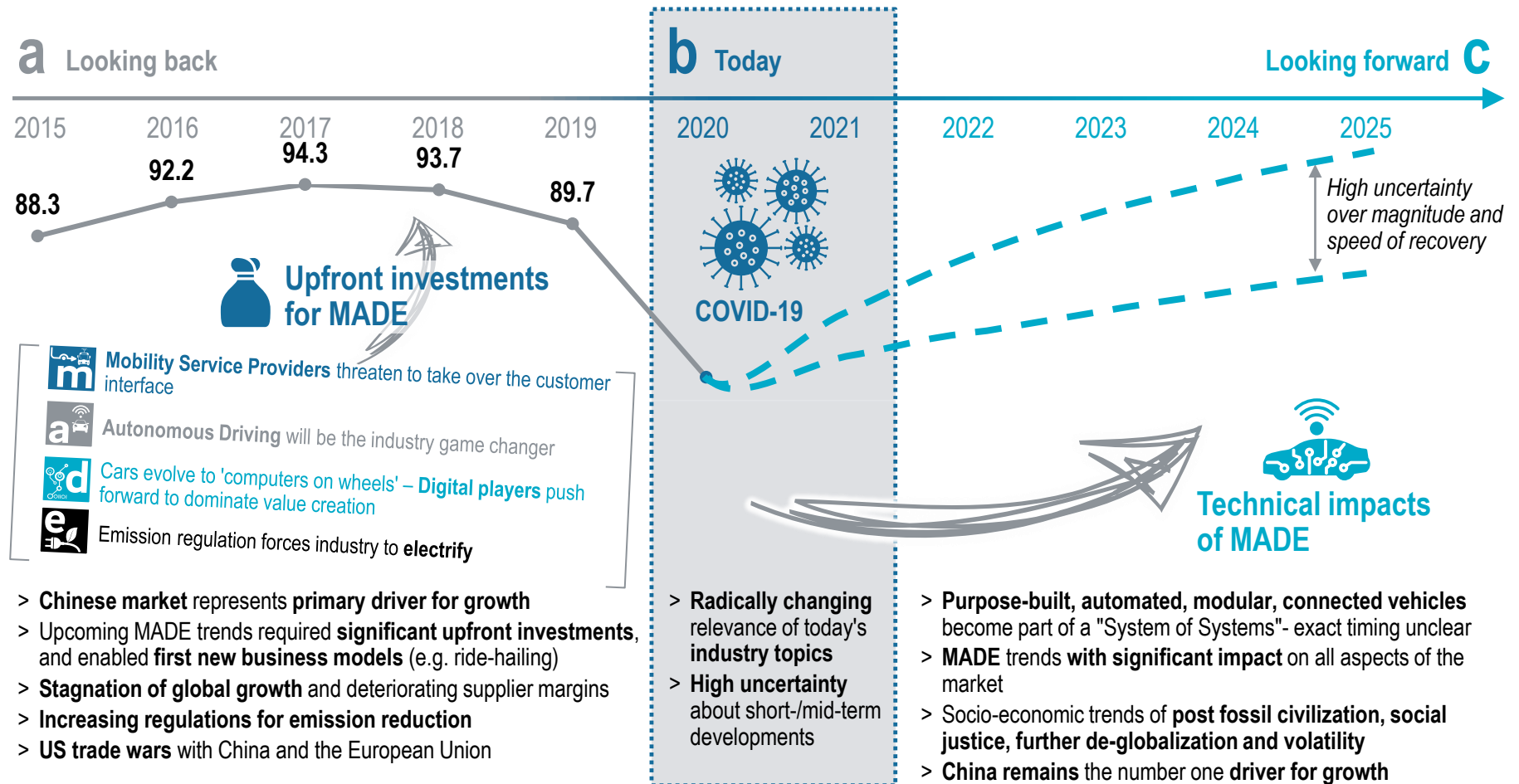
# The next economic cycle – Key takeaways



- 📍 The **speed** of the auto industry's volume **recovery remains highly uncertain** – but it might take until 2025 to reach pre-crisis volumes again
- 📍 **China** provides the **most attractive market environment** for suppliers going forward – driven by both growth prospects and favorable conditions along all MADE dimensions
- 📍 On top of MADE, **socio-economic megatrends** around sustainability, social justice and deglobalization will impose an **additional layer of complexity** onto supplier's business
- 📍 The industry's target picture of a **mobility ecosystem remains largely intact** even in light of COVID-19 – but it will likely take longer and yield **more technological and commercial challenges** than ever before

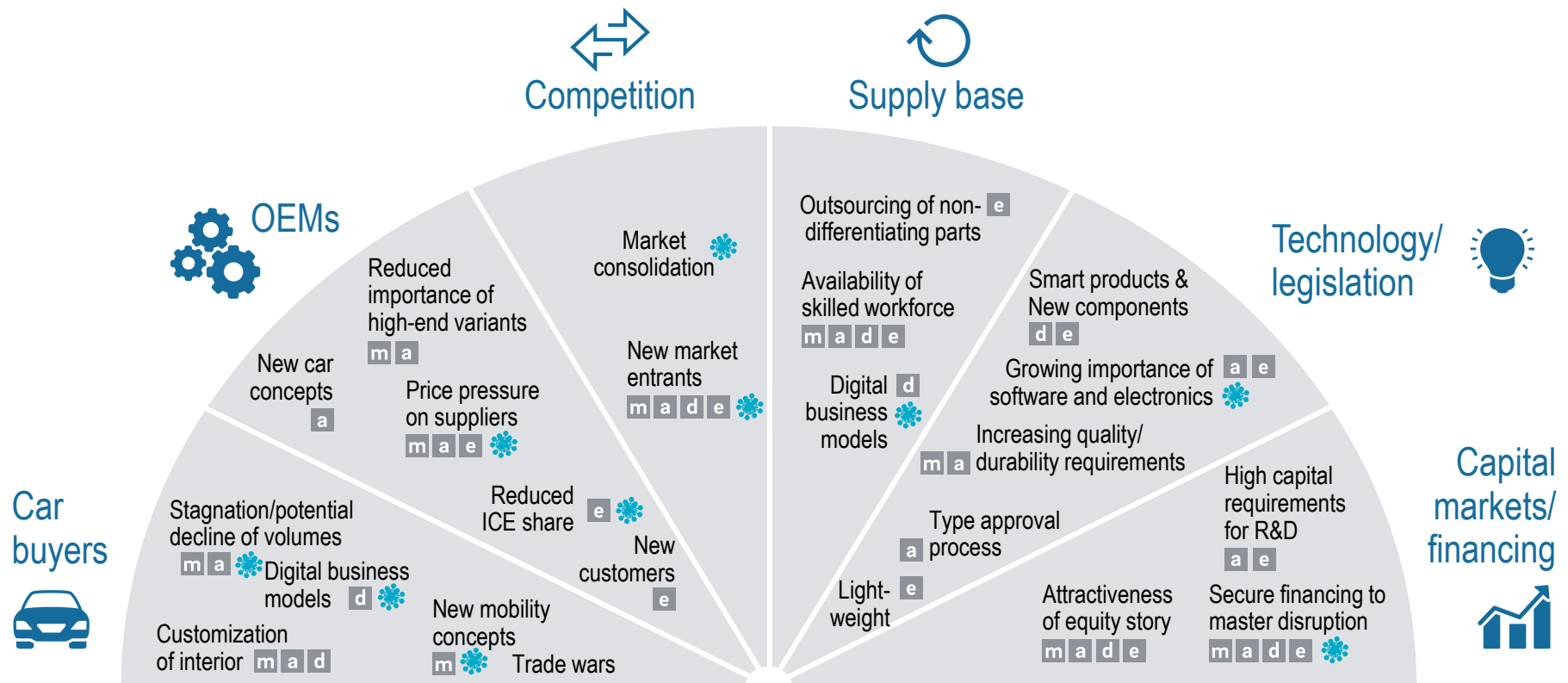
# COVID-19 comes on top of radical changes in managing financing and business model transformation

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



# Looking back, the MADE<sup>1)</sup> trends dominated supplier agendas and impacted almost all aspects of the automotive industry

Automotive supplier CEO radar screen, 2019 perspective



1) m Mobility a Autonomous d Digitalization e Electrification ❄️ Affected by COVID-19

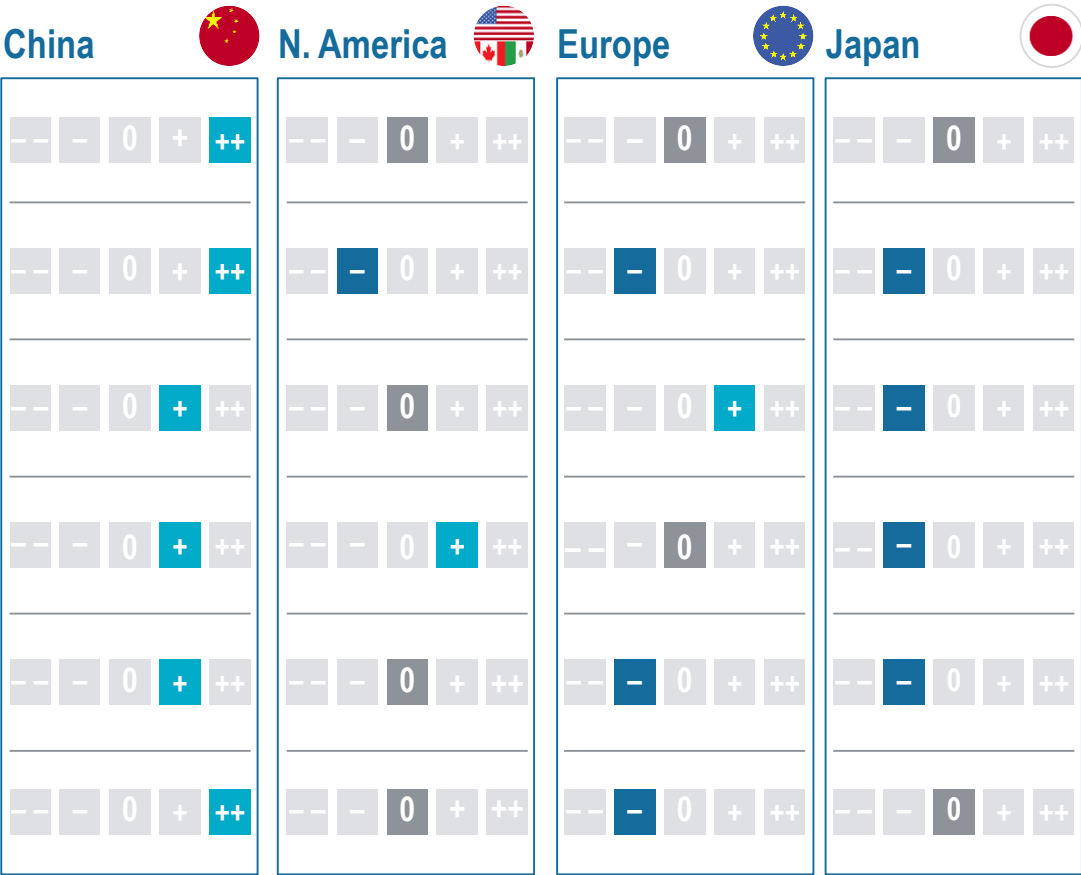
# Suppliers have to deal with different local environments and market dynamics in order to set the base for a successful future business

## Differentiating factors and prerequisites across regions

### Prerequisites influencing suppliers

**Recovery speed**

How fast are regions expected to recover from COVID-19 on short-term basis and general government crisis support?



**Sales volumes**

How are mid- to long-term light vehicles sales volumes expected to develop? Which growth for business offers the region?

**Government agenda**

How do governmental agendas and legal frameworks differ for local suppliers and thereby influence their businesses?

**Current supplier state**

How is the current financial health state of local supplier base and how are companies positioned for future competition?

**Access to capital**

How easy is the access to capital across regions to finance growth for the local suppliers?

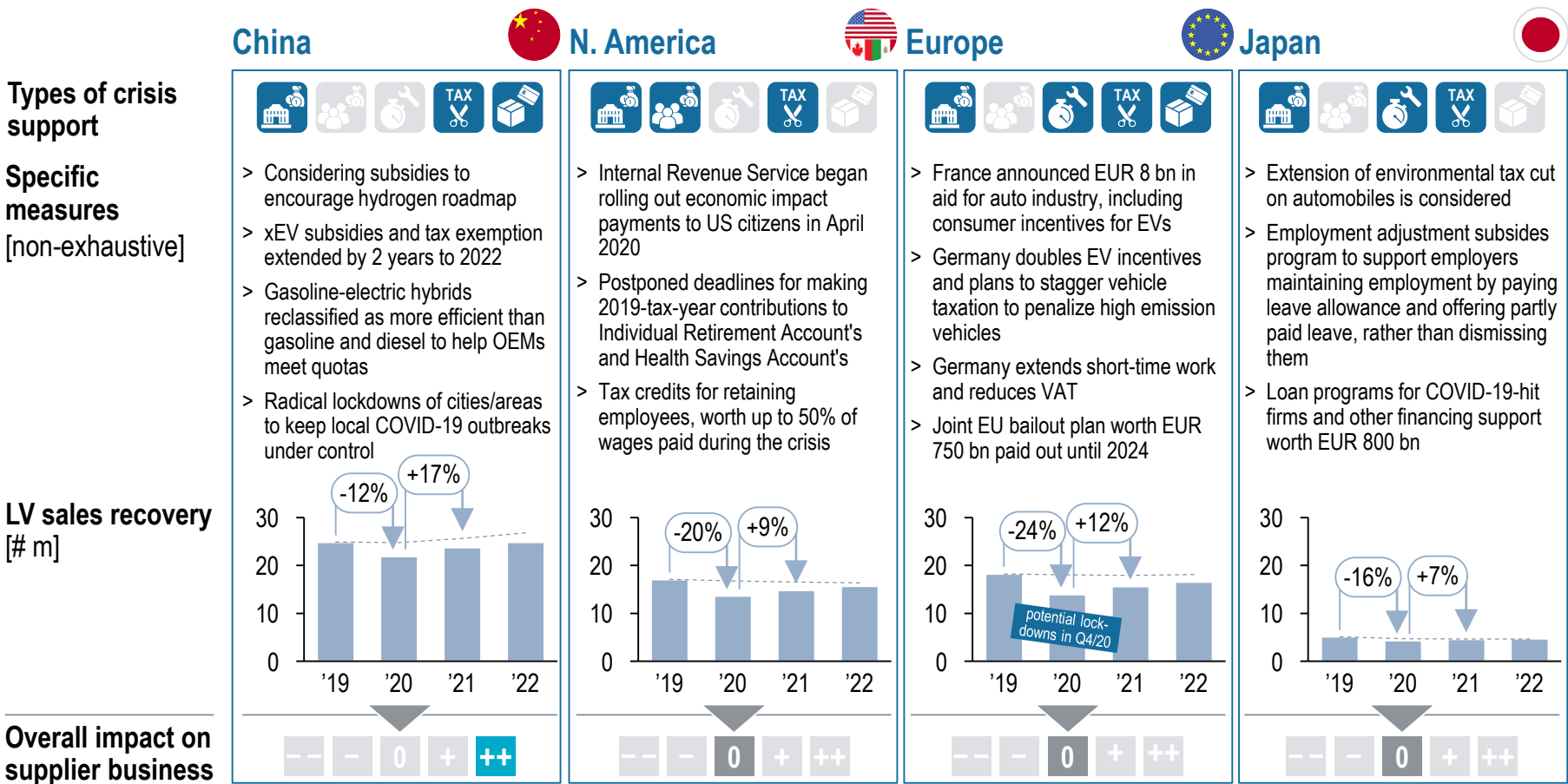
**MADE implications**

How do the MADE trends influence the local markets and how favorable is that for local suppliers?

-- - 0 + ++ Impact on supplier business: (strongly) negative, no impact, (strongly) positive

# Government reaction to the crisis differs significantly across regions – China with fastest recovery overall

## Government support and recovery speed

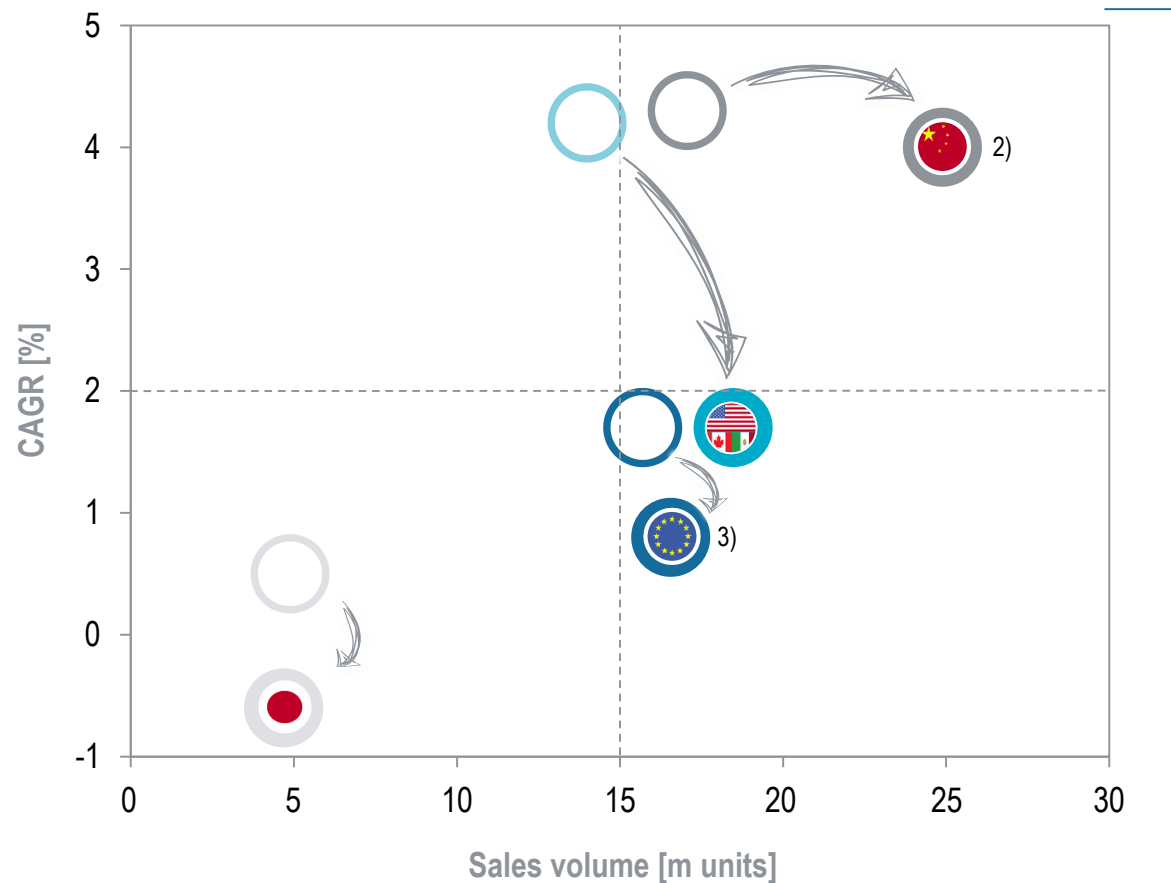


Financial aid for businesses Financial aid for individuals Short-time work Tax cuts Purchase incentives --- Pre-COVID sales forecast

Source: IHS, Roland Berger/Lazard

# The next growth period is expected to be driven by China while North American and EU sales growth is expected to stagnate

Global light vehicle sales volume<sup>1)</sup> by region



- > **China's sales growth are expected to continue** beyond the recovery of the COVID-19 shock
- > **North American and EU** light vehicle sales growth is expected to **stagnate** after the recovery from the COVID-19 shock
- > Light vehicle sales in **Japan are expected to slightly decrease** until 2026
- > Comparing to the period after the financial crisis 2008/09, sales growth in Europe, North America and Japan is **expected to be significantly lower**

### Overall impact on supplier business

China	--	-	0	+	++
North America	--	-	0	+	++
EU28	--	-	0	+	++
Japan	--	-	0	+	++



# The Western market regulatory framework makes business easier for suppliers – But US tariffs are a 'Sword of Damocles'

## Government policies

### Assessment criteria

#### Grants and subsidies

General financial support for companies

#### Free trade agreements

Range of international agreements to ease trade

#### Business taxation

Regional company tax rates

#### Tariffs

Duties for import business

#### Market regulation overall

Regional legal frameworks, e.g. for money transfer or business relationships

#### Labor laws

Labor friendliness of regulations, e.g. for downsizing

#### Framework for restructuring

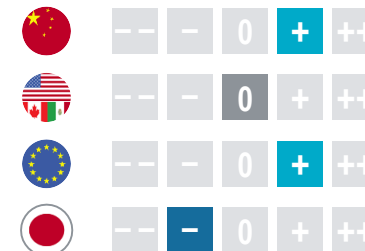
Regional regulations for processing of insolvencies and deleveraging

### Benefit for local supply base



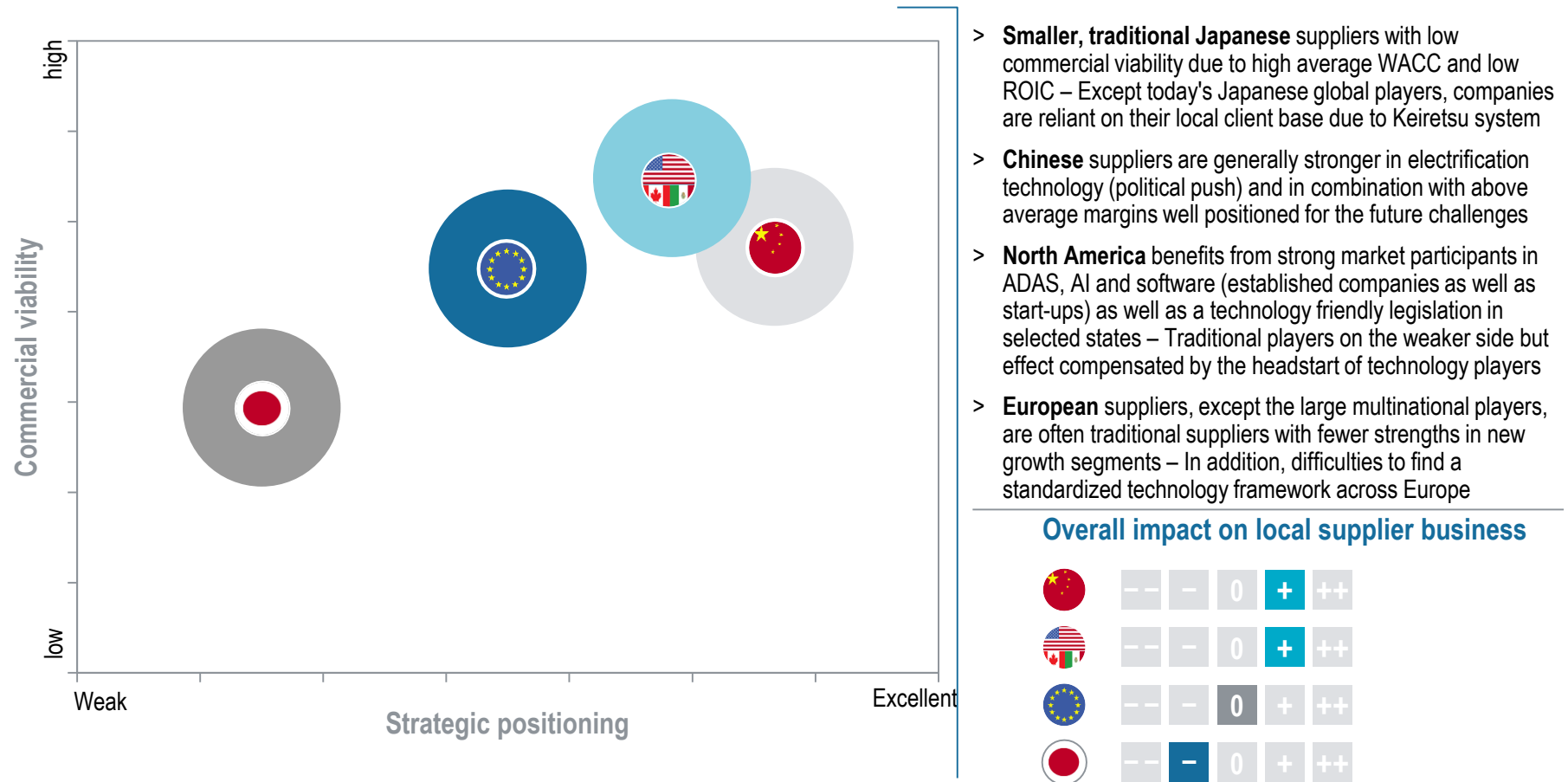
- > **China** is heavily investing in their technology players, but profits have to be maintained in China
- > With its "at will employment" and company friendly chapter 11 restructuring framework, the **US** offers favorable government policies for suppliers. Looming tariffs on imported vehicles favor local suppliers
- > Besides recent efforts to stop technology sellout, **European** suppliers are with little government support. Major countries in the EU have strict labor laws and strong work councils protecting employees, though Central/Eastern Europe offers more liberties
- > **Japan** plans to provide \$2.2 billion to help manufacturers shift their production out of China. With its "lifetime employment" system, labor laws are very protective of employees

### Overall impact on local supplier business



# Chinese suppliers are best positioned to profit from future tech while Japanese lag in both strategic position and commercial viability

## Commercial viability and strategic positioning of suppliers



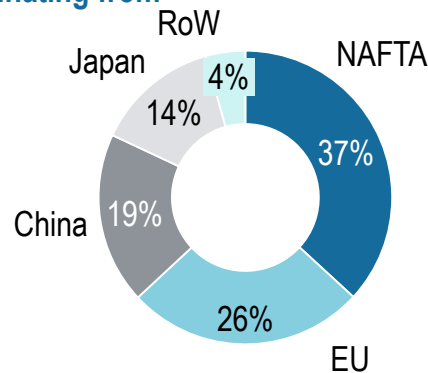
- > **Smaller, traditional Japanese** suppliers with low commercial viability due to high average WACC and low ROIC – Except today's Japanese global players, companies are reliant on their local client base due to Keiretsu system
- > **Chinese** suppliers are generally stronger in electrification technology (political push) and in combination with above average margins well positioned for the future challenges
- > **North America** benefits from strong market participants in ADAS, AI and software (established companies as well as start-ups) as well as a technology friendly legislation in selected states – Traditional players on the weaker side but effect compensated by the headstart of technology players
- > **European** suppliers, except the large multinational players, are often traditional suppliers with fewer strengths in new growth segments – In addition, difficulties to find a standardized technology framework across Europe

# North America has highest capital availability – Historically highest share of invest in EU suppliers, but trend is towards China and US

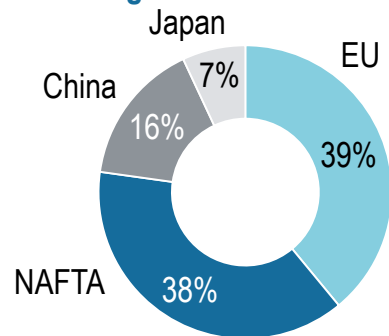
## Investments into the automotive industry

### M&A capital<sup>1)</sup>...

... originating from

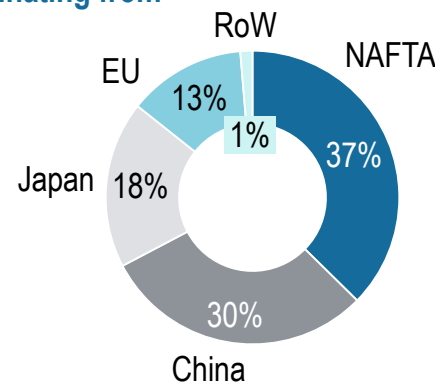


... invested in region

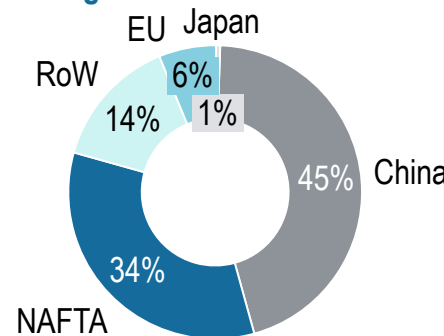


### Venture capital funding<sup>2)</sup> ...

... originating from

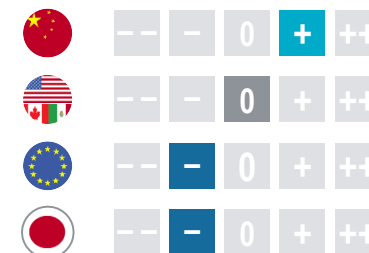


...invested in region



- > Almost **40% of capital invested** in disclosed M&A deals between 2017 and 2020 came from North American region
- > **Weaknesses of the Japanese supply base** become obvious as Japanese investors seek primarily assets outside Japan
- > Overall **access to capital** has become **more challenging**
- > **Foreign control hurdles** impacting **Chinese** investments
- > **Perceived attractiveness** of sector diminished

### Overall impact on supplier business



1) Based on disclosed deal value Private Placement or Merger/Acquisition in the automotive supplier industry from 2017-2020

2) Estimated numbers based on disclosed Venture Capital investments from 2017-2020

Source: CapIQ, TRACXN, Roland Berger/Lazard

# From a MADE perspective, prerequisites for suppliers to monetize product offerings in the mid-term are the best in the Chinese market

## Regional impact<sup>1)</sup> of future technologies

### MADE categories



#### Mobility

The future of moving people & goods



#### Autonomous

Replacing drivers to improve safety and cost



#### Digitalization

Big Data analytics, connectivity & AI



#### Electrification

Hybrid or electric powertrains

### Regional technology interest



- > **Ride-hailing** firms scale up, however, **currently negative effect of COVID-19** on consumer acceptance of shared mobility
- > **Autonomous mobility gains importance** and COVID-19 further accelerates relevance of autonomy for mobility concepts
- > **Digitalization** and connectivity **become more common**, with digital business models gaining importance as vehicle sales slump
- > **OEMs and suppliers are heavily investing in electric mobility** as a future market, supported by some COVID-19 government subsidies explicitly for EV's

### Overall impact on local supplier business

	--	-	0	+	++
	--	-	0	+	++
	--	-	0	+	++
	--	-	0	+	++

1) Qualitative assessment

# 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. CPTPP<sup>1)</sup>
-  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 GDP +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

# Changes in the socio-economic megatrends are expected to noticeably change the future business of automotive suppliers

## Exemplary implications on traditional automotive suppliers

### Post fossil civilization



- Increasing share of electric mobility leads to a shift of value add towards the suppliers
- Especially for ICE powertrain focused suppliers very negative impact due above average volume decline in the next years
- Declining volumes overall due to stronger use of alternative mobility concepts
- New players for new technologies, e.g. battery suppliers or software players, enter the automotive supplier landscape and increase competitive pressures



### Social justice



- Negative image of luxury or premium cars in established markets leads to volume declines for high-end variants
- Increasing importance of supply chain sustainability including proof of origin requirements for ethical sourcing, e.g. raw material
- Increasing importance of social engagement as part of a good brand image to attract talent
- Diversity topics to be expected on the agendas of many suppliers and thus pull significant management attention



### De-globalization



- Increasing tendency for local-for-local supply-chains, driven mostly by the COVID-19 crisis
- De-globalization of supply-chains will drive competition for international suppliers in local markets
- Significantly increasing need for internal collaboration and global know-how transfer but also required efforts to protect intellectual property
- Further increase in factor costs and more difficulties to manage plant utilization from a global perspective



### Volatility



- Increasing difficulties to ensure stable plant utilizations across the value chain
- Increasing planning complexity in almost all business processes, e.g. supplier management, production or capacity planning
- Higher capital requirements on the one hand to finance capacity requirements and more difficulties to draw convincing equity stories for investors in the light of higher uncertainties
- Logistic as well as relocation costs expected to increase in the future



### Overall impact

➤ Positive impact   ➤ Negative impact

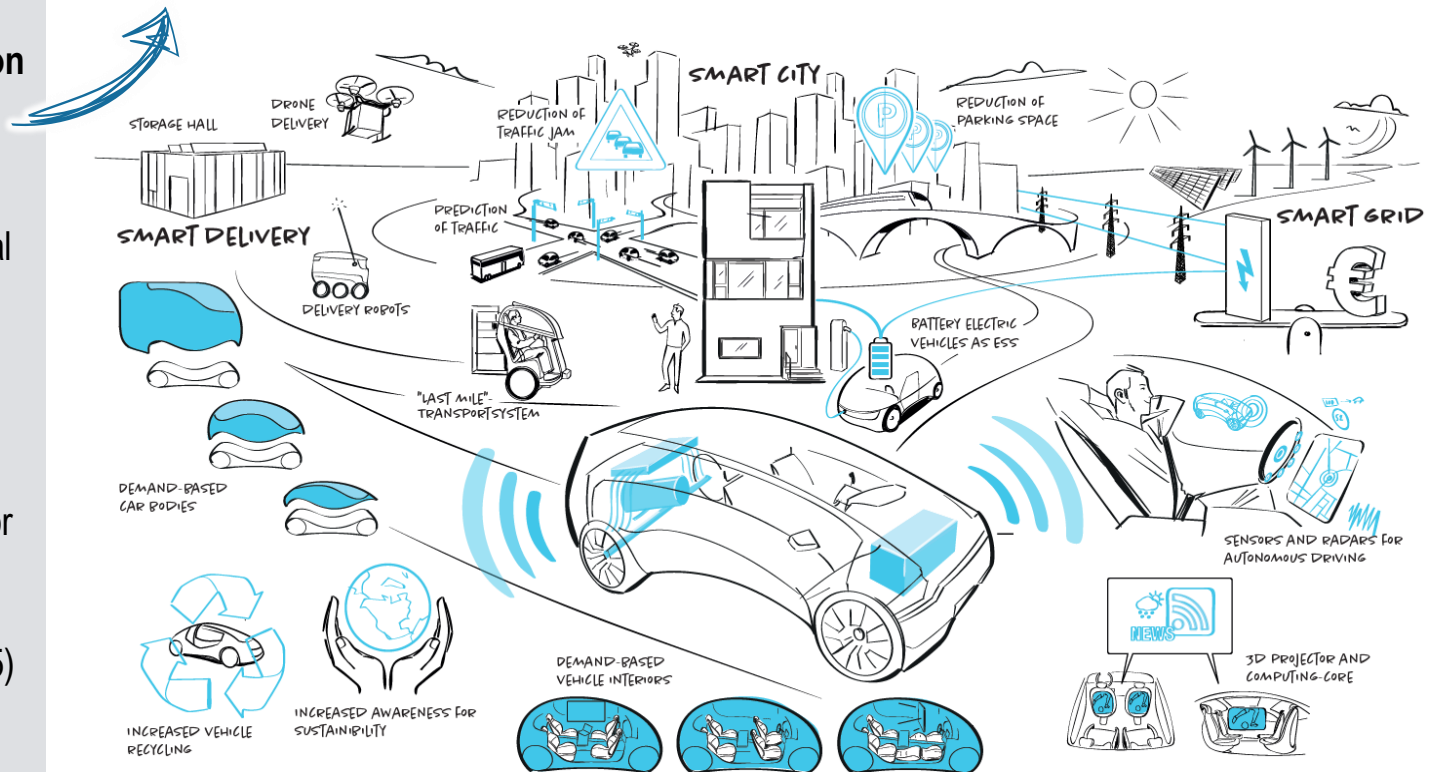


# The current pandemic doesn't change the future automotive and mobility ecosystem – R&D remains key to ensure long-term success

## Industry transformation 2030 and beyond

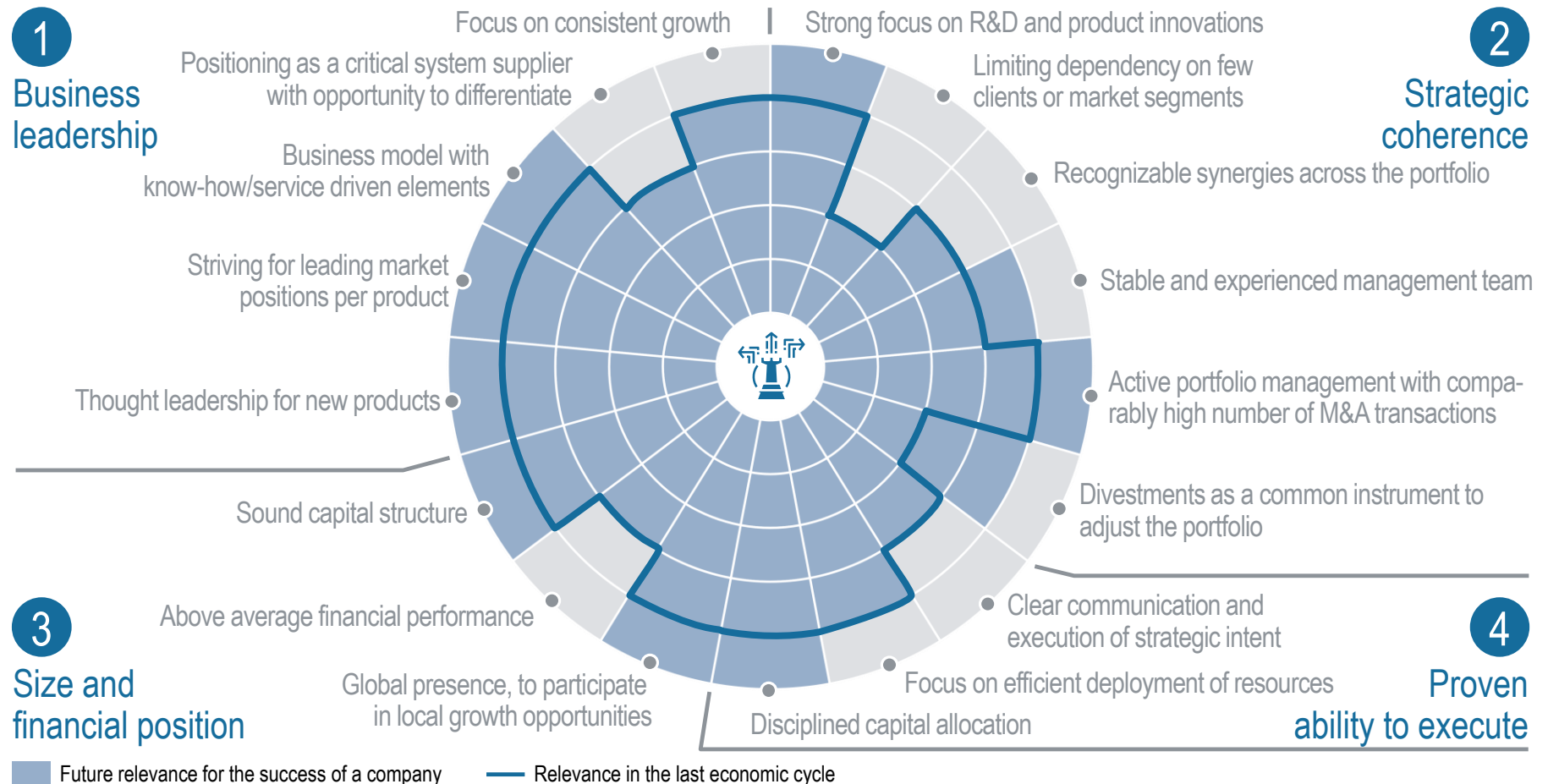
- > High share of electric vehicles (30-50% w/o ICE)
- > AI-based optimization of "super-systems" (e.g. traffic flow plus grid load)
- > Low share of individual car ownership
- > MaaS using purpose-built mobility vehicles (PMV's):
  - Modular
  - Electric (BEV and/or FC)
  - Connected
  - Autonomous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

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



# Looking ahead, most Winners' differentiators will gain additional importance

## Strategic options for automotive suppliers





# 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 and Lazard Automotive teams

# The way forward – Key takeaways



- 📍 Suppliers need to think and act along **three dimensions to navigate through the challenges** of COVID-19 and the industry transformation
- 📍 Defined MADE strategies will likely require a course-correction, leading to a revised **positioning** of a supplier's **product, customer and regional portfolio** – Chinese/Japanese suppliers will have to further internationalize, while many of their European peers will have to catch up on new technologies
- 📍 **Performance** improvement will remain an inevitable part of any supplier's activity in the near future to **master the ongoing cost pressure** across virtually all vehicle domains – Next to efficiency gains, **restructuring of legacy businesses** will be a core element for many triad suppliers
- 📍 Suppliers will have to pay more attention to defining answers for the socio-economic megatrends than before – Substantial **progress** is needed to **drive sustainability and cope with de-globalization** in order to prevent negative business impact in the mid- and long-term

# The industry transformation puts the same challenges on each supplier CEO's agenda but with individual solutions for the way out

## Strategic roadmap – Exemplary for Tier 1 system supplier

	Own position	Strategic direction	Challenge	Potential solutions
Traditional stable/ shrinking areas	<b>Strong</b>	<ul style="list-style-type: none"> <li>&gt; Keep profitable business units</li> <li>&gt; Cement long-term leadership through acquisitions</li> </ul>	<ul style="list-style-type: none"> <li>&gt; Price pressure from customers</li> <li>&gt; Protection of current market position against emerging disruptors</li> <li>&gt; Ongoing restructuring need</li> </ul>	<ul style="list-style-type: none"> <li>✓ Continuously reduce cost base of traditional business</li> <li>✓ Manage free cash flow, reducing Capex/R&amp;D</li> <li>✓ Acquire competitiveness at low/discount level</li> </ul>
	<b>Weak</b>	<ul style="list-style-type: none"> <li>&gt; Radical restructuring of legacy business</li> <li>&gt; Divest cash burning units without future growth potential</li> </ul>	<ul style="list-style-type: none"> <li>&gt; Lack of potential buyers</li> <li>&gt; Low valuation levels</li> </ul>	<ul style="list-style-type: none"> <li>✓ Mergers or Joint Ventures</li> <li>✓ Spin-off or subsidiary IPO to form consolidation platforms (in case of sizeable businesses)</li> </ul>
Future growth areas	<b>Strong</b>	<ul style="list-style-type: none"> <li>&gt; Invest in areas with future growth potential</li> </ul>	<ul style="list-style-type: none"> <li>&gt; Capex intensive in the short- to mid-term</li> </ul>	<ul style="list-style-type: none"> <li>✓ Partnership in R&amp;D</li> <li>✓ Consider minority IPOs or capital increase to generate required funds</li> </ul>
	<b>Weak</b>	<ul style="list-style-type: none"> <li>&gt; Divest high growth units where own position is too weak or where financial power is not sufficient to develop the business</li> </ul>	<ul style="list-style-type: none"> <li>&gt; High investments required, while access to capital is difficult</li> </ul>	<ul style="list-style-type: none"> <li>✓ Exit at valuation peaks and use proceeds for deleveraging or re-investing in core business</li> <li>✓ Use SPACs as alternative to IPOs</li> </ul>

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



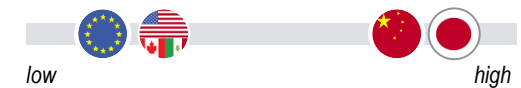
**Adjustment of target clients**

- > 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



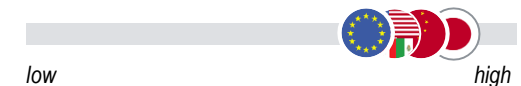
**Adjustment of target operating model (robust organization)**

- > 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



# Suppliers have to prepare for the next economic cycle

## Key takeaways for automotive suppliers

COVID-19 and the acceleration of the technological changes coming alongside with the industry transformation are the **starting point for a new economic cycle** – This is a serious milestone for suppliers

---

Neither the product domain nor the regional positioning is a limiting factor – A **thought-through strategy** which is **consistently executed** is the **key for the success** of a company

---

**Suppliers have to consider course-correcting their overall strategy** to ensure a suitable positioning for future success – **Classical cost-cutting programs will not be sufficient** to prepare

---

**Radical restructuring or even disposal of legacy businesses with a weak competitive position is required** to dispose of a burden that might put the company's existence at risk in the new normal

---

Given **tighter access to equity** as well as **traditional/credit financing**, suppliers should consider alternative **ways to fund growth opportunities**, e.g. minority IPOs or spin-offs of sought-after/high-growth business areas

---

**Smart partnership solutions** become **more important than ever** – Automotive suppliers have to think beyond classical Joint Ventures and find ways to collaborate in R&D, product offerings and funding for their endeavors

---

**Automotive suppliers have to transform** and ensure the agility in their organizations to deal with an increasingly volatile market 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 and Lazard Automotive teams

# Please contact us for further information

## Your contacts



**Felix Mogge**  
Senior Partner

+49 89 9230-8346  
felix.mogge@rolandberger.com



**Florian Daniel**  
Principal

+49 89 9230-8374  
florian.daniel@rolandberger.com



**Christof Söndermann**  
Managing Director

+49 69 170073-221  
christof.soendermann@lazard.com



**Ken Oliver Fritz**  
Managing Director

+49 69 170073-69  
ken.fritz@lazard.com

### Authors of this study



**Brandon Boyle**  
Senior Partner

+1 248 525-8924  
brandon.boyle@rolandberger.com



**Eric Kirstetter**  
Senior Partner

+33 1 5367-0988  
Eric.Kirstetter@rolandberger.com



**Mohit Kohli**  
Managing Director

+1 212 632-6794  
mohit.kohli@lazard.com



**Cédric Leoty**  
Managing Director

+33 1 44 13 01 86  
cedric.leoty@lazard.com



**Ron Zheng**  
Senior Partner

+86 21 52986677-163  
ron.zheng@rolandberger.com



**Hitoshi Kaise**  
Partner

+81 3 35876-682  
hitoshi.kaise@rolandberger.com



**Julia Huang**  
Managing Director

+86 10 57069199  
julia.huang@lazard.com



**Yuta Nakao**  
Director

+81 3 5511 6034  
yuta.nakao@lazard.com

### Global contacts



# LAZARD

*This presentation was prepared by Lazard & Co. GmbH ("Lazard") and Roland Berger GmbH ("RB") exclusively for the benefit and internal use of our clients and solely as a basis for discussion of certain topics related to the automotive supplier industry described herein. This presentation is strictly confidential and may not be reproduced, summarized or disclosed, in whole or in part, without the prior written authorization of both Lazard and RB, and by accepting this presentation you hereby agree to be bound by the restrictions contained herein.*

*This presentation is based on publicly available information that has not been independently verified by Lazard or RB. Any estimates and projections contained herein involve significant elements of subjective judgment and analysis, which may or may not be correct. Neither Lazard, nor any of its affiliates, nor any of its direct or indirect shareholders, nor any of its or their respective members, employees or agents, nor RB provides any guarantee or warranty (express or implied) or assumes any responsibility with respect to the authenticity, origin, validity, accuracy or completeness of the information and data contained herein or assumes any obligation for damages, losses or costs (including, without limitation, any direct or consequential losses) resulting from any errors or omissions in this presentation.*

*The economic estimates, projections and valuations contained in this presentation are necessarily based on current market conditions, which may change significantly over a short period of time. In addition, this presentation contains certain forward-looking statements regarding, among other things, the future financial performance of automotive suppliers, which may include projections based on growth strategies, business plans and trends in the automotive sector and global markets. These forward-looking statements are only predictions based on current expectations; the actual future results, levels of activity and/or financial performance of automotive suppliers may differ materially from the predictions contained in this presentation. Changes and events occurring after the date hereof may, therefore, affect the validity of the statements contained in this presentation, and neither Lazard nor RB assumes any obligation to update and/or revise this presentation or the information and data upon which it has been based.*